



AGENDA

President and Board of Trustees
Village of Arlington Heights
Board Room

Arlington Heights Village Hall
33 S. Arlington Heights Road
Arlington Heights, IL 60005

October 19, 2015

8:00 PM

I. CALL TO ORDER

II. PLEDGE OF ALLEGIANCE

III. ROLL CALL OF MEMBERS

IV. APPROVAL OF MINUTES

- A. Committee of the Whole 09/15/2015
- B. Village Board Minutes 10/05/2015

V. APPROVAL OF ACCOUNTS PAYABLE

- A. Warrant Register of 10/15/15

VI. RECOGNITIONS AND PRESENTATIONS

- A. Presentation of Disability Employment Awareness Award to the Arlington Heights Park District

VII. PUBLIC HEARINGS

VIII. CITIZENS TO BE HEARD

Anyone wishing to speak on a subject not on the Agenda should fill out a card, located in the back of the room, and hand it to the Village Clerk. Please limit your comments to three minutes.

IX. OLD BUSINESS

X. CONSENT AGENDA

This Agenda consists of proposals and recommendations that, in the opinion of the Village Manager, will be acceptable to all members of the Board of Trustees. The purpose of this Agenda is to save time by taking

only one roll call vote instead of separate votes on each item.
Consideration of this Consent Agenda will be governed by the following rules and procedures prior to roll call vote:

1. Any Trustee who wishes to vote "no" or "pass" on any Consent Agenda items should so indicate.
2. Upon the request of any one Trustee, any item will be removed from the Consent Agenda and considered separately after adoption of the Consent Agenda.
3. Citizens in the audience may ask to remove any item on this Consent Agenda.
4. One roll call vote will be taken and will cover all remaining Consent Agenda items.

CONSENT APPROVAL OF BIDS

- A. Non-Chloride Granular Deicer Contract
- B. Repairs to John Deere End Loader
- C. Non-Chloride Liquid Deicer Contract

CONSENT LEGAL

- A. An Ordinance Amending the Comprehensive Plan and Official Map of the Village of Arlington Heights (2015 Update)
- B. An Ordinance Granting a Variation from Chapter 28 of the Arlington Heights Municipal Code (Holy Nation Presbyterian Church, 2501 N. Chestnut Ave.)
- C. An Ordinance Amending the Comprehensive Plan of the Village of Arlington Heights (2501 N. Chestnut Avenue)
- D. An Ordinance Establishing the Speed Limit on Certain Streets in the Village of Arlington Heights

CONSENT REPORT OF THE VILLAGE MANAGER

- A. Workers' Compensation Settlement - Richard Manthy
- B. Workers' Compensation Settlement - Michael Perkovich

XI. APPROVAL OF BIDS

XII. NEW BUSINESS

- A. The Moorings - 811 E. Central Rd. - PC#15-012

XIII. LEGAL

XIV. APPOINTMENTS

XV. PETITIONS AND COMMUNICATIONS

XVI. REPORT OF THE VILLAGE MANAGER

- A. Review of FY2015 Comprehensive Annual Financial Report (CAFR) - Mr. Ron Amen, Lauterbach & Amen, LLP
- B. Lexington Homes - 900 W. Campbell St. - Early Review

XVII.ADJOURNMENT

Persons with disabilities requiring auxiliary aids or services, such as an American Sign Language interpreter or written materials in accessible formats, should contact David Robb, Disability Services Coordinator, at 33 S. Arlington Heights Road, Arlington Heights, Illinois 60005, (847)368-5793 (Voice), (847)368-5980 (Fax) or drobb@vah.com.



Item: Committee of the Whole 09/15/2015

Department: Village Clerk

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
Committee of the Whole 09/15/2015	Minutes



MINUTES

President and Board of Trustees
Village of Arlington Heights
Committee-of-the-Whole
Community Room
Arlington Heights Village Hall
33 S. Arlington Heights Road
Arlington Heights, IL 60005
September 15, 2015
7:30 PM

I. CALL TO ORDER

II. PLEDGE OF ALLEGIANCE

III. ROLL CALL

BOARD MEMBERS PRESENT: President Hayes; Trustees: Farwell, Glasgow, LaBedz, Rosenberg, Scaletta, Sidor and Tinaglia

BOARD MEMBERS ABSENT: Blackwood

STAFF MEMBERS PRESENT: Randy Recklaus, Diana Mikula, James McCalister, Charles Perkins, Michael Mertes and Becky Hume

IV. NEW BUSINESS

A. Chamber Small Business Report

President Hayes thanked the Board and the community partners who worked to ensure a business friendly Village. The success of businesses will help lower taxes for property owners. He said it was a good example of a public/private partnership.

Mr. Recklaus said municipalities and Chambers of Commerce do their best work when they work together. He said the Chamber is a force multiplier for staff. Tonight's presentation is part of the agreed-to reporting process to the Village Board which is the client.

Mr. Jon Ridler and Mr. Jim Platt of the Arlington Heights Chamber of Commerce summarized the Small Business Development Report (Exhibit A). Fifty two successful case studies were created. They said that after conversations with local State Representatives Harris and Nekritz, there may

be an opportunity for matching funds from the State.

Mr. Platt said his focus was: retention visits, businesses with expansion plans, education and development. He said he tried to keep visits balanced and proportional to kinds of businesses and locations within the Village. He was able to have further conversations in the second year, but as they were more involved, there were also fewer of them. Mr. Platt was pleased that he was able to help businesses open sooner which put more dollars into the economy more quickly. He said that pathways found in the Planning and Building and Health Services Departments were identified for new businesses. He developed a way to better explain Village processes and as a result he was able to help expedite the processes sooner for follow-on businesses.

Mr. Platt said centralized marketing is a resource that businesses are looking for and he would like to expand that issue. He said many businesses are concerned with confidentiality; they are reluctant to voice concerns or ask questions.

Mr. Platt said at the beginning of the program, he primarily listened; many businesses were surprised that there was a representative from the Village/Chamber dedicated to small businesses. He said the goodwill was invaluable and powerful.

Mr. Gerd Loeff of Signs by Tomorrow said they just opened in a new, larger space in the Village. He said they almost moved to a neighboring suburb as there was only one property that would work in Arlington Heights and there were too many unanswered questions at this new location. Mr. Platt helped to find answers to the questions and helped them find resources like an architect, a tax consultant and construction companies, who could offer advice on how to make the Davis Street property work. Jim helped trouble shoot the zoning and building permit issues and arranged for him to meet with the proper Village staff. Mr. Loeff noted that Trustee Sidor gave support. He said he is confident they have made the right decision to stay. He said he felt much more comfortable because of the support from Mr. Platt and the help from the Village staff and that he could not have relocated within the Village without the relationships Mr. Platt brought.

President Hayes thanked Mr. Loeff for staying in the Village.

Dr. Martin Matis, an optometrist in the Village, said he was looking for space to expand his business. There were a number of difficulties regarding a proposed new location on Arlington Heights Road. He contacted the Village but was told that staff could not give input as he did not own the property. He said he seriously considered moving his practice near his farm residence out of town. He said the property had a zoning variance, so he moved forward. He said resistance he got on signage and other issues made it difficult for him to stay, so he considered selling the building. Out of the blue, Mr. Platt called and helped with the signage problem. Dr. Matis said Mr.

Platt brought the necessary people together to work it out. As a liaison, Mr. Platt knew the process and helped so much. He said moving to a new location is really hard for a small business owner as it is typically a one-time situation and understanding the process is challenging. He said, if not for Mr. Platt, he would have moved to the country.

Larry Huber from Salsa 17 said he was struggling to get the outdoor patio opened when Mr. Platt appeared. He said had Mr. Platt been involved earlier, it could have shaved a year off. Prior to Mr. Platt's involvement, he felt like he was banging his head against the wall. Mr. Platt played the mediator between him and Village staff. Mr. Huber said the Village is benefitting as are the business owners.

Jason Miller of Fitness 19 said he used the Chamber as a resource to help understand the sign variation process. Mr. Platt helped him understand the Village's perspective. He said Trustees Sidor and Tinaglia also reached out with offers of support. He said Mr. Platt is a great resource and he might have been able to bring the sign variation request sooner if Mr. Platt had gotten involved earlier. He said the program is a great resource to help businesses navigate, expedite and better understand the Village perspective.

Mayor Hayes read Trustee Blackwood's comments. Trustee Blackwood said she took an informal poll and said the overwhelming sentiment of business owners was positive. She said the combined pairing of the Chamber and the Planning Department was to the Village's advantage.

Trustee Tinaglia said that as a user of the system, he understands it well, but his clients often do not. To have someone to "hold the hands" of people navigating the system is valuable. He said he would be okay with giving the program more financial support.

Trustee Farwell asked where the leads come from. Mr. Platt said phone calls come to the Chamber, and a lot of the leads are word of mouth from conversations with other business owners. Trustee Farwell said it appeared the position has evolved from liaison to expeditor. He asked what the Village can do to help facilitate the path of information to new businesses. Mr. Ridler said they have monthly conversations with Village Staff where opportunities for improvement are presented. Mr. McCalister gives them lists of businesses that have applied for permits, but haven't been back. Trustee Farwell said he would like to hear more of the stories to help the Village continue to improve. The reports don't tell whole story.

Trustee Scaletta said more narrative would be helpful. He asked what questions are asked at the visits. Mr. Platt said he tries to engage the owners by asking about their business and how long have they been there. When they talk about themselves, they are happy to give them their time. Not every call is great. Not every owner wants help but he still lets them know the resource is there. Mr. Platt said he receives updated business license application lists from the Village. He then runs a report to efficiently visit

businesses based on location.

Mr. Platt said he breaks down his list into the following categories: type of business issue, what his involvement can be, long term prognosis, recommendations to Village/Chamber to get ahead of issues, and what staff involvement is. Trustee Scaletta said he would like more information without jeopardizing confidentiality. He asked if there was a way to share common themes. Mr. Platt said they had identified common threads and attached case studies to them, to explain why a thread and not an isolated issue. He said they need to start having those discussions in the monthly meetings with staff. Not all 52 cases have common threads. Trustee Scaletta suggested explaining common issues at breakfast meetings and working with the Economic Alliance. He said a spreadsheet isn't sufficient as it doesn't tell the whole story. He said sometimes the process is there for a good reason, but streamlining and better understanding would be helpful. He did not want businesses trying to get around regulations; the Code is there for a reason. Mr. Platt said businesses want clarification; they're not looking to get around the Code. Usually they are good people trying to do things the right way.

Mr. Ridler said when its Code related, they help translate what the owners are hearing. He said that is when they hand off the contact to the Village. It is often the first time they are opening a business. Sometimes tradesmen are not reputable and are not forthcoming to the businesses. Mr. Platt said they have not been able to attend the Plan Review meetings as of yet. Mr. Recklaus said there have not been any qualified businesses. Trustee Scaletta said the more information the Village gets, the more beneficial this is, since the numbers don't always tell the story.

Trustee Rosenberg asked if the Trustees could see the case studies. He wants to see if the Village is doing everything they can do. He asked about the visits. Mr. Platt said he leaves each business with a packet of resources, database links, Chamber information, Village contacts, Postal information and a follow up letter. He encourages them to self-advocate.

Trustee Rosenberg asked if there were help sheets for the Village. Mr. Platt said no, but it would be a good thing to work on, if the Village has something, they would like it. Trustee Rosenberg asked if the trend seemed to be with larger businesses versus smaller ones. Mr. Platt said they brought those who were willing to share their stories on common threads. It's harder for smaller business to step forward because they don't want their name mentioned. They are terrified. Having the Chamber helping business owners helps them understand that they are not alone.

Mr. Ridler said the Chamber does not get involved with bigger businesses and are not pursuing businesses outside of the agreement; they must qualify within one of the criteria. A lot of handing off to staff has occurred. Trustee Rosenberg asked if there were comments available post hand off. Mr. Platt said yes, getting in touch with the right person makes the difference. Just knowing where to begin is helpful. Mr. Platt said that Village customer

service has shown a marketable difference in the last 6-8 months. Being recognized when you walk in the door is important.

Mr. Recklaus said a lot of businesses may have a connection with one department, but not another. Often the connection can help facilitate a meeting. By having Mr. Platt, there is one more person advocating for that business. When issues come from Mr. Platt or Mr. Ridler staff talks about how the Village can be more clear or helpful. In addition to input from the Chamber, Staff also regularly discusses feedback received directly from applicants and possible improvements and efficiencies that could be implemented. These ideas are discussed at weekly meetings and a handful of things have already changed internally. As an example, Mr. Perkins, Mr. McCalister and Mr. Massarelli are working on trading ownership of projects like fences so that only one department owns a process.

Trustee Rosenberg asked about the ownership issue when people ask for advice on a property. Mr. Recklaus said staff does not like to spend a lot of time when there is no attachment to property. Mr. Perkins said that they deal with this issue every day. The challenge is that someone is looking at a building, but doesn't want to hire an architect, and because there is no plan, staff can't give a specific answer because projects have so many contingencies. Sometimes they can answer questions, but many times they cannot. A list of architects has been provided to the Chamber for them to refer to clients. The Village is not allowed to make referrals. Recently the Village had an inspector go to a site to see if something was possible, so the business would know it was not wasting money. Mr. Recklaus said when questions are asked without an architect or plans, often all of it depends. Sometimes a hypothetical answer is given, then the plans come, and the client comes back saying that something was promised, but it no longer works because of some other issue. Mr. Recklaus said Mr. Perkins is correct, staff is tempted to give an answer, but it comes back to bite the Village and staff has to be really careful.

Mr. Ridler agreed that it is difficult. He said having staff come to the site is very valuable.

Trustee Rosenberg asked if the businesses were being pressured to join the Chamber on these visits. Mr. Platt said he downplays the Chamber connection so that it is seen as a resource. It's a building process, business owners need to see value before they invest.

Trustee LaBedz asked why business owners would be afraid to speak. Mr. Platt said the perception is that the Village is "the man." They are worried that they are going to be told they are doing something wrong. Trustee LaBedz asked if the fear abates. Mr. Platt said an advantage of being a former small business owner is that he is able to relate to these owners and help people relax. Trustee LaBedz asked about the centralized marketing. Mr. Platt said they are working to try and link neighborhoods with their nearest businesses so that people shop locally.

Mr. Ridler said some multicultural owners sometimes have fear of how government works; this perception gets portrayed onto local government. Trustee LaBedz said she would appreciate more narratives in the reporting, the more that can be shared the better.

Trustee Glasgow said he needed some quantification to support the program or increase it. The numbers appeared to him to be going in a downward trend. Mr. Platt said the initial surge won't be replicated. Calls take more time now because advocating takes more time, and more referrals to Village staff will need to occur. Mr. Platt said the Building Department has been very helpful. Knowing the client can move forward with staff is helpful. A more prioritized program to the most vulnerable businesses will be important moving forward.

Trustee Glasgow asked how many new Chamber members have resulted from these visits. Mr. Platt said the Chamber has grown 10% in the last two years. Trustee Glasgow wanted to make sure that since tax dollars were being used that there was a quantifiable reason to keep the program going. He needs more meat in the report to justify to voters and residents that this is working. Trustee Glasgow said there was a swing in the numbers between downtown/south-town/north-town. Mr. Platt said many of the downtown businesses were approached when the sandwich board sign issue was in play. There is more activity in the south end because of the density; it is easier to get through more businesses in a short amount of time. On the north side getting in/out can take a long time and the small business density is not present.

Mr. Ridler said they have more detail and want to find the right way to share the stories and opportunities.

Trustee Sidor said this program has been invaluable as far as the education it has provided. He said one issue learned is that the Building Department is integral to the process. He asked staff what their thoughts were. Mr. McCalister said that it has been positive and they have gone on visits together, the Village and the Chamber want the same thing and getting the word out is helpful. Their suggestions on how to make things easier for businesses have been helpful. The relationship is working well. Mr. Perkins said they spend a lot of time in their monthly meetings. There was a recent case where a business contacted Mr. Platt because it was looking to relocate. Mr. Platt put them in touch with staff that were able to help with the zoning process. The client called and thanked the Village for their help. Mr. Perkins said the program has improved communication by discussing cases, and understanding the issues. Trustee Sidor thanked Mr. Platt for putting people at ease.

Mr. Ridler said finding balance with this part-time initiative is an ongoing challenge. There is a great opportunity to grow this depending on resources available. There are a lot of businesses in town that have not been contacted.

It will take more resources to reach them and to continue the work to retain businesses. Trustee Sidor said it is hard to put a dollar amount on the program as the intangibles are what the program is about. He said businesses are happier, things are getting done more quickly, there is improved outreach, it is a great program, and he witnessed it first-hand.

Amy Philpott, Chamber of Commerce President, said she wished this program was there when she started. She said sometimes she just didn't understand what the Village was looking for. The Village is lucky to have Mr. Platt in the role. Ultimately, if the community wants to grow as business friendly, it must roll up its sleeves and find out how to make it happen.

Mr. Recklaus said there is an intersection between development and governance which is difficult. Arlington Heights is fortunate to have a robust business market with a lot of success. Standards go up. The Village has high standards. Every code added, solves a problem, but makes things a little more difficult and technical. The other element is resources. Mr. McCalister and Mr. Perkins have seen a 10% cut in staff and work is up to pre-recession levels. If each department added a few people they would be able to get things done quicker and have better conversations. The Chamber brings people who are afraid of talking to the Village. Most people don't have problems.

Mr. Recklaus said any increase spent on outreach has to be proportionate. The Village's departments are busy and struggling to process the thousands of permits they handle. The Village needs aggregate data, not just storytelling, individual case studies and general observations. From a staff standpoint, there is value in summarized anecdotes. He said he wouldn't want to overplay singular issues, and focus more on the forest and less on the trees.

Trustee Scaletta asked for the Village to provide some direction to the Chamber for reporting so that some specific ways are identified to improve processes. Mr. Recklaus said staff would meet with the Chamber to provide a more useful format and forward this to the Board members for input.

Trustee Farwell said in looking at the forest for three years, he is seeing improvement in the departments. He asked for a framework of the Chamber suggestions, then have that information given to the Board and staff and between the three entities come up with a report. Usually consultants come up with deliverables, and he would like this situation to be the same.

Mr. Recklaus said the difference is a lot of the Chamber's work is parallel to what staff is doing. He asked if the Board wanted a similar product from staff to balance it out. He said it is a question of how the information is weighed; some businesses go through the process with no problems. The Chamber's information would not be a representative sample.

Trustee Farwell said some improvements in process could improve workload

for staff. He wanted to make sure staff learned how to work smarter before more people are added.

Mr. Recklaus asked if the Board would like to see a case study in the monthly report with response, data and observations. Trustee Farwell said he wanted a pulse.

Mayor Hayes said he did not want 100 different case studies; he wanted to see common threads.

Mr. Ridler said the Chamber can pinpoint common threads and show them with staff's input, and work to get that tool out there.

Trustee Scaletta said he wanted different deliverables than was shown tonight. He asked for Mr. Recklaus to identify what it is the Chamber should provide to the Board.

President Hayes thanked everyone involved. He said Mr. McCalister, Mr. Mertes and Mr. Perkins were critical to the process, as it is difficult to give up control of responsibilities. Without their support and participation this would not be successful.

V. OTHER BUSINESS

VI. ADJOURNMENT

Trustee Glasgow moved to adjourn at 9:47 p.m. Trustee Scaletta seconded the motion. The motion carried.



Item: Village Board Minutes 10/05/2015

Department: Village Clerk

Bid Section

Item:

Bid Opening Date:

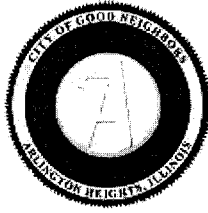
Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
Village Board Minutes 10/05/2015	Minutes



MINUTES

President and Board of Trustees
Village of Arlington Heights
Board Room
Arlington Heights Village Hall
33 S. Arlington Heights Road
Arlington Heights, IL 60005
October 5, 2015
8:00 PM

VIDEO **I. CALL TO ORDER**

VIDEO **II. PLEDGE OF ALLEGIANCE**

VIDEO A. Presentation of the Colors by Brownie Troop
#40531 from Olive-Mary Stitt School, 3rd Grade

VIDEO **III. ROLL CALL OF MEMBERS**

The Village Clerk called the roll with President Hayes and the following Trustees responding: Tinaglia, Farwell, Rosenberg, Glasgow, LaBedz, Blackwood, Sidor, Scaletta.

Also in attendance were: Randy Recklaus, Robin Ward, Charles Perkins, Scott Shirley, Cris Papierniak, Bill Enright, Matt Norton of Holland & Knight and Becky Hume.

VIDEO **IV. APPROVAL OF MINUTES**

VIDEO A. Committee of the Whole 08/31/2015 Approved

Trustee Joe Farwell moved to approve. Trustee Mike Sidor Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO B. Committee of the Whole 09/08/2015 Approved

Trustee Carol Blackwood moved to approve. Trustee Robin LaBedz
Seconded the Motion.
The Motion: Passed
Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta,
Sidor, Tinaglia

VIDEO C. Village Board Minutes 9/8/2015 Approved

Trustee Thomas Glasgow moved to approve. Trustee Robin LaBedz
Seconded the Motion.
The Motion: Passed
Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta,
Sidor, Tinaglia

VIDEO D. Committee of the Whole 09/21/2015 Approved

Trustee Joe Farwell moved to approve. Trustee Mike Sidor Seconded the
Motion.
The Motion: Passed
Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Sidor,
Tinaglia

Abstain: Scaletta

VIDEO E. Village Board Minutes 9/21/15 Approved

Trustee Carol Blackwood moved to approve. Trustee Robin LaBedz
Seconded the Motion.
The Motion: Passed
Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Sidor,
Tinaglia

Abstain: Scaletta

VIDEO **V. APPROVAL OF ACCOUNTS PAYABLE**

VIDEO A. Warrant Register of 9/30/2015

Trustee Joe Farwell moved to approve the Warrant Register dated 9/30/15
in the amount of \$1,409,793.85. Trustee Thomas Glasgow Seconded the
Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VI. RECOGNITIONS AND PRESENTATIONS

VII. PUBLIC HEARINGS

VIDEO VIII. CITIZENS TO BE HEARD

Jim Valencia asked about the current status of the fence on Davis Street next to the rail road tracks. Mr. Recklaus said staff is looking at several different cost actions. The fence will be part of the Capital Improvement Budget process. There are a number of worthy projects, and the Village must look at all the projects together. Mr. Valencia asked to be kept informed of the planning so that he can have input as a representative of the community.

Rob Sherman of Buffalo Grove said he had a concern pertaining to the p-ticket adjudication process. He was in attendance at the August hearings which were problematic. He said there were numerous problems with the way the hearings were conducted. He said he contacted Ms. Ward, who looked into the matter, and she said what the Village is doing is proper and no changes needed to be made. Mr. Sherman said he strongly disagrees. He asked the Board to review the p-ticket adjudication process. He asked for a response from the Village or Board within three weeks and would also like to be notified if changes are being contemplated.

President Hayes said staff will follow up with the Board, and will follow up with Mr. Sherman as to the status of his request.

VIDEO IX. OLD BUSINESS

VIDEO A. Report of the Committee-of-the-Whole Meeting of Approved October 5, 2015

Interview of Andi Ruhl for Appointment to the
Arlington Economic Alliance

President Hayes administered the Oath of Office to Ms. Ruhl.

Trustee Robin LaBedz moved to concur with the Mayor's appointment of Andi Ruhl to the Arlington Economic Alliance with a term ending 4/30/16. Trustee Carol Blackwood Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

B. Report of the Committee-of-the-Whole Meeting of Approved
October 5, 2015

Interview of Dr. Michael Bagby for Appointment to the Bicycle & Pedestrian Advisory Commission

President Hayes administered the Oath of Office to Dr. Bagby.

Trustee Joe Farwell moved to concur with the Mayor's appointment of Dr. Michael Bagby to the Bicycle & Pedestrian Advisory Commission with a term ending 4/30/16. Trustee John Scaletta Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO X. CONSENT AGENDA

CONSENT OLD BUSINESS

VIDEO CONSENT APPROVAL OF BIDS

VIDEO	A.	2015 Pavement Management Program	Approved
-------	----	----------------------------------	----------

Trustee Robin LaBedz moved to approve. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaqlia

VIDEO	B. Firefighter Turnout Gear Drying Cabinets	Approved
-------	---	----------

Trustee Robin LaBedz moved to approve. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaaglia

VIDEO	C.	Street Sweeper Rental 2015b	Approved
-------	----	-----------------------------	----------

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Trustee Robin LaBedz moved to approve 15-035. Trustee Bert Rosenberg

Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO	B.	An Ordinance Amending Chapter 20 of the Arlington Heights Municipal Code (Sections 20-101, Definitions; 20-104, Driveways - Materials, Repair and Maintenance and Section 20-115 Parkway Maintenance)	Approved
-------	----	---	----------

Trustee Robin LaBedz moved to approve 15-036. Trustee Bert Rosenberg
Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO	C.	An Ordinance Amending Chapter 22 of the Arlington Heights Municipal Code (New Article - Illicit Discharge Ordinance)	Approved
-------	----	--	----------

Trustee Robin LaBedz moved to approve 15-037. Trustee Bert Rosenberg
Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO	D.	An Ordinance Granting a Special Use Permit for a Public Elementary School and Variations from Chapter 28 of the Arlington Heights Municipal Code (Olive-Mary Stitt School, 303 E. Olive Street)	Approved
-------	----	---	----------

Trustee Robin LaBedz moved to approve 15-038. Trustee Bert Rosenberg
Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Abstain: Glasgow

VIDEO	E.	An Ordinance Granting a Special Use Permit and a Variation from Chapter 28 of the Arlington Heights Municipal Code (Ivy Hill School, 2211 N. Burke Dr.)	Approved
-------	----	--	----------

Trustee Robin LaBedz moved to approve 15-039. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Abstain: Glasgow

VIDEO	F.	An Ordinance Amending Planned Unit Development Ordinance Numbers 88-060, 14-002 and 15-016 (Northwest Crossings, 1421 and 1501 W. Shure Drive)	Approved
-------	----	---	----------

Trustee Robin LaBedz moved to approve. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO	G.	An Ordinance Amending Chapter 8 of the Arlington Heights Municipal Code (Section 8-504 Criminal Trespass to Real Property)	Approved
-------	----	--	----------

Trustee Robin LaBedz moved to approve 15-041. Trustee Bert Rosenberg
Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta,
Sidor, Tinaqlia

VIDEO CONSENT PETITIONS AND COMMUNICATIONS

VIDEO	A.	Bond Waiver - St. Edna Bingo	Approved
-------	----	------------------------------	----------

Trustee Robin LaBedz moved to approve. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO B. Bond Waiver - The American Legion Approved

Trustee Robin LaBedz moved to approve. Trustee Bert Rosenberg Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

CONSENT REPORT OF THE VILLAGE MANAGER

XI. APPROVAL OF BIDS

VIDEO XII. NEW BUSINESS

VIDEO A. Comprehensive Plan Update - PC#14-020 Approved

Mr. Recklaus introduced the Comprehensive Plan Update which is an aspirational plan for the community. Mr. Enright said it has been 18 years since the Village has reviewed the Plan. Over the past year, the Comprehensive Plan Subcommittee has met and held Public Meetings. The Plan includes updated demographic information and policies with the added categories of historic preservation, corridors, sustainability and public input. An online survey was conducted to gauge public opinion.

Trustee Tinaglia who served on the Committee said the Historical Preservation category is a huge step forward within the Plan. This is a guide which gives a direction on what the Village wants to be. It is not about raising taxes to do everything in the plan.

Trustee Labedz said there was concern that having historical districts would have some hand tying. The survey showed that residents do care about the history and want their homes to reflect it.

Trustee Sidor said he was happy with the Sustainability section. He said the impervious surface reduction for storm water runoff is a critical step forward.

Trustee Rosenberg suggested that the Economic Development Chapter be shared with the Economic Alliance. Trustee Rosenberg asked how the

sustainability objectives would be communicated and put into policy and procedure. Mr. Recklaus said there would be a general public outreach program. Mr. Enright said new developments are required to include a narrative of sustainability for their developments. Trustee Rosenberg suggested that the Village feature a chapter a month on the website and that perhaps the Library could create a program. Mr. Recklaus said multiple concepts with periodic review would be a good idea.

Trustee Blackwood said the Economic Alliance would benefit from the Corridors section as well.

Trustee Scaletta said the Plan is mostly unfunded it would be nice to improve the corridors but there is not money to do all that the plan sets out to do. The Plan is not a mandate to be accomplished all at once.

Trustee Robin LaBedz moved to approve the 2015 Comprehensive Plan.
Trustee Jim Tinaglia Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Trustee John Scaletta moved to approve the Comprehensive Plan Land Use Map. Trustee Thomas Glasgow Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

VIDEO	B.	Christina Court - Final Plat of Subdivision -	Approved
		PC#15-001	

Mr. Recklaus said the preliminary plat was approved in June. At that time, the Board was primarily concerned with the retention basin. Since then, the Village has negotiated a maintenance fee \$68,250 which will cover 10 years of the maintenance cost. The Village will not accept ownership until the total fee is paid and the detention area is established. Staff has accomplished what the Board set out to do. Mr. Isherwood of K. Hovnanian said they will meet all the conditions.

Trustee Rosenberg asked how the deal was structured. Mr. Recklaus explained that at the end of 10 years, the Village will assume maintenance. Once all of the lots are sold, the fees will be paid and the detention area established. Mr. Perkins said once the basin meets engineering requirements; the money will be put into a fund that can be drawn down to cover maintenance. Trustee Rosenberg asked what happens if there is a lot outstanding? Mr. Perkins said the developer would probably pay the fee if it

came to that. If not, the developer maintains the responsibility of the basin. The agreement will be recorded against the property.

Trustee Farwell asked if there were discussions regarding the retaining wall on the northwest corner of the subdivision. Mr. Isherwood said there will be native plantings on back side of basin to screen the retaining wall. Also, there has been a set of stairs added to the retaining wall for proper access to the lot. There will not be a homeowner association established here. The homeowner will be responsible for the maintenance of this wall. Mr. Perkins said the value of house will be such that the homeowner will most likely maintain it, but if they don't it would be a Code violation. Trustee Farwell said that his concern was that in tough times, the wall might not be maintained. He said he hopes future developments keep a sharper eye on this issue. As it stands, the Village must rely on Code enforcement to make sure the wall is properly maintained.

Trustee Glasgow asked if the developer had agreed to everything the Board asked for. Mr. Recklaus said yes.

Trustee Tinaglia said he is voting "no" because he did not like the detention pond being the Village's responsibility. In future would like Village to find better ways to manage storm water detention on site.

Trustee Thomas Glasgow moved to approve. Trustee John Scaletta Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor

Nays: Farwell, Tinaglia

C. A Resolution Approving a Final Plat of Subdivision Approved
(Christina Court, 1306 and 1310 E. Olive Street)

Trustee Thomas Glasgow moved to move Legal XIII A to this point in the meeting. Trustee John Scaletta Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Trustee Bert Rosenberg moved to approve R15-037. Trustee John Scaletta Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor

Nays: Farwell, Tinaglia

Mr. Recklaus said there are two items to be discussed, parking variation for a church/synagogue and a Comprehensive Plan Amendment. A church is a permitted use in this district. The only regulatory change being discussed is parking. The Comprehensive Plan Amendment is not necessary for the project to go forward as it is a permitted use. It is unlikely that this site will be a school again in the future.

Mr. Perkins said the proposal is to convert the Glenkirk facility into a church. Glenkirk will lease a portion of the building. Most churches in the Village are in R-3 districts like Our Lady of the Wayside, St. Peters and Orchard. The parking variation is to reduce the Code requirement from 308 spaces to 97 spaces. The Plan Commission recommended land banking 73 spaces to be in keeping with other variations given to other churches. There is a condition that the petitioner work with the Park District on sharing parking if it is expanded. Mr. Scholten from the Park District said they would be interested in working with Holy Nation to modify their existing parking agreement. There is a tree arboretum on the property, so a tree preservation plan would need to be submitted to preserve the grove if parking were added.

Trustee Glasgow questioned the parking. Mr. Perkins said each phase of the parking plan would need to be reviewed when the additional parking was requested. The church is legally permitted; they just need a parking variation. The conditions limit capacity to 200 people and limit their ability to have overlapping functions. Trustee Glasgow asked how that would be enforced. Mr. Recklaus said parking is the true driver of the 200 person limit, so it is a function of parking. Enforcement would occur on a complaint basis driven by parking outside of the lot and on street parking. Trustee Glasgow said the choices are to allow variance and destroy greenspace or deny the variance and not have enough parking for the congregation.

Mr. Patterson, attorney for the church, said the parish has 90 members. It was created in 1987, and doubled in membership in 30 years. The services are in Korean. Trustee Glasgow asked how they would limit attendance to 200 people. Mr. Patterson said it would be self-enforcing, and the church was aware of their relationship with community. The desire is to do everything they can to make the community comfortable. Trustee Glasgow asked if the church reached out to the neighbors. Mr. Patterson said they followed the Village requirements of notification.

Mr. Patterson said the church currently shares space with two other churches and are now seeking a home of their own. The staff report and the Plan Commission conditions are acceptable. Additional parking may be required, but it would be in the future. The church would like to maintain the green space as much as possible. This is an organization that does not intend on growing a lot. Mr. Patterson explained that Glenkirk will occupy

13% of the building. The gymnasium space is what triggers the Code parking requirement and thus the need for a variation. Traffic during the week will be significantly reduced from what it is today.

Trustee Scaletta asked how the 200 person capacity number was determined. Mr. Perkins said it was based on the seating plan of the sanctuary. The chapels will be used for infants/toddlers and smaller children so they can have their own worship services. Trustee Scaletta said the impact of a church is on evenings and weekends, different from a school. Mr. Patterson said based on their traffic study, peak demand will be on Wednesday evening, Friday evening and on Sundays. Parking never exceeds 80% of the parking in their current location which has fewer parking spaces than this property has. Staff estimated there would be 3.75 persons per vehicle based on the churches current numbers. There have been no neighbor complaints or parking issues in Mt. Prospect.

Trustee Scaletta asked how the landscaping would be if they had to add parking. Mr. Perkins said they will have to provide heavy landscaping on the north side with a fence and any new parking expansion would have to meet current Village requirements. Three feet of landscape screen are required on street frontage. The church has agreed to replace the existing perimeter landscaping.

Trustee Tinaglia said this is a permitted use and dozens of churches have this same zoning. The parking requirement is based on the Village's Zoning Ordinance and is the only thing stopping this from going through. The church doesn't want all the parking stalls. The Plan Commission recommended 73 stalls be land banked if determined necessary by the Village. He asked if the church will have other churches joining them. He said he was afraid of functions every night. How can the church ensure that this will not happen? Mr. Patterson said there are so many conditions created that they eliminate the possibility of other congregations joining.

Trustee Labeledz asked how the Park District obtained land between two buildings that do not have parking. Mr. Perkins explained that the park space was a trade with District 25 for a park at Olive Mary Stitt School. Trustee Labeledz asked if homes could be developed here. Mr. Perkins said yes. The Park District is not interested in obtaining this property at the current price.

Trustee Farwell said the property could hold 16 homes. If it were developed as townhomes it could be more. The tree grove would not be kept in those cases. He noted two other faith communities received similar parking variations.

Trustee Sidor asked how is capacity enforced at other churches. Mr. Perkins said staff works with churches to recommend staggering services, and other techniques. Typically, complaints drive enforcement. Trustee Sidor asked how the 200 person limit was arrived at. Mr. Perkins said it was a

conservative estimate based on actual seating proposed in the sanctuary.

Trustee Blackwood asked if there was a plan to have school. Mr. Patterson said no.

Leslie Plass said he found out about the proposal two days before the Plan Commission meeting. They had a 5 month advantage. He questioned the church's financial ability to handle a \$4 million property with only 80 families. The church has two employees and \$110,000 in annual revenue. It is not registered with the IRS. He said he had concerns that the minister or others may live in facility. He wants to make sure that doesn't happen. He said banquets and weddings can occur in this facility and it will have more people in it than what you have been told. They are saying what you want to hear. They say they moved out of Chicago, two years ago, but the church is still there. He said he was concerned that the fence next to the playground will not hold back a car.

President Hayes asked if people can live in the facility. Mr. Perkins said some churches have a rectory, but rectories are typically separate buildings which require a PUD for approval. It may be allowed in Code for a pastor to live on site but it is not typical. Mr. Perkins did not know if they would need approval or not for that. The property is zoned residential and the Code does allow rectory use.

Tom Dineen said the project seems pushed on them at the last minute, there was not a lot of public relations on behalf of the church. He said he was not against the church but against the impact. He said church activity in a neighborhood was different from park and school activity. He said not all institutions have been good neighbors. Waverly is a cut through with people driving too fast. There are stop signs on Chestnut and Waverly, but people don't stop and they are not enforced. Parking for soccer and softball is all on Waverly, and it's an accident waiting to happen. He suggested having parking on the north side of street only. He asked for better Code enforcement, the Futabakai mobile classrooms are an eyesore, and the park area behind Glenkirk is a haven for drugs, drinking and bad behavior. He said he has complained but nothing is being done. He asked for the Village to get the mobile classrooms out of there. He said the church will add traffic two nights a week that they are not accustomed to. Headlights will be coming in and out. He said the facility could be rented out for other activities, multiple nights a week. He wanted reassurances that the landscaping will be improved and maintained. He asked if there will be more lighting and if these assurances are in writing. Every church wants to get bigger and the problems will get worse. He wants assurances that this will be done well and the church will be good neighbors.

President Hayes said the conditions require new lighting in the existing lot; this condition is in writing along with improved landscaping. He said the Village will take note of the traffic enforcement and speeding and try to improve the situation. He said other areas are experiencing this problem as

well.

Alice Sylvester said there are 38 churches in the Village and all but three are on major thoroughfares. They are not in the middle of neighborhoods. The Comprehensive Plan made her neighborhood one of meandering streets with schools and parks. This is not a church of Arlington Heights residents, these are not Berkley Square neighbors. She said the neighborhood suffers a great deal with traffic and now will have to suffer Wednesday evenings, Saturday and Sundays as well. There are too many people and it is too crowded. She said it floods, there is crime, and she was unhappy with the process. She said the church had a 6 month leg up, and it was not fair. She said she believed the church will grow to 200 people. She said residents pay taxes but the church won't.

Frank Abbinati said he has enjoyed a beautiful neighborhood for 30 years. He said 99% of the neighbors are against the church, not the people or what they stand for, but of how deeply it will affect the neighborhood. It's a great neighborhood; their biggest concern is the effect on traffic and the serious drug problem. It is so dark at night. Stonebridge brings in people on certain nights; it's a haven for people to gather. The church traffic will bring in multiple problems.

Greg Zyck said it seems like a done deal, this is just a parking variation. There are a lot of issues; the church will make the area better looking than it does now. Lighting will go up. The church is going to help some of the situations. However, the traffic situation is a problem. The Park District brings so much. Futabakai brings even more. He wants to make sure when the church comes that more problems don't come. He said the church has more than enough spots. He asked for the Village to not destroy the green space and keep the park. A parking lot on the north side would encroach on the other homes and reduce their value. He asked for the Board to keep the property how it is now. The parking variance is too much when 62 spaces is all they need.

President Hayes said this is not a done deal. The Board has open minds and comes into meetings with open minds until petitioner and residents have had their say. He said he was sympathetic to the residents and their concerns, most of which are addressed by the conditions set by the Plan Commission and agreed to by the petitioner. The conditions will improve the situation in the neighborhood. Lighting will disburse the youth congregating. The church growth pattern is an accurate representation based on his view of the community. This is not just a permitted use but a reasonable use for this facility under the conditions. He said he would prefer to see no new parking developed.

Trustee Farwell asked about the historical use of property. Mr. Perkins said it was Berkley School and then District 25 sold it to Glenkirk in the early 90's. In 1993 the school became privately owned and operated. There were no restrictions on size put upon Glenkirk, but there were restrictions to

preserve the arboretum and shared parking. Futabakai leases their property from District 25. Trustee Farwell said this is an upkeep issue with Futabakai and a parking issue for the parks. He recommended talking to D25 about upkeep and Police for protocol for a safe environment. A church is a permitted use, similar variations have been granted for other churches, from a lawyer's perspective, if the proposal doesn't go, it would be a legal liability for the Village.

Trustee Scaletta said he agreed with the Plan Commission on the land bank parking because it keeps the percentages on parking in line with other variations that have been provided to other churches. Also, the parking is there if it is needed. The uses for this property are a school or a church but that could change and the residents could have something different that they didn't want.

Trustee Glasgow disagreed saying each neighborhood is unique, just because variations are granted one place does not ensure they will be granted in another. He asked what the growth pattern was. He said the overflow parking onto Waverly is ridiculous. He saw three people blow through the stop sign. The Police need to deal with it. This church will add pressure on the weekends that wasn't there before. People will try and park in the church parking lot during sports events. Church members will overflow into the streets. He said he will vote no.

Trustee Tinaglia said it is a quandary; what do the neighbors want? A church is allowable; it's in the Zoning Ordinance. A church can be in any residential neighborhood as long as there is enough parking. Do the residents want to force the church to take down trees and add parking stalls to meet an Ordinance, or should the Board deny the variance and let them use it as is? The Board can't break the law to vote against them moving in so, how much of a parking variation can we give them?

Trustee Rosenberg asked if the land banking could occur in increments with a cap of 73. Mr. Perkins said parking would be added incrementally as needed based on impact. Trustee Rosenberg said he thought that no matter what is going in, people would not be happy, if it was a school it would be more crowded, there would be more parking issues at night. This is a small church; it's only grown 50% in 30 years. There are an extreme number of conditions put upon them. There is added light in the parking lot. He apologized on behalf of the Village that residents didn't receive the notification in a timely way. The petitioner is only required by law to contact residents 250 feet from their property. Projects are sometimes worked on a long time, and then the meeting date gets set.

Trustee Farwell said in 1982, 240 children attended Berkley. He said he continued to be concerned that by not granting the variation, the Board would be putting the Village in a legal quandary as the use was a zoned use. In 2017 Futabakai may be renegotiating their lease; he hoped staff would talk to D25 and address some of these issues. He said he understood

the congestion and safety issues, but perhaps they can be addressed without barring the petitioner. Mr. Patterson said the petitioner has agreed to the 11 conditions.

Trustee Glasgow cited the Code 28-2 (2.10) saying the Board had the power to limit congestion on public streets. He said he foresees more traffic problems and if the variance is denied, the church will have to pave the greenspace.

Trustee Joe Farwell moved to approve. Trustee Mike Sidor Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia

Nays: Glasgow

XIII.LEGAL

XIV. APPOINTMENTS

VIDEO XV. PETITIONS AND COMMUNICATIONS

The Katie Project will occur on November 7. Contact Nancy Kluz to have the batteries in your smoke detector changed or to volunteer at 847-368-5000.

The Fire Station Open House is Saturday, October 10 at Fire Station #1, 300 E. Sigwalt.

President Hayes thanked the Special Events Commission for a successful Autumn Harvest.

VIDEO XVI. REPORT OF THE VILLAGE MANAGER

VIDEO A. Staff Update on Status of Stormwater Control Studies

Mr. Recklaus said analysis of a number of small unique localized flooding issues has been ongoing. It requires very detailed engineering models with many assumptions. Almost all the low hanging fruit has already been taken advantage of. The Village has already invested \$140,000 Million in inflation adjusted dollars in the storm sewer system and these upgrades have been successful and impactful. The storm event of 2011 exposed weaknesses in the system. The Village is looking for further enhancements.

Mr. Shirley said the Village has been active in addressing flooding issues since 1963. A decision was made in 1977 not to separate the combined area. It was an important fork in the road. In 2001 the Village created the

overhead sewer system. In some areas storm water is held on the streets on purpose so water doesn't go into people's basements using inlet control systems. Two studies were commissioned after the July 2011 storm event. In January of 2016 the studies will be presented. Resident meetings will occur at that time. There is no current revenue source for storm water improvements and they will cost more than several hundred thousand dollars. Over 100 homes have taken advantage of the overhead sewer program and the program should be part of any solution. Potential upgrades will be included in the Capital Improvement Program beginning in March.

Mr. Recklaus said staff wants residents to see the models and problems and understand the impact of improvements. The decisions will not be easy and the Board will have to weigh the costs with full understanding that any solution will not prevent all flooding. Information will be forthcoming on the website.

Trustee Rosenberg asked if there was any possibility that something could be started next year. Mr. Recklaus said there is some money budgeted in the regular storm water program that may be identified for some of this work. There is no funding for major improvements.

Trustee Sidor asked if grant money for flooding can be explored. Mr. Recklaus said staff intends to seek grant money as part of the strategy.

Trustee Scaletta asked if the more than 200 residents who reported water damage will be notified of the hearings. Mr. Recklaus said yes.

President Hayes said this was an important process and he asked that it stay on course even if there is not funding as he wanted to produce the study results the Village has been promising.

VIDEO **XVIIADJOURNMENT**

Trustee Bert Rosenberg moved to adjourn the meeting at 10:58 p.m..

Trustee John Scaletta Seconded the Motion.

The Motion: Passed

Ayes: Blackwood, Farwell, Glasgow, Hayes, LaBedz, Rosenberg, Scaletta, Sidor, Tinaglia



Item: Warrant Register of 10/15/15

Department: Village Clerk

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description

10-15-15 Warrant Register

Type

Warrant Register



VILLAGE OF ARLINGTON HEIGHTS

WARRANT REGISTER FOR

CHECK DATE: 10 - 15 - 2015

Fund	Fund Description	Total Transaction Amount
101	General Fund	\$352,075.15
215	CDBG Fund	\$733.75
231	Criminal Investigation Fd	\$29,766.20
235	Municipal Parkg Opr Fund	\$256,145.27
401	Capital Projects Fund	\$738,597.90
435	EAB Fund	\$27,232.00
505	Water and Sewer Fund	\$238,302.65
511	Solid Waste Fund SWANCC	\$93,093.00
515	Arts,Entert & Events Fund	\$124,222.73
605	Health Insurance Fund	\$269,162.19
611	General Liability Ins Fnd	\$4,087.06
615	Workers Compensation Ins	\$111,095.44
621	Fleet Operations Fund	\$163,444.95
625	Technology Fund	\$16,092.37
711	Fire Pension Fund	\$48.50
715	Guaranty Deposits Fund	\$15,600.00
721	Escrow Deposits Fund	\$5,096.04
TOTAL ALL FUNDS		\$2,444,795.20

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 0					
Division: 0					
195443	715-0000-220.93-00	A & E LANDSCAPING INC	REFUND BOND	\$200.00	\$200.00
195445	715-0000-220.93-00	A AND A PAVING CONTRACTORS	REFUND BOND	\$200.00	\$200.00
195451	715-0000-220.93-00	AJD CONCRETE CORP	REFUND BOND	\$50.00	\$50.00
195452	505-0000-140.10-00	AMERICAN PRINTING TECHNOLOGIES	POSTAGE	\$1,891.10	\$1,891.10
195455	715-0000-220.93-00	ANGELICA CARDONA	REFUND BOND	\$200.00	\$200.00
195457	235-0000-435.65-03	JOSEPH ANSEL	REFUND PARKING PERMITS	\$90.00	\$90.00
195466	715-0000-220.93-00	BARBARA MORGAN	REFUND BOND	\$200.00	\$200.00
195467	101-0000-433.14-00	WAUNETTTAH BARTKOWIAK	REFUND AMBULANCE CLAIM	\$74.21	\$74.21
195469	101-0000-433.14-00	LYDIA BATTISTONI	REFUND AMBULANCE CLAIM	\$74.21	\$74.21
195471	235-0000-435.65-02	SUBHADEEP BHATTACHARJEI	REFUND PARKING PERMITS	\$60.00	\$60.00
195472	715-0000-220.93-00	UMA BODAPATI	REPLACE LOST CK 193680	\$200.00	\$200.00
195473	235-0000-435.65-03	MARY BOHNE	REFUND PARKING PERMITS	\$90.00	\$90.00
195474	101-0000-433.14-00	MARTA BORAWSKI	REFUND AMBULANCE CLAIM	\$320.00	\$320.00
195476	715-0000-220.93-00	BRADLEY RASOF	REFUND BOND	\$200.00	\$200.00
195481	101-0000-433.14-00	SUSANA CAMACHO	REFUND AMBULANCE CLAIM	\$67.78	\$67.78
195487	715-0000-220.93-00	CAVMEN AND SONS	REFUND BOND	\$200.00	\$200.00
195521	235-0000-435.65-02	JAMES CUMMINGS	REFUND PARKING PERMITS	\$90.00	\$90.00
195523	715-0000-220.93-00	CYNTHIA CASTAGNA	REFUND BOND	\$200.00	\$200.00
195526	715-0000-220.93-00	DAN MAR CONCRETE INC	REFUND BOND	\$200.00	\$200.00
195527	715-0000-220.93-00	DAN MAR CONCRETE INC	REFUND BOND	\$200.00	\$200.00
195528	715-0000-220.93-00	DANIEL LISEK	REFUND BOND	\$200.00	\$200.00
195532	715-0000-220.93-00	DOLORES GEORG	REFUND BOND	\$200.00	\$200.00
195535	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195536	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195537	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195538	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195539	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195540	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195541	715-0000-220.93-00	DUBOIS PAVING CO	REFUND BOND	\$200.00	\$200.00
195554	715-0000-220.93-00	FORTIS CONCRETE	REFUND BOND	\$200.00	\$200.00

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195557	715-0000-220.93-00	FRANK GEORGEKOS	REFUND BOND	\$200.00	\$200.00
195564	715-0000-220.93-00	GRAHAM ENTERPRISE INC	REFUND BOND	\$6,250.00	\$6,250.00
195568	101-0000-433.14-00	ROBERT GREEN	REFUND AMBULANCE CLAIM	\$320.00	\$320.00
195569	715-0000-220.93-00	GREENSCAPE HOMES LLC	REFUND BOND	\$350.00	\$350.00
195570	715-0000-220.93-00	GREENSCAPE HOMES LLC	REFUND BOND	\$200.00	\$200.00
195576	101-0000-421.99-00	HALLOWEEN CITY	REFUND BUSINESS LICENSE	\$380.00	\$380.00
195577	715-0000-220.93-00	HANSEN'S LADNSCAPING	REFUND BOND	\$200.00	\$200.00
195584	101-0000-433.14-00	MARINA HOFFMAN	REFUND AMBULANCE CLAIM	\$294.71	\$294.71
195592	235-0000-435.65-02	SERGE IGNATOFF	REFUND PARKING PERMITS	\$60.00	\$60.00
195603	715-0000-220.93-00	JOHN HERSEY H S	REFUND BOND	\$1,000.00	\$1,000.00
195605	101-0000-433.14-00	LAWRENCE JOHNSON	REFUND AMBULANCE CLAIM	\$120.00	\$120.00
195606	715-0000-220.93-00	JRS CONCRETE	REFUND BOND	\$200.00	\$200.00
195607	101-0000-421.05-00	JOSEPH KALESITS	REFUND VEHICLE STICKER	\$10.00	\$10.00
195609	715-0000-220.93-00	KATHY WROBEL	REFUND BOND	\$200.00	\$200.00
195613	715-0000-220.93-00	KIMBERLY CARPENTER	REFUND BOND	\$200.00	\$200.00
195617	101-0000-433.14-00	IRINA KOZDOY	REFUND AMBULANCE CLAIM	\$50.00	\$50.00
195624	715-0000-220.93-00	LECH MARTA	REFUND BOND	\$200.00	\$200.00
195627	101-0000-433.14-00	TERRI LEWIS	REFUND AMBULANCE CLAIM	\$600.00	\$600.00
195629	101-0000-433.14-00	MARY LIEBERMAN	REFUND AMBULANCE CLAIM	\$74.21	\$74.21
195635	715-0000-220.93-00	MARGIE BOYLE	REFUND BOND	\$200.00	\$200.00
195636	715-0000-220.93-00	MARLENE SKWARSKI	REFUND BOND	\$200.00	\$200.00
195637	715-0000-220.93-00	MARTIN MUNEEN	REFUND BOND	\$200.00	\$200.00
195638	715-0000-220.93-00	MARTIN STAEHLIN	REFUND BOND	\$200.00	\$200.00
195650	721-0000-221.10-11	MI HOMES	REFUND PERMIT FEES	\$196.08	\$5,096.04
			REFUND PERMIT FEES	\$1,977.36	
			REFUND PERMIT FEES	\$945.24	
			REFUND PERMIT FEES	\$1,977.36	
195656	101-0000-433.14-00	PATRICK MORAN	REFUND AMBULANCE CLAIM	\$98.64	\$98.64
195658	101-0000-433.14-00	ELLEN MUELLER	REFUND AMBULANCE CLAIM	\$600.00	\$600.00
195670	101-0000-140.50-00	OFFICE DEPOT	PAPER, OFFICE, MAILROOM	\$679.50	\$679.50
195673	101-0000-433.14-00	IRMGARD OSWALD	REFUND AMBULANCE CLAIM	\$25.00	\$25.00
195677	101-0000-422.10-00	PALOS ELECTRIC CO INC	REFUND PERMIT	\$65.00	\$65.00
195678	101-0000-433.14-00	PARENTS OF JACK BLUMENFELD	REFUND AMBULANCE CLAIM	\$86.96	\$86.96
195689	101-0000-421.99-00	PURE DETOX	REFUND BUSINESS LICENSE	\$64.00	\$64.00

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195691	715-0000-220.93-00	R.D. ANDREWS	REFUND BOND	\$200.00	\$200.00
195692	101-0000-433.14-00	LEONIE RAKITIN	REFUND AMBULANCE CLAIM	\$400.00	\$400.00
195693	715-0000-220.93-00	RANDOLPH WITEK	REFUND BOND	\$200.00	\$200.00
195699	715-0000-220.93-00	RICHARD BERNAS	REFUND BOND	\$200.00	\$200.00
195700	715-0000-220.93-00	RICHARD FUNG	REFUND BOND	\$200.00	\$200.00
195701	715-0000-220.93-00	RICKY CONSTRUCTION INC	REFUND BOND	\$200.00	\$200.00
195704	101-0000-433.14-00	RANDALL ROMANO	REFUND AMBULANCE CLAIM	\$40.00	\$80.00
			REFUND AMBULANCE CLAIM	\$40.00	
195706	715-0000-220.93-00	S & H PAVING INC	REFUND BOND	\$200.00	\$200.00
195707	715-0000-220.93-00	S & H PAVING INC	REFUND BOND	\$200.00	\$200.00
195708	505-0000-472.32-00	FRANK SALERNO	REFUND PERMIT	\$295.00	\$295.00
195713	101-0000-433.14-00	SAM SHIMASAKI	REFUND AMBULANCE CLAIM	\$385.16	\$385.16
195718	101-0000-433.14-00	TIMOTHY SITTIG	REFUND AMBULANCE CLAIM	\$30.00	\$30.00
195721	101-0000-433.14-00	MARY SOLHEIM	REFUND AMBULANCE CLAIM	\$400.00	\$400.00
195727	715-0000-220.93-00	SWITT, KELLY	REFUND BOND	\$150.00	\$150.00
195728	101-0000-433.14-00	GARY TAKATA	REFUND AMBULANCE CLAIM	\$172.97	\$172.97
195732	101-0000-421.99-00	THOMAS RENOVATIONS	REFUND BUSINESS LICENSE	\$65.00	\$65.00
195735	715-0000-220.93-00	TIFFANY MARSTON	REFUND BOND	\$200.00	\$200.00
195745	101-0000-433.14-00	KAREN ULLRICH	REFUND AMBULANCE CLAIM	\$360.00	\$360.00
Total Division:				\$29,169.49	
Total Department:				\$29,169.49	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 4

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 1 Board of Trustees					
Division: 1					
195482	101-0101-501.21-65	CAPTION FIRST INC	CLOSED CAPTIONING 9-2015	\$600.00	\$600.00
195670	101-0101-501.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$35.99	\$35.99
901089	101-0101-501.22-05	CITIBANK	POSTAGE	\$19.55	\$19.55
Total Division:				\$655.54	
Total Department:				\$655.54	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 5

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 2 Village Manager					
Division: 1					
195579	101-0201-502.22-03	HARRIS TRUST & SAVINGS BANK	EBS	\$55.00	\$55.00
195670	101-0201-502.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$236.94	\$236.94
195763	101-0201-502.21-65	VERIZON WIRELESS	INV 9753039680	\$133.75	\$133.75
195772	101-0201-502.22-15	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$85.00	\$85.00
901089	101-0201-502.22-05	CITIBANK	POSTAGE	\$20.86	\$20.86
Total Division:				\$531.55	
Total Department:				\$531.55	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 3 Human Resources					
Division: 1					
195559	615-0301-552.42-75	GALLAGHER BASSETT SERVICES INC	CLAIMS - MEDICAL LOSS	\$7,121.15	\$44,801.15
			CLAIMS-MEDICAL EXPENSES	\$22,317.18	
			CLAIMS - MEDICAL LOSS	\$15,362.82	
	615-0301-552.42-80		CLAIMS - W/C	\$28,097.10	\$65,945.29
			CLAIMS-W/C	\$22,100.10	
			CLAIMS - W/C	\$15,748.09	
195579	101-0301-503.22-01	HARRIS TRUST & SAVINGS BANK	ICMA ONLINE PURCHASES	\$74.25	\$274.25
			APA JOBS ONLINE	\$200.00	
	101-0301-503.40-70		ARNIE SALERNOS PIZZERI	\$149.60	\$681.10
			ARNIE SALERNOS PIZZERI	\$531.50	
	615-0301-552.22-03		HRWEBADVISOR.COM	\$349.00	\$349.00
195670	101-0301-503.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$174.89	\$174.89
195772	101-0301-503.22-15	XEROX CORPORATION	LEASE AGREEMENT	\$85.00	\$85.00
901087	605-0301-552.20-60	HMO ILLINOIS	PREMIUM-10-2015	\$261,968.17	\$261,968.17
901088	605-0301-552.20-65	PRUDENTIAL INSURANCE CO OF AMERICA	PREMIUM-10-2015	\$4,770.23	\$7,194.02
			PREM SUPPLEMENTAL 10-2015	\$2,423.79	
901089	101-0301-503.22-05	CITIBANK	POSTAGE	\$15.85	\$15.85
Total Division:				\$381,488.72	
Total Department:				\$381,488.72	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 7

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 4 Legal Department					
Division: 1					
195545	101-0401-503.20-20	ERNEST R BLOMQUIST PC	LEGAL SERVICES	\$8,927.50	\$8,927.50
195547	101-0401-503.22-05	FEDERAL EXPRESS	SHIPPING/DELIVERY SERVICE	\$28.38	\$56.76
			SHIPPING/DELIVERY SERVICE	\$28.38	
195585	101-0401-503.20-10	HOLLAND & KNIGHT LLP	RETAINER	\$1,500.00	\$4,500.00
			RETAINER	\$3,000.00	
195756	101-0401-503.21-65	VERIZON WIRELESS	INV 9852852896	\$95.74	\$95.74
195772	101-0401-503.22-15	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$140.90	\$281.80
			OFFICE MACHINES & ACCESS	\$140.90	
901089	101-0401-503.22-05	CITIBANK	POSTAGE	\$28.26	\$28.26
Total Division:				\$13,890.06	
Total Department:				\$13,890.06	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 5 Finance					
Division: 1					
195452	505-0501-503.21-65	AMERICAN PRINTING TECHNOLOGIES	SERVICE MISCELLANEOUS	\$713.22	\$713.22
195453	101-0501-503.21-65	ANDRES MEDICAL BILLING LTD	SERVICE FINANCIAL	\$6,833.81	\$6,833.81
195530	101-0501-503.22-10	DIRECT RESPONSE RESOURCE	SERVICE PRINTING	\$13,915.59	\$13,915.59
195559	611-0501-552.42-53	GALLAGHER BASSETT SERVICES INC	CLAIMS - VEHICLE LOSS	\$1,421.46	\$1,421.46
	611-0501-552.42-60		CLAIMS - LIABILITY LOSS	\$539.00	\$2,665.60
			CLAIMS - LIABILITY	\$2,126.60	
195579	101-0501-503.22-03	HARRIS TRUST & SAVINGS BANK	IPPFA	\$150.00	\$550.00
			EASTERN IL UNIVERSITY	\$400.00	
	101-0501-503.30-01		CHICAGO TRIB SUBSCRIPT	\$390.00	\$390.00
	101-0501-503.30-05		TRANSACT TECHNOLOGIES	\$179.40	\$179.40
195659	101-0501-503.30-05	MURNANE PAPER CO	OFFICE SUPPLIES	\$236.00	\$236.00
195663	101-0501-503.30-05	NEOPOST	OFFICE SUPPLIES	\$1,639.95	\$1,639.95
195670	101-0501-503.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$126.27	\$179.84
			OFFICE SUPPLIES	\$53.57	
	505-0501-503.30-05		OFFICE SUPPLIES	\$294.07	\$294.07
195676	101-0501-503.22-01	PADDOCK PUBLICATIONS INC	ADVERTISING	\$51.30	\$51.30
195687	101-0501-503.22-10	PRINTFIN PRINTING & GRAPHICS SRVS	PRINTING SERVICES	\$675.00	\$2,590.00
			PRINTING SERVICES	\$1,915.00	
195757	101-0501-503.21-65	VERIZON WIRELESS	INV 9752807657	\$55.52	\$55.52
195772	101-0501-503.22-15	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$19.71	\$126.78
			OFFICE MACHINES & ACCESS	\$85.00	
			OFFICE MACHINES & ACCESS	\$22.07	
901089	101-0501-503.22-05	CITIBANK	POSTAGE	\$1,128.52	\$1,128.52
	505-0501-503.22-05		POSTAGE	\$1,542.20	\$1,542.20
Total Division:				\$34,513.26	
Total Department:				\$34,513.26	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 9

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 6 Information Technology					
Division: 1					
195579	625-0601-553.33-05	HARRIS TRUST & SAVINGS BANK	ADMIN ARSENAL INC	\$900.00	\$900.00
	625-0601-572.50-10		DMI DELL K-12/GOVT	\$6,487.15	\$11,847.79
			DMI DELL K-12/GOVT	\$1,649.96	
			DMI DELL K-12/GOVT	\$2,393.08	
			AMAZON MKTPLCE PMTS	\$20.17	
			DMI DELL K-12/GOVT	\$1,297.43	
195597	625-0601-553.21-02	IMAGE SYSTEMS & BUSINESS SOLUTIONS	PRINTER REPAIR	\$99.00	\$99.00
195670	625-0601-553.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$97.25	\$231.74
			OFFICE SUPPLIES	\$3.99	
			OFFICE SUPPLIES	\$69.99	
			OFFICE SUPPLIES	\$60.51	
195722	625-0601-572.50-10	SOUTHERN COMPUTER WAREHOUSE	REPLACEMENT PRINTER	\$557.60	\$557.60
195753	625-0601-553.21-65	VERIZON WIRELESS	INV 9752900268	\$440.44	\$440.44
195761	625-0601-553.21-65	VERIZON WIRELESS	INV 9752852895	\$1,444.42	\$1,444.42
801494	625-0601-553.21-65	AT & T	831000260408	\$571.38	\$571.38
Total Division:				\$16,092.37	
Total Department:				\$16,092.37	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 10

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 10 Boards & Commissions					
Division: 1					
195458	101-1001-502.40-05	ARLINGTON HTS COMM CONCERT BAND	REIMB MUSIC EXPENSES	\$3,957.42	\$3,957.42
Total Division:				\$3,957.42	
Division: 10					
901089	101-1010-502.22-05	CITIBANK	POSTAGE	\$10.37	\$10.37
Total Division:				\$10.37	
Division: 17					
195520	101-1017-502.20-24	CROWN TROPHY	DISABILITY AWARD	\$55.00	\$55.00
Total Division:				\$55.00	
Division: 18					
195543	515-1018-525.40-55	COLLEEN ENGLE	REIMB - SUPPLIES	\$153.62	\$153.62
195572	515-1018-525.40-55	GROOT RECYCLING AND WASTE SERVICES	MANE EVENT	\$1,220.94	\$1,220.94
195579	515-1018-525.40-55	HARRIS TRUST & SAVINGS BANK	ORIENTAL TRADING CO	\$130.90	\$449.88
			ORIENTAL TRADING CO	\$318.98	
195695	515-1018-525.40-55	RED BARN FARM MARKET	PUMPKINS AUTUMN HARVEST	\$625.00	\$625.00
195697	515-1018-525.40-55	REDS GARDEN CENTER	SUPPLIES/AUTUMN HARVEST	\$750.00	\$750.00
195711	515-1018-525.40-55	KEVIN SEIFERT	REIMB - SUPPLIES	\$139.29	\$139.29
Total Division:				\$3,338.73	
Division: 21					
195519	101-1021-502.40-40	CREEKSIDE PRINTING	SERVICE PRINTING	\$1,345.17	\$1,345.17
195685	101-1021-502.40-40	POSTMASTER ARLINGTON HEIGHTS	POSTAGE - PERMIT 2594	\$487.80	\$487.80
195764	101-1021-502.40-40	VISUAL EDGE CREATIVE SERVICES	SERVICE PRINTING PREP	\$1,200.00	\$1,200.00

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 11

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Total Division:				\$3,032.97	
Total Department:				\$10,394.49	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 12

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 20 Special Events					
Division: 5					
195490	515-2005-525.50-55	CHICAGO FLYHOUSE	RIGGING HARDWARE	\$1,243.79	\$1,243.79
195566	515-2005-525.50-55	GRAND STAGE COMPANY	STAGE LIGHTING EQUIPMENT	\$1,490.00	\$1,490.00
195579	515-2005-525.50-55	HARRIS TRUST & SAVINGS BANK	DMI DELL K-12/GOVT	\$3,045.24	\$4,081.61
			AMAZON MKTPLACE PMTS	\$473.64	
			AMAZON.COM	\$99.99	
			AMAZON MKTPLACE PMTS	\$83.62	
			MONOPRICE INC	\$67.53	
			MONOPRICE INC	\$83.59	
			TECHSOUP	\$174.00	
			TECHSOUP	\$54.00	
195649	515-2005-525.40-81	METROPOLIS PERFORMING ARTS CENTRE	OPERATING SUBSIDY	\$106,500.00	\$106,500.00
Total Division:				\$113,315.40	
Total Department:				\$113,315.40	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 30 Police Department					
Division: 1					
195444	101-3001-511.30-05	A & E RUBBER STAMP CORP	OFFICE SUPPLIES	\$31.50	\$31.50
195446	101-3001-511.21-65	ACCURATE DOCUMENT DESTRUCTION	SERVICE MISCELLANEOUS	\$314.68	\$314.68
195448	101-3001-511.21-02	ACTIVE LOCK AND KEY LTD	DOOR REPAIR	\$263.00	\$263.00
195449	101-3001-511.22-03	JEFFREY C AIELLO	TRAINING	\$15.00	\$15.00
195450	101-3001-511.30-35	AIR ONE EQUIPMENT	CLOTHING	\$619.00	\$462.25
			CLOTHING	(\$156.75)	
195454	101-3001-511.22-03	VALERIE ANDREWS	TRAINING	\$65.00	\$65.00
195456	101-3001-511.33-25	ANIMAL CARE EQUIPMENT SERVICES INC	POLICE EQUIPMENT & SUPPLY	\$330.37	\$402.67
			SHIPPING/DELIVERY SERVICE	\$72.30	
195475	101-3001-511.22-03	BOYLE RICHARD	TRAINING	\$65.00	\$65.00
195478	101-3001-511.30-35	BURGO SUSAN	CLOTHING	\$22.00	\$22.00
195479	101-3001-511.22-03	RYAN BUTCHER	TRAINING	\$45.00	\$45.00
195496	101-3001-511.33-25	CMI INC	BREATHALYZER	\$349.00	\$349.00
195497	101-3001-511.22-03	EDWARD COMMERS	TRAINING	\$15.00	\$15.00
195515	101-3001-511.22-03	COWSERT MICHAEL	TRAINING	\$786.00	\$786.00
195518	101-3001-511.21-65	CRASH DATA GROUP INC	SOFTWARE UPGRADE	\$570.00	\$570.00
195520	101-3001-511.33-05	CROWN TROPHY	NAME PLATES	\$90.00	\$90.00
195524	101-3001-511.22-03	GRZEGORZ J CZERNECKI	TRAINING	\$326.40	\$326.40
195544	101-3001-511.22-03	ANNE ERIKSSON	TRAINING	\$15.00	\$15.00
195548	101-3001-511.30-35	FELSER MARK	CLOTHING	\$26.00	\$26.00
195552	101-3001-511.22-03	ANDREW FLENTGE	TRAINING	\$15.00	\$105.00
			TRAINING	\$75.00	
			TRAINING	\$15.00	
195558	101-3001-511.22-03	PIOTR GACEK	TRAINING	\$15.00	\$15.00
195561	101-3001-511.22-03	DOUGLAS GLANZ	TRAINING	\$75.00	\$75.00
195565	101-3001-511.33-25	GRAINGER W W INC	POLICE EQUIPMENT & SUPPLY	\$70.12	\$70.12
195574	101-3001-511.22-03	GYORKE SHAWN	TRAINING	\$80.00	\$80.00
195575	101-3001-511.22-03	HAJEK DOUGLAS	TRAINING	\$597.99	\$597.99
195579	101-3001-511.22-03	HARRIS TRUST & SAVINGS BANK	HAMPTON INN MACOMB	\$92.13	\$1,096.26
			HAMPTON INN MACOMB	\$92.13	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195579	101-3001-511.22-03	HARRIS TRUST & SAVINGS BANK	IACP	\$350.00	\$1,096.26
			IACP	\$350.00	
			NAT'L TEC INFO SERVICE	\$212.00	
	101-3001-511.33-05		TORTORICES PIZZERIA	\$60.17	\$97.81
			TORTORICES PIZZERIA	\$37.64	
	101-3001-511.33-25		AMAZON MKTPLACE PMTS	\$16.99	\$74.68
			AMAZON MKTPLACE PMTS	\$57.69	
195582	101-3001-511.22-10	HEART PRINTING INC	SERVICE PRINTING	\$250.00	\$250.00
195583	101-3001-511.22-03	HERNANDEZ MIGUEL	TRAINING	\$15.00	\$15.00
195593	101-3001-511.22-03	IL ASSOC OF CHIEFS OF POLICE	REGISTRATION	\$282.00	\$282.00
195595	101-3001-511.22-03	IL HOMICIDE INVESTIGATORS ASSOC	TRAINING COCNFERENCE	\$2,145.00	\$2,145.00
195602	101-3001-511.30-35	JG UNIFORMS	CLOTHING	\$67.00	\$67.00
195604	101-3001-511.30-05	CHRISTOPHER JOHNSON	TRAINING	\$900.00	\$900.00
195608	101-3001-511.22-03	KAPPELMAN RICHARD	TRAINING	\$15.00	\$15.00
195612	101-3001-511.22-03	JINHONG KIM	TRAINING	\$15.00	\$15.00
195616	101-3001-511.22-15	KONICA MINOLTA BUSINESS USA	OFFICE MACHINES & ACCESS	\$64.42	\$1,395.44
			OFFICE MACHINES & ACCESS	\$330.63	
			OFFICE MACHINES & ACCESS	\$48.30	
			OFFICE MACHINES & ACCESS	\$705.17	
			OFFICE MACHINES & ACCESS	\$246.92	
195618	101-3001-511.22-03	KRYCA JAMES	TRAINING	\$15.00	\$15.00
195620	101-3001-511.22-03	DAVID LAVIN	TRAINING	\$15.00	\$15.00
195621	101-3001-511.22-03	LAW ENFORCEMENT TRAINING LLC	COURT SMART PROGRAM 2015	\$5,000.00	\$5,000.00
195622	101-3001-511.21-65	LAW OFFICE OF JOAN VASQUEZ	SERVICE PROFESSIONAL	\$843.75	\$1,437.50
			SERVICE PROFESSIONAL	\$593.75	
195623	101-3001-511.33-05	LEA DATA TECHNOLOGIES	SOFTWARE UPGRADE	\$500.00	\$500.00
195632	401-3001-572.50-15	MACNEIL AUTOMOTIVE PRODUCTS	SUPPLIES	\$273.52	\$273.52
195633	101-3001-511.22-03	MANDEL, RUSSELL	TRAINING	\$15.00	\$15.00
195641	101-3001-511.21-65	MC DONALDS CORPORATION	SERVICE MISCELLANEOUS	\$299.19	\$299.19
195642	101-3001-511.22-03	MC GUIRE BRIAN	TRAINING	\$15.00	\$15.00
195646	101-3001-511.30-20	MEDIA DISTRIBUTORS	PHOTOGRAPHIC SUPPLY/EQUIP	\$2,160.00	\$2,215.00
			POLICE EQUIPMENT & SUPPLY	\$10.00	
			SHIPPING/DELIVERY SERVICE	\$45.00	
195647	101-3001-511.21-65	METRO-WESTERN COOK CREDIT	SERVICE MISCELLANEOUS	\$72.00	\$72.00

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195652	101-3001-511.22-03	MIDWEST GANG INVESTIGATORS ASSOC	REGISTRATION	\$330.00	\$330.00
195657	101-3001-511.21-65	MSAB INC	RENEWAL- FORENSIC PROGRAM	\$2,995.00	\$2,995.00
195660	101-3001-511.22-03	NE MULTI REGIONAL TRAINING INC	REGISTRATION	\$510.00	\$810.00
			REGISTRATION	\$50.00	
			REGISTRATION	\$250.00	
195662	101-3001-511.22-03	NELSON ALEXANDRA	TRAINING	\$786.00	\$786.00
195664	101-3001-511.21-65	NORTHERN IL FUNERAL SERVICES INC	MORGUE TRANSPORT	\$750.00	\$750.00
195665	101-3001-511.21-65	NORTHERN IL POLICE ALARM SYSTEM	TRANSLATING CHARGES	\$71.50	\$71.50
195666	101-3001-511.20-37	NORTHWEST CENTRAL DISPATCH SYS	MEMBER ASSESSMENT 11-2015	\$64,519.40	\$64,519.40
195668	101-3001-511.22-03	NORTHWESTERN UNIVERSITY	STAFF/COMMAND CLASS	\$3,400.00	\$3,400.00
195670	101-3001-511.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$59.99	\$835.05
			OFFICE SUPPLIES	\$224.91	
			OFFICE SUPPLIES	\$65.22	
			OFFICE SUPPLIES	\$301.30	
			OFFICE SUPPLIES	(\$74.95)	
			OFFICE SUPPLIES	(\$33.42)	
			OFFICE SUPPLIES	\$33.42	
			OFFICE SUPPLIES	\$208.50	
			OFFICE SUPPLIES	\$39.99	
			OFFICE SUPPLIES	\$2.74	
			OFFICE SUPPLIES	\$7.35	
195675	101-3001-511.22-03	RYAN PACYGA	TRAINING	\$45.00	\$45.00
195681	101-3001-511.22-03	PETTY CASH/POLICE	TRAINING	\$5.00	\$61.68
			TRAINING	\$34.34	
			TRAINING	\$22.34	
	101-3001-511.33-25		SUPPLIES	\$8.49	\$18.48
			SUPPLIES	\$9.99	
195682	101-3001-511.22-03	JOSEPH PINNELLO	TRAINING	\$15.00	\$15.00
195683	101-3001-511.22-03	ADAM PLAWER	TRAINING	\$75.00	\$90.00
			TRAINING	\$15.00	
195690	101-3001-511.21-65	R E WALSH & ASSOCIATES INC	FORENSIC LAB EXAMS	\$375.00	\$375.00
195694	101-3001-511.30-35	RAY O'HERRON	CLOTHING	\$1,166.12	\$2,624.02
			CLOTHING	\$303.75	
			CLOTHING	\$27.00	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195694	101-3001-511.30-35	RAY O'HERRON	CLOTHING	\$138.00	\$2,624.02
			CLOTHING	\$32.95	
			CLOTHING	\$164.99	
			CLOTHING	\$139.99	
			CLOTHING	\$105.90	
			CLOTHING	\$138.00	
			CLOTHING	\$74.95	
			CLOTHING	\$119.99	
			CLOTHING	\$161.93	
			CLOTHING	\$38.45	
			CLOTHING	\$12.00	
195703	101-3001-511.22-03	BRANDI ROMAG	TRAINING	\$65.00	\$65.00
195710	101-3001-511.22-03	TIMOTHY SCANLAN	TRAINING	\$75.00	\$75.00
195714	101-3001-511.22-03	SHOMETTE & ASSOCIATES	REGISTRATION	\$900.00	\$900.00
195720	101-3001-511.22-03	ERIK SLOAN	TUITION REIMBURSEMENT	\$1,500.00	\$1,575.00
			TRAINING	\$75.00	
195726	101-3001-511.33-25	SUBURBAN ACCENTS INC	GRAPHICS	\$90.00	\$90.00
195729	101-3001-511.21-65	TEAMINTEL LLC	DATA SERVICE	\$2,275.00	\$2,275.00
195736	101-3001-511.33-25	TJ CONEVERA'S	POLICE EQUIPMENT & SUPPLY	\$3,500.00	\$3,500.00
195739	235-3001-532.33-05	TRAFFIC SAFETY STORE	SUPPLIES	\$518.88	\$518.88
195740	101-3001-511.22-03	TRI-RIVER POLICE TRAINING REGION	REGISTRATION	\$400.00	\$400.00
195742	101-3001-511.22-03	MICHAEL TURANO	TRAINING	\$75.00	\$75.00
195743	235-3001-532.22-10	TYLER TECHNOLOGIES INC	PRINTING SUPPLIES	\$950.00	\$950.00
195746	401-3001-572.50-15	ULTRA STROBE COMMUNICATIONS INC	SQUAD EQUIPMENT	\$425.85	\$425.85
195748	101-3001-511.22-05	UPS STORE #4073	SHIPPING CHARGES	\$212.46	\$212.46
195754	101-3001-511.21-65	VERIZON WIRELESS	INV 9852824024	\$238.73	\$238.73
195760	101-3001-511.21-65	VERIZON WIRELESS	MAINTENANCE AGREEMENT	\$2,328.31	\$2,328.31
195768	101-3001-511.22-03	WHOWELL ANDREW	TRAINING	\$65.00	\$65.00
195769	101-3001-511.33-25	WILLIAMS SHOOTERS SUPPLY INC	POLICE EQUIPMENT & SUPPLY	\$6,751.00	\$6,751.00
195770	101-3001-511.22-03	WINKELMAN SCOTT	TRAINING	\$7,752.30	\$7,752.30
901089	101-3001-511.22-05	CITIBANK	POSTAGE	\$845.52	\$845.52
Total Division:				\$127,786.19	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 17

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Division: 3					
195498	231-3003-511.40-11	COMMISSION ON ACCREDITATION	REGISTRATION	\$670.00	\$670.00
195579	231-3003-511.40-11	HARRIS TRUST & SAVINGS BANK	AMERICAN AIRLINES	\$396.20	\$396.20
195688	231-3003-511.40-11	PRO TECH SECURITY SALES	EMERGENCY MEDICAL SUPPLY	\$28,700.00	\$28,700.00
Total Division:				\$29,766.20	
Total Department:				\$157,552.39	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 35 Fire					
Division: 1					
195450	101-3501-512.30-35	AIR ONE EQUIPMENT	SAFETY & FIRST AID EQUIP.	\$161.00	\$161.00
195460	101-3501-512.22-10	ARLINGTON SIGNS & BANNERS	OPEN HOUSE SIGN	\$30.00	\$30.00
195489	101-3501-512.21-02	CHICAGO COMMUNICATIONS LLC	EQUIPMENT INSTALLATION	\$2,555.40	\$4,855.40
			NEW MODEMS (5)	\$2,300.00	
195492	101-3501-512.21-02	CHUCKS COMPRESSOR INC	COMPRESSOR REPAIR	\$1,547.00	\$1,547.00
195531	101-3501-512.22-03	DJS SCUBA LOCKER INC	DRYSUIT CLASS	\$365.00	\$860.00
			PUBLIC SAFETY CLASS	\$495.00	
195550	101-3501-512.30-35	FIRESERVICE MANAGEMENT	TURNOUT GEAR REPAIR	\$383.81	\$383.81
195565	101-3501-512.30-35	GRAINGER W W INC	SAFETY & FIRST AID EQUIP.	\$115.32	\$115.32
195579	101-3501-512.21-02	HARRIS TRUST & SAVINGS BANK	OHD, INC.	\$760.00	\$760.00
	101-3501-512.22-02		PARAMEDIC LIC RENEWAL	\$41.75	\$83.50
			PARAMEDIC LIC RENEWAL	\$41.75	
	101-3501-512.31-65		WEST MARINE #1727	\$52.99	\$52.99
	101-3501-512.31-85		AMAZON MKTPLACE PMTS	\$93.49	\$93.49
195594	101-3501-512.33-05	IL FIRE CHIEFS ASSOC FOUNDATION	SUPPLIES	\$255.67	\$255.67
195599	101-3501-512.31-85	INTERSPIRO INC	DIVE EQUIPMENT	\$85.17	\$85.17
195600	101-3501-512.31-65	INTERSTATE ALL BATTERY CENTER	BATTERIES REBUILT	\$229.42	\$229.42
195655	101-3501-512.22-03	MARTIN MORAN	TUITION REIMBURSEMENT	\$705.00	\$705.00
195666	101-3501-512.20-37	NORTHWEST CENTRAL DISPATCH SYS	MEMBER ASSESSMENT 11-2015	\$21,506.46	\$21,506.46
195669	101-3501-512.31-65	OCEAN TECHNOLOGY SYSTEMS	RESCUE BOAT PARTS	\$99.64	\$99.64
195670	101-3501-512.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$18.49	\$229.30
			OFFICE SUPPLIES	\$84.37	
			OFFICE SUPPLIES	\$126.44	
195672	101-3501-512.30-35	ON TIME INC	T SHIRTS	\$285.00	\$285.00
195712	101-3501-512.31-65	SHERWIN ACE HARDWARE	HARDWARE SUPPLIES	\$29.96	\$29.96
195738	101-3501-512.21-65	TRACE ANALYTICS INC	COMPRESSED AIR TESTS	\$904.80	\$904.80
195741	101-3501-512.31-65	TRUE VALUE	PAINT	\$13.47	\$27.92
			AIR HOSE PARTS	\$14.45	
195758	101-3501-512.21-65	VERIZON WIRELESS	INV 9752817679	\$781.47	\$781.47
195772	101-3501-512.22-15	XEROX CORPORATION	LEASE AGREEMENT	\$19.71	\$356.83

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 19

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195772	101-3501-512.22-15	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$19.71	\$356.83
			OFFICE MACHINES & ACCESS	\$19.71	
			OFFICE MACHINES & ACCESS	\$85.00	
			OFFICE MACHINES & ACCESS	\$19.71	
			OFFICE MACHINES & ACCESS	\$19.71	
			OFFICE MACHINES & ACCESS	\$22.07	
			OFFICE MACHINES & ACCESS	\$85.00	
			OFFICE MACHINES & ACCESS	\$22.07	
			OFFICE MACHINES & ACCESS	\$22.07	
			OFFICE MACHINES & ACCESS	\$22.07	
	101-3501-512.30-05		OFFICE SUPPLIES, GENERAL	\$265.98	\$265.98
901089	101-3501-512.22-05	CITIBANK	POSTAGE	\$34.56	\$34.56
Total Division:				\$34,739.69	
Total Department:				\$34,739.69	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 20

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 40 Planning					
Division: 1					
195460	101-4001-521.33-05	ARLINGTON SIGNS & BANNERS	NAMEPLATE	\$56.00	\$56.00
195514	101-4001-521.40-40	COSTAR REALTY INFORMATION INC	SERVICE PROFESSIONAL	\$723.21	\$723.21
195579	101-4001-521.40-40	HARRIS TRUST & SAVINGS BANK	GLOBAL EXPERIENCE SPEC	\$644.32	\$644.32
195626	101-4001-521.21-65	LEGRAND REPORTING & VIDEO SERVICES	TRANSCRIPTS	\$880.75	\$880.75
195670	101-4001-521.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$300.99	\$127.87
			OFFICE SUPPLIES	\$54.18	
			OFFICE SUPPLIES	(\$227.30)	
195676	101-4001-521.22-01	PADDOCK PUBLICATIONS INC	ADVERTISING	\$94.50	\$453.60
			ADVERTISING	\$85.05	
			ADVERTISING	\$102.60	
			ADVERTISING	\$71.55	
			ADVERTISING	\$99.90	
195687	101-4001-521.30-05	PRINTFIN PRINTING & GRAPHICS SRVS	SERVICE PRINTING	\$48.00	\$48.00
195755	101-4001-521.21-65	VERIZON WIRELESS	INV 9752917734	\$106.60	\$106.60
195771	401-4001-572.50-10	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$127.00	\$5,171.00
			RENTAL/LEASE EQUIPMENT	\$5,044.00	
901089	101-4001-521.22-05	CITIBANK	POSTAGE	\$98.00	\$98.00
Total Division:				\$8,309.35	
Total Department:				\$8,309.35	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 21

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 41 Community Devl Block Grnt					
Division: 1					
195546	215-4101-522.41-62	ESCORTED TRANSPORTATION SERV	CDBG PROGRAM	\$733.75	\$733.75
Total Division:				\$733.75	
Total Department:				\$733.75	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 45 Building & Health Service					
Division: 1					
195571	101-4501-523.20-35	GRIVAS KRAUSE ASSOCIATES LTD	ENG.REVIEW PERMIT 15-740	\$550.00	\$550.00
195579	101-4501-523.22-03	HARRIS TRUST & SAVINGS BANK	ICC ONLINE TRAINING	\$69.00	\$69.00
195670	101-4501-523.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$511.09	\$511.09
195705	101-4501-523.22-10	RYDIN SIGN & DECAL	VENDING DECALS	\$417.00	\$417.00
195723	101-4501-523.21-65	SPRINT	ACCT 874139132	\$459.72	\$459.72
195733	101-4501-523.21-65	THOMPSON ELEVATOR INSPECTION	SERVICE BLDG MAINT	\$114.00	\$114.00
195772	101-4501-523.22-15	XEROX CORPORATION	OFFICE MACHINES & ACCESS	\$19.71	\$104.71
			OFFICE MACHINES & ACCESS	\$85.00	
901089	101-4501-523.22-05	CITIBANK	POSTAGE	\$148.46	\$148.46
Total Division:				\$2,373.98	
Division: 2					
195513	101-4502-523.21-10	CORELOGIC SOLUTIONS LLC	PROPERTY SEARCH	\$220.00	\$220.00
195549	101-4502-523.33-10	FFF ENTERPRISES INC	SUPPLIES	\$3,180.00	\$12,239.77
			SUPPLIES	\$6,360.00	
			SUPPLIES	(\$476.43)	
			SUPPLIES	\$3,176.20	
195579	101-4502-523.21-65	HARRIS TRUST & SAVINGS BANK	J2 MYFAX SERVICES	\$10.00	\$10.00
	101-4502-523.33-05		RECREATION SUPPLY COMP	\$66.54	\$66.54
	101-4502-523.33-10		CANDYFAVORITES.COM	\$62.55	\$62.55
	101-4502-523.40-53		COMED	\$250.00	\$718.03
			BILLMATRIX CORPORATION	\$2.50	
			COMED	\$408.30	
			BILLMATRIX CORPORATION	\$2.50	
			DAKOTA K AUTO REPAIR &	\$54.73	
195610	101-4502-523.20-25	KATOR LCSW, ANNE	COUNSELING	\$130.00	\$130.00
195643	101-4502-523.33-10	MC KESSON GENERAL MEDICAL	HEALTH RELATED SUPPLIES	\$2,308.18	\$2,308.18
195654	101-4502-523.33-10	MOORE MEDICAL LLC	CLINIC SUPPLIES	\$594.61	\$594.61
195737	101-4502-523.21-10	TNT LANDSCAPE CONSTRUCTION INC	PROPERTY MAINTENANCE	\$40.00	\$175.00

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 23

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195737	101-4502-523.21-10	TNT LANDSCAPE CONSTRUCTION INC	PROPERTY MAINTENANCE	\$40.00	\$175.00
			PROPERTY MAINTENANCE	\$30.00	
			PROPERTY MAINTENANCE	\$30.00	
			PROPERTY MAINTENANCE	\$35.00	
195759	101-4502-523.21-65	VERIZON WIRELESS	INV 9753039805	\$199.05	\$199.05
195772	101-4502-523.22-15	XEROX CORPORATION	LEASE AGREEMENT	\$85.00	\$85.00
901089	101-4502-523.22-05	CITIBANK	POSTAGE	\$66.72	\$66.72
Total Division:				\$16,875.45	
Division: 3					
195486	101-4503-523.31-65	CATHOLIC CHARITIES CATERING	PROGRAM SUPPLIES	\$67.50	\$67.50
195579	101-4503-523.21-65	HARRIS TRUST & SAVINGS BANK	VOLGISTICS INC	\$61.00	\$61.00
	101-4503-523.31-65		SAMSClub #8198	\$219.41	\$326.81
			WAL-MART #2815	\$41.18	
			GFS STORE #1913	\$66.22	
	101-4503-523.40-05		SAMS INTERNET	\$284.98	\$284.98
195615	101-4503-523.21-65	KOLLUM ,JEFFERY M	SENIOR CENTER PROGRAM	\$150.00	\$150.00
195734	101-4503-523.22-40	THREE O THREE TAXI FLASH CAB	TAXI PROGRAM	\$147.00	\$147.00
901089	101-4503-523.22-05	CITIBANK	POSTAGE	\$24.10	\$24.10
Total Division:				\$1,061.39	
Total Department:				\$20,310.82	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 24

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 50 Engineering					
Division: 1					
195461	401-5001-571.50-30	ARROW ROAD CONSTRUCTION CO	SERVICE CONSTRUCTION	\$598,746.07	\$598,746.07
195477	401-5001-571.50-30	MIKE BROWN	SIDEWALK REIMBURSEMENT	\$525.00	\$525.00
195512	401-5001-571.50-30	CONSTRUCTION & GEOTECHNICAL	SERVICE PROFESSIONAL	\$2,806.75	\$19,689.70
			SERVICE PROFESSIONAL	\$16,882.95	
195517	401-5001-571.50-30	CORINNE CRACZYK	REIMBURSEMENT DRIVEWAY	\$1,451.88	\$1,451.88
195533	401-5001-571.50-30	DOUGLAS G FELDER PC	WILKE/NW HWY	\$140.00	\$140.00
195563	101-5001-524.20-05	GOVTEMPS USA LLC	TEMP HELP - PLAN REVIEWER	\$994.00	\$3,010.00
			TEMP HELP - PLAN REVIEWER	\$1,120.00	
			TEMP HELP - PLAN REVIEWER	\$896.00	
195579	101-5001-524.22-03	HARRIS TRUST & SAVINGS BANK	U OF IL ONLINE PAYMENT	\$125.00	\$125.00
	101-5001-524.32-80		JOHN WILEY & SONS, INC	\$110.63	\$110.63
195762	101-5001-524.21-65	VERIZON WIRELESS	INV 9752523980	\$422.23	\$422.23
195772	101-5001-524.22-15	XEROX CORPORATION	LEASE AGREEMENT	\$85.00	\$85.00
901089	101-5001-524.22-05	CITIBANK	POSTAGE	\$24.31	\$24.31
Total Division:				\$624,329.82	
Total Department:				\$624,329.82	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 71 Public Works					
Division: 1					
2015	235-7101-571.50-20	J GILL & COMPANY	COLUMN INSPECTION	\$950.00	\$950.00
	235-7101-571.50-25		SERVICE BLDG CONSTRUCT	\$116,977.50	\$240,034.90
			SERVICE BLDG CONSTRUCT	\$123,057.40	
195447	101-7101-531.31-75	ACTIVE ELECTRICAL SUPPLY CO	PARKING GARAGE LAMPS	\$152.11	\$1,589.12
			SUPPLIES	\$431.70	
			PHOTOCELL TWISTLOCK	\$388.37	
			SUPPLIES	\$335.42	
			SIGN LAMPS	\$281.52	
195459	401-7101-572.50-15	ARLINGTON POWER EQUIPMENT	ELECTRICAL EQUIP & SUPPLY	\$3,660.00	\$3,660.00
195461	101-7101-531.31-90	ARROW ROAD CONSTRUCTION CO	STREET/SIDEWALK SUPPLIES	\$744.60	\$4,066.25
			STREET/SIDEWALK SUPPLIES	\$390.37	
			STREET/SIDEWALK SUPPLIES	\$725.60	
			STREET/SIDEWALK SUPPLIES	\$1,189.72	
			STREET/SIDEWALK SUPPLIES	\$1,015.96	
195462	101-7101-531.22-70	AT & T LONG DISTANCE	857088062	\$472.98	\$472.98
195465	401-7101-572.50-15	BADE PAPER PRODUCTS	BOSS CARPET EXT	\$1,788.88	\$1,788.88
195470	101-7101-531.31-55	BERKHEIMER CO INC	SUPPLIES	\$97.16	\$97.16
195480	101-7101-531.21-36	C C CARTAGE INC	RENTAL/LEASE EQUIPMENT	\$1,150.00	\$1,150.00
195488	101-7101-531.31-55	CENTURY TILE CO	BUILDING SUPPLIES	\$137.56	\$137.56
195493	101-7101-531.30-35	CINTAS CORP	CLOTHING	\$36.82	\$36.82
195494	435-7101-531.40-86	MICHAEL CIPOLLA	EAB	\$50.00	\$50.00
195506	101-7101-531.21-50	COMMONWEALTH EDISON COMPANY	3291084013	\$1,793.49	\$1,793.49
195507	101-7101-531.21-50	COMMONWEALTH EDISON COMPANY	4103039009	\$177.34	\$177.34
195508	101-7101-531.21-50	COMMONWEALTH EDISON COMPANY	2278061084	\$81.62	\$81.62
195511	101-7101-531.21-11	COMPLETE CLEANING CO INC	SERVICE BLDG MAINT	\$2,630.00	\$2,630.00
195516	101-7101-531.21-11	COYNE TEXTILE SERVICES	MAT CLEANING	\$15.84	\$15.84
195529	401-7101-571.50-40	DENLER INC	SERVICE CONSTRUCTION	\$100,000.00	\$100,000.00
195542	101-7101-531.21-02	DYNAMIC HEATING & PIPING CO	SERVICE BLDG MAINT	\$2,486.50	\$2,985.50
			EQUIPMENT MAINTENANCE	\$499.00	
	401-7101-571.50-20		BUILDING MAINTENANCE	\$1,926.00	\$1,926.00

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195551	101-7101-531.21-15	FLECKS LANDSCAPING	SERVICE MISCELLANEOUS	\$8,932.00	\$8,932.00
195555	101-7101-531.21-02	FOUNTAIN TECHNOLOGIES LTD	SERVICE FOUNTAIN	\$825.00	\$825.00
195556	101-7101-531.30-35	FRANCIS LLOYD M	BOOT REIMBURSEMENT	\$100.00	\$100.00
195560	101-7101-531.22-05	GEMPLERS	POSTAGE	\$87.19	\$87.19
	101-7101-531.31-85		MOWER	\$410.92	\$410.92
195562	101-7101-531.21-11	GOLDEN EAGLES	BUILDING MAINTENANCE	\$675.00	\$675.00
195573	101-7101-531.21-11	GSF USA INC	SERVICE BLDG MAINT	\$11,249.00	\$11,249.00
195579	101-7101-531.22-03	HARRIS TRUST & SAVINGS BANK	THE MORTON ARBORETUM	\$150.00	\$128.00
			THE MORTON ARBORETUM	(\$22.00)	
	101-7101-531.31-65		AMAZON MKTPLACE PMTS	\$15.98	\$15.98
195580	101-7101-531.21-02	HAYES MECHANICAL	EQUIPMENT MAINTENANCE	\$360.85	\$360.85
195586	101-7101-531.31-90	HOME DEPOT #1922	PAINT	\$61.92	\$61.92
195591	435-7101-531.40-86	BETTY HOPKINSON	EAB	\$50.00	\$50.00
195596	101-7101-531.31-55	ILLCO INC	SUPPLIES	\$260.88	\$260.88
195601	101-7101-531.31-40	JCK CONTRACTORS	TOPSOIL	\$1,005.00	\$1,005.00
195614	401-7101-571.50-20	KINGSLEY & GINNODO ARCHITECTS	MASONRY REPAIR WORK	\$250.00	\$250.00
195630	101-7101-531.21-02	LIONHEART CRITICAL POWER	UPPER JACKET WATER HOSE	\$376.00	\$592.00
			GENERATOR REPAIRS	\$216.00	
195631	101-7101-531.30-35	LOWES COMMERCIAL SERVICES	CLOTHING & APPAREL	\$25.62	\$25.62
	101-7101-531.31-40		AGRICULTURAL SUPPLIES	\$39.84	\$39.84
	101-7101-531.31-65		BATTERIES	\$7.11	\$7.11
	101-7101-531.31-85		HAND TOOLS-POWER/NON POW	\$26.61	\$26.61
195634	101-7101-531.30-39	MANSFIELD OIL COMPANY	FUEL,OIL,GREASE, & LUBES	\$13,535.57	\$13,535.57
195645	101-7101-531.22-02	SHAWN MCALPIN	CDL REIMBURSEMENT	\$50.00	\$50.00
195651	101-7101-531.21-02	MID AMERICAN ELEVATOR CO INC	EQUIPMENT MAINTENANCE	\$562.25	\$562.25
195667	101-7101-531.31-75	NORTHWEST ELECTRICAL SUPPLY CO	SUPPLIES	\$91.24	\$91.24
195670	101-7101-531.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$29.57	\$168.73
			OFFICE SUPPLIES	\$51.49	
			OFFICE SUPPLIES	\$87.67	
195671	101-7101-531.21-15	OLIVE GROVE LANDSCAPING INC	SERVICE MISCELLANEOUS	\$2,339.00	\$2,339.00
195684	101-7101-531.31-90	POROUS PAVE	BINDER, RUBBER CHIPS	\$367.70	\$367.70
195686	101-7101-531.21-55	POWELL TREE CARE INC	SERVICE TREES	\$9,630.00	\$9,630.00
195702	101-7101-531.30-39	RKA PETROLEUM COMPANIES INC	FUEL,OIL,GREASE, & LUBES	\$17,060.62	\$17,060.62
195709	101-7101-531.21-15	SANDY'S LAWN AND TREE CARE	SERVICE MISCELLANEOUS	\$5,406.25	\$5,406.25

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195712	101-7101-531.31-40	SHERWIN ACE HARDWARE	AGRICULTURAL SUPPLIES	\$15.96	\$15.96
	101-7101-531.31-65		HARDWARE SUPPLIES	\$121.96	\$121.96
	101-7101-531.31-70		TRAFFIC SIGNAL SUPPLIES	\$68.95	\$68.95
195715	101-7101-531.33-05	SIDWELL CO	MAP BINDER	\$475.00	\$475.00
195716	401-7101-571.50-20	SIMONS, DOUGLAS	SERVICE BLDG MAINT	\$2,400.00	\$4,550.00
			SERVICE BLDG MAINT	\$2,150.00	
195751	101-7101-531.22-70	VERIZON WIRELESS	INV 9751441143	\$126.44	\$126.44
195752	101-7101-531.22-70	VERIZON WIRELESS	LONG DISTANCE SERVICE	\$472.98	\$472.98
195765	235-7101-571.50-25	WALKER PARKING CONSULTANTS	SERVICE CONSULTING	\$3,263.83	\$3,263.83
195766	435-7101-571.50-55	WEST CENTRAL MUNICIPAL CONF	AGRICULTURAL SUPPLIES	\$27,132.00	\$27,132.00
195772	101-7101-531.22-15	XEROX CORPORATION	LEASE AGREEMENT	\$11.08	\$26.62
			SERVICE MISCELLANEOUS	\$15.54	
801494	101-7101-531.22-70	AT & T	847439786809	\$158.49	\$11,561.54
			847342153609	\$86.29	
			847259612407	\$84.10	
			847255350509	\$2,150.51	
			847590600008	\$1,640.31	
			847R16028909	\$728.22	
			847253343809	\$189.80	
			847253312009	\$6,182.11	
			847398933609	\$341.71	
801495	101-7101-531.21-50	COMMONWEALTH EDISON COMPANY	0002031003	\$31.55	\$729.45
			5492508009	\$10.00	
			0002031003	\$31.55	
			3973144001	\$77.70	
			4286290000	\$578.65	
801496	101-7101-531.21-50	NICOR	94830700004	\$261.79	\$4,495.91
			38096400007	\$100.51	
			06802945268	\$24.50	
			95407400001	\$591.85	
			15839647334	\$24.49	
			28178600004	\$480.14	
			40178600009	\$26.09	
			38178600003	\$46.75	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 28

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
801496	101-7101-531.21-50	NICOR	72489260108	\$156.89	\$4,495.91
			95422686599	\$953.58	
			97034457784	\$490.26	
			96945600003	\$980.42	
			43278600002	\$96.58	
			19426400008	\$83.52	
			58401600000	\$178.54	
901089	101-7101-531.22-05	CITIBANK	POSTAGE	\$10.35	\$10.35
Total Division:				\$491,008.73	
Total Department:				\$491,008.73	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 72 Water and Sewer					
Division: 1					
195480	505-7201-561.21-36	C C CARTAGE INC	RENTAL/LEASE EQUIPMENT	\$21,388.55	\$21,388.55
	505-7201-561.21-62		SERVICE DISPOSAL	\$5,525.00	\$5,525.00
	505-7201-561.31-90		STREET/SIDEWALK SUPPLIES	\$8,802.23	\$8,802.23
195499	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0705092066	\$36.52	\$36.52
195500	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0528113037	\$2,665.19	\$2,665.19
195502	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0117046072	\$55.58	\$55.58
195503	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0081080033	\$2,318.00	\$2,318.00
195504	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0441087047	\$2,420.10	\$2,420.10
195505	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0831076049	\$145.29	\$145.29
195510	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0789016039	\$806.10	\$806.10
195553	505-7201-561.31-01	FOREMAN JOSEPH D AND CO	COPPER TUBING	\$780.00	\$780.00
	505-7201-561.31-07		REDUCER	\$1,054.45	\$2,224.45
			COPPER TUBING	\$1,170.00	
195565	505-7201-561.31-55	GRAINGER W W INC	LIQUID-TIGHT CONDUIT	\$58.65	\$58.65
195567	505-7201-561.50-15	GRAYBAR ELECTRIC COMPANY	CAMERA UPGRADE	\$1,659.91	\$1,659.91
195579	505-7201-561.31-65	HARRIS TRUST & SAVINGS BANK	AMAZON MKTPLACE PMTS	\$96.74	\$141.69
			AMAZON.COM	\$44.95	
	505-7201-561.31-85		AMAZON.COM	\$161.70	\$161.70
	505-7201-561.50-10		AMAZON.COM	\$119.99	\$119.99
195581	505-7201-561.21-35	HBK WATER METER SERVICE INC	SERVICE METER	\$3,532.54	\$14,922.86
			SERVICE METER	\$11,390.32	
195587	505-7201-561.21-50	HOMEFIELD ENERGY	0528113037	\$2,018.74	\$2,018.74
195588	505-7201-561.21-50	HOMEFIELD ENERGY	0300013030	\$5,171.15	\$5,171.15
195590	505-7201-561.21-50	HOMEFIELD ENERGY	0522082015	\$385.28	\$385.28
195630	505-7201-561.21-02	LIONHEART CRITICAL POWER	ANTIFREEZE	\$1,700.00	\$1,700.00
195631	505-7201-561.31-65	LOWES COMMERCIAL SERVICES	HARDWARE SUPPLIES	\$57.11	\$57.11
195639	505-7201-561.31-07	MC CANN INDUSTRIES	SUPPLIES	\$1,081.69	\$1,081.69
195644	505-7201-561.31-07	MCA INDUSTRIES	REBAR	\$400.00	\$400.00
195653	505-7201-561.31-02	MIDWEST METER INC	COMPOUND SERIES BASE	\$1,776.50	\$1,776.50
195661	505-7201-561.31-07	NEENAH FOUNDRY COMPANY	SIDE PC FRAME	\$120.00	\$172.00

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195661	505-7201-561.31-07	NEENAH FOUNDRY COMPANY	SIDE PC FRAME	\$52.00	\$172.00
195670	505-7201-561.30-05	OFFICE DEPOT	OFFICE SUPPLIES	\$29.58	\$168.75
			OFFICE SUPPLIES	\$51.50	
			OFFICE SUPPLIES	\$87.67	
195674	505-7201-561.31-90	OZINGA READY MIX CONCRETE INC	STREET/SIDEWALK SUPPLIES	\$1,216.00	\$5,776.00
			STREET/SIDEWALK SUPPLIES	\$592.00	
			STREET/SIDEWALK SUPPLIES	\$3,968.00	
195696	505-7201-561.30-35	RED WING SHOE STORE	CLOTHING & APPAREL	\$188.65	\$537.09
			CLOTHING & APPAREL	\$182.70	
			SHOES AND BOOTS	\$165.74	
195712	505-7201-561.31-65	SHERWIN ACE HARDWARE	HARDWARE SUPPLIES	\$1.13	\$1.13
195719	505-7201-561.21-35	SKIRMONT MECHANICAL CONTRACTORS	SERVICE METER	\$10,805.65	\$10,805.65
195725	505-7201-561.31-05	STEINER ELECTRIC	PUMP WIRE TERMINATION	\$68.64	\$68.64
	505-7201-561.31-55		BUILDING SUPPLIES	\$181.45	\$181.45
195731	505-7201-561.31-02	TEST GAUGE & BACKFLOW SUPPLY	PRESSURE ASSEMBLY	\$1,162.99	\$2,391.93
			PRESSURE ASSEMBLY	\$1,228.94	
195750	505-7201-561.31-65	USA BLUEBOOK	GAS FLOW REGULATOR	\$1,451.53	\$3,953.55
			WATER SAMPLE CHEMICALS	\$439.91	
			SUPPLIES	\$761.33	
			COLORINE TANK SWITCH	\$1,300.78	
195767	505-7201-561.31-85	WHOLESALE DIRECT INC	IDOT JUSTICE BAR	\$1,377.79	\$1,377.79
801494	505-7201-561.22-70	AT & T	847590808508	\$244.93	\$1,258.02
			847590210508	\$930.75	
			847253017409	\$82.34	
801495	505-7201-561.21-50	COMMONWEALTH EDISON COMPANY	0368380009	\$32.11	\$32.11
801496	505-7201-561.21-50	NICOR	76830700001	\$114.46	\$958.39
			42567835683	\$26.34	
			90920700003	\$81.82	
			05850400002	\$32.61	
			58544400003	\$24.50	
			16797600000	\$81.94	
			90920700003	\$80.73	
			58544400003	\$26.32	
			05850444442	\$27.67	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 31

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
801496	505-7201-561.21-50	NICOR	19278600002	\$158.00	\$958.39
			19278600002	\$304.00	
Total Division:				\$104,504.78	
Total Department:				\$104,504.78	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002Date: Wednesday, October 14, 2015
Page 32

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 73 Parking					
Division: 1					
195747	235-7301-532.21-40	UNION PACIFIC RAILROAD	LOT P 3RD QTR PAYMENT	\$3,663.93	\$3,663.93
801495	235-7301-532.21-50	COMMONWEALTH EDISON COMPANY	4643715006	\$21.50	\$142.14
			5231622008	\$59.94	
			5231622008	\$60.70	
Total Division:				\$3,806.07	
Division: 2					
195501	235-7302-532.21-50	COMMONWEALTH EDISON COMPANY	4874331007	\$912.78	\$912.78
195525	235-7302-532.21-11	DAHME MECHANICAL INDUSTRIES	BUILDING MAINTENANCE	\$98.00	\$508.00
			BUILDING MAINTENANCE	\$410.00	
195579	235-7302-532.33-05	HARRIS TRUST & SAVINGS BANK	AMAZON MKTPLACE PMTS	\$596.92	\$596.92
195589	235-7302-532.21-50	HOMEFIELD ENERGY	4874331007	\$138.10	\$138.10
Total Division:				\$2,155.80	
Division: 3					
195509	235-7303-532.21-50	COMMONWEALTH EDISON COMPANY	4643395004	\$748.18	\$748.18
195631	235-7303-532.31-65	LOWES COMMERCIAL SERVICES	HARDWARE SUPPLIES	\$226.80	\$226.80
801494	235-7303-532.21-50	AT & T	847632002809	\$2,392.97	\$2,564.98
			847253097809	\$172.01	
801496	235-7303-532.21-50	NICOR	12690400002	\$51.34	\$51.34
Total Division:				\$3,591.30	
Division: 4					
195717	235-7304-532.21-02	SIMPLEX GRINNELL	SPRINKLER INSPECTION	\$397.00	\$397.00
801496	235-7304-532.21-50	NICOR	92296400002	\$87.49	\$87.49

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 33

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Total Division:				\$484.49	
Total Department:				\$10,037.66	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 34

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 74 Solid Waste Dispsl SWANCC					
Division: 1					
901090	511-7401-562.21-54	SOLID WASTE AGENCY	TIPPING FEES	\$93,093.00	\$93,093.00
Total Division:				\$93,093.00	
Total Department:				\$93,093.00	

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 75 Municipal Fleet Services					
Division: 1					
195459	621-7501-551.31-51	ARLINGTON POWER EQUIPMENT	FAN COVER	\$28.87	\$52.37
			CLUTCH STARTER	\$23.50	
195460	621-7501-551.21-07	ARLINGTON SIGNS & BANNERS	VINYL DECALS	\$785.00	\$785.00
195463	621-7501-551.31-51	ATLAS BOBCAT INCORPORATED	VEH MAINTENANCE SUPPLY	\$2.74	\$2.74
195464	621-7501-551.31-65	AUTO PARTS HOUSE INC	SILENCER	\$35.99	\$35.99
195468	621-7501-551.31-51	BATTERIES PLUS LLC	BATTERIES	\$162.72	\$162.72
195483	621-7501-551.21-07	CAR PRETTY	STICKER REMOVAL DETAIL	\$100.00	\$100.00
195484	621-7501-551.31-51	CAR QUEST	HD BLADE WIDE SADDLE	\$107.96	\$597.51
			RIGHT STUFF GASKET MAKER	\$99.30	
			VEH MAINTENANCE SUPPLY	\$3.52	
			VEH MAINTENANCE SUPPLY	\$9.59	
			AIR FILTERS	\$34.81	
			VEH MAINTENANCE SUPPLY	\$24.19	
			PINION SEAL	\$14.11	
			OIL SEAL	\$7.19	
			VEH MAINTENANCE SUPPLY	\$82.75	
			VEH MAINTENANCE SUPPLY	\$7.99	
			HYD FITTING	\$47.56	
			SPRING GUARDS	\$158.54	
195485	621-7501-551.31-51	CASTLE CHEVROLET NORTH	RETAINER CHECK	\$50.72	\$120.12
			SEAL	\$19.41	
			RETAINER HANDLE	\$49.99	
195491	621-7501-551.31-51	CHICAGO PARTS AND SOUND	CORE RETURN	(\$60.00)	\$101.37
			VEH MAINTENANCE SUPPLY	(\$104.35)	
			BRAKE SHOE KIT	\$179.92	
			BRAKE KIT	\$85.80	
195493	621-7501-551.30-35	CINTAS CORP	CLOTHING	\$36.82	\$36.82
195495	621-7501-551.31-51	CLASS C SOLUTIONS GROUP	AIR BRAKE TUBING	\$144.43	\$144.43
195534	621-7501-551.31-51	DOUGLAS TRUCK PARTS INC	SNAP PLUG FASTENER	\$59.88	\$59.88
195565	621-7501-551.31-51	GRAINGER W W INC	EXT SPRING	\$6.21	\$65.66

WARRANT REGISTER - GM0002

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
195565	621-7501-551.31-55	GRAINGER W W INC	EXT SPRING	\$23.78	\$65.66
			EXT SPRING	\$29.46	
			EXT SPRING	\$6.21	
	621-7501-551.31-65		SUPPLIES	\$137.22	\$137.22
195578	621-7501-551.31-85	HARBOR FREIGHT TOOLS	PROPANE BLOWTORCH KIT	\$32.69	\$32.69
195579	621-7501-551.31-51	HARRIS TRUST & SAVINGS BANK	AUTOZONE #2567	\$79.98	\$71.90
			AUTOZONE #2567	\$71.90	
			AUTOZONE #2567	(\$79.98)	
	621-7501-551.31-85		WALMART.COM	\$26.76	\$113.66
			AMAZON MKTPLACE PMTS	\$86.90	
195598	621-7501-551.31-51	INDUSTRIAL STEEL SERVICE INC	VEH MAINTENANCE SUPPLY	\$168.87	\$168.87
195611	621-7501-551.31-51	KEYSTONE	REPLACE LOST CK 192424	\$181.00	\$181.00
195619	621-7501-551.21-07	LAND AIR ASSOCIATES	WELDING SERVICES	\$40.00	\$40.00
195625	621-7501-551.31-51	LEE AUTO PARTS	STICK-ON MIRROR	\$7.90	\$16.89
			OIL SEAL	\$8.99	
195628	621-7501-551.21-62	LIBERTY TIRE RECYCLING	TIRES	\$119.03	\$119.03
195679	621-7501-551.31-51	PATLIN INC	SPRAY PAINT	\$118.78	\$118.78
195698	621-7501-551.31-51	RENEWED PERFORMANCE INC	ROTARY LOCKS, STRIKER	\$321.56	\$321.56
195712	621-7501-551.31-51	SHERWIN ACE HARDWARE	HARDWARE SUPPLIES	\$1.14	\$1.14
	621-7501-551.31-65		HARDWARE SUPPLIES	\$26.97	\$26.97
195724	621-7501-551.31-51	STANDARD EQUIPMENT CO	WELDMENT PIN	\$61.40	\$1,065.10
			THERMOSTAT	\$36.28	
			VEH MAINTENANCE	\$826.74	
			BEARING	\$140.68	
195730	621-7501-551.31-65	TERMINAL SUPPLY CO	SHRINK TUBING	\$274.66	\$274.66
195744	621-7501-551.21-07	UL LLC	EMERGENCY VEHICLES TESTED	\$1,590.00	\$1,590.00
195746	621-7501-551.21-07	ULTRA STROBE COMMUNICATIONS INC	EQUIP INSTALLATION/LABOR	\$918.75	\$918.75
195749	621-7501-551.31-51	US AUTO FORCE	VEH MAINTENANCE SUPPLY	\$450.72	\$450.72
195767	621-7501-551.31-51	WHOLESALE DIRECT INC	AMBER LIGHT	\$39.40	\$39.40
Total Division:				\$7,952.95	
Total Department:				\$7,952.95	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 37

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 80 Pensions					
Division: 1					
901089	711-8001-631.22-05	CITIBANK	POSTAGE	\$48.50	\$48.50
Total Division:				\$48.50	
Total Department:				\$48.50	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 38

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 90 Capital					
Division: 1					
195640	505-9001-571.50-25	MC CLURE ENGINEERING ASSOCIATES	SERVICE CONSULTING	\$3,500.00	\$3,500.00
195680	505-9001-571.50-25	PATNICK CONSTRUCTION INC	SERVICE CONSTRUCTION	\$125,562.28	\$125,562.28
Total Division:				\$129,062.28	
Division: 3					
195522	621-9003-572.50-05	CURRIE MOTORS	VEHICLE MAJOR TRANSPORT	\$19,556.00	\$155,492.00
			VEHICLE MAJOR TRANSPORT	\$30,208.00	
			VEHICLE MAJOR TRANSPORT	\$105,728.00	
Total Division:				\$155,492.00	
Total Department:				\$284,554.28	

Check Date: 2015 - 10 - 15

WARRANT REGISTER - GM0002

Date: Wednesday, October 14, 2015
Page 39

Check #	Account Number	Payee	Description 1	Transaction Amount	Total Trans Amt
Department: 99 Non Operating					
Division: 1					
195648	515-9901-525.40-92	METROPOLIS COMMERCIAL CONDO ASSN	BLDG RESERVE CHARGE 10-15	\$1,199.90	\$7,568.60
			CAM CHARGE	\$6,368.70	
Total Division:				\$7,568.60	
Total Department:				\$7,568.60	
TOTAL ALL FUNDS:				\$2,444,795.20	



Item: Presentation of Disability Employment Award

Department: Village Manager's Office

Presentation of Disability Employment Awareness Award to the Arlington Heights
Park District

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:



Item: Non-Chloride Granular Deicer Contract

Department: Public Works

BACKGROUND

The Village Board awarded a contract to New Deal Deicing for non-chloride granular deicer on January 20, 2015. Non-chloride granular deicer is used to perform snow and ice control operations on the Village's three elevated parking garages.

The Village utilizes a combination of sodium and potassium acetate on the elevated garages. The Village has not permitted the use of chlorides on the parking garages due to its corrosive effect on the structural steel embedded within the concrete.

New Deal Deicing was the lowest responsible bidder in the public bid held December 9, 2014. The contract was for one year with an optional one-year extension. Staff is very pleased with the performance of the product from New Deal Deicing. Staff would like to extend the contract, per Village policy, for one additional year at the original bid per ton price, as agreed on by New Deal Deicing.

Staff recommends proceeding with a one-year contract extension for non-chloride granular deicer at the original bid price of \$1,873 per ton.

RECOMMENDATION

It is recommended that the Village Board approve a one-year contract extension for non-chloride granular deicer to New Deal Deicing of Denver, Colorado in the amount of \$1,873 per ton.

Bid Section

Item:	Non-Chloride Granular Deicer Contract
Bid Opening Date:	December 9, 2014
Account Numbers:	235-7301-532.31-90, 235-7302-532.31-90, 235-7303-532.31-90
Total Budget for Specific	

Item:	\$60,900
Bid Amount:	\$1,873 per ton



Item: Repairs to John Deere End Loader

Department: Public Works

BACKGROUND

The Public Works Department currently has a John Deere Rubber-Tired End Loader used primarily at the Village Annex facility for loading trucks and moving material.

On August 25th, this loader was damaged while an employee was performing a work task at the Village Annex site. This incident resulted in damage to the ladder, cab structure and windows. This unit was transported to Westside Tractor Sales of Chicago for analysis and estimated repair costs. Westside Tractor is the local John Deere Authorized Dealer for Northern Illinois. The estimated repair costs are \$25,516.66. By allowing Westside Tractor Sales to perform all repair work, the costs and down time for the repair will be minimized. This piece of equipment will be needed very soon for our upcoming leaf sweeping operations.

The Fleet Fund Maintenance account has sufficient funds to cover these expenditures in account 621-7501-551-2107. Staff recommends approving the repair with Westside Tractor Sales to perform all necessary work on the John Deere End Loader.

RECOMMENDATION

It is recommended that the Village Board waive the bidding procedure and authorize payment of \$25,516.66 to Westside Tractor Sales of Chicago, Illinois to perform the above described repair work to the John Deere End Loader.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:



Item: Non-Chloride Liquid Deicer Contract

Department: Public Works

BACKGROUND

The Village Board awarded a contract to Wellspring Management for non-chloride liquid deicer on January 20, 2015. Non-chloride liquid deicer is used to enhance our ice control operations on the Village's three elevated parking garages. This liquid deicer is used as a wetting agent to enhance granular application and as pre-wet application to minimize ice bond to the parking garage decks.

The Village has not permitted the use of chlorides on the parking garages due to its corrosive effect on the structural steel embedded within the concrete.

Wellspring Management was the lowest responsible bidder in the public bid held on December 9, 2014. The initial contract is for one year with an optional one-year extension. Wellspring Management has agreed to the one-year extension at the original bid price. Staff has been very pleased with the performance and delivery of the product.

Staff recommends proceeding with a one-year contract extension, per Village policy, at the original bid price of \$3.975 per gallon of non-chloride liquid deicer.

RECOMMENDATION

It is recommended that the Village Board approve a one-year contract extension for non-chloride liquid deicer to Wellspring Management of Oak Park, Illinois in an amount of \$3.975 per gallon.

Bid Section

Item:	Non-Chloride Liquid Deicer Contract
Bid Opening Date:	December 9, 2014
Account Numbers:	235-7301-532.31-90, 235-7302-532.31-90, 235-7303-532.31-90
Total Budget for Specific	\$60,900

Item:

Bid Amount: \$3.975 per gallon



Item: Ordinance - Comprehensive Plan - 2015

Department: Planning/Legal

An Ordinance Amending the Comprehensive Plan and Official Map of the Village of Arlington Heights
(2015 Update)

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
2015 Comprehensive Plan and Official Map	Ordinance
2015 Comprehensive Plan - A	Exhibits
2015 Comprehensive Plan - B	Exhibits
2015 Comprehensive Plan - C	Exhibits
2015 Comprehensive Plan - D	Exhibits
2015 Comprehensive Plan - E	Exhibits

**AN ORDINANCE AMENDING THE COMPREHENSIVE PLAN AND
THE OFFICIAL MAP OF THE VILLAGE OF ARLINGTON HEIGHTS**

WHEREAS, the President and Board of Trustees of the Village of Arlington Heights have from time to time amended the Comprehensive Plan and the Official Map of the Village of Arlington Heights; and

WHEREAS, the Plan Commission of the Village of Arlington Heights, in Petition Number 14-020, conducted a public hearing on August 26, 2015, pursuant to published notice, to consider amendments to the Comprehensive Plan and Official Map, and has recommended adoption of said amendments for purposes of future implementation of the Comprehensive Plan and the Official Map; and

WHEREAS, the President and Board of Trustees have considered the report and recommendation of the Plan Commission and have determined that such amendments to the Comprehensive Map and Official Map are the best interests of the Village of Arlington Heights,

NOW, THEREFORE, BE IT ORDAINED BY THE PRESIDENT AND BOARD OF TRUSTEES OF THE VILLAGE OF ARLINGTON HEIGHTS:

SECTION ONE: The Comprehensive Plan and the Official Map of the Village of Arlington Heights are hereby amended by adopting the 2015 Comprehensive Plan and Official Map and amendments to the Comprehensive Plan Land Use Map, a true and correct copy of which are attached hereto and made a part hereof.

SECTION TWO: The revisions to the Comprehensive Plan and Official Map shall be placed on file with the Village Clerk and shall be available for public inspection.

SECTION THREE: This Ordinance shall be in full force and effect from and after its passage and approval in the manner provided by law.

AYES:

NAYS:

PASSED AND APPROVED this 19th day of October, 2015.

ATTEST:

Village President

Village Clerk



VILLAGE OF ARLINGTON HEIGHTS COMPREHENSIVE PLAN

JUNE 2015

2015

Prepared by the Village of Arlington Heights
Department of Planning and Community Development

(Page Intentionally Left Blank For Double-Sided Printing)



2015

Comprehensive Plan

Prepared by the Department of Planning and Community
Development



Village of Arlington Heights

33 South Arlington Heights Road
Arlington Heights, Illinois 60005-1499
(847) 253-2340

Village Board of Trustees

Thomas W. Hayes, Mayor
Carol J. Blackwood
Joseph C. Farwell
Thomas Glasgow
Bert Rosenberg
John Scaletta
Mike Sidor
Jim Tinaglia*
Robin LaBedz

Plan Commission

Joseph Lorenzini, chairman*
Jay Cherwin
Susan Dawson
George T. Drost*
Terrence Ennes*
Bruce C. Green
Lynn Jensen
John Sigalos*
Mary Jo Warskow*

*** Comprehensive Plan Subcommittee Members**

Village Administration

Randall Recklaus, Village Manager
Diana Mikula, Assistant Village Manager
Charles Witherington-Perkins, Director of Planning and Community Development

Planning Staff

Bill Enright, Deputy Director, Planning & Community Development
Nora Boyer, Housing Planner
Latika Bhide, Development Planner
Steven Hautzinger, Design Planner
Derek Mach, Landscape Planner
Michael Mertes, Business Development Coordinator
Bill Cooney, Intern
Rich McGowan, Intern

Approved by the Village Board of Trustees
Date (Ordinance #)

CONTENTS

1		INTRODUCTION	01
2		GOALS AND POLICIES	11
3		HOUSING AND POPULATION	23
4		ECONOMIC DEVELOPMENT	31
5		RECREATION	43
6		HISTORIC PRESERVATION	51
7		CORRIDORS	59
8		SUSTAINABILITY	75
9		PUBLIC INPUT	85
A		APPENDIX	89

Introduction

Chapter Contents: Housing and Population, Economic Development, Recreation and Education, Traffic Circulation, Land Use, What is a Comprehensive Plan?, Implementation, Citizen Participation, Goal Setting

Background

Since its incorporation in 1887, the Village of Arlington Heights has grown into one of the largest suburbs in the metropolitan area. The Village has reached the “maturation” stage in its development growth and, therefore, faces new challenges and opportunities. Redevelopment of the Village’s commercial, manufacturing, and residential areas has become the predominant issue when planning for the future of the Village.

Historically, planning dates back to 1836 when the unincorporated Village of Dunton, which later became Arlington Heights, was first platted by Asa Dunton. In 1927, the first zoning ordinance was adopted by the Village Board. Comprehensive Plans have been produced by the Village in 1960, 1969, 1977, 1984, 1988, 1991 and 1997. This Plan, which was prepared, reviewed, discussed by the public, and recommended by the Plan Commission to the Village Board in 2015, should guide the citizens, Village leaders, developers, and other interested parties through the next 10 to 15 years. The Comprehensive Plan and the planning process cause the community to look ahead, peer into the future and anticipate what Arlington Heights will be like in the years ahead.



Downtown: Then and Now



Village of Arlington Heights Gateway Sign

Chapter Contents:

-  Housing and Population
-  Economic Development
-  Recreation, Leisure and Education
-  Traffic Circulation
-  Land Use

Introduction

Housing and Population

The Village experienced tremendous growth in the 1950's and 1960's when the population grew from 8,727 in 1950 to 64,884 in 1970. Growth slowed in the 1970's, increasing to 66,116 in 1980, however the Village experienced another growth spurt in the 1980's as the population reached 75,460 in 1990. Since then the Village's population has stabilized reaching 76,031 in 2000 with a modest decrease in 2010 to 75,101. This decrease was mostly attributable to an increase in vacancies due to foreclosures from the 'great recession' which began in 2007. The population of Arlington Heights is estimated to reach 86,059 persons by 2040 (source: Chicago Metropolitan Agency for Planning 'GO TO 2040' Regional Plan). This increase in population, if realized, would likely be the result of more dense housing in designated redevelopment areas. In addition annexation of unincorporated residential areas would add to the population. The median age of the Village population has continued to increase from 36.7 in 1990 to 42.7 in 2010, which reflects a regional and national trend.

Household characteristics have changed significantly over the past 25 years. The emergence of non-traditional households and life styles and the decrease in family size, as well as the aging of the population, have been the most significant changes. Total housing units have increased from 23,189 in 1980 to 30,428 in 1990, and 32,795 in 2010 primarily due to town home, condominium and apartment building construction. In 2014 total housing units is estimated at 33,150, due to new multi-family development and in-fill single family development. This trend of in-fill redevelopment, higher density redevelopment, and possible annexation of adjacent residential areas could increase the housing units to 35,500 by 2040 (CMAP GO TO 2040 estimate).

The growth in new households and area employment opportunities will continue to exert demand for housing in Arlington Heights and keep the median home price (\$209,000) well above the region. While the traditional single family residence will continue to be the preferred housing choice in Arlington Heights in the future, alternative housing options will become more available in the community in response to changing life styles and household characteristics. Additional information and observations about the Village's housing and population characteristics can be found in the Housing and Population section. (The Comprehensive Plan and all of the reports referred to in the Plan may be reviewed at the Arlington Heights Memorial Library and are available from the Village Planning and Community Development Department.)



Downtown Arlington Heights



Moderate to high density multi-family construction has led to a growth in Arlington Heights' population in recent years.

Introduction



Economic Development

The Village of Arlington Heights economy is a prosperous, balanced and mature economy, having grown above the national averages for more than 20 years. The prosperity of the economy is reflected by the Village's per capita income, household expenditures, home values and low vacancy rates for commercial and manufacturing uses. Approximately 70% of Village property tax revenue is derived from residential uses and 30% from non-residential uses—which includes over 3.2 million square feet of retail, 4.2 million square feet of office, and over 3.0 million square feet of manufacturing space. However, there are very few vacant land parcels remaining to be developed, therefore the Village must now focus on maintaining the existing balance within its economy by encouraging redevelopment.

The Arlington Heights economy remains both diverse and dynamic, drawing from the region's vast labor pool, superior transportation systems and access to world-class research and educational institutions. We can anticipate that current trends in technology, labor and global economies will continue to shape our local economy. Non-traditional work arrangements will play an increasing role in the economy. Important features which Arlington Heights will need to prepare for are concentrations of service oriented (office) workers, work at home arrangements, and the need for state of the art telecommunications infrastructure. Additional information and observations about the Arlington Heights economy can be found in the Economic Development section.



Recreation, Leisure and Education

The availability of recreation and cultural opportunities contribute to the quality of life in Arlington Heights. The diverse nature of the parks, gardens, and other recreation amenities across the Village enable community residents to enjoy a wide variety of passive and active recreation pursuits. There are more than 716 acres of parks and golf courses in the Village. The Arlington Heights Park District has on several occasions won national awards for excellence.

The Arlington Heights Memorial Library is a recognized leader in its field for the innovations and breadth of library services it offers community residents. The Library was expanded in 1995 from 76,000 square feet to 132,000 square feet. The Library has more than 350,000 items in its collection and a circulation over 2.66 million items. There are over 100 personal computers with internet access and software available to the public.

The local school system is a perennial top performer in the state and is complemented by the curriculum and services available at Roosevelt University, William Rainey Harper Community College, Northern Illinois University and other institutions of higher learning in the metropolitan area. Additional information and observations about the recreational and cultural opportunities in Arlington Heights can be found in the Recreation section.



30% of property tax revenue is from non-residential uses.



Arlington Heights Memorial Library

Introduction

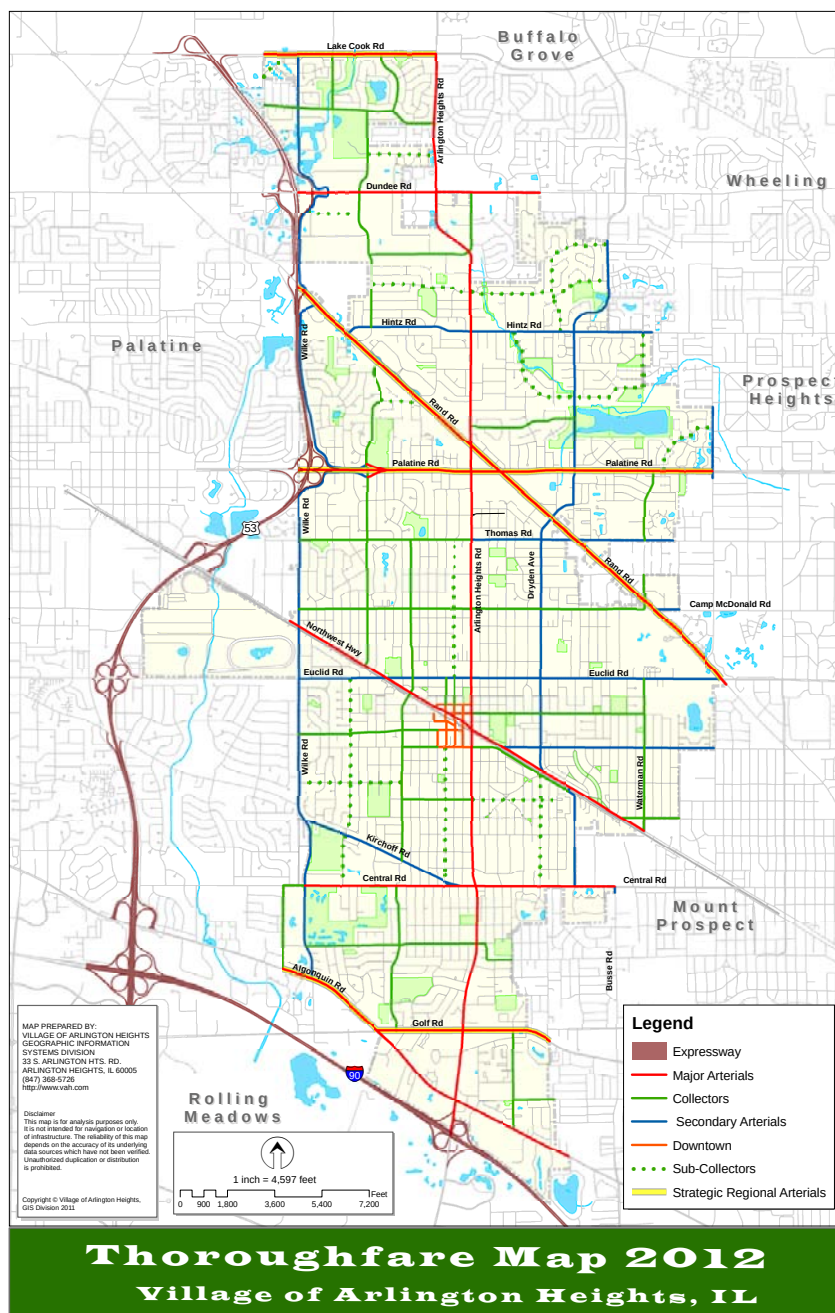


Traffic Circulation

Mobility is essential to the long-term economic and social development of the Village. The lay out and arrangement of transportation systems affect the pattern of land development in the Village and the ease, safety, and convenience with which people travel. The proximity of O'Hare International Airport, the accessibility to two adjacent expressways, convenient commuter rail service at two Metra stations and bus service, regular freight rail service, and the efficiency of the transportation system are likely to continue their influence on development in the Village in the future. Additional information and observations about the Arlington Heights circulation systems can be found in the Thoroughfare and Transportation Policy Plan, approved in 2012.



Interchange at Arlington Heights Road and the Northwest Tollway



Village of Arlington Heights Thoroughfare Map

Introduction

Land Use

Land development in Arlington Heights has reached maturation as vacant land for manufacturing, commercial and residential uses has declined to less than 50 acres. Given this current growth stage, Arlington Heights has and will continue to focus on redevelopment of underdeveloped property. Several shopping centers in the Village have either redeveloped or are in the process of redeveloping to meet current market standards in the retail industry. In-fill redevelopment of residential areas and replacement of older homes with new, larger homes has become more prevalent. Mixed land use development, which is particularly attractive because it is more functional, efficient, and can mitigate most land use conflicts, will continue as land becomes a premium commodity in the Village. Below is a table which approximates the current Comprehensive Plan land use distribution.



Downtown Train Station and Village Green

Land Use Designation	Acres	Percent
Single Family Detached	4,525	43.2
Single Family Attached	55	0.5
Moderate Density Multi Family	670	6.4
High Density Multi Family	29	0.3
Commercial	505	4.9
Offices Only	225	2.2
Research, Development, Manufacturing, Warehousing	590	5.7
Institutional	285	2.7
Mixed Use	398	3.8
Parks	803	7.6
Schools	190	1.8
Government	89	0.9
Open Space	100	1
Streets	200	19.1
TOTAL	10,464	100

Introduction

What is a Comprehensive Plan?

A Comprehensive Plan is a public document which establishes an overall strategy to guide the growth and development of the community. It is a policy statement aimed at the unified and coordinated physical and social development of Arlington Heights. The Comprehensive Plan consists of the Comprehensive Plan Map which indicates proposed land uses in the community, and the text of the Comprehensive Plan, including Goals and Policies. Background material explaining the rationale for the Comprehensive Plan can be found in the following documents:

1. Comprehensive Planning Program
2. Downtown Master Plan
3. Consolidated Plan; Housing
4. Bicycle and Pedestrian Policy Plan
5. STAR Line Master Plan
6. Hickory Kensington Area Plan
7. Thoroughfare and Transportation Policy Plan

Comprehensive Planning Program

The Comprehensive Planning Program was initiated and approved by the Village Board of Trustees on March 4 and April 1, 1991. The program objective is to develop long range plans for specified redevelopment, corridor and annexation areas. These studies will address the future development of vacant and/or underdeveloped land in selected areas throughout the Village in order to ensure proper development within these areas.

Redevelopment studies address issues such as land use, access, consolidation of parcels, proper utilization of land, parking lot interconnects, etc. for specific sites.

Corridor studies address many of the same issues, but with a broader scope than the more site specific redevelopment areas. Characteristics of a commercial corridor include: developed in a linear fashion along major routes; residential areas directly abutting with little or no screening; business developed incrementally with little relationship or connection to each other; and, showing signs of age, deterioration, poor maintenance, vacant buildings, among others.

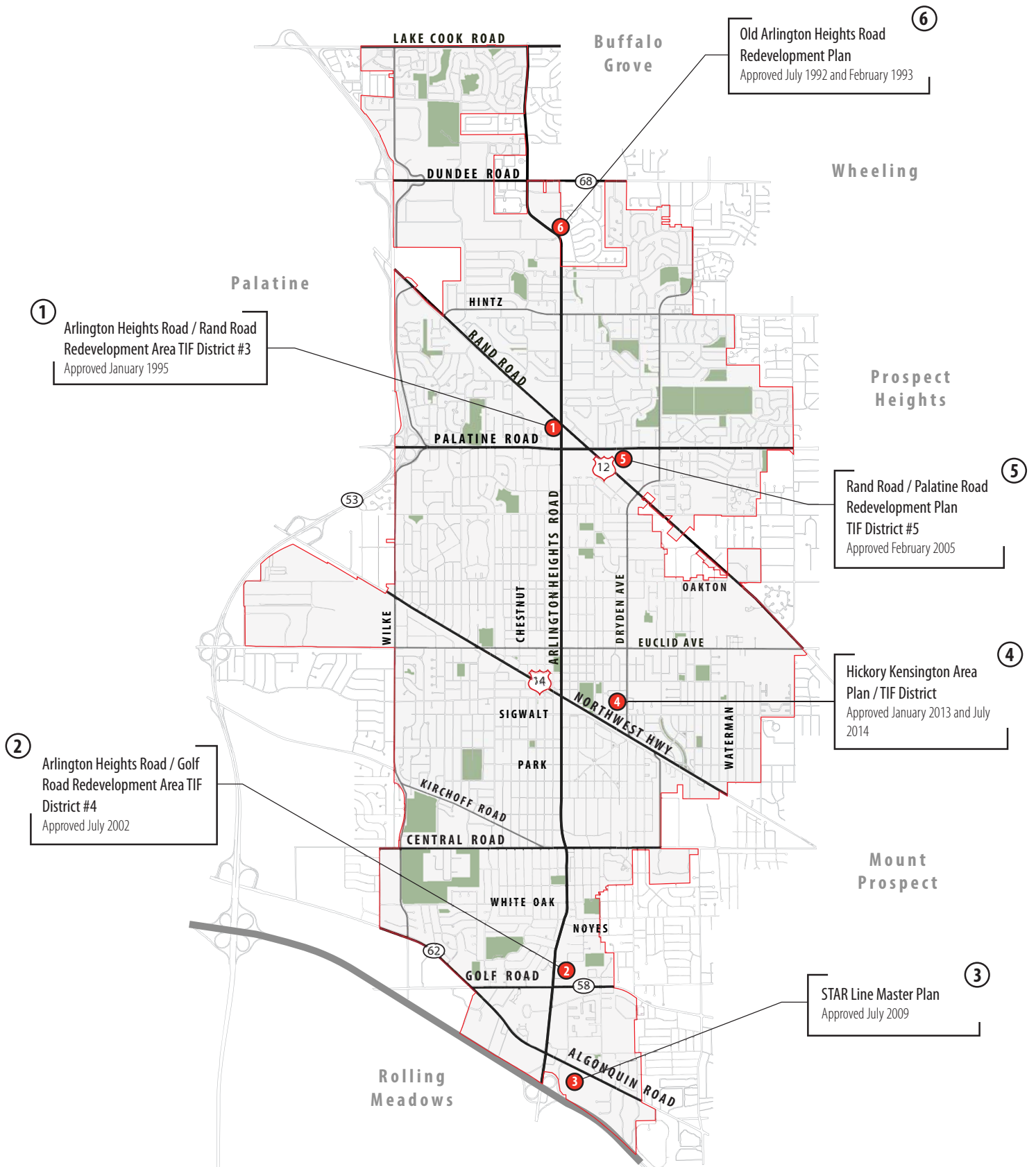
Annexation studies analyze the social and economic issues related to annexing areas designated on the Comprehensive Plan map as potential annexation areas. This version of the Comprehensive Plan includes a new section on Corridors which describe each corridor and past efforts to improve each area.



Illustration from STAR Line Master Plan



Bird's-eye rendering of Hickory Kensington Area Plan



Implementation

To be effective the Comprehensive Plan must be utilized. The Plan's purpose is to give guidance and direction in the process of development of the Village. The policies within the Plan should be constantly referred to by citizens and decision makers when weighing the assortment of development issues facing the Village.

The formulation and enforcement of zoning and subdivision regulations and a capital improvement program is the principal means by which the village implements the objectives of the Comprehensive Plan.

Zoning Ordinance

Chapter 28 of the Municipal Code is adopted to promote and protect the health, safety, and general welfare of the people of Arlington Heights by regulating the use of land and buildings in the Village.

Subdivision Control Regulations

Chapter 29 of the Municipal Code governs the design and layout of subdivisions and the requirements for subdivision of land in Arlington Heights. The subdivision regulations are intended to provide for sound comprehensive development of the Village's infrastructure.

Capital Improvement Program

The Capital Improvement Program (CIP) is the financial plan for implementing public improvements such as new fire stations, street improvements and major equipment purchases needed to meet the demands of growth and development in the Village. The CIP schedules capital improvements over a period of time, usually five years, based upon some measure of present and projected need, allowing the Village Board to plan ahead for future expenditures and to set priorities.

Companion documents, including but not limited to redevelopment plans, may from time to time be amended or adopted by the Village Board to reinforce and support the goals and policies of the Comprehensive Plan. The companion documents generally focus on a specific area of concern and devote more resources toward developing detailed recommendations for improvement or development than can be expected from the Comprehensive Plan.

Official Map

The Official Map identifies present and future public facilities and improvements such as parks and schools, fire stations, other municipal uses, thoroughfares and bikeways in the Village. As a planning tool, the Official Map allows the Village to identify areas where future public improvements are needed, thus allowing the Village to budget time and/or money to develop, improve or acquire the resources needed to provide the improvement or facility. The Official Map can be found in the Appendix.

Thoroughfare and Transportation Policy Plan

The Arlington Heights Thoroughfare and Transportation Policy Plan sets forth policies and recommendations addressing all aspects of development and maintenance of the Village thoroughfare network. It provides decision makers with direction and guidance when considering issues affecting the thoroughfare network. The Plan was updated in October, 2012.

Downtown Master Plan

The Downtown Master Plan (originally approved in 1986) is a planning tool setting forth recommendations for improving downtown's public environment and to enhance the downtown's business climate. It is the central feature of a strategy to promote diversity and concentration of uses in the Downtown. In 2006, the Plan was updated to reflect upon accomplishments in redeveloping the Downtown and to evaluate what future improvements are needed over the next 15 years.

Citizen Participation

The Comprehensive Plan and its companion documents are statements of the community's desires and aspirations resulting from public input. Citizen participation is initiated early in the planning process to allow opportunity for suggestions for improvement or change. Public input after the Plan is adopted is equally important because it provides Village officials and staff with the feedback needed to determine whether decisions have been made consistent with the Plan's goals and policies, or whether aspects of the Plan need to be improved or changed to reflect changing community needs and attitudes.

Introduction

(Page Intentionally Left Blank For Double-Sided Printing)

Goals and Policies

Chapter Contents: General Planning, Land Use, Housing and Population, Economic Development, Recreation and Open Space, Municipal Services, Energy Efficiency and Conservation, Thoroughfare and Transportation, Downtown Master Plan

Goal Setting

The planning process is a series of steps which include goal setting, data collection, analysis of problems and opportunities, plan formulation, implementation and evaluation. Of these steps, goal setting is certainly one of the most basic and important steps. It is in this stage that citizens, local officials, and planners try to provide answers to the most fundamental questions. What vision do we hold for the future quality of life in the Village? What decisions shall we make to help meet the challenges of the present and of the future?

The Comprehensive Plan can be an effective instrument to guide the future only if it is based upon carefully formulated goals and policies. Goals represent the general aim and direction of the Plan. Policies are courses or methods of action selected, in the light of existing trends and future needs, to guide future decisions in pursuit of goals.

Goals and Policies

The goals and policies that follow establish the basis for continuity of the decision making process. They become the basis for the direction of all other plans and documents relating to the Comprehensive Plan. Together the goals and policies and the Comprehensive Plan Map comprise the Arlington Heights Comprehensive Plan.

Chapter Contents:



General Planning



Land Use



Housing and Population



Economic Development



Recreation and Open Space



Municipal Services



Energy Efficiency and Conservation



Thoroughfare and Transportation



Downtown Master Plan

Goals and Policies



General Planning Goals

1. To maintain a self-sustaining community where people may reside, pursue education, earn a living, shop, and enjoy their leisure time.
2. To preserve and enhance nature and the existing environment.
3. To permit the utilization of the full potential, talents, capabilities, and productivity of all residents, regardless of race, origin, color, religion, income, sex, age, or education.
4. To create a flexible plan which will reflect changing conditions.
5. To preserve physical resources of historic value which exemplify the heritage of Arlington Heights.
6. To exercise due regard for the goals of neighboring communities and other governmental units in planning activities.
7. To focus on Village wide business development.
8. To develop effective transportation planning.
9. To promote affordable housing for various income levels and housing types.
10. To maintain and improve Village infrastructure.
11. To promote and encourage sustainable based policies and services.
12. To improve the overall quality of life.



General Planning Policies

1. To provide adequate facilities, improvements, and institutions to adequately support all basic activities of present and future residents. Foster economic growth through necessary governmental actions. Initiate Village and private business partnerships to create new developments.
2. All developments should respect and take advantage of land and natural features.
3. The Planning and Economic Development Programs should stimulate citizen and business interest and participation in community planning and development processes.
4. To review and periodically update the entire Comprehensive Plan.
5. Whenever specific land areas and/or existing structures come under review for general planning progress, or in conjunction with a specific land use petition, consideration should be given to identify, for possible preservation purposes, land areas or buildings that meet any of the following criteria:
 - A. Structures that exhibit a high quality of architectural design reminiscent of the past.
 - B. Structures that exhibit unusual or distinctive design, or construction techniques which contribute to the architectural interest of its environs either as an accent or a counter point.
 - C. Land areas that have long provided an established or familiar visual presence in Arlington Heights by virtue of: a unique location; distinctive physical characteristics; or, historical association.
6. To analyze existing boundary agreements and communicate with adjoining communities when considering projects that could affect these communities.
7. To provide a broad spectrum of recreational, educational, social, cultural, and entertainment opportunities to improve the quality of life.

Goals and Policies



Land Use Goals

- 1 To ensure that the general land use pattern and relationships of all land uses remain or become acceptable to the present and future community.
- 2 The remaining limited amount of undeveloped land shall be utilized in a manner which benefits the community.
- 3 The intensity of development should be related to the location and availability of transportation facilities.
- 4 Incompatible zoning should be avoided.
- 5 Only well planned commercial and industrial developments should be built.
- 6 Remaining unincorporated land, adjoining or within the Village, should be annexed only if beneficial to the Village as a whole.
- 7 Future growth should be accommodated and encouraged through a redevelopment program in selected priority areas as defined in the Comprehensive Planning Program.



Land Use Policies

- 1 To require quality planning in new developments utilizing advanced land planning and development concepts. Encourage mixed land use concepts in proper locations consistent with the Village's Land Use Map.
- 2 Intensive developments should be limited to the downtown area, in areas where there is adequate access to public transportation and those areas which are adjacent to controlled access intersections and/or major intersections, or in conjunction with an approved redevelopment plan.
- 3 The rezoning of land should be considered only where such rezoning is supported by detailed studies.
- 4 Encouragement should be given to commercial and industrial developments which have safe access, respect nearby land uses, do not landlock nearby land parcels, and which can provide adequate screening and landscaping.
- 5 Determination of redevelopment sites should be based upon the Village Comprehensive Planning Program.
- 6 Protect distinct functional areas from intrusion and encroachment of incompatible uses.
- 7 Revitalize declining areas through rehabilitation, redevelopment, and In-fill strategies as appropriate.

Goals and Policies



Population and Housing Goals

- 1 To preserve the basic single-family character of the Village.
- 2 To preserve and protect existing and future residential neighborhoods in the Village.
- 3 To encourage construction of necessary housing to meet present and future residential needs consistent with Population & Housing Goals #1 and #2.
- 4 To encourage a wide variety of housing alternatives by type, size, and price range.
- 5 To maintain and improve property values.
- 6 To maintain the social and economic viability of neighborhoods.
- 7 To utilize good housing redevelopment concepts in areas where rehabilitation of existing housing is not practical.
- 8 To encourage the development of an adequate residential population base in and around the Downtown to improve its economic viability.



Population and Housing Policies

- | | |
|--|--|
| <ol style="list-style-type: none"> 1 To construct a necessary amount of single-family detached and attached single-family houses, and multi-family housing to meet market demands while maintaining a proper housing balance. 2 To protect present and future residential areas from encroachment by other less desirable land uses or improvements that could diminish quality of life or property values. 3 To prepare and maintain results of demographic and housing studies to assist in planning future developments. 4 To utilize Federal, State, and local programs to assist in the development of affordable housing while retaining Village controls pursuant to the Village's affordable housing tool kit for homeownership and rental units. 5 To construct smaller housing units necessary to maintain smaller households in the community. 6 To provide a wide variety of housing for young, elderly, disabled and single households, including rental housing. | <ol style="list-style-type: none"> 7 To enforce Village codes and regulations in order to prevent housing deterioration and, when appropriate, to utilize State, Federal, or local assistance programs. 8 To preserve and renovate housing of historic or aesthetic value and upgrade and renovate public improvements and facilities in Village neighborhoods. 9 To designate future redevelopment sites and proceed with necessary steps leading to redevelopment of selected sites pursuant to the Comprehensive Planning Program. 10 To prepare realistic plans for the areas in and around downtown with all necessary safeguards for fine residential and historical properties. |
|--|--|



Economic Development Goals

- 1 To promote balanced economic growth through imaginative planning leading to a strong, vital local economy.
- 2 To work closely with local businesses to promote their growth and expansion and prevent the loss of existing establishments.
- 3 To facilitate redevelopment and modernization of mature business and industrial areas of the Village.
- 4 To attract new business enterprises by taking full advantage of Arlington Heights' location in the transportation "hub" of the Midwest, as well as its labor market, business climate, educational facilities and governmental resources.
- 5 To improve the downtown through rehabilitation and redevelopment of targeted properties pursuant to the Downtown Master Plan and provide assistance to parties interested in the rehabilitation and redevelopment of the Downtown.
- 6 To realize the full development potential of Arlington International Race Course.
- 7 To attract educational facilities and promote development of educational programs to maintain the well trained labor market of Arlington Heights and meet the training and retraining needs of tomorrow's technology driven firms.
- 8 To effectively balance population, housing and economic growth with reasonable and effective environmental safeguards to enhance the established quality of life in the village.



Arlington Racecourse

Goals and Policies



Economic Development Policies

- 1 To undertake necessary research and planning to create information systems and implement programs which promote balanced economic growth.
- 2 To assist businesses in transition by maintaining access to resources and available space to facilitate relocations and expansions.
- 3 To assist owners of outdated or deteriorated business facilities with facility renovation and modernization.
- 4 To continue to enhance and maintain the Village web site which highlights Arlington Heights' unique advantages for business to attract investors, developers and business owners.
- 5 To encourage rehabilitation and redevelopment of the Downtown through improved public facilities and additional financial assistance when appropriate.
- 6 In cooperation with ownership at the Arlington International Race Course, prepare bold plans and promote practical development of corporate office structures, retail, hotel, convention, exhibition, entertainment, sports and high density living in the race course area.
- 7 To assist local educational institutions and work force training organizations and access industrial training programs to provide vital advanced technology training.
- 8 To monitor existing business and industrial establishments and comprehensively screen all new development to mitigate any potential detrimental effects on the community.



Recreation and Open Space Goals

- 1 To protect the environment and provide adequate resources for active and passive recreation.
- 2 To explore new concepts in recreational facilities.
- 3 To fully implement water detention and recreational facilities.
- 4 To make provisions to acquire future recreational land.
- 5 To encourage additional new types of parks and recreational facilities such as linear parks, vest-pocket playgrounds, neighborhood squares, pedestrian and bicycle paths.
- 6 To fully develop present undeveloped park land according to potential needs of residents while utilizing existing facilities by means of expanding recreational, educational, vocational, and cultural programs.



Downtown Arts Fair

Goals and Policies



Municipal Services Goals

- 1 To provide adequate municipal services and facilities in developing areas and improve them where necessary in the existing Village area.
- 2 To improve the economy and efficiency of municipal services and facilities.
- 3 To promote the cooperation of all concerned governmental agencies in planning, development, and operation of services and facilities.



Village of Arlington Heights Public Works



Municipal Services Policies

- 1 To plan, in advance, for land acquisition for municipal services and facilities for future development areas.
- 2 To establish priority systems, corresponding to budgetary resources utilizing new technology to improve municipal services and facilities.
- 3 To economize expenditures, streamline the operation through joint operations. Merge Village operations with other units of government if such action will bring improvements and savings.



Arlington Heights Fire Station No. 1

Goals and Policies



Energy Efficiency and Conservation Goals

1. To link transportation and land use in order to enhance transit options for residents and the labor force.
2. To promote and encourage energy efficiency for residential and commercial buildings.
3. Encourage the use of renewable energy and resources such as solar, wind, geothermal, and bio fuels.
4. Continue to promote and encourage both residents and businesses to reduce waste and increase recycling.
5. To optimize tree planting and protection of existing trees for maximum carbon reduction and to increase water conservation measures.
6. Keep abreast of new policies and research regarding energy efficiency and provide support for local, state, and Federal efforts to promote energy conservation measures.
7. Educate and Promote using Public Relations to encourage energy conservation and support for the Village Energy Efficiency Conservation Strategy.



Thoroughfare and Transportation Goals

- 1 To promote the adequacy, efficiency, convenience, aesthetics and safety of traffic and transportation.
- 2 To promote and coordinate transportation systems, including public transportation, through co operation with other involved agencies and other communities, when such improvements benefit the Village.
- 3 To minimize conflict between vehicular and pedestrian traffic.
- 4 To provide for bicycle traffic, preferably separated from vehicular traffic.
- 5 To improve the aesthetics of existing traffic facilities.
- 6 To minimize the need for the operation of individual vehicles within the Village.
- 7 To ensure that the character of and quality of life in the Village is not adversely affected by future traffic and transportation improvements.
- 8 Encourage public participation in planning thoroughfare network improvements.
- 9 Review traffic calming measures in residential areas.

Thoroughfare and Transportation Policies

- 1 To schedule, plan, and construct necessary physical improvements including widening, turning lanes, and bays and other appropriate improvements if appropriate before serious problems develop.
- 2 To establish close cooperation with adjoining communities and other agencies for traffic and transportation planning and implementation.
- 3 To construct safe pedestrian walkways separate from automotive traffic.
- 4 To establish safe bicycle path systems away from motorized traffic where the volume of bicycle traffic through cooperation with other agencies (i.e., Park District, Commonwealth Edison, and bicycle clubs) will justify such investments.
- 5 To landscape, where possible, arterial roadways; screen parking areas; improve street graphics; and improve the appearance of signalization and other elements related to traffic and transportation.
- 6 To explore and implement alternate modes of local transportation such as minibuses, tramway, monorail, van and carpooling, and establish locations for parking facilities.
- 7 To examine all proposed traffic and transportation improvement projects from the aspect of impact on local housing, neighborhoods, business and industry.



Village of Arlington Heights Train Station

Goals and Policies



Downtown Master Plan

“

Vision:

A Downtown that is recognized as the business, cultural and entertainment heart of Arlington Heights – offering a thriving business climate, a sense of community and residential pride and is viewed as a desired destination for all residents of the Northwest suburbs.

”



Downtown Master Plan Objectives

1. Promote diversity and concentration of use in the downtown core.
2. Create a quality pedestrian environment.
3. Strengthen downtown's residential base by encouraging additional residential development.
4. Create a unique identity and positive image.
5. Promote quality development through design review.
6. Emphasize public / private partnerships in implementation.
7. Emphasize early action and tangible results.
8. Facilitate growth and development of selected areas including guidelines for redevelopment.
9. Develop retail strategy to attract and retain quality commercial businesses.
10. Evaluate and recommend funding options for long term infrastructure needs, redevelopment, special events and marketing.
11. Develop a marketing plan and strategy, including a communication plan, for downtown.



Bird's-eye view of Downtown Arlington Heights

Goals and Policies

Comprehensive Planning Program Goals and Objectives

Annexation Studies Goal: To determine the viability of annexing remaining unincorporated areas adjacent to the Village as designated on the Comprehensive Plan.

Objective 1: Analyze and assess the fiscal impacts of annexation for both the village and affected property owners.

Objective 2: Identify all issues, fiscal, social and otherwise, that pertain to the particular area being studied.

Corridor Plans Goal: To improve upon existing conditions which detract from the overall functioning of the corridor.

Objective 1: Develop a strong and positive image and appearance which establishes a unified image and sense of place which reinforces and supports commercial and economic activities along the corridor.

Objective 2: Create a system of on- and off-street parking facilities which adequately serve the needs of commercial uses within the corridor in a safe and functional manner.

Objective 3: Promote a safe and effective traffic circulation system which adequately accommodates the varied types of traffic movement utilizing the corridor.

Objective 4: That development activities within the corridor be compatible with adjacent non-residential and residential uses.

Redevelopment Plans Goal: To assure that the future development of blighted, vacant and/or underdeveloped land in selected areas throughout the Village is properly developed.

Objective 1: To limit the effects of piecemeal development by encouraging unified, cohesive development.

Objective 2: To limit the impacts of non-residential uses on adjacent residential uses by providing adequate buffering and screening.

Objective 3: To promote and enhance the economic vitality of each redevelopment area.

Goals and Policies

Comprehensive Plan Map

The use of land greatly affects the quality of life in Arlington Heights. The Comprehensive Plan Map illustrates desired land uses and their location throughout the Village. Also, the map identifies existing and future thoroughfares in Arlington Heights illustrating their relationship to the use of land across the Village. The map is updated annually and included as an insert as part of this document.

Housing and Population

Chapter Contents: Purpose, Population Characteristics, Household Characteristics, Housing Characteristics, Summary, Growth of Municipal Limits

Over the past 25 years, the Village's population has undergone several changes. The population has grown older, household size has declined, and more non-traditional households are being formed. All these changes have had an impact on the housing demand in the Village, such as the demand for multi-family and senior housing. Many "empty nesters" are looking to downsize their housing needs by selling their homes and purchasing smaller and easier to maintain condominiums or renting. Many wish to remain in the Village, therefore creating the high demand for multi-family housing. At the same time, new families are moving into the homes sold by the older population, thus creating an increase in elementary school enrollments. Although the 'Great Recession' from 2007 to 2012 negatively impacted housing values, the Village has seen a recent increase in values with the economic recovery. Housing ownership nationally has declined as more persons rent apartments, which has increased demand for rental apartments in the country and Village as well.

As the Village continues to mature, maintenance of the existing housing stock will be one of the primary concerns. Encouraging preservation and renovation of existing housing and enforcement of property maintenance codes are the primary ways to preserve neighborhood character and property values. Housing programs for low and moderate income persons to facilitate home improvements will also contribute to maintenance of the housing stock. The Village has also begun to see the replacement of older homes with new, larger homes as available land for new homes decreases.

The affordability of housing in the Village is another concern as the value of homes continues to increase as well as average rents in the Village. Programs such as the Single Family Rehabilitation Program and the Affordable Housing Trust Fund will help low and moderate income persons live and maintain their homes in Arlington Heights. More detail on the Village's housing policy and affordable housing can be referenced in the Consolidated Plan.

The quality of life in Arlington Heights is the community's greatest asset and it is reinforced by the quality of housing and the character of the Village's neighborhoods. Preserving the character of the Village, maintaining and improving neighborhood property values, and providing a wide variety of housing opportunities in the community the primary issues facing the Village.

Chapter Contents:



Population Characteristics



Household Characteristics



Housing Characteristics



Growth of Village Municipal Limits

Housing and Population

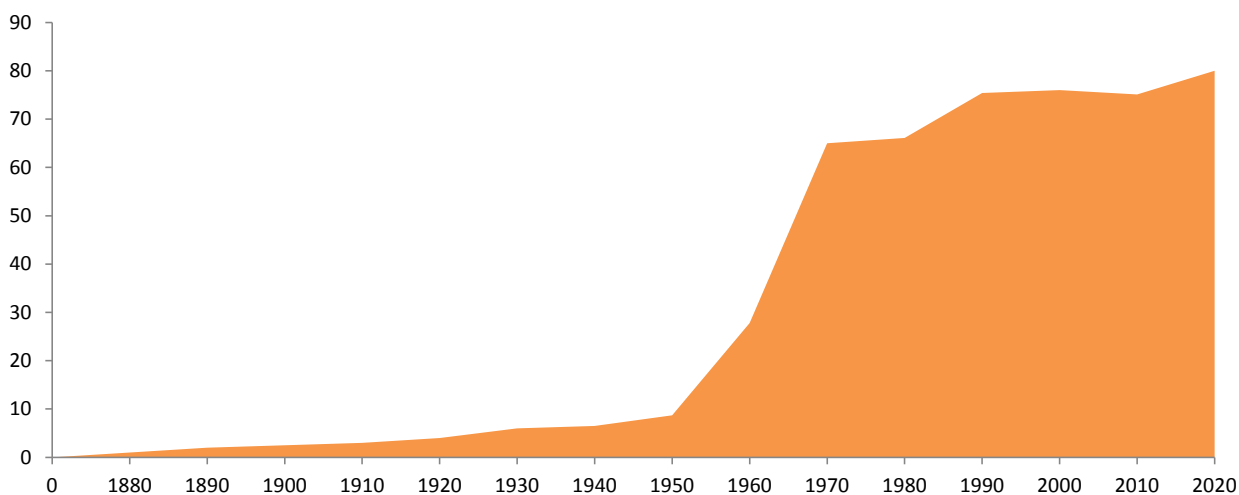
Purpose

The purpose of this section is to provide Village policy and decision makers with information to aid their decision-making process. This section provides a detailed profile of the population and housing characteristics of the Village. Also, needs or areas of concern are identified which may require the Village's attention or intervention in order to maintain and improve the housing inventory and opportunities for housing in the Village. The goals and policies of the Comprehensive Plan directly result from the data included in this section.

Population Characteristics

The Village experienced tremendous growth in the 1950's and 1960's when the population grew from 8,727 in 1950 to 64,884 in 1970. Growth slowed in the 1970's, increasing to 66,116 in 1980, however the Village experienced another growth spurt in the 1980's as the population reached 75,460 in 1990. The population peaked in 2000 at 76,031 as it slightly declined in 2010 to 75,101. This decrease was mostly attributable to an increase in vacancies due to foreclosures from the 'great recession' which began in 2007. As vacancies decline and new housing is built, the population of Arlington Heights is estimated to reach 86,059 persons by 2040 (source: Chicago Metropolitan Agency for Planning 'GO TO 2040' Regional Plan). This increase in population, if realized, would likely be the result of more dense housing in designated redevelopment areas. In addition annexation of unincorporated residential areas would add to the population. The median age of the Village population has continued to increase from 36.7 in 1990 to 42.7 in 2010, which reflects a regional and national trend.

Figure 1. Population Growth from 1880 to 2020



Housing and Population

Age of Population

In addition to the growth of the population, the median age in the Village has increased from 25.8 in 1970 to 32.2 in 1980, 36.7 in 1990 and 42.7 in 2010. This trend reflects the nation as a whole and is expected to continue. Figure 2 below delineates the Village population by age group for 1990, 2000 and 2010. The increase in the median age of the population can be attributed to the large number of “baby-boomers”. In addition, people are living longer, therefore the 65+ age group has continued to increase from 4% of the total population in 1970 to 8% in 1980, 12% in 1990, 16% in 2000 and 17% in 2010.

Another factor contributing to the number of 65+ persons was the development of two large senior housing complexes - Luther Village and the Moorings, during the 1980's and 90's. Although the population is aging, the Village has still experienced waves of new families with children, therefore creating recent increases in elementary school aged children.

Racial Composition

Minority population has continued to increase in the Village to 12% in 2010, up from 3% in 1980 and 7% in 1990.

Figure 3. Village Population by Race - 2014

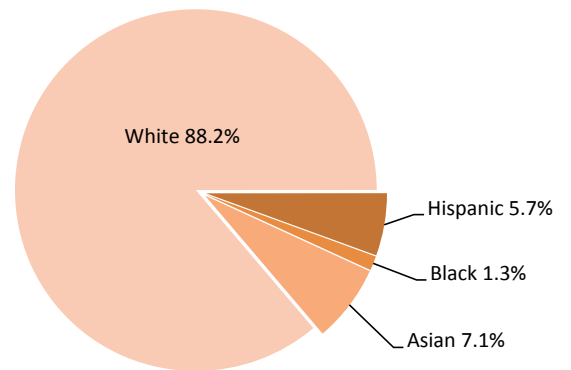
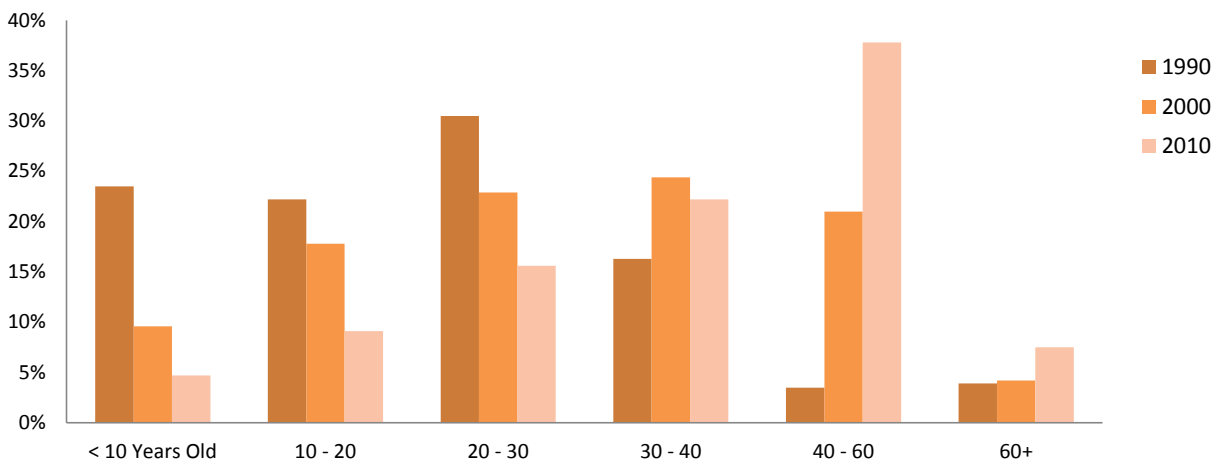


Figure 2. Age Distribution of Village Population - 1990, 2000, 2010



Housing and Population



Household Characteristics

The number of households in the Village of Arlington Heights increased dramatically since 1980. In 1980, there were 22,218 households. By 1990, the number increased by 29% to 28,810. In 2010 the number of households was 30,919. Households are occupied housing units, therefore these numbers differ from the total number of housing units. Figure 4 below compares housing growth in Arlington Heights to Cook County

Figure 4. Household Characteristics - Village of Arlington Heights and Cook County

Number of Households

YEAR	1990	2000	2010	Percent Change 1990-2010
Village of Arlington Heights	28,810	30,763	30,919	7.3%
Cook County	1,879,488	1,974,181	1,966,356	4.6%

The number of households has been increasing nationally as a result of a variety of factors including the increasing number of one person households, more working women, increased divorce rates, lower marriage rates, decreased birth rates, and a growing number of elderly persons. Although the number of households has been increasing, the average size of households has continued to decrease due to the factors listed above. This trend is expected to continue. Average household size is depicted in Figure 5 below.

Figure 5. Average Household Size - 1990, 2000, 2010

YEAR	1990	2000	2010
Persons per Household	2.61	2.60	2.55

As mentioned above, various factors have led to the decline in household size. In 1970, single person households comprised 9% of all households, compared to 18% in 1980, 24% in 1990, and 30% in 2010.

Housing and Population



Housing Characteristics

The total number of housing units in the Village increased significantly from 1980 to 1990 as 7,239 units were constructed, an increase of 32%. Since 1990, an additional 2,367 units have been built. Most of the additional housing stock since 1980 has resulted from town house, condominium, apartment, and senior housing developments. Since 1990 most of the new development has been in the downtown. Figure 6 below indicates the number of housing units in the Village since 1950. Housing units are projected to reach 34,102 by 2040.

Figure 6. Total Housing Units Since 1950

Year	Total Number of Housing Units
1950	2,255
1960	7,223
1970	16,511
1980	23,189
1990	30,428
2000	31,725
2010	32,795



Housing Characteristics

Almost 51% of the housing in Arlington Heights was constructed prior to 1970, therefore 49% of the housing stock is less than 45 years old. Only 22% of the housing stock was constructed prior to 1960. Figure 7 below depicts the age of housing in the Village.

Figure 7. Age of Housing Stock - 2010

Age	Number	Percentage
0 - 10	1,529	4.7%
10 - 20	2,979	9.1%
20 - 30	5,104	15.6%
30 - 40	7,288	22.2%
40 - 60	12,387	37.8%
60+	2,450	7.5%

Housing and Population

Type of Housing

There is a variety of housing types in the Village, which has grown even more varied since 1985 with downtown development. Single family homes consisted of 65% of the housing types in 1985 decreasing to 59% in 1990. Currently in 2015, single family homes consist of approximately 57% of the housing types. This figure is expected to slightly decrease if more multi-family residential is constructed. Rental units comprised 24% of the total units in 2010, compared to 26% in 1980.

Value of Housing

The median home value in 1990 was \$171,798, rising to \$222,900 in 2000. This includes single family homes, duplexes, town homes and condominiums. In 2012 the median value was \$286,100. Median rents have risen from \$692 in 1990 to \$1,103 in 2012. Median rents are expected to continue to increase as higher end rental developments are constructed. The Village's affordable housing policy includes the provision of affordable units based on a percentage of total units being proposed.

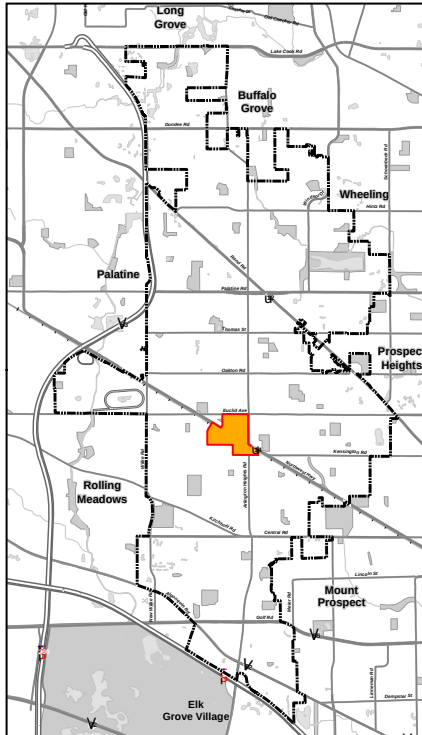


Summary

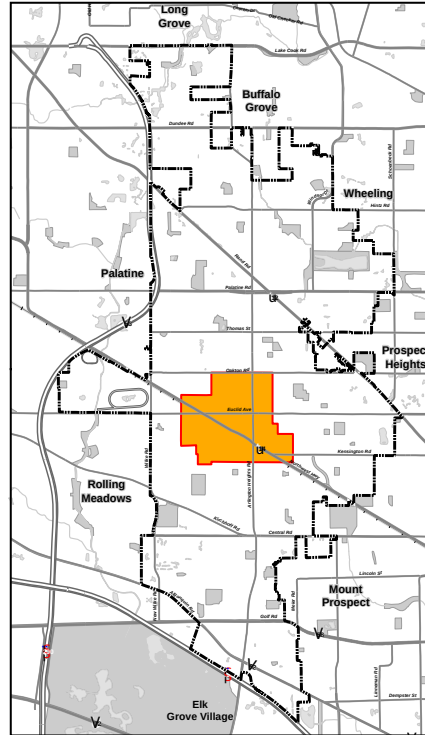
Housing affordability, maintenance of the housing stock, and meeting the demand for differing housing types in the future pose the greatest challenges to the Village. Detailed information on the Village's policy towards housing related issues is provided in the Consolidated Plan, a five year plan which outlines the housing needs and priorities of the Village. In addition, the Village in 2013 collaborated with neighboring municipalities on a housing study for the sub-region. This study "Homes for a Changing Region" provides insight into the Village's current and future housing needs and affordability.

Housing and Population

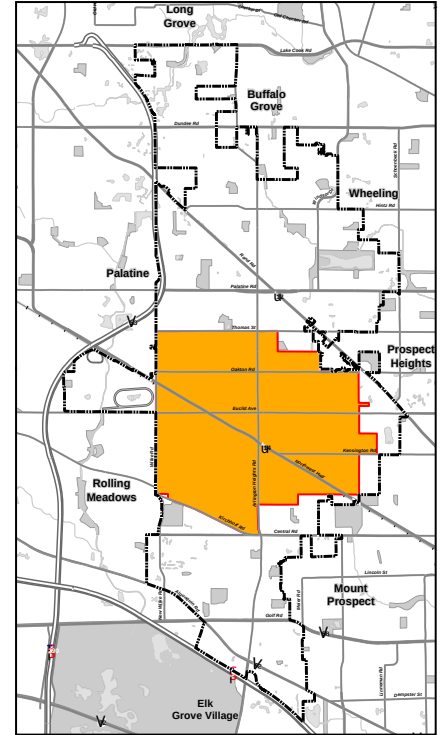
Growth of Village Municipal Limits - 1920 to Present



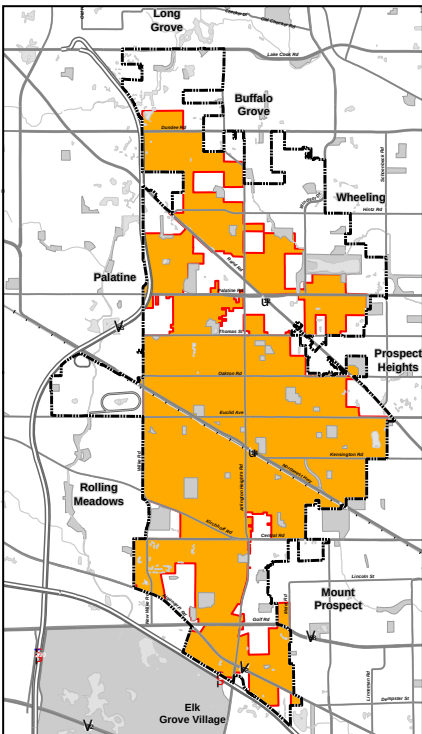
1850



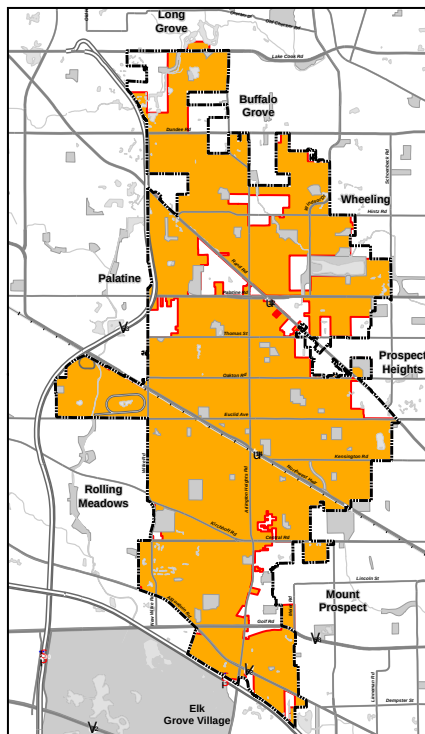
1910



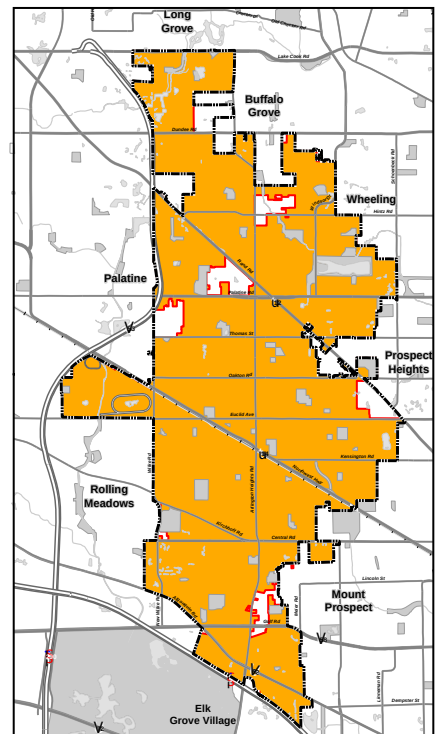
1920



1960

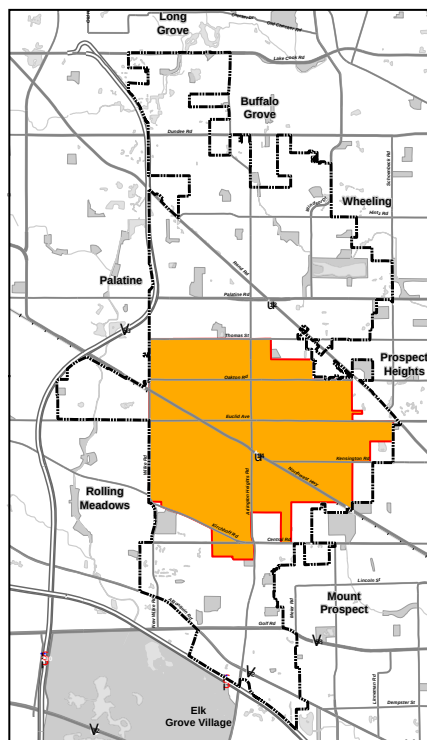
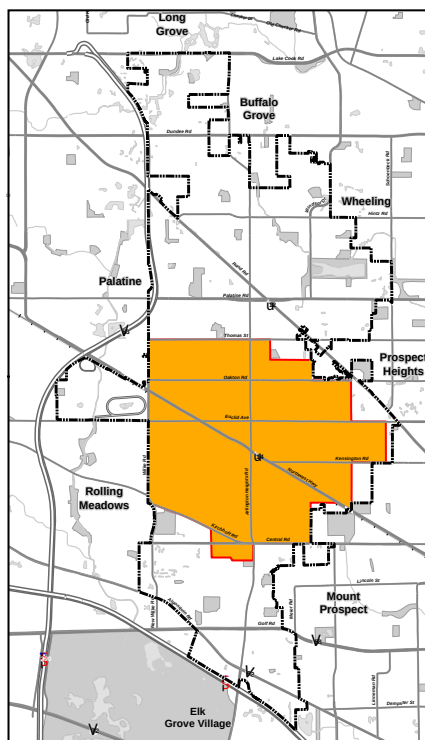
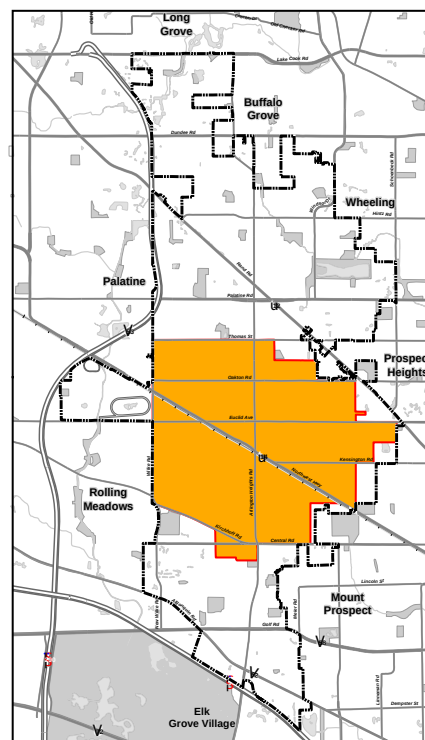
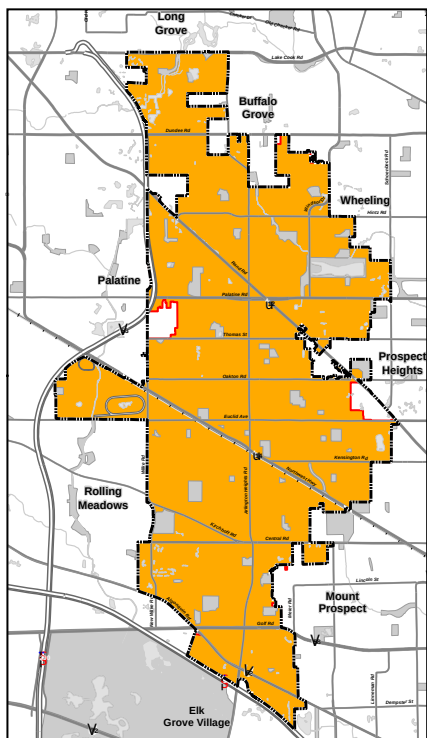
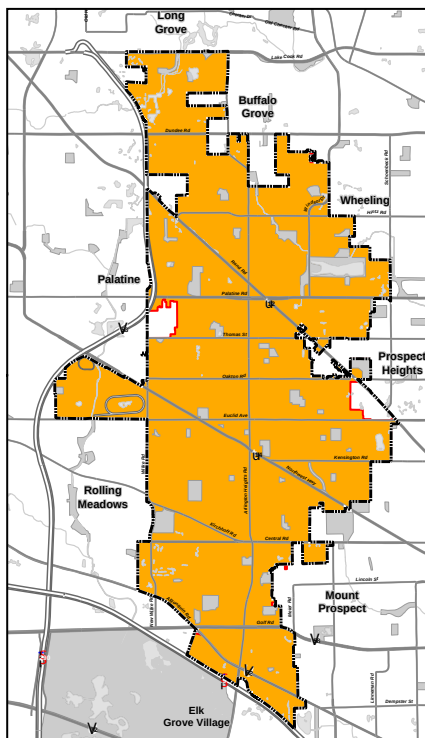
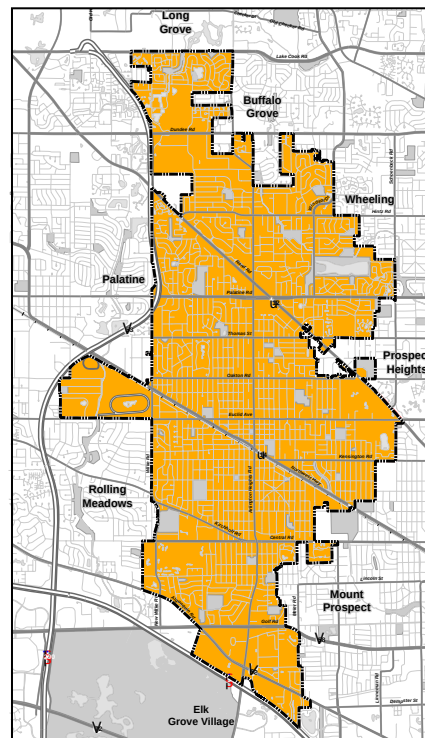


1970



1980

Housing and Population

**1930****1940****1950****1990****1995****2015**

Economic Development

Chapter Contents: Purpose, Market Setting, Market Characteristics, Economic Indicators, Areas of Focus

The local economy is dynamic, always changing. It draws its strength from the region's vast labor pool, capital and natural resources, superior transportation network and education and research facilities. There is great diversity in the local economy, essential to its strength and versatility. Yet, it is inextricably bound to the gyrations of the national- and global- economy.

The characteristics of the Arlington Heights market make it attractive to investors and entrepreneurs, and influence the employment, service and shopping opportunities available in Arlington Heights. Availability of jobs and retail business in the Village eventually increase the desirability of our neighborhoods. Economic growth invariably affects the local government's ability to provide essential services to residents and businesses. The emerging trends in commerce and industry and changing employment and shopping habits in the Village are responses to more sophisticated needs and desires of the consumer, business and industry. Increased mobility of the population has expanded the market area and labor pool for the area's retailers and employers. Competition for community investment has extended beyond neighboring communities to reach national and international markets.

To ensure that opportunities for continued development of the Arlington Heights economy exist in the future the Village should pay careful attention to the changing characteristics of the market, producers and retailers in the Village, actively work to retain existing business and industry, and maintain and improve community assets, the transportation network, and its telecommunications infrastructure.

Purpose

The purpose of this section is to provide Village policy and decision makers with information to aid their decision-making process. This section provides a detailed profile of the local economy, past and present, and identifies areas of concern requiring the Village's attention or intervention in order to strengthen and improve the local economy. This section is intended to provide input into the formulation of the goals and policies of the Comprehensive Plan.

Chapter Contents:



The Market Setting



Economic Indicators



Areas of Focus

Economic Development



The Market Setting

The Arlington Heights economy is not isolated nor self-sufficient. At one time Arlington Heights' businesses competed within a small geographic area for trade, labor and capital. Gradually, industry and commerce in Arlington Heights grew to depend on the region for its resources. The growing number of foreign companies establishing operations in the Northwest suburbs is testimony to the global expansion of trade in all sectors of commerce and industry today.

The local economy benefits from the wealth of resources in the region. The local road network provides convenient access to all points in the metropolitan area. The adjacent interstate system places the Arlington Heights' market area within a day's drive of over one-third of the U.S. population. The Union Pacific railroad provides timely transportation for commuter and freight traffic. The hundreds of daily domestic and international flights at O'Hare International Airport enable the Arlington Heights market to reach all points of the globe.

Arlington Heights is located in the third largest metropolitan area, behind New York and Los Angeles. Chicagoland trails only New York in the number of Fortune 500 companies headquartered here, which include high tech firms such as Motorola and AT & T.

The quality of life in Arlington Heights is enriched by the recreation, cultural, and entertainment opportunities which abound in Arlington Heights and the region. World-class museums, theater, opera and dance are located in Chicago and venues for all types of popular entertainment and sports are found across the region.

The region is host to several universities and numerous research facilities. Major universities such as Northwestern University, University of Chicago, University of Illinois at Chicago, DePaul University, Loyola University and Illinois Institute of Technology are developing partnerships with local business and industry to improve the region's economy. Many of the State's major universities, including Northern Illinois University, have begun to establish satellite campus facilities in the suburbs to work more closely with government, business and industry. Convenient campus locations such as Roosevelt University in Schaumburg and Harper Community College in Palatine allow residents to continue their education and improve work skills, as well as Robert Morris University in Arlington Heights.

The curriculum and research conducted by academia in the region supports related activities at a variety of private and government research facilities in the region. This research helps industry develop new and improved processes and products for application in business and industry and expands the base of knowledge from which to build the future.

Economic Development



Economic Indicators

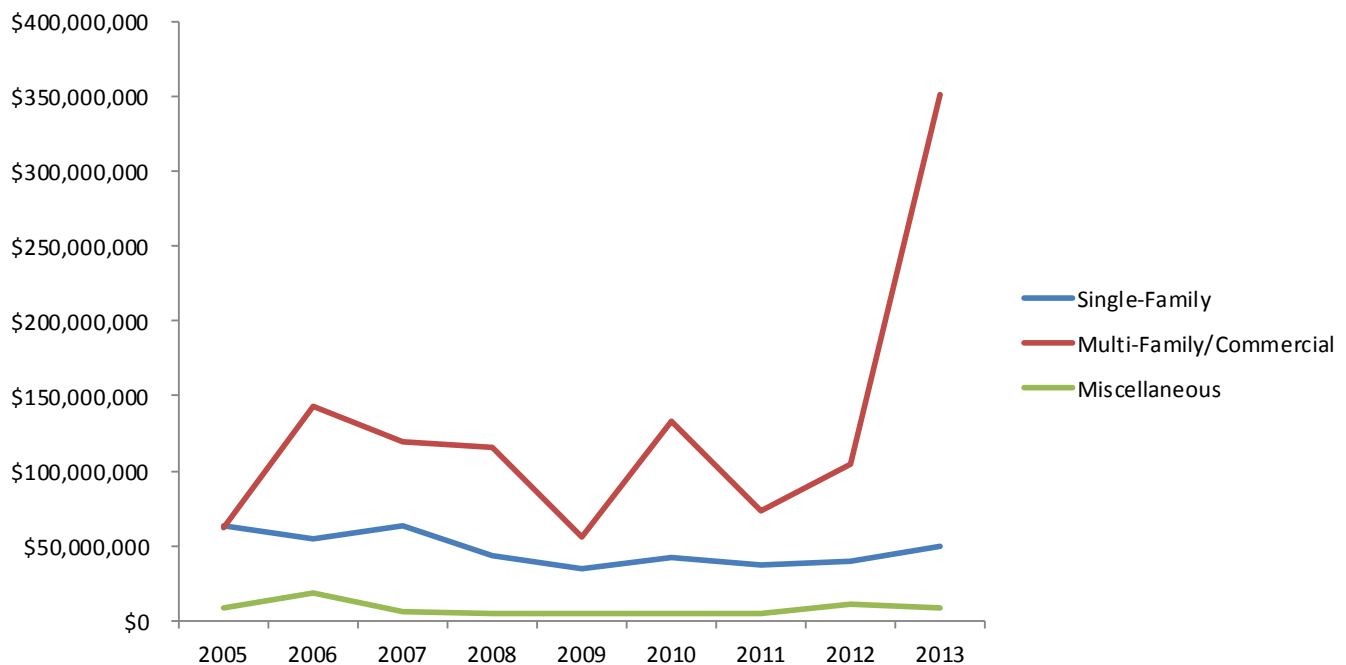
The Arlington Heights economy is greater than the sum of its parts. Examination of key economic indicators can provide only a snapshot of each segment of the economy but is useful in revealing the characteristics of the local economy.



Construction Activity

Construction activity has a direct and indirect economic benefit to the local economy in terms of jobs created and dollars spent in the Village. The Village benefitted greatly in the building boom years in the 1950's and 1960's, and to a lesser degree the mid to late 1980's. However, as the Village matures, less land will be available for development, therefore redevelopment has become and will continue to be very important to the Village's economy.

Figure 8. Value of New Construction - 2005 to 2013 (Note: not adjusted for CPI)

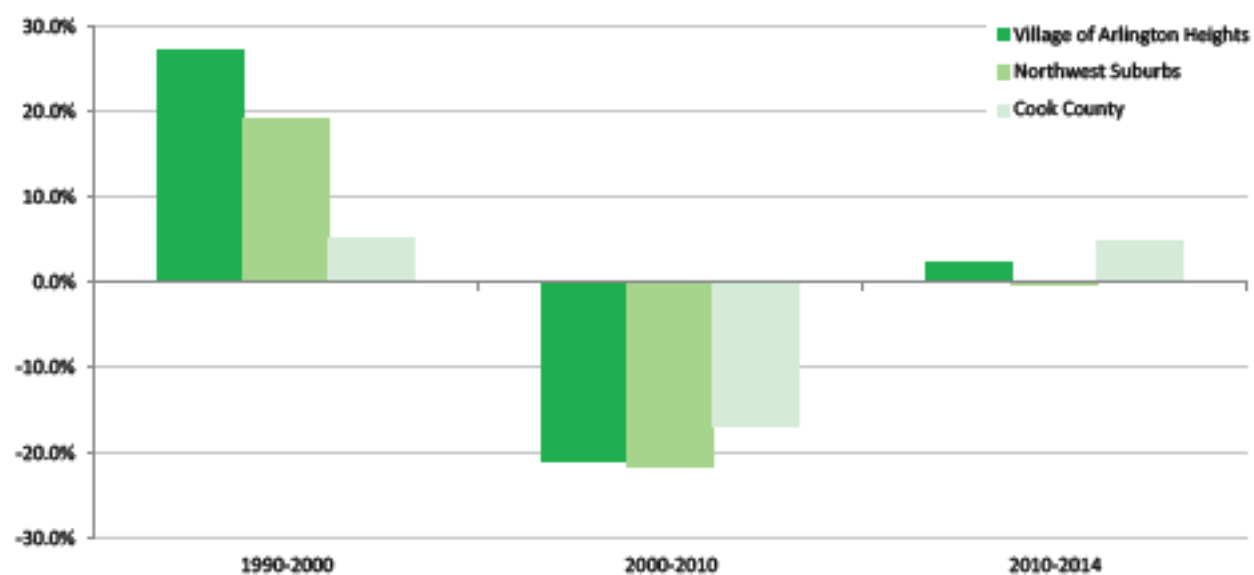


Economic Development

💰 Employment

Local employment is usually viewed from the perspective of the work force and labor force. The work force may be defined as the number of persons employed in Arlington Heights regardless of their place of residence. The labor force is defined as those persons 16 years of age or older residing in Arlington Heights regardless of their place of employment.

Figure 9. Employment Change



One North Arlington

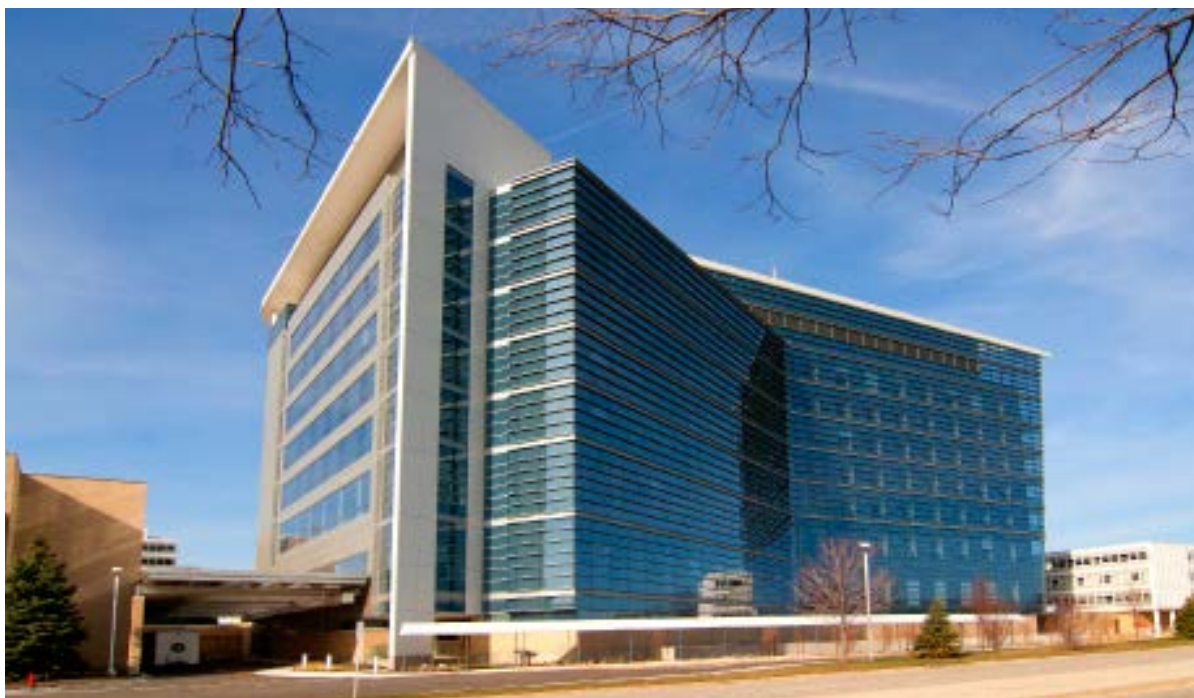
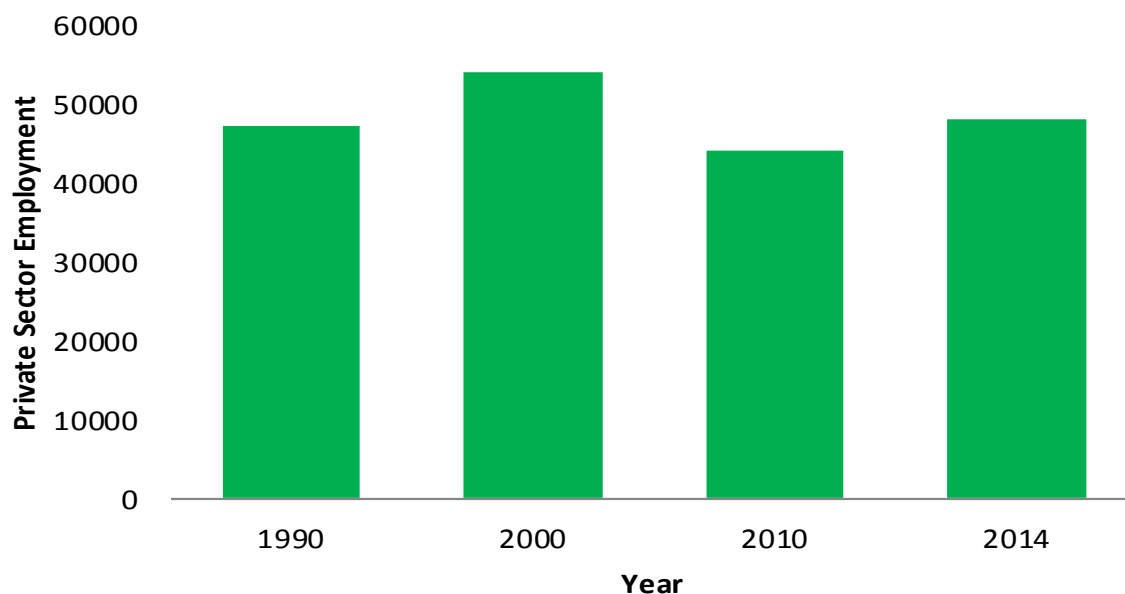
Economic Development



Work Force

From 1979 to 1990, the number of jobs in the Village grew by 159% from 18,248 to 47,305, while during the same time period, job growth in northwest suburban Cook County was 60%. Much of the job growth during this period was in wholesale, retail, service and financial industries. Since 1990, the Village job growth rate has fluctuated, peaking in 2000 at 53,982 jobs. During the decade plus from 2000 to 2011, the workforce declined to 44,007. Preliminary data suggests jobs will increase to 48,028 in 2014.

Figure 10. Arlington Heights Work Force



Northwest Community Hospital

Economic Development



Labor Force

Unemployment in Arlington Heights has historically been 3% to 4% below that of the nation as a whole, State and County. The primary reason for this is due to the high level of education attained by its residents. 52% of Arlington Heights residents over the age of 25 have attained at least an undergraduate degree from a college or university; over 20% have attained graduate degrees. Over the past 30 years the Village unemployment rate has averaged around 4%. The unemployment rate increased to around 8% during the 'Great Recession' but since has dropped closer to the average for the Village.

Figure 12. Unemployment Rate 1986 - 2014

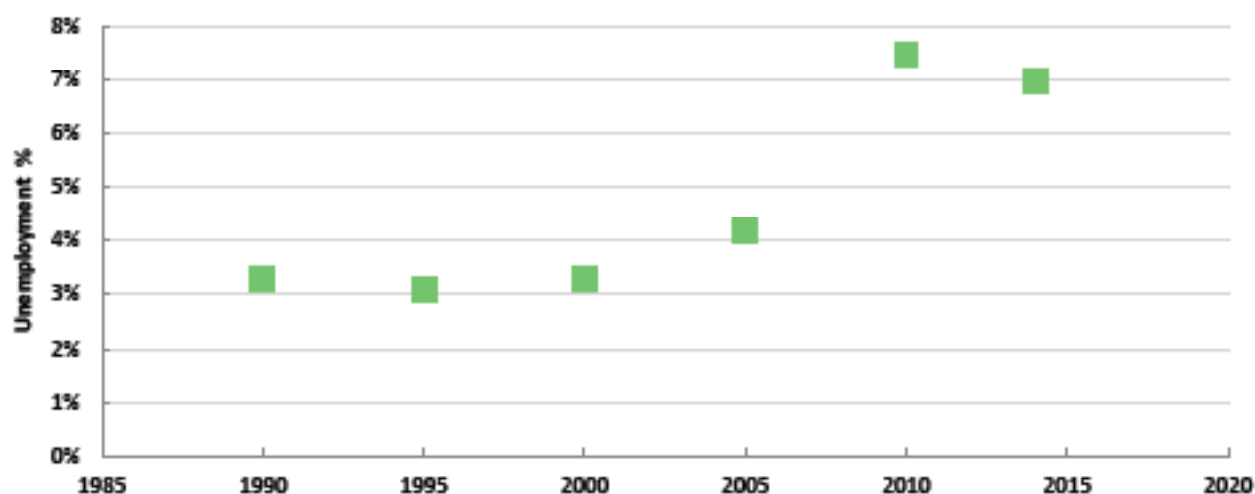
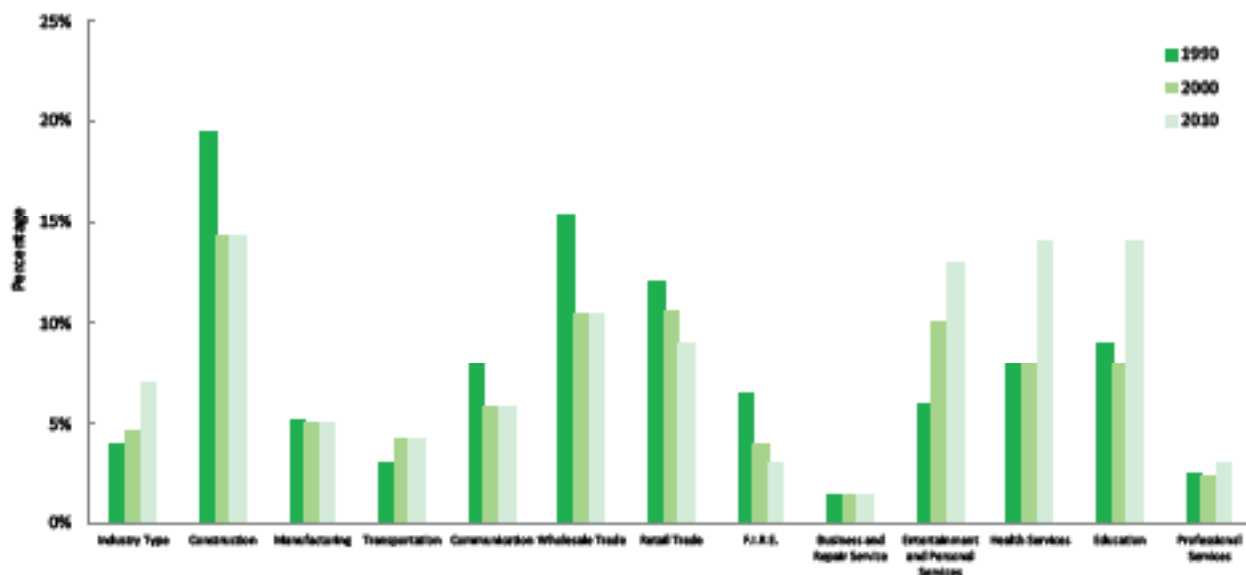
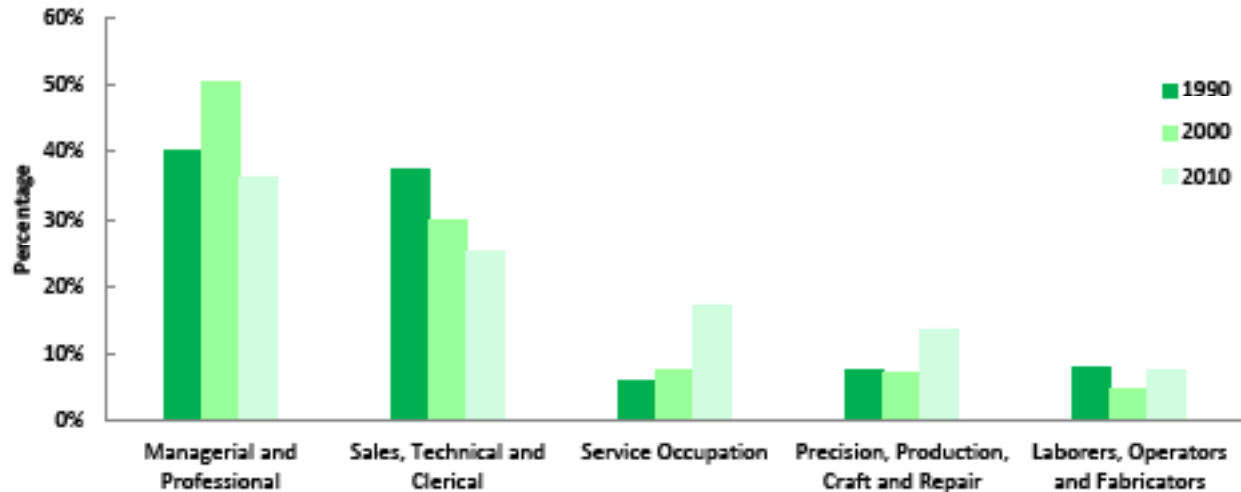


Figure 13. Labor Force Employment by Industry



Economic Development

Figure 14. Labor Force Employment by Occupation



Although the Village has experienced significant change in industrial uses, the labor force employment changed slightly by industry (Figure 13) and by occupation (Figure 14) from 1970 to 2015. The labor force apparently adapted quickly to the changes occurring in industry because it is highly skilled, well-educated and experienced.

Other interesting observations on the labor force include: approximately 2,584 (6.7%) worked at home in 2015 compared to about 1,500 persons who worked at home in 1990; the average commute time in 1980 was 23.1 minutes, rising to 27.9 minutes in 1990, increasing to 29.7 in 2015.



Income Characteristics

In 1990, median household income was \$51,331. By 2010 median household income was \$68,613. Total personal income in the Village was \$2.58 billion in 2005 rising to \$3.0 billion in 2014.

Per capita income in 1990 was \$22,864. In 2014 per capital income rose to \$40,277. Approximately 17% of households earned over \$150,000 annually in 2010. Another 17% earned between \$100,000 and \$150,000.

Economic Development



Retail Sales

Retail sales activity occurs across Arlington Heights in 38 shopping centers totaling almost 3.3 million square feet. The largest concentration of retail square footage is in the Rand Road/ Arlington Heights Road/Palatine Road area. This area comprises 1.3 million square feet of retail space, which is 39% of the Village total. The Village experienced a commercial boom in retail space during the 1980's, when 1.8 million square feet was built. Since 1990, the Village has gained 142,000 square feet of retail space. The competition among Arlington Heights merchants for consumers is made all the more keen by competition from establishments in adjacent communities. The transportation network encourages consumer mobility and requires creative marketing and promotion on the part of merchants to capture available consumer dollars. Woodfield, Deer Park and Randhurst malls are magnets for primary and secondary retail activity and their market areas overlap Arlington Heights.

The growing popularity of off-price retailing and other retailing concepts will affect consumer shopping habits and the nature of competition among established businesses in Arlington Heights. Market segmentation is becoming more sophisticated. It is likely that the Village will see more rapid creation and demise of businesses in the future as retailers attempt to market products to increasingly specialized target markets within the Village.

The internet is also impacting how people shop. Retail sales in Arlington Heights have increased over the past 20 years to \$1.19 billion in 2014. Due to the "Great Recession", sales decreased to slightly below \$1 billion in 2009, but have since recovered to its highest level.

Figure 15. Retail Sales - 2000 to 2014

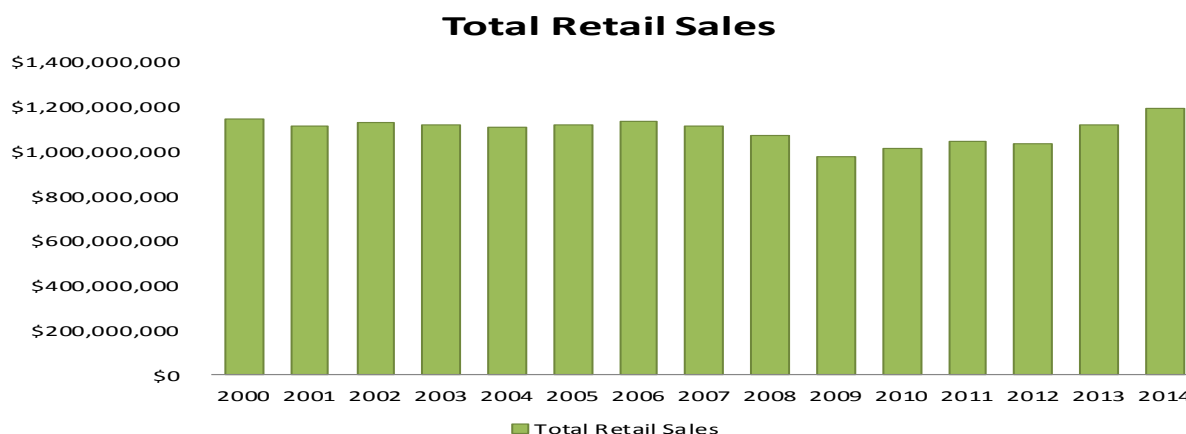


Figure 16A. Village Retail Sales Comparison-1995/2014

Category (\$ millions)	1995 Sales	1995 Pct.	2014 Sales	2014 Pct.
General Merchandise	\$90.1	9.4%	\$68.5	5.7%
Food	\$149.6	15.5%	\$200.1	16.8%
Drinking/Eating Places	\$90.1	9.4%	\$146.7	12.3%
Apparel	\$33.0	3.4%	\$36.7	3.1%
Furniture/HH/Radio	\$81.8	8.5%	\$87.5	7.3%
Lumber/Bldg/Hardware	\$57.1	5.9%	\$49.2	4.1%
Auto & Filling Stations	\$236.6	24.6%	\$280.3	23.5%
Drugs & Misc Retail	\$140.7	14.6%	\$162.2	13.6%
Agriculture & All Others	\$49.8	5.2%	\$136.9	11.5%
Manufacturing	\$33.4	3.5%	\$25.1	2.1%
TOTAL SALES	\$962.0	100.0%	\$1,193.5	100.0%

Economic Development



Market Share of Retail Sales

The Village's share of retail sales, based upon sales tax receipt data, of 10 surrounding communities is 12%, 3rd only to Schaumburg and Mt. Prospect in Northwest Cook County. Figure 16 presents market shares by retail category for the 10 communities.

Figure 16 B. Market Shares by Community and Retail Category - 2014

Community	Total Sales	General Merch.	Food	Drinking & Eating	Apparel	Furniture	Lumber & Hardware	Drugs & Misc.
Arlington Heights	12%	8%	20%	14%	9%	18%	11%	10%
Mount Prospect	14%	13%	9%	7%	4%	5%	17%	28%
Prospect Heights	1%	0%	4%	2%	0%	0%	0%	1%
Palatine	9%	10%	15%	7%	1%	2%	12%	7%
Rolling Meadows	3%	11%	3%	5%	0%	2%	0%	2%
Schaumburg	31%	34%	16%	35%	81%	56%	10%	23%
Elk Grove Village	10%	7%	6%	7%	0%	5%	20%	6%
Wheeling	6%	12%	5%	9%	0%	4%	9%	3%
Hoffman Estates	8%	6%	14%	8%	2%	4%	0%	10%
Buffalo Grove	6%	0%	8%	5%	1%	4%	19%	10%

Market penetration represents a community's share of retail sales in contrast to the trade area's resident generated retail sales potential. For other communities the size of Arlington Heights with a downtown shopping district, community shopping centers, and numerous strip shopping centers, market penetration is usually between 5% and 10%. Communities with a major mall and surrounding power centers typically command higher market penetration levels of between 14% and 15% of total expenditures within the trade area. The market penetration of the Village of Arlington Heights in relation to its trade area was approximately 30%.



Retail Stores and Restaurants

Economic Development



Areas of Focus



Economic Diversity

The economy of Arlington Heights is a delicate interaction of labor, capital and community resources. Maintaining diversity and variety in the Arlington Heights economy provides two results: a strong economy resilient to periods of boom and bust and a stable tax base. Diversity helps to make the economy less susceptible to the business cycles peculiar to every business and industry. Variety fosters a more competitive environment and benefits all the participants in the Arlington Heights economy.

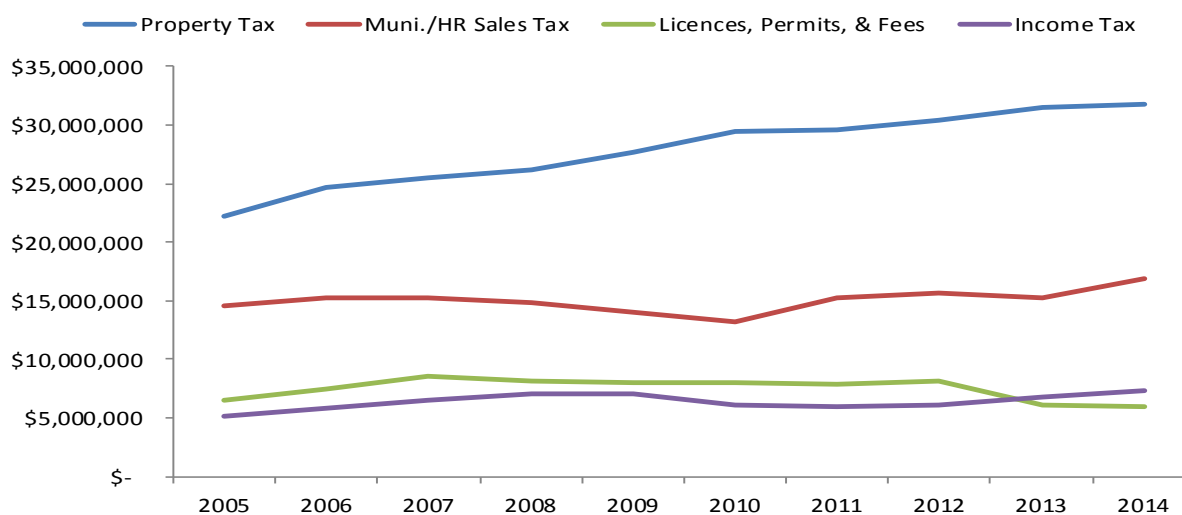
The local economy directly affects the ability and means with which government services are provided to the residents and businesses of Arlington Heights. Revenue used to pay for government services comes from a variety of sources but the major revenue sources are sales tax (21%), property tax (40%), and state income tax (9%). Changes in the local economy affect these resources and the ability of the Village government to maintain present service levels. For example, with more than 41% of the retail sales in Arlington Heights going towards the purchase of durable goods (autos, furniture, appliances, and home improvement materials) the local economy and Village sales tax revenues can suffer during national recessions as occurred in 1991-92 and in 2007-2012. Fortunately, the Village has a diverse commercial environment with a healthy mix of retailers, auto dealerships, restaurants, food stores, and hotels.

The Village budget depends heavily on sales tax revenue for its General Fund operating budget. Therefore it is imperative that the Village continue to increase sales taxes through business attraction and redevelopment of underperforming retail areas.

The equalized assessed valuation of land in the Village is an important consideration for the Village's bond holders and creditors, and is an indication of the private sector's faith and confidence in the community as a place in which to invest. The equalized assessed value of land in the Village has historically increased most years, however from 2009 to 2013 there was a large decrease of 33% due to the recession. As the economy continues to improve, the assessed values should start to increase to pre-recession levels.

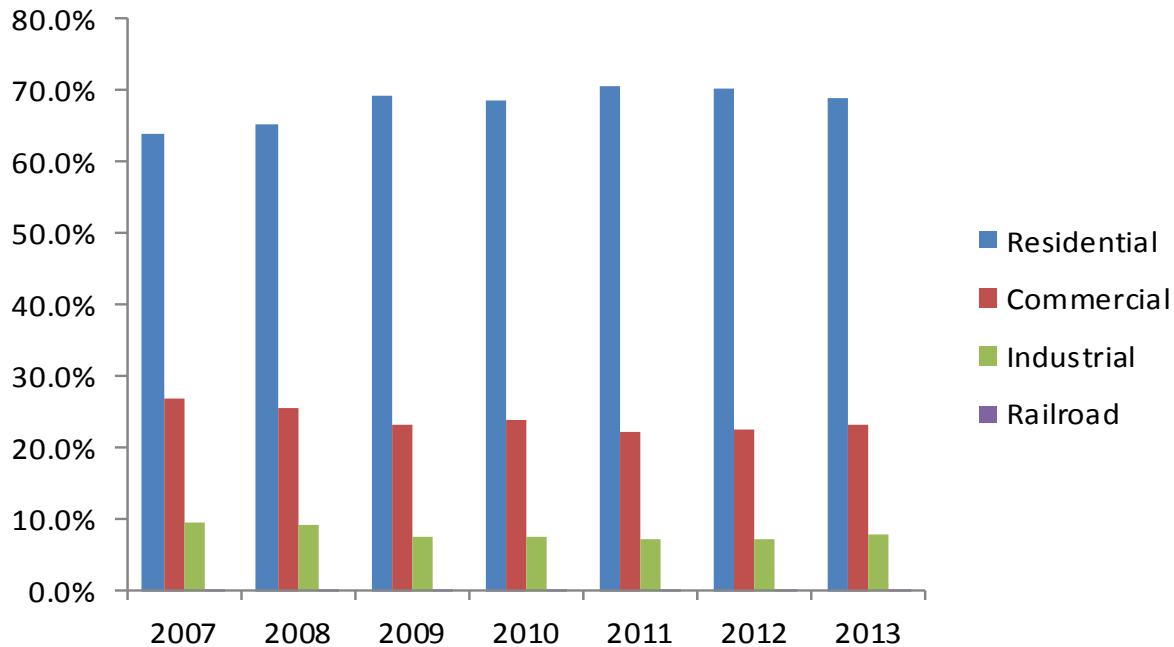
Real growth of the Village's EAV in the future will occur only with dense, mixed-use infill redevelopment in the Village, and with the natural increases in the assessed value. It is unlikely the Village's reliance on these revenue sources can be averted in the future. Greater emphasis on providing diversity and variety in local employment, shopping, housing and investment opportunities will allow the Village's budget to withstand some of the effects caused by the cyclical nature of the economy.

Figure 17. Revenue Growth for Four Village Revenue Sources



Economic Development

Figure 18. Village Equalized Assessed Valuation - 2007 to 2013



Business Attraction and Retention

The focus of much economic development activity in the region today is attraction of new employment and shopping opportunities. Arlington Heights is fortunate to have in place much of the infrastructure needed to attract investment to the community: roads and utilities, schools and parks, diverse housing, and established government services. Industrial and business attraction efforts are necessary in order to compete in the marketplace with other communities in pursuit of private investment and job creation in the Village. These efforts should not be the only economic development activity undertaken by the Village. Retention of existing business and industry should be of paramount concern. Business retention is important because it encourages existing business and industry to continue to make investments in the community creating more jobs, sales and savings. Retention efforts lack the glamour of business attraction but business retention maintains the diversity vital to a healthy economy. Moreover the odds of successful retention are slightly enhanced because the business is already in the Village, and new opportunities for growth and development may be discovered during the process.

The portfolio of grants, loans and other forms of financial assistance and inducements currently maintained by the Village may be used more often in the future as more businesses turn to the Village for assistance in establishing a new business or expand an existing enterprise in Arlington Heights. There are an array of local, state and federal tools the Village can use to protect and improve its economy and should work towards promoting tools available to the business community including Cook County property tax abatements; tax increment financing and industrial revenue bonds. Each program has its requisite objectives and criteria for use in determining an applicant's eligibility, suitability, and maximum amount of funding for a given project or activity, but they share the goal of assisting business development in Arlington Heights. The Village should market the programs to the business community in order to create interest and awareness to find prospective recipients for the programs.

Economic Development

Transportation

The economic well-being of Arlington Heights relies on an efficient transportation network. Businesses need transportation to provide safe, convenient access to their customers, suppliers and employees. Traffic congestion could become a detriment to economic development in the future in Arlington Heights and the immediate area if mitigating measures are not employed now. Greater use of public transportation, carpooling and staggered work hours are a few inexpensive options. Land use decisions and site design requirements are additional solutions which can have an impact on traffic circulation. In addition, the Illinois Department of Transportation has adopted the Strategic Regional Arterial program, which defines a region wide network of arterial streets to study to improve circulation. There are five SRA's in the Village: Lake-Cook Road, Rand Road, Palatine Road, Golf Road and Algonquin Road from Golf Road northwesterly. With the expansion of I-90 in 2015-2016, the new four lane cross section will allow for bus rapid transit. Also discussed for the future is the STAR Line, which would include new Metra commuter rail service along I-90 from O'Hare to Hoffman Estates, then south through the far western suburbs to the Naperville area.



Village of Arlington Heights Train Station and Downtown

Maintaining and Improving Community Assets

The Village should be concerned about maintaining and improving the community characteristics and assets which make Arlington Heights a desirable place in which to live, conduct business, and invest. The variety of housing, education and cultural opportunities in the Village and the characteristics of the population and work force have a direct impact on development of the local economy.



Metropolis Performing Arts Center

Recreation

Chapter Contents Purpose Population Characteristics Governmental Relationships Existing Park Inventory, Future Park Development, Areas of Concern

The availability and variety of recreational opportunities generally contribute to the quality of life in Arlington Heights. The programs and facilities provided by the Park Districts improve human development and the local environment.

The changes occurring in the Village population affect the delivery of recreation services. Demand for recreation opportunities is directly related to the amount of leisure time, income and mobility on the part of the population. The resources with which to provide recreation opportunities are limited: there is only so much land available for parks and recreation demands are varied and growing.

Recreation experiences are available in a variety of settings throughout the Village. The Village and Park Districts have worked hard to provide recreation areas which are compatible with the surrounding area and contribute to the environment.

The Village has in place the tools and policies to help the Park Districts acquire the additional land needed to achieve their objective. The high standards set by the Village and Park Districts are the community's assurance that recreation opportunities in Arlington Heights will continue to be a community asset.

Purpose

The purpose of this section is to provide Village policy and decision makers with information about the recreation opportunities in the community to aid their decision-making process. This section profiles the response to the public's demand for recreational facilities and programs in the Village and explains the relationship between the Village and Park Districts. Areas of concerns and needs are identified in order to help the Park District's provide the very best leisure time opportunities and experiences in Arlington Heights.

Chapter Contents:



Population Characteristics



Governmental Relationships



Existing Park Inventory



Future Park Development



Areas of Concern

Recreation

Population Characteristics

Since 1990, the population growth of Arlington Heights has stabilized. Growth over the next 20 years will be minimal, however, the average age of the population will continue to rise as described in the Housing and Population section. The aging of the population has and will continue to have an impact on the Park District programs and facilities. The emphasis of programming will continue to provide a more balanced approach, providing not only youth oriented, but adult and senior oriented programs as well.



Sculptural Element in a Park

Governmental Relationships

The Arlington Heights Park District is responsible for developing and maintaining recreational facilities and administering recreational programs for most of Arlington Heights. However, portions of the Village are served by the Buffalo Grove Park District, Salt Creek Park District, Palatine Park District and the Mount Prospect Park District. Park Districts are independent government bodies governed by an elected Board of Commissioners having the power to levy and collect taxes, issue bonds, and purchase land and services. Unlike the Village government, Park Districts can not regulate the use and development of land in Arlington Heights.

The Village performs an advisory and supportive role, and in some instances a regulatory role, in the park development process. The Village can help the Park Districts achieve their objectives by using its statutory powers to reserve land for future park development, obtain park sites from developers through cash contributions or land dedications, and controlling the type and density of development across the Village. The Village's land use decisions can increase demand for recreation opportunities or alter the Park Districts' tax base. This relationship applies to all the Park Districts which have jurisdiction within Arlington Heights' municipal boundaries.

Open space administration and development is also provided by the County Forest Districts in Cook County and Lake County. These agencies provide open space and a variety of recreation opportunities on a regional scale. The Districts' Ned Brown Forest Preserve is immediately south of Arlington Heights and other preserves are within a short driving distance.

Intergovernmental cooperation has expanded recreation opportunities for residents in Arlington Heights and adjacent communities. The Arlington Heights Park District has reciprocal agreements with the Mount Prospect Park District, Buffalo Grove Park District and Rolling Meadows Park District which allow non-residents to use facilities and programs in the other Park Districts subject to certain conditions. These agreements are renewed periodically and permit the participating park district to concentrate on the facilities and programs it can best provide, thus avoiding costly duplication of facilities, programs and administration.

The cooperative spirit of the agencies involved has led to several joint agreements which have provided recreational opportunities such as: Lake Arlington, North School Park, Nichol Knoll Golf Course, Melas Park, and others as well. These relationships benefit the taxpayer by making available new facilities and programs at lower economic and social cost. The local governmental jurisdictions should explore additional applications of this cooperative approach towards providing public recreation opportunities.



Existing Park Inventory

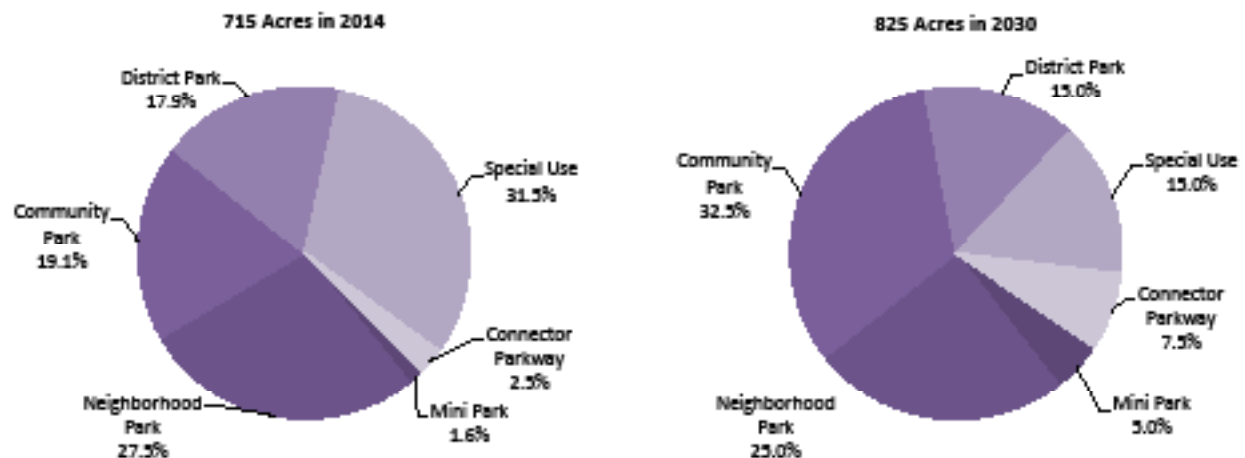
The Village is primarily served by the Arlington Heights Park District, which oversees 58 park sites of all sizes and classifications, and over 1500 recreational programs. Among the 716 acres of park land are 6 pools (1 indoor), 2 golf courses, 2 tennis clubs, and numerous other special recreation facilities. The Park District owns 457 acres (64%) and leases 259 acres (36%), primarily from the Village and school districts. In 1983 and again in 1992 and 2001 the Park District won the National Gold Medal Award for excellence in park and recreation management.

Community and neighborhood parks comprise 47% of the land the Arlington Heights Park District manages. Special Use parks such as Arlington Lakes Golf Club comprise almost 32%, with district parks such as Lake Arlington comprise 18%. Figure 19 compares the existing breakdown (2015) of park acreage with the desirable park acreage in 2030. Using national standards, the desirable future park acreage in the Village is 825 acres, or 10 acres per 1,000 population (assumes population of 82,500 in 2030).

Parks differ in size, the type of facilities and amenities offered, and the user they are meant to serve. Mini parks are small sites, usually less than 2 acres, providing recreation opportunities for toddlers and young children within 1/4 to 1/2 mile radius of the park. Neighborhood parks provide recreation opportunities for a larger segment of the population within 1/2 to 1 mile radius of the park. These parks usually include the same features found in play lots, plus areas for active and passive recreation pursuits. Community parks such as Camelot and Pioneer provide swimming pools and field houses in addition to many of the features found in neighborhood parks for the residents living within 1 to 2 miles. District parks are very large parks, usually over 30 acres, with large areas devoted to passive pursuits for the entire community. Lake Arlington, developed in 1991, and Melas Park, jointly developed in 1995-96 by the Arlington Heights Park District, the Mount Prospect Park District and Village of Mount Prospect, are the two district parks serving Arlington Heights. Special Use parks are often single purpose facilities devoted to specialized activities such as golf courses or nature areas. Parkways are linear parks connecting activity areas such as schools, commercial areas, or other parks and are used primarily for walking or bicycling.

A complete inventory of features of each park in the Village is provided in the Park District Comprehensive Plan available at the Park District administrative offices.

Figure 19. Comparison of Existing Park Acreage with Desirable Park Acreage



Recreation



Future Park Development

It is the goal of the Arlington Heights Park District to maintain a ratio of 10 acres of park land for every 1,000 persons in the Village. Thus the Park District needs to increase its land inventory from 716 acres to 825 acres to achieve this goal by the time the population is expected to peak at 82,500. The addition to the present inventory may be new parksites or expansion of existing parks as determined by neighborhood need.

The Village's Comprehensive Plan map designates areas desirable for park development in the Village. The Official Map indicates the location and type of existing and future park development in the community. Future parksites are specifically located to decrease an existing or future neighborhood or community wide park deficiency. The deficiency is determined by the present ratio of park land per 1,000 persons within a defined geographic area for a specific park type measured against the appropriate national standard (Figure 20).

Figure 20. Recommended Park Standards & Comparison of Existing Acreage with Desirable Acreage

Type of Facility	Service Radius	Population Served	Desirable Acres/ 1,000 Population	Present Inventory	Target Inventory
Playlot	1/4 - 1/2 mile	500 - 2,000	0.5	11.4	40.5
Neighborhood Park	1/2 - 1 mile	2,000 - 5,000	2.5	187.4	212.5
Community Park	1 - 2 miles	5,000 - 20,000	3.3	130.3	263.3
District Park	Entire Community	Entire Community	1.5	128.0	121.5
Special Use	Entire Community	Entire Community	1.5	218.3	121.5
Connector Parkway	Varies	Varies	0.8	13.8	60.8
	Recommended	Park Acreage	10.00	689.0	810.0



Park Site Reservations

The future park sites listed in Figure 21 and identified in Figure 22 are in areas generally experiencing a deficiency in park and recreation opportunities as compared to optimal national standards. The location of the future parksites takes into consideration the location of existing parks and schools, physical features of the landscape, and the neighborhood's land use and recreation needs. Wherever possible existing park or school sites have been recommended for expansion instead of developing a new site in the vicinity. However, areas having unique physical features such as a creek, wooded areas, or hills, are included regardless of the proximity or type of adjacent park since such areas provide special opportunities for park development.



North School Park

Figure 21. Park Site Reservations

ID	Site Name	Neighborhood	Acres	Address	Pin #
CD1	Carousel Park	Camelot	5.8	1901 E. Suffield	03-16-105-006
CD2	ComEd Right-of-Way	Camelot	11.5	Various	03-15-400-007
CD3	Commerce Point Property	Camelot	3.5	3825 N. Ventura	03-06-108-006
CD4	Glenlark School	Camelot	4	2501 N. Chestnut	03-17-100-015
CD5	Inselia - Michalewski Property	Camelot	20	2301 N. Waterman	03-16-202-002/013
CD6	Ivy Hill School	Camelot	7	2211 N. Burke	03-17-400-006
CD7	Lake Arlington	Camelot	93	2101 N. Windsor	03-16-301-002/03 03-16-400-009
CD8	McDonald Creek Property	Camelot	3	406-506 E. Hintz	03-08-303-024/ 025/026/040/049
CD9	Michel Knoll Golf Course	Camelot	56	3800 N. Kennicott	03-06-103-003 03-06-301-001
CD10	Poe School	Camelot	5	2800 N. Highland	03-07-401-013
CD11	Rand Jr. High School	Camelot	11	2550 N. Arlington Hgts.	03-17-100-017
CD12	Riley School	Camelot	7	2906 N. Windsor	03-08-402-004
FD1	Greenbrier School	Frontier	11	2330 N. Venle	03-18-112-003
FD2	Happiness Park (part)	Frontier	1.7	2206 N. Venle	03-18-302-003
FD3	Patton School	Frontier	7	1616 N. Patton	03-19-108-024/035
HD1	Juliette Lane School	Heritage	5	1530 S. Highland	08-09-400-024/ 028/029/031/056
HD2	U.S. Army Reserve Headquarters	Heritage	45	1801 W. Central	08-04-100-010 08-09-101-012
HD3	Victory Park	Heritage	1.7	1300 S. Harvard	08-09-315-006
PD1	Cypress Park	Pioneer	5	1150 S. Arlington Hgts.	08-09-220-005
PD2	Dunton School (closed)	Pioneer	11	1220 S. Dunton	08-09-220-002
PD3	Festival Park	Pioneer	0.3	300 W. Hawthorne	03-11-230-009
PD4	Girchoff Road Property	Pioneer	4	1701 W. Girchoff	03-31-301-033 03-31-312-002
PD5	Our Lady of the Wayside Church	Pioneer	11	405 S. Ridge	03-31-218-016/ 017/018
PD6	South Jr. High School	Pioneer	11	314 S. Highland	03-31-219-001/ 002/004/008/016/ 017/018/019
PD7	Sunset Meadows Park (part)	Pioneer	33.3	700 S. Dwyer	03-31-301-032/ 034/037/040/043
PD8	U.S. Post Office	Pioneer	5	909 W. Euclid	03-30-400-001
PD9	Westgate / Dwyer School	Pioneer	7	1211 W. Grove	03-31-100-022/043
RD1	American Legion Property	Recreation	0.2	121 N. Douglas	03-29-402-002
RD1	Belmont Residential Properties	Recreation	0.3	15817 S. Belmont	03-29-351-001/002
RD3	Dryden School	Recreation	5	722 S. Dryden	03-32-409-021
RD4	First United Methodist Church	Recreation	10	1903 E. Euclid	03-28-301-008/ 009/011

Recreation

Figure 21. Park Site Reservations Continued

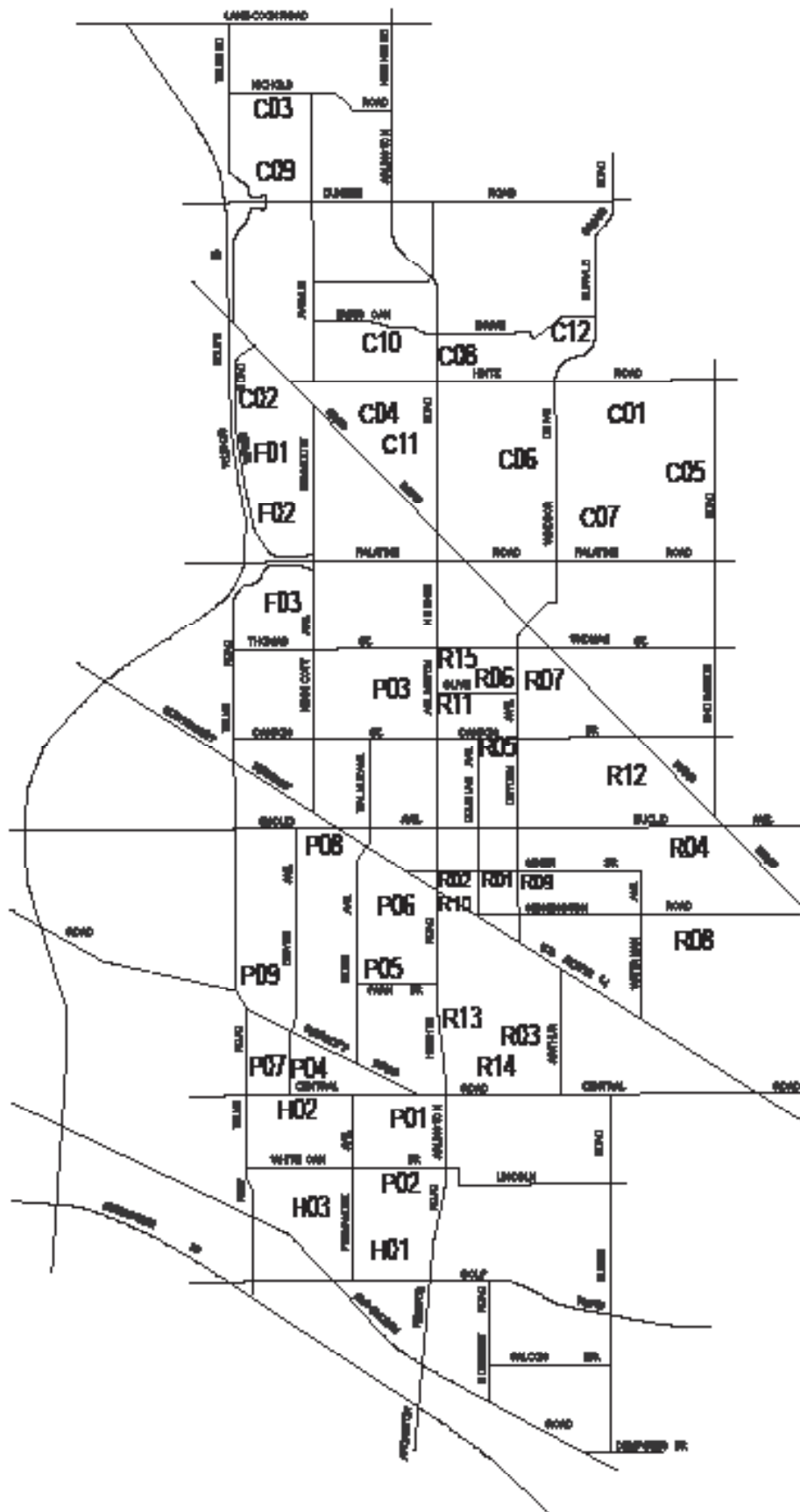
#	Site Name	Neighborhood	Acres	Address	PIN #
R05	Greens Park	Recreation	4.2	501 E. Olive	CE-20-306-040/ 041/069
R06	Greenslopes Park	Recreation	5	1401 Belmont	CE-20-304-009/010
R07	Hickory Meadows Park	Recreation	5	1309 N. Douglas	CE-20-417-011
R08	Kensington School	Recreation	5	201 S. Evanston	CE-33-218-001
R09	Miner / Windsor School (part)	Recreation	9	1315 E. Miner	CE-29-412-012/ 013/014/015/ 016/042
R10	Northwest Highway Property	Recreation	3	500-510 NW Highway	CE-29-351-007 CE-29-352-002/ 003/004/011/012
R11	Olive School	Recreation	5	303 E. Olive	CE-20-306-039/051
R12	Rolling Green Country Club	Recreation	30	750 N. Rand	CE-28-101-002
R13	Salas Property	Recreation	1.5	807 S. Beverly	CE-32-424-014
R14	Southminster United Presbyterian	Recreation	2	906 E. Central	CE-32-409-012/ 014/015/012
R15	Thomas Jr. High School	Recreation	10	303 E. Thomas	CE-20-303-006
R16	Windsor Parkway	Recreation	4	100-500 S. Windsor	No PIN

Arlington Heights Park District - Approved by Village Board - June 16, 1997



Arlington Lakes Golf Course

Figure 22. Park Site Reservation Map Land Acquisition



Recreation

The land needed for future parks sites is acquired in a number of fashions. Purchase and donation of property are two of the most common ways for park districts to acquire land. Leasing has become a significant means of providing park sites and programs. Condemnation and conservation easements are other, but less popular, means.

Illinois statutes permit municipalities to designate land in the Village for school, park or other public land on the Village Comprehensive Plan map. This map serves only as a guide with respect to land use decisions and in no way should be construed as a regulatory device. The Village Official Map, however, serves notice to property owners that the Village or Park District may consider acquisition of all or part of the subject property in the future. Should a subdivision plat be approved for property having this designation, the Park District or Village has one year in which to negotiate a sale or land donation or commerce condemnation proceedings to acquire the property.

An alternative to the outright purchase of land for park purposes is the Village's land contribution requirement in connection with land subdivision and residential development. In short, the contribution requirement requires residential builders in the Village to contribute land in an amount proportionate to the estimated population of the development, or cash in-lieu of land to the Village, according to a prescribed formula. The contributions are used to acquire or assemble the park sites designated on the Comprehensive Plan map or Official Map. Much of the Arlington Heights Park District's land inventory and physical improvements thereon have been acquired in this manner.



Areas of Concern

Communication between Government Agencies

The Unique relationship of the Village and the Park District can lead to lapses in communication, particularly in the area of planning for park development. Regular dialogue between the Village and Park District should be maintained and improved, if necessary, to minimize duplication of effort and to share resources and information.

Land Availability

There is very little undeveloped land available in the Village with which to increase the inventory of park land. Since it is necessary to add land to the inventory to maintain a satisfactory ratio of park land and population it can be assumed that the marginal costs of adding land to the park inventory will increase as the supply of vacant land diminishes.

Land Acquisition Strategy

The problems created by a finite supply and growing demand will require innovative solutions. The Village should encourage the Park District to formulate a strategy to acquire land for future parks sites or expansion of existing parks in advance of need to minimize public costs and maximize public benefit. The Village's land contribution requirement is the key to land acquisition strategy and should be evaluated and improved when necessary.

Historic Preservation

Chapter Contents: Growth and Architecture, Comprehensive Plan, Neighborhood Conservation Districts, Historic Preservation Ordinance, Historic Preservation Strategies

The Village of Arlington Heights has a rich local history including the presence of four major development periods which added distinct architectural styles and character to residential neighborhoods. These four periods of growth and development cover the establishment of the Village of Arlington Heights by the Dunton family in the early 1800's thru the current redevelopment of the downtown area.

The first distinct period of growth occurred during the railroad expansion and consisted of homes located around the railroad station. These homes varied in design from highly ornamental designs that mimic Victorian styles to simple designs as availability and cost of lumber became affordable. The second major expansion occurred with educational and religious buildings, including the creation of high-end residential communities such as Stonegate and Scarsdale. During this period numerous French, Spanish, American Bungalow, and Frank Lloyd Wright style houses were built. The third major historic event that impacted Arlington Heights' architecture and development was brought on by the rapid expansion after World War II, which resulted in the creation of large residential neighborhoods. Many ranch, split-level, trilevel, lustron, neo-colonial, cape cod, minimal traditional, cube, and mansard designs are a result of this time period. The last major period of architectural distinction is the current downtown revitalization. The creation of the downtown as a pedestrian friendly location and the creation of numerous high-rise residences has increased the livability of the downtown area and impacted the architectural character of the downtown.

Although the Village requires a development plan prior to allowing demolition of a home, there is no Local Preservation Ordinance to preserve buildings of historic significance. In 2004, the Village adopted Single Family Design Guidelines, which provide design direction for new homes and additions. Homes should take into consideration the character of the existing neighborhood, site layout, relationship of the home to adjacent homes, bulk and massing, and use of materials. However, without a preservation Ordinance, how can the Village ensure that the historic structures within the community will not be compromised?



Statue of William Dunton

Chapter Contents:



Growth and Architecture



Comprehensive Plan



Neighborhood Conservation Districts



Historic Preservation Ordinance



Historic Preservation Strategies

Historic Preservation

Growth and Architecture

The Village's patterns of growth and development can be seen in four distinct periods as mentioned above. Each period left its own physical mark on the Village giving its unique suburban character.

1830 – 1900: Railroad Village – Village town platted by the Dunton family with lots centered around the train depot. Many of the Village's historic homes are within the original town.

1900 – 1945: Inter-War – Stonegate and Scarsdale are newly platted neighborhoods for higher end housing. The Great Depression slows development during this time period.

1945 – 1980: Post War Boom – Great expansion of the Village borders to the south and north, with more suburban type of development typical of the 60's and 70's.

1980 – Present: Downtown Revitalization – higher density development to include a mix of land uses centered around the train station.

The architectural styles seen in the Village include Craftsman, National Folk, Folk Victorian, American Four Square, Queen Anne, Italianate, Colonial, Tudor Revival, Chicago Bungalow, Split level, Post WWII Cube, among others. Currently, there are three structures in the Village listed on the National Register of Historic Places, although many others would qualify as well.



1. The Mueller House: 500 N. Vail Avenue



2. The Banta House: 514 N. Vail Avenue



3. Wheeler-Magnus Round Barn: 811 E. Central Road

Historic Preservation



Comprehensive Plan

The following historic preservation related goals and policies are included in the Comprehensive Plan:

Goal

To preserve physical resources of historic value which exemplify the cultural, political, economic or social heritage of Arlington Heights.

Policy

Whenever specific land areas and/or existing structures come under review for general planning progress, or in conjunction with a specific land use petition, consideration should be given to identify for possible preservation purposes, land areas or buildings that meet any of the following criteria:

- a. Structures that exhibit a high quality of architectural design reminiscent of the past.
- b. Structures that exhibit unusual or distinctive design, or construction technique which contribute to the architectural interest of its environs either as an accent or a counterpoint.
- c. Land areas that have long provided an established or familiar visual presence in Arlington Heights by virtue of: a unique location; distinctive physical characteristics; or historical association.

Goal

To preserve and protect existing and future residential neighborhoods in the Village.

Policy

To preserve and renovate housing of historic or aesthetic value and upgrade and renovate public improvements and facilities in Village neighborhoods.

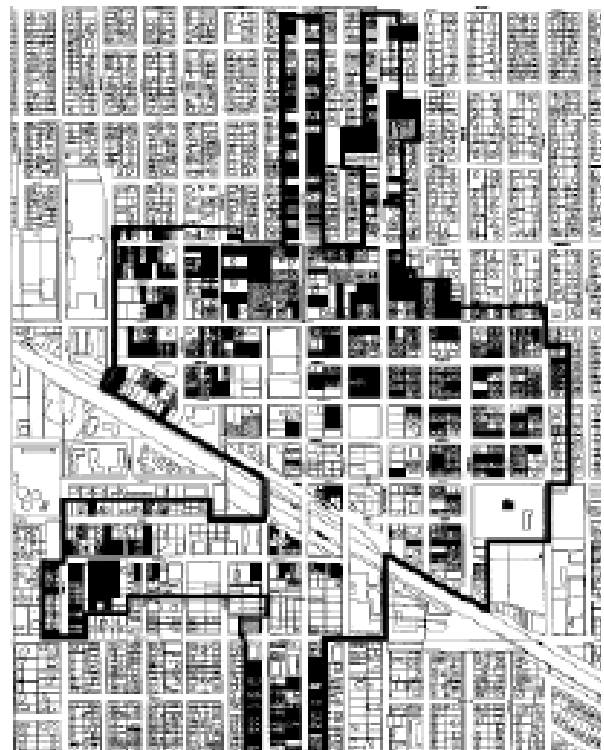
To prepare realistic plans for the areas in and around downtown with all necessary safeguards for finer residential and historical properties.

These stated Goals and Policies serve as guidance, however they do not control the use of land unless supplemented with enacted codes such as a Preservation Ordinance.



The School of the Art Institute of Chicago Study

In 2004, the graduate program in historic preservation at the School of the Art Institute of Chicago, conducted a study of historic buildings and areas of the Village. This report inventoried 450 residential structures and 34 commercial structures. The area inventoried is depicted here:



Historic Preservation



Historic Preservation



Neighborhood Conservation Districts

The area surveyed was further broken down into 7 potential Neighborhood Conservation Districts (NCD). A NCD is a preservation planning tool employed by communities to identify and protect the distinct physical character of established neighborhoods. A map of the potential NCD's is depicted below.

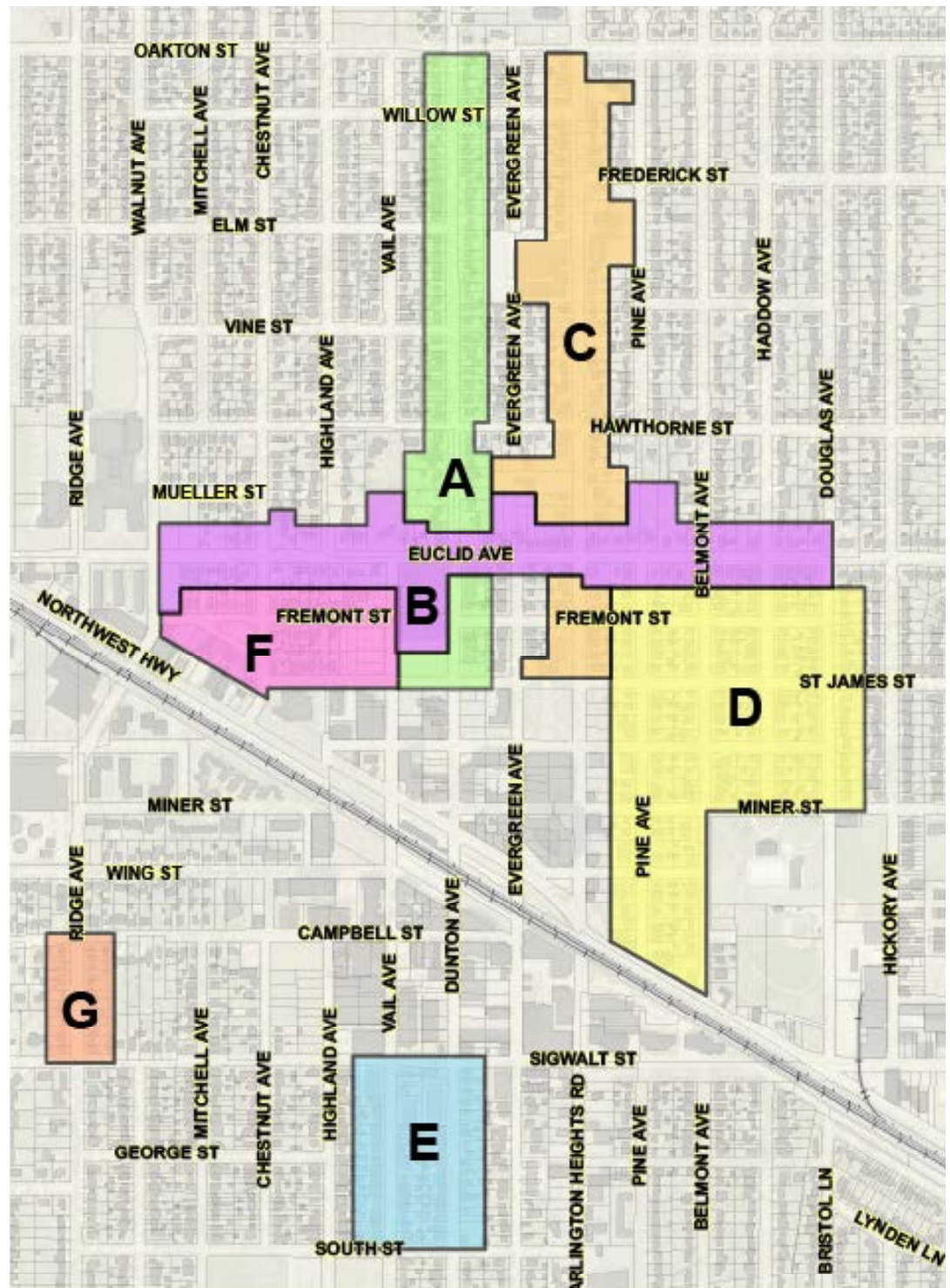
Each structure evaluated in the survey was rated as one of the following:

Exceptional: These are structures that could be eligible for landmarking on the National Register of Historic Places

Notable: Structures that have integrity and strongly contribute to a potential historic or conservation district.

Contributing: Properties that contribute to a district but due to alterations cannot stand alone as landmarks.

Unrated: Structures that do not contribute to the historic area.



Potential Conservation Districts (based on Central Arlington Heights Historic Resources Survey)
Prepared by the Village of Arlington Heights
Department of Urban Planning and Community Development
July 2011

Historic Preservation

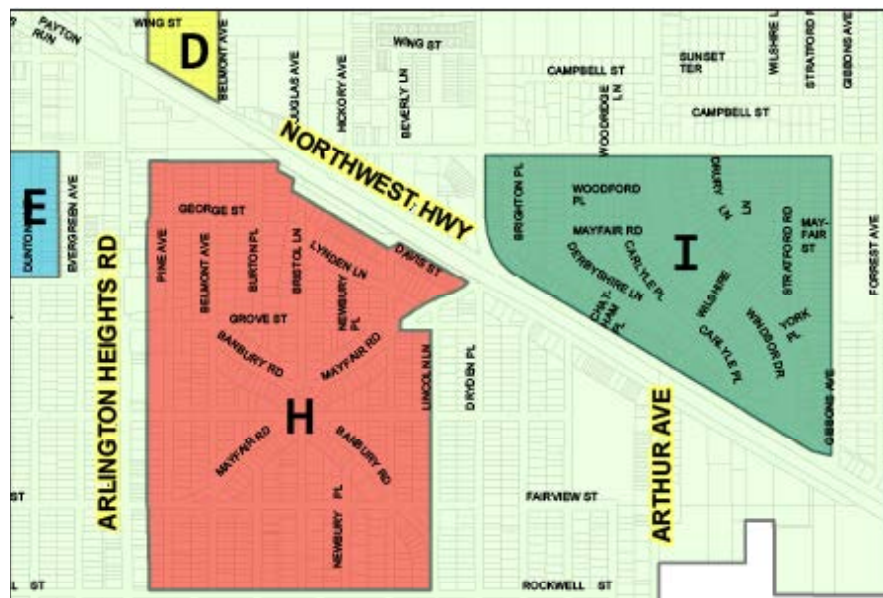
The following chart lists each of the potential NCD's and the number of structures rated either Exceptional, Notable, Contributing, or Unrated.

Area	Exceptional	Notable	Contributing	Unrated
A	6	28	17	4
B	8	10	29	17
C	7	17	22	18
D	1	27	67	31
E	0	26	23	10
F	6	9	15	3
G	0	8	12	4

The study area did not include Scarsdale or Stonegate, therefore those two areas should be added to the map but as areas for future study as NCD's. (See map below).

The goal of any NCD is to sustain and preserve the neighborhood's character by defining procedures and policies for new construction, alterations, demolition and additions to existing structures in the district. Typically, the community formally establishes an NCD via a Conservation District Ordinance (CDO). Because a CDO does not impose the same level of scrutiny or protection for historic structures in districts as a preservation ordinance does, conservation district programs have been designed to be used congruently with a preservation ordinance.

As mentioned, the Village already has a review process for new homes throughout the Village that are required to address the design guidelines, which take into account the characteristics of the neighborhood. Although zoning regulations for single family lots in the Village have been modified to limit Floor Area and impervious surfaces, the Village does not have unique zoning standards for the possible conservation districts. Since each district has unique development attributes, the Village may want to consider reviewing each recommended NCD in order to determine if zoning and design standards need to be created for each specific NCD.



Historic Preservation



Historic Preservation Ordinance with Commission and Local Landmark Process

In 2005 the Village Board discussed the concept of a historic preservation ordinance. There was interest in doing so however in order to properly implement such an Ordinance, additional staffing would be required. Due to financial constraints, this issue was not pursued.

The Illinois Municipal Code (65 ILCS 5/11-48.2-1 et al) sets forth regulations with respect to local municipalities rights regarding the preservation of certain structures. As a result, many communities have adopted local Historic Preservation Ordinances and that include a local landmark nomination process. These Ordinances typically include the establishment of a Historic Preservation Commission, the criteria for the designation of Local Landmarks or Districts and the nomination process, the Certificate of Appropriateness criteria and process, and the Certificate of Economic Hardship process. This option would allow the Village to acknowledge structures that are historically significant and to impose more stringent review measures on said structures. It is important to note that the federal government has various tax credit programs that are available to property owners of structures (in conjunction with a rehabilitation project) that have been established as "historic" via a locally adopted Historic Preservation Ordinance. These tax credits encourage the preservation of "historic" structures rather than the demolition of said structures.



Arlington Heights Historical Museum

Historic Preservation



Historic Preservation Strategies

The following are suggested strategies to further expand on current Village practices related to historic preservation:

- 1 *Designate Neighborhood Conservation Districts.*
- 2 *Evaluate Stonegate and Scarsdale neighborhoods for possible designation as Neighborhood Conservation District's.*
- 3 *Further study each of the Neighborhood Conservation Districts for possible district specific zoning overlays and / or develop district specific design guidelines.*
- 4 *Continue to provide Historic Preservation information on the Village web page and enhance public education.*

Corridors

Chapter Contents: Corridor Plans, Corridor Priorities, Characteristics and Key Issues, Design Guidelines

Corridors are areas along arterial streets that were developed incrementally over time with various land uses. A corridor includes the street itself and the abutting properties. There are five corridors in the Village that are recommended for further study to determine what type of improvements should be incorporated in order to improve the aesthetics of the corridor, and to evaluate abutting land uses for possible changes.

The five corridors designated for further study are:

- **Corridor A:** Arlington Heights Road: Sigwalt to Park
 - **Corridor B:** Arlington Heights Road: Central to White Oak
 - **Corridor C:** Arlington Heights Road: I 90 to Noyes
 - **Corridor D:** Rand Road: Hintz to Oakton
 - **Corridor E:** Northwest Highway: Arlington Heights Road to Waterman and Chestnut to Wilke
-

Chapter Contents:



Corridor Plans



Corridor Priorities, Characteristics and Key Issues



Design Guidelines

Corridors



Corridor Plans: Goals and Objectives

The Comprehensive Planning Program includes a Corridor Plans Goal with four Objectives as follows:

Corridor Plan Goal:

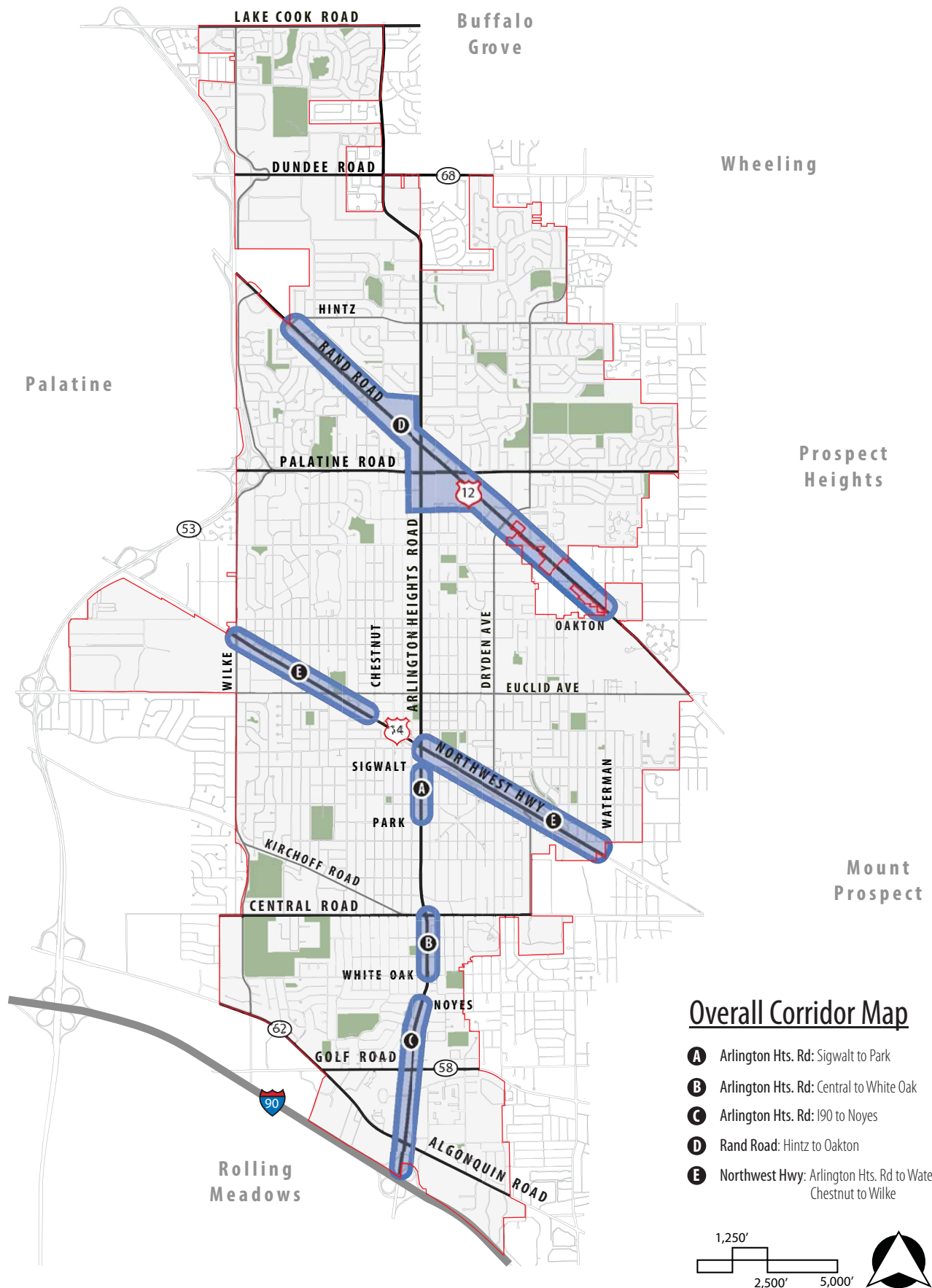
To improve upon existing conditions which detract from the overall functioning of the corridor.

Objective 1: Develop a strong and positive image and appearance which establishes a unified image and sense of place which reinforces and supports commercial and economic activities along the corridor.

Objective 2: Create a system of on and off street parking facilities which adequately serve the needs of commercial uses within the corridor in a safe and functional manner.

Objective 3: Promote a safe and effective traffic circulation system which adequately accommodates the varied types of traffic movement utilizing the corridor.

Objective 4: That development activities within the corridor be compatible with adjacent non residential and residential uses.



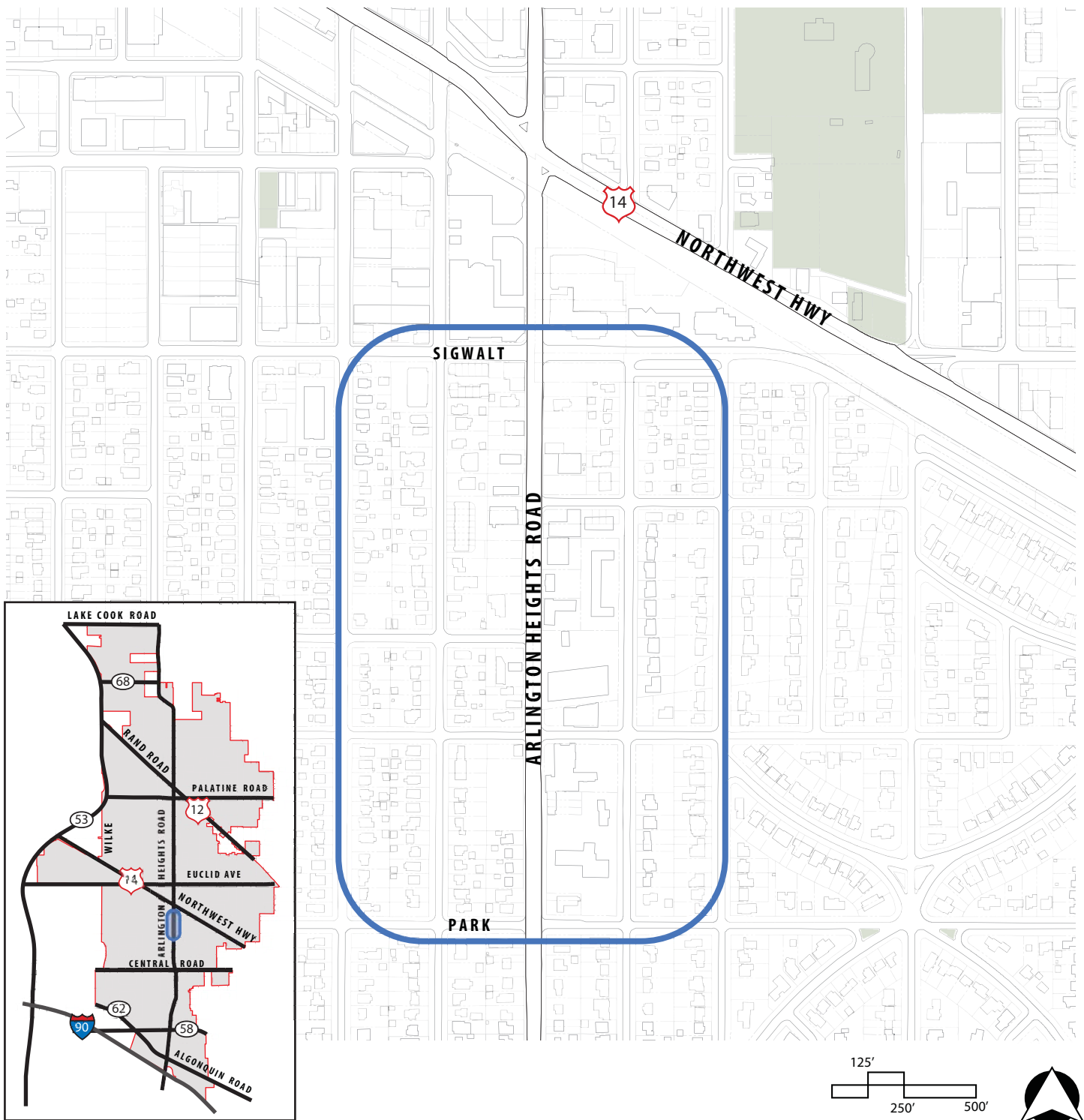
Corridors



Corridor Priorities, Characteristics and Key Issues

The five corridors have been assigned a priority level of either 1, 2 or 3 based on a review of existing conditions for each corridor. The chart below provides an overview of each corridor and the recommended priority level for each. The following pages provide a more detailed map for each corridor as well as images and key issues. Detailed studies for each corridor should be developed according to the priority level assigned.

Corridor	Priority Level	Characteristics	Zoning	Comp Plan
A.				
Arlington Heights Road: Sigwalt to Park	1	4 lanes with center turn lane; - Buildings close to street, 1 to 2 floors height; - narrow sidewalks; - West side lot depth small.	B-2	Commercial High Density MF Single Family
B.				
Arlington Heights Road: Central to White Oak	2	- lack of landscaping older commercial; - minimal depth for landscaping; - multiple sign poles; - multiple traffic lanes; - Mostly 1 floor buildings.	B-1; B-2; OT	Commercial; Offices Only
C.				
Arlington Heights Road: I-90 to Noyes	3	- Large roadway pavement 6-9 lanes; - Overhead utilities; - Lack of identity; - Buildings various setbacks, 1 to 5 floors height.	B-2; B-3; OT	Commercial; Offices Only STAR Line Plan
D.				
Rand Road: Hintz to Oakton	3	- Vast right of way Rand Road; - subject to current corridor study; - Mostly Commercial, but Multi Family to west; - Multiple driveways; - Haphazard border to east with Prospect Heights.	B-1, B-2, B-3 R-6; OT	Commercial Moderate Density MF Offices Only Teska Study
E-1.				
Northwest Highway East: Arlington Heights Road to Waterman	1	4 lanes' with turn lanes at certain cross streets; - mix of old and new; - older building close to street; - lack of landscaping. - mostly 1 floor, 2 to 3 floors for MF	B-2; B-3; R-6	Hickory Kensington Plan Rec Park Expansion Plan Commercial; Offices Only Parks Moderate Density MF
E-2.				
Northwest Highway West: Chestnut to Wilke	1	- Newer development well landscaped; - older auto repair sites lack of landscaping; - UP railroad ROW storage area east of Euclid poor visually. - Commercial 1 floor, auto repair; MF 2 floors	B-2; B-3 R-3; R-6	Commercial Moderate Density MF Single Family



Corridor A

Arlington Heights Road : Sigwalt to Park

Corridors

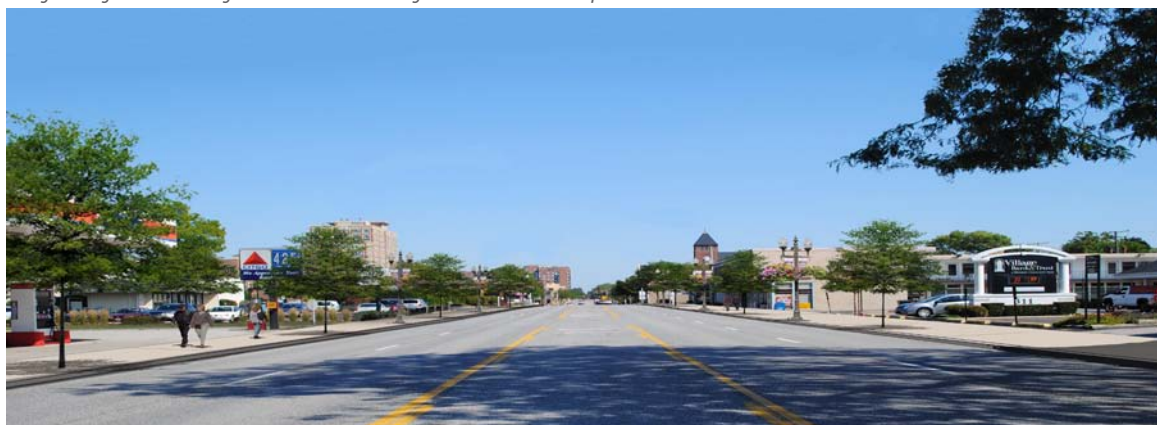
Corridor A: Arlington Heights Road: Sigwalt to Park

Key Issues:

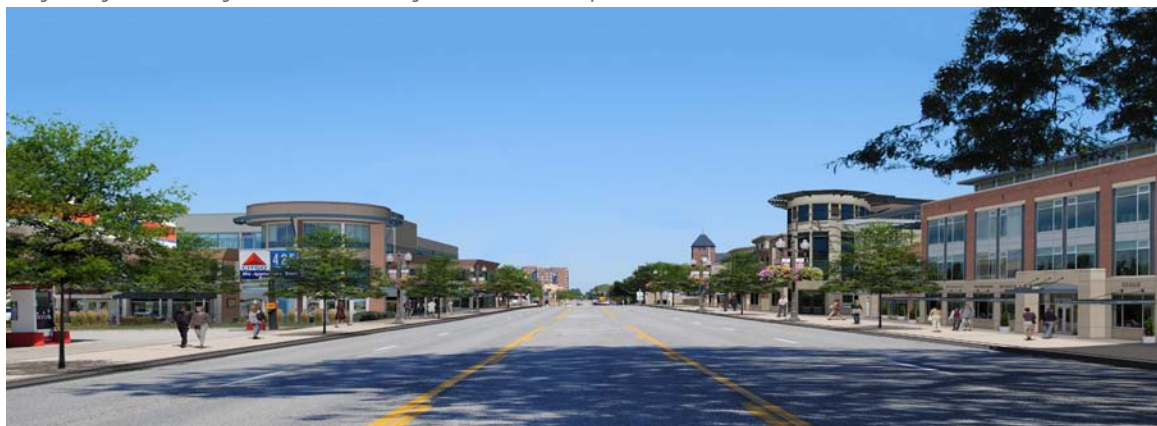
- Gateway into Downtown
- Lack of depth of certain lots limits redevelopment opportunities.
- Improve landscape screening of parking areas/poor condition of some parking areas.
- Sidewalk location adjacent to roadway not pedestrian friendly.



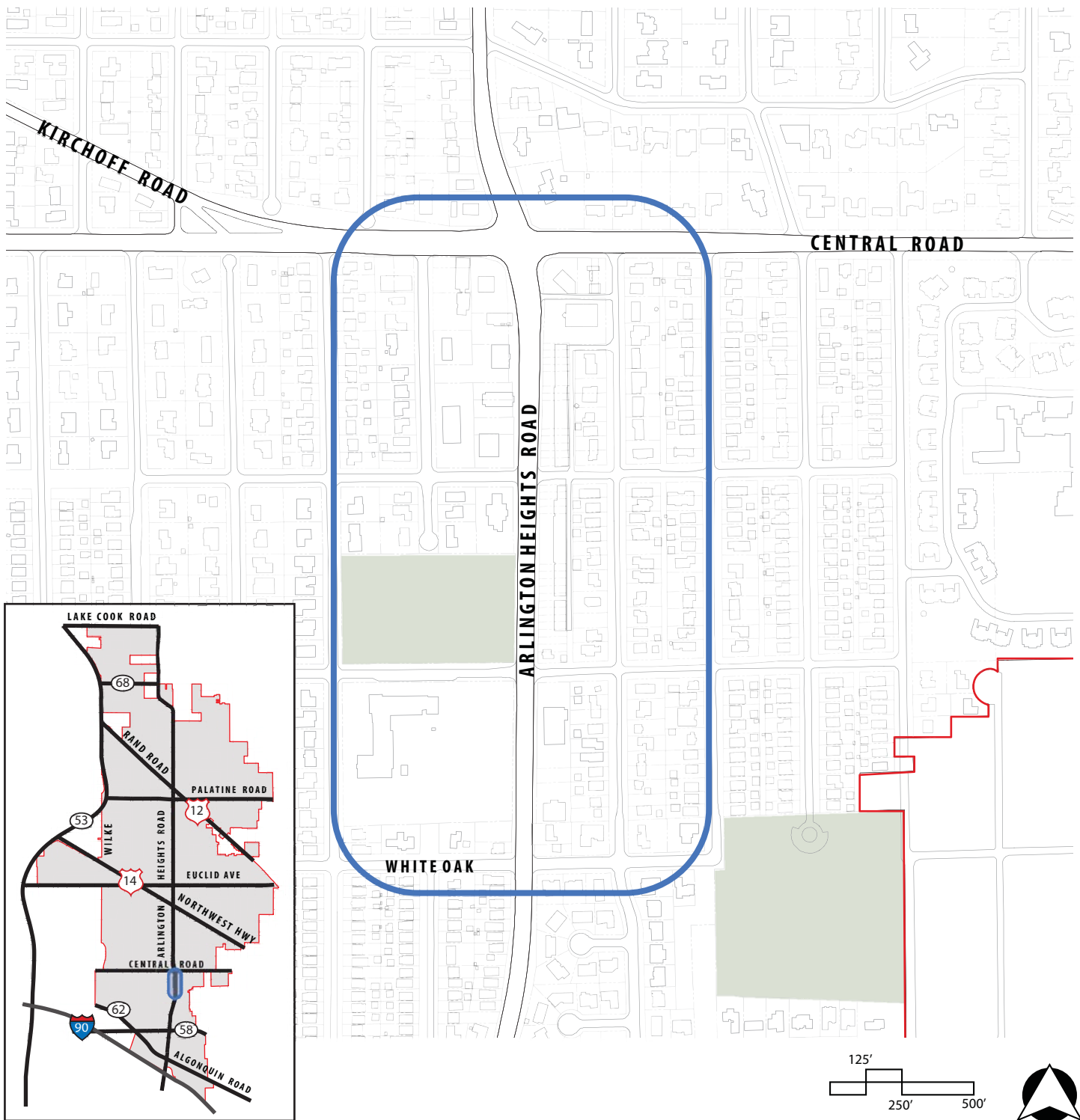
Arlington Heights Road and Sigwalt Corridor - Credit: Fregonese Associates-Conceptual Enhancements



Arlington Heights Road and Sigwalt Corridor - Credit: Fregonese Associates-Conceptual Enhancements



Arlington Heights Road and Sigwalt Corridor - Credit: Fregonese Associates-Conceptual Enhancements



Corridor B
Arlington Heights Road: Hintz to Oakton

Corridors



Corridor B: Arlington Heights Road: Central to White Oak

Key Issues:

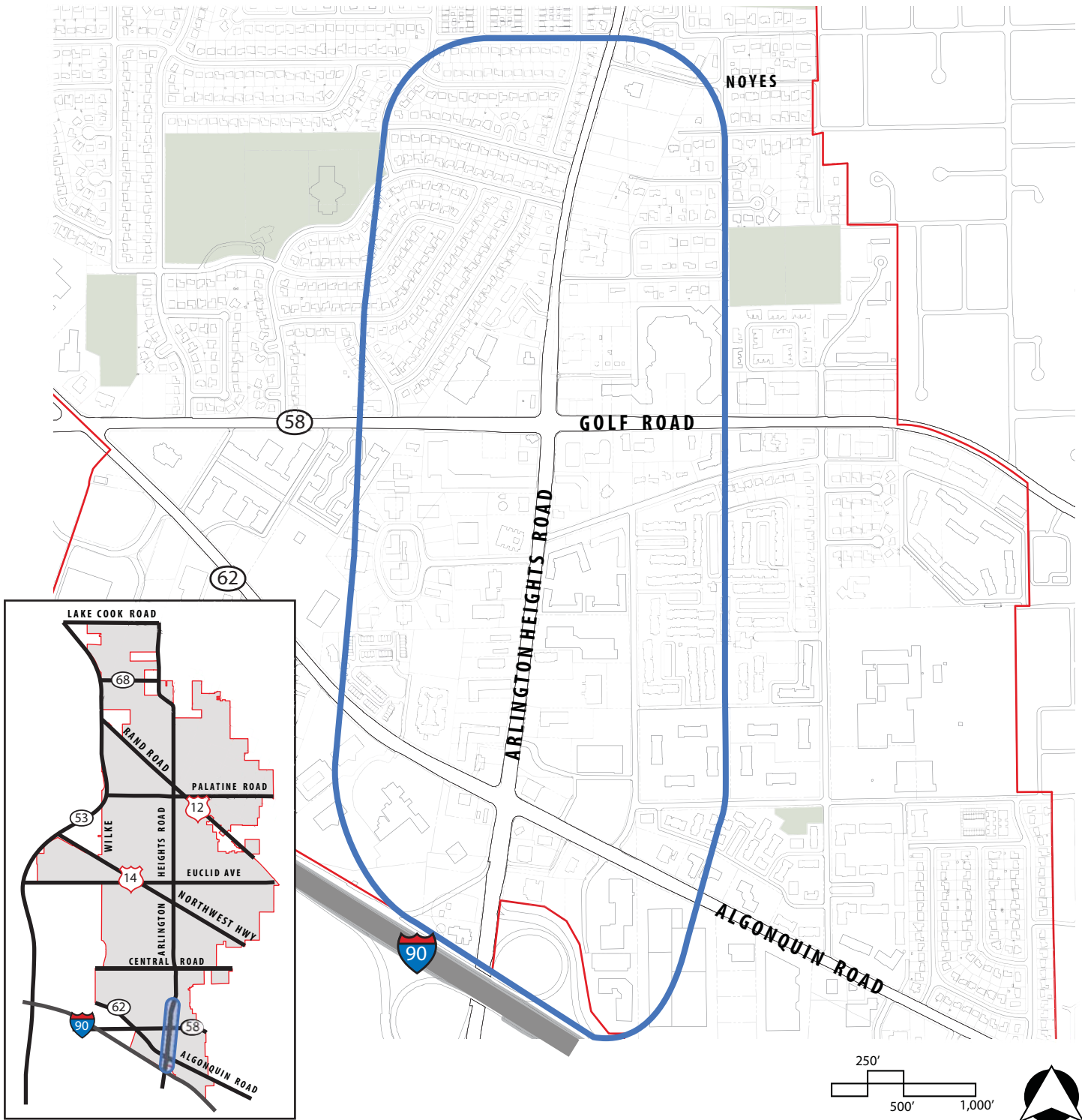
- Lack of landscape screening of parking areas.
- Multiple pole signs, degree of sign blight.
- Multiple commercial driveways along east side of roadway.



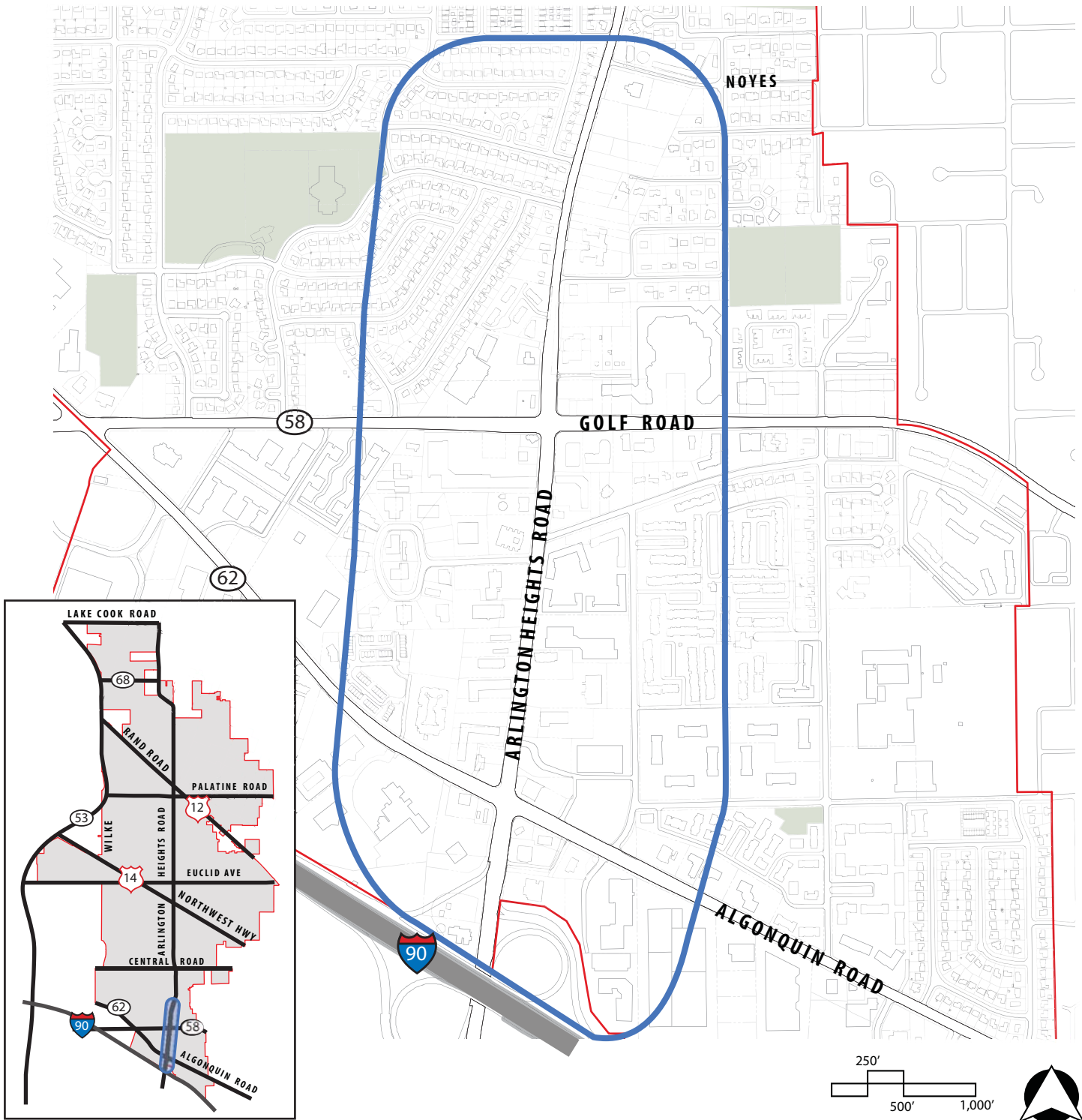
Existing Conditions



Proposed Enhancements



Corridor C
Arlington Heights Road: I-90 to Noyes



Corridor C
Arlington Heights Road: I-90 to Noyes

Corridors

Corridor C: Arlington Heights Road: I90 to Noyes

Key Issues:

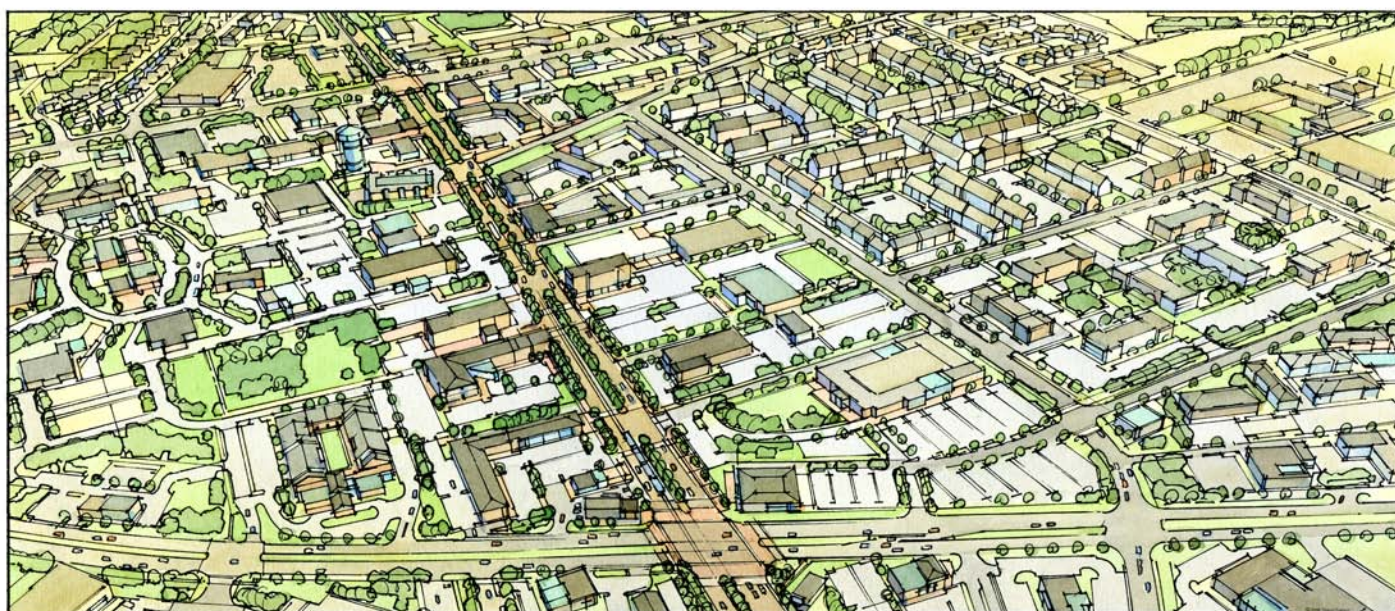
- Gateway into Village of Arlington Heights
- Loss of greenery when Arlington Heights Road was widened from I90 to Golf Road
- Overhead utility lines along west side of roadway from I90 to Golf Road
- Potential for redevelopment of larger sites such as the former Wellington site

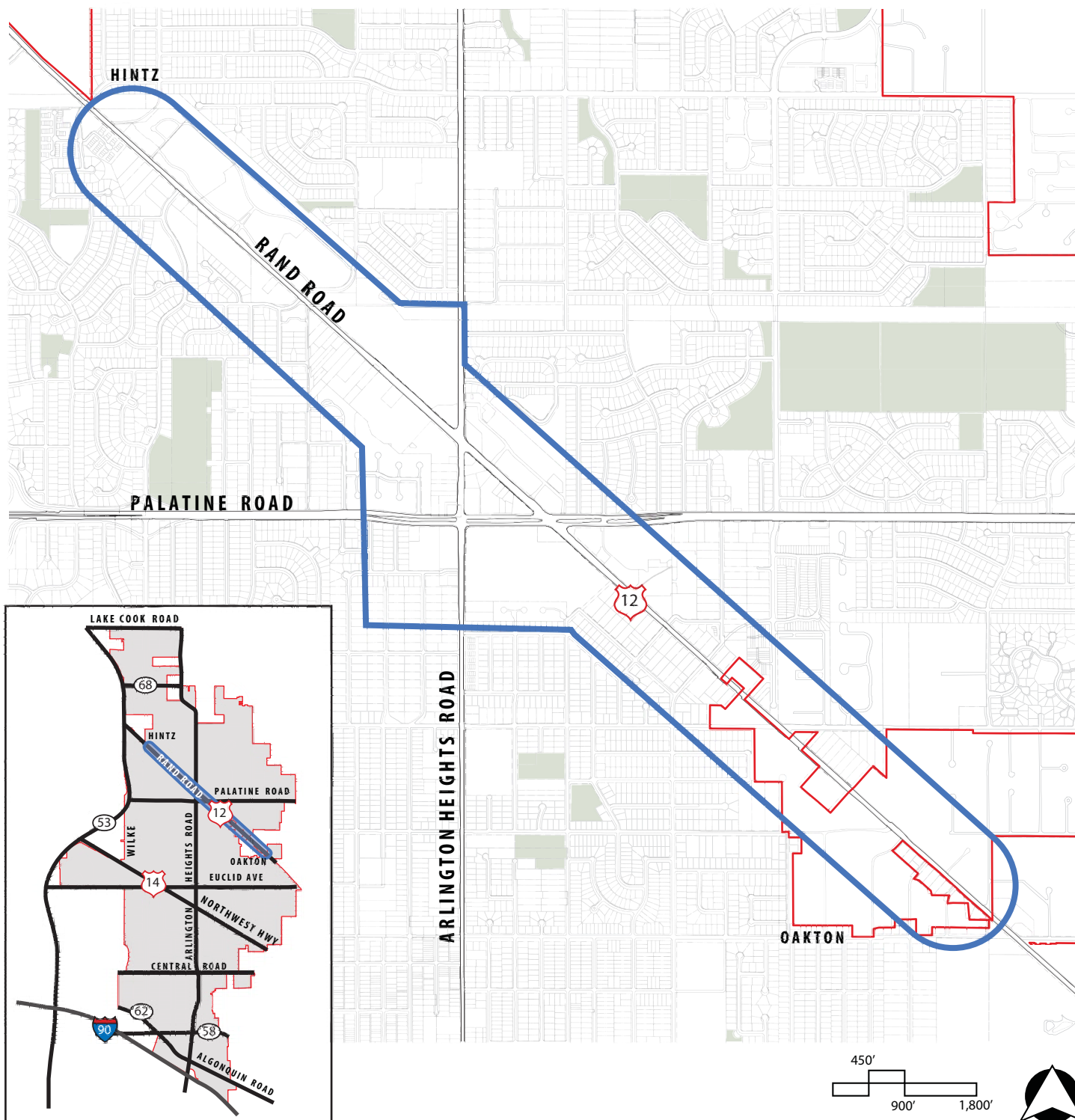


Existing Conditions



Proposed Enhancement





Corridor D
Rand Road: Hintz to Oakton

Corridors



Corridor D: Rand Road: Hintz to Oakton

Key Issues:

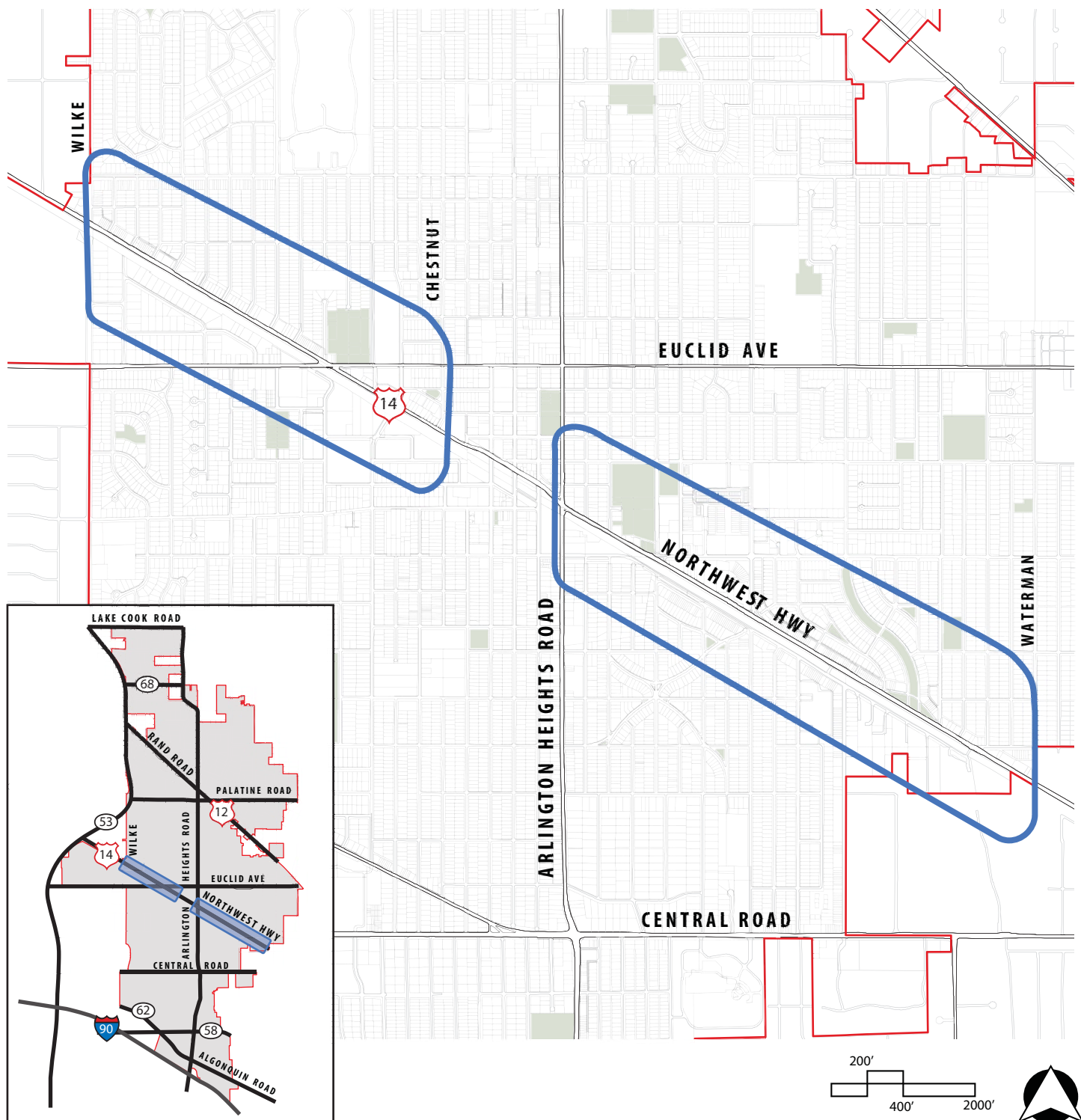
- Circuitous Boundary with City of Prospect Heights east end of Rand Road
- Corridor improvements study underway by Teska Associates
- Important commercial corridor and economic engine containing significant amount of the Village's retail shopping space
- Includes TIF District's #3 and #5

Existing Conditions



Proposed Enhancements





Corridor E
Northwest Highway: Arlington Heights Road to Waterman
& Chestnut to Wilke

Corridors



Corridor E: Northwest Highway: Arlington Heights Road to Waterman, Chestnut to Wilke

Key Issues:

- Screening of UPRR Maintenance Area near Euclid Avenue
- Includes Redevelopment of Hickory Kensington TIF District
- Impacts of Auto related uses on nearby residential
- Enhanced landscaping along the UPRR tracks



Existing Conditions



Proposed Enhancement



General Corridor Design Principles

For many visitors to Arlington Heights, roadway corridors influence first impressions of the Village.

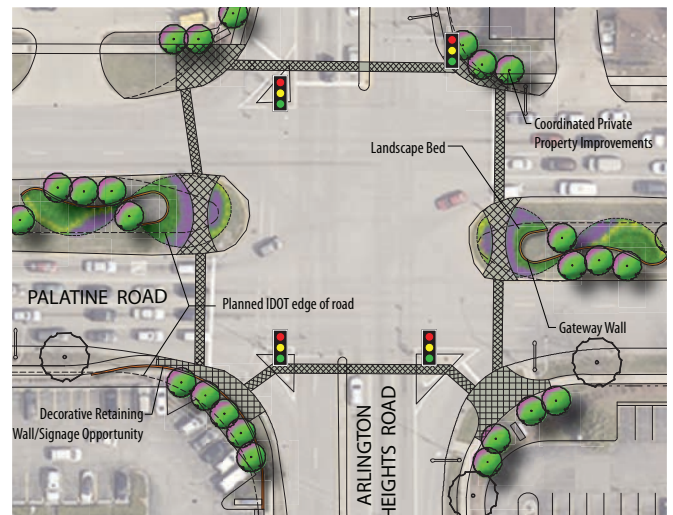
As the Village considers future corridor development, critical design principles should be considered.



Public Improvements

Intersections and Gateway Signage:

All signalized intersections should be improved to promote safe pedestrian and bike crossings. Gateway Signage can help identify districts within the Corridors and provide a unified community character throughout the Village.



Intersection improvements may include new ADA access and decorative textured crosswalks. (image credit: Teska Associates)



Intersection improvement may include pedestrian refuge islands, decorative textured crosswalks and LED street signs. (image credit: Teska Associates)

Corridors

Private Improvements

Perimeter Landscape Buffer:

This area includes the perimeter landscape buffer between parking lots and the ROW. The following guidelines provide landscape treatments that can be applied along the Corridor to create a consistent landscape character.

Internal Pedestrian Access:

These guidelines address pedestrian access from the ROW to the building entrances of commercial properties to ensure proper pedestrian access and safety is provided.



Photo example of a wide perimeter landscape buffer



Continuous walks through parking lots to commercial entrances



Photo example of a narrow perimeter landscape buffer

Sustainability

Chapter Contents: Introduction, Energy Efficiency, Land Use Policies and Actions, Transportation Actions, Housing and Building Actions, Sustainable Practices

Introduction

Sustainability is based on a simple principle: Everything that we need for our survival and well-being depends, either directly or indirectly, on our natural environment. Sustainability creates and maintains the conditions under which humans and nature can exist in productive harmony, that permit fulfilling the social, economic and other requirements of present and future generations.

Sustainability is important to making sure that we have and will continue to have, the water, materials, and resources to protect human health and our environment. In our own communities, be it school, workplace, home or the town we live in, we need to take ownership of our environment and the stewardship of future development.

To that end, the Village should encourage sustainable development for new and renovated commercial and residential projects by developing a public awareness / education strategy and use of incentives to encourage sustainable development. Sustainable development encourages more efficient use of land and resources such as water, energy, and waste disposal. As such, sustainable development strategies should focus on these three elements:

- Water / Storm Water Conservation
- Energy Efficiency;
- Waste Disposal.

The Village has adopted sustainable goals to guide the Village as part of its Energy Efficiency and Conservation Strategy. These goals are articulated on pages 83 & 84.

Chapter Contents:



Sustainable Practices



Energy Efficiency and Conservation



Land Use Policies to Promote Sustainability



Land Use Actions Towards Sustainability



Transportation Actions Towards Sustainability



Housing and Building Actions Towards Sustainability

Sustainability

Sustainable Practices

Redeveloping in an existing urban area has less impact on the region than sprawl, therefore it is environmentally beneficial to locate new development in urbanized areas utilizing existing infrastructure. This sustainable development practice of in-fill development helps limit sprawl and preserve natural land. The redevelopment of urban areas helps restore, invigorate and sustain established urban living patterns, creating a more stable and interactive community.

As an example, sustainable or Smart Growth principles are applied in the Village downtown. Many destinations are accessible within a half mile radius, such as parks, grocery stores, the commuter train station, and various types of housing and are easy to walk or bike to. As such, Arlington Heights was named a transit friendly community by the DePaul Chaddick Institute.

There are several examples of sustainable practices that the Village should promote and encourage through regulations and incentives. These practices include the following:

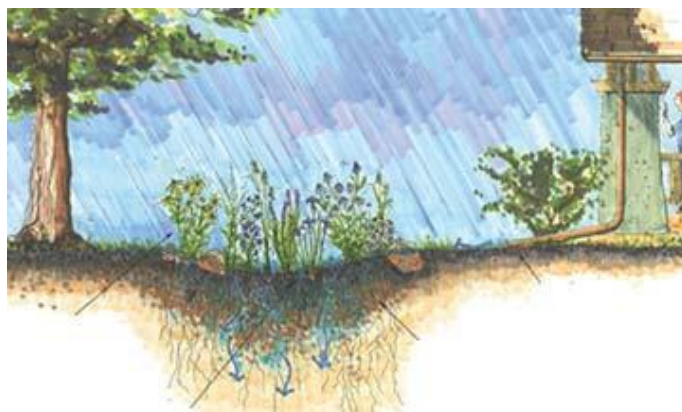
- Renewable Energy
- Storm Water Management
- Use of Building Materials

Stormwater Management Practices

Minimizing runoff helps prevent rainwater from washing off your yard into storm sewers and retention ponds and eventually into nearby streams and lakes. A few steps that can be taken to reduce runoff include the following:

Minimize impervious surfaces on your property

Pervious Pavers provide a solid ground surface, strong enough to take heavy loads, like large vehicles, while at the same time they allow water to filter through the surface and reach the underlying soils. The voids in the surface of the paving allow water to drain through and into the soil beneath. Pervious pavers reduce the amount of storm water runoff entering our natural waterways and carrying with it contaminants and pollutants.



Stormwater Management Practices

Create a Rain Garden or Bio-swale

A rain garden or bio-swale is a planted depression that allows rainwater runoff from roofs, driveways, walkways, and parking lots, the opportunity to be absorbed. A rain garden or bio-swale reduces rain runoff by allowing storm water to soak into the ground. Native plants are recommended for rain gardens and bio-swales because they generally do not require fertilizer and are more tolerant of one's local climate, soil, and water conditions, and attract local wildlife such as native birds. The plants — a selection of wetland edge vegetation, such as wildflowers, sedges, rushes, ferns, shrubs and small trees — take up excess water flowing into the depression. Water filters through soil layers before entering the groundwater system. Root systems enhance infiltration, maintain or even augment soil permeability, provide moisture redistribution, and sustain diverse microbial populations involved in bio-filtration.



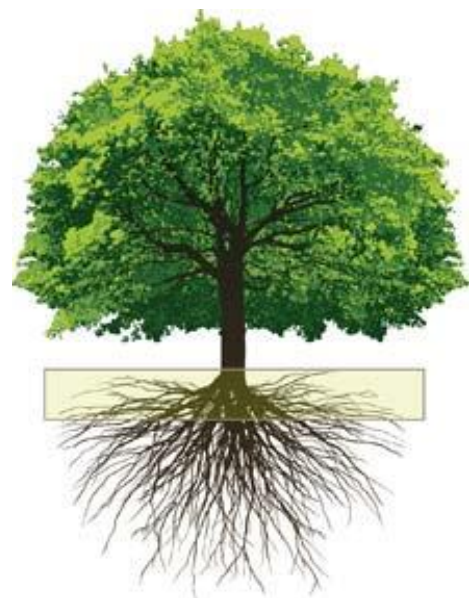
Utilize Rain Barrels

Rain barrels help slow down rain runoff so it can drain naturally into the ground. That helps keep excess water out of the sewer systems and keeps rain runoff from collecting pollutants as it travels to drainage systems and nearby waterways. Rain barrels also provide water during dry weather.

Plant Trees Trees' immense root systems effectively absorb water over a large area.

For every 5% of tree cover area added to a community, run-off is reduced by approximately 2%. (Source: Identified Benefits of Community Trees and Forests, by Dr. Rim D. Coder, University of Georgia)

By implementing the above simple steps water runoff can be reduced. Even the smallest change can make a positive impact.



Sustainability

Renewable Energy Practices

Renewable energy is a term used to describe energy that is derived from resources, like the sun and the wind – resources that are continually available to some degree or other all over the world. We never run out of them. And their use or capture does not inflict any material damage on the environment.

Go to American Council on Renewable Energy at www.acore.org to learn more.

Solar Energy

Solar technologies are broadly characterized as either passive or active depending on the way they capture, convert and distribute sunlight. Active solar techniques use photovoltaic panels, pumps, and fans to convert sunlight into useful outputs. Passive solar techniques include selecting materials with favorable thermal properties, designing spaces that naturally circulate air, and referencing the position of a building to the Sun.

Installing a solar system could offset the electrical consumption by 50% or more depending on the orientation of your home and the available sunlight.

U.S. Energy Information Administration

Passive Solar:

A passive solar building makes use of proper orientation to provide day lighting and natural cooling. In the Midwest the optimal orientation of a building is to the south. Some examples of passive solar are: Using a south facing orientation; Sun shades or brise-soleils over openings and windows; Use of natural air flows and temperature gradients for ventilation and cooling; Landscaping for shade and cooling.

Operable windows, whole house fans Trombe wall or Thermal Storage (exposing masonry surfaces to the cool night sky and insulating these surfaces from outside air during the day. As daytime temperatures rise, the cooler surface acts as a heat sink for the living space.)

Buildings that take advantage of solar building design are less dependent on fuel cost variations and can maintain comfort.

Active Solar:

This refers to the use of collectors, usually located on the roof to collect solar radiation to heat water for domestic uses and possibly, to provide auxiliary heating in the winter months. The systems that provide both hot water and heat are often referred to as combi-systems. An example of an active solar system is the Photovoltaic Systems (PV).

Photovoltaic Systems (PV):

PV systems generate electricity. The PV system may be on the building's roof, integrated into its overhangs, or provide the skin for the building's façade or atrium. Distributed power is PV generated power that is fed into the utility's grid.

In the Northwest Suburbs, 100,000 sf of solar panel surface area could generate enough electricity for about 1,058 homes.

U.S. Department of Energy



Solar Farm in Illinois; Use of Solar for Light Solar Panels on Village Banners and Bike Shelter

Renewable Energy Practices Continued

The Village has been employing the use of solar energy for gateway signs, gateway banners in the downtown and most recently the bike shelter. The bike shelter near the train station with its solar panels produces enough energy to light the adjacent park, and was funded by a grant through the Illinois Clean Energy Foundation.

To learn more on solar energy go to Illinois Solar Association at www.illinoissolar.org.

Geothermal:

The term geothermal means earth, and therme, meaning heat, thus geothermal energy is energy derived from the natural heat of the earth. Energy can be extracted without burning a fossil fuel such as coal, gas, or oil. There are three main types of geothermal systems in use today, Dry Steam, Flash Steam and Binary Cycle. This source is almost an unlimited amount of heat generated by the Earth's core.

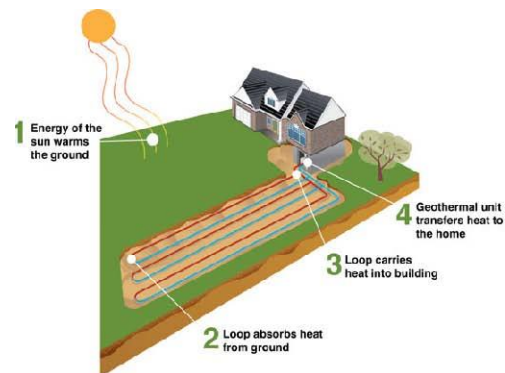
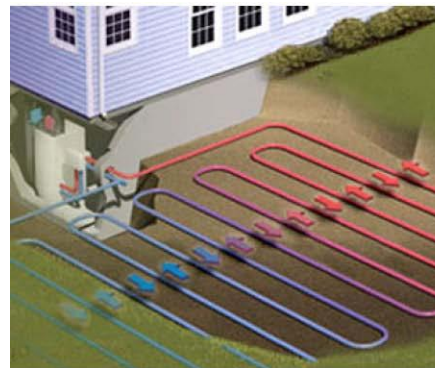
Direct Use of Geothermal Energy:

Hot water near the surface of the Earth can be used for heat for a variety of commercial and industrial uses. Direct-use applications include heating buildings, growing plants in greenhouses, drying crops, heating water at fish farms, and several industrial processes such as pasteurizing milk.

Binary Cycle:

In the binary system, the water from the geothermal reservoir is used to heat another "working fluid," which is vaporized and used to turn the turbine/generator units. The geothermal water and the "working fluid" are each confined in separate circulating systems or "closed loops" and never come in contact with each other. The advantage of the binary cycle plant is they produce no air emissions.

To learn more about geothermal energy go to www1.eere.energy.gov



Horizontal Geothermal System Source: U.S. Department of Energy

Sustainability

Renewable Energy Practices Continued

Wind Energy Technologies:

Wind energy (or wind power) refers to the process by which wind turbines convert the movement of wind into electricity. Winds are caused by the uneven heating of the atmosphere by the sun, the irregularities of the earth's surface, and rotation of the earth. Wind turbines convert the kinetic energy of the moving wind into electricity. The wind turns the turbine's blades, which spin a shaft connected to a generator to make electricity.

Wind energy technologies use the energy in wind for practical purposes such as generating electricity, charging batteries, pumping water, and grinding grain. Stand-alone turbines are typically used for water pumping or communications.

The Village has an energy aggregation program through Integrys Energy for the purchase of renewable energy, with an opt out option. A participating resident can save 42% off their current electric supply. In addition to the savings, Arlington Heights residents ensure that fees paid by participants for electricity generation go to purchase 100% renewable energy credits, or "green energy". Residents can review information on Integrys and electric aggregation by clicking Integrys Energy on the Village website at www.vah.com.

Types of Wind Turbines:

Modern wind turbines fall into two basic groups: the horizontal-axis variety, as shown in the photo, and the vertical-axis design, like the eggbeater-style Darrieus model, named after its French inventor.

Horizontal axis turbines are the most common turbine configuration used today. They consist of a tall tower, atop which sits a fan-like rotor that faces into or away from the wind, a generator, a controller, and other components. Most horizontal axis turbines built today are two-or three-bladed.

Thomas Middle School in Arlington Heights has a horizontal axis turbine installed on the school property. Although the main purpose of the wind turbine is educational, on a windy day the turbine generate 2.4 kilowatts of energy or roughly enough electricity to power two and a half classrooms.

The Darrieus turbine was invented in France in the 1920s. Often described as looking like an eggbeater, it has vertical blades that rotate into and out of the wind. Using aerodynamic lift, it can capture more energy than drag devices.

The Savonius turbine is S-shaped if viewed from above. This drag-type turbine turns relatively slowly but yields a high torque. It is useful for grinding grain, pumping water, and many other tasks, but its slow rotational speeds are not good for generating electricity.

Recently in 2011 the Village Board approved regulations for Solar and Geothermal systems for residential and non-residential zoning districts. The regulations may be found in Chapter 28 of the Village Zoning Code. To see what is allowable go the Zoning Code on the Village website at www.vah.com.

To learn more on wind energy go to Illinois Wind Association, www.illinoiswind.org.



U.S. Department of Energy

Building Materials Practices

Green building materials are composed of renewable, rather than nonrenewable resources. Green materials are environmentally responsible because impacts are considered over the life of the product. Green materials should meet some of the criteria below:

- Recycled Content are products with identifiable recycled content.
- Natural, plentiful or renewable are Materials harvested from sustainably managed sources.
- Locally available are building materials found locally or regionally.
- Salvaged, refurbished, or remanufactured: Includes saving a material from disposal and renovating, repairing, restoring, or generally improving the appearance, performance, quality, functionality, or value of a product.
- Reusable or recyclable: Select materials that can be easily dismantled and reused or recycled at the end of their useful life.
- Durable: Materials that are longer lasting or are comparable to conventional products with long life expectancies.

A few examples of the types of green building materials include:

- Green carpets and area rugs are low-emitting and made from natural fibers (e.g., wool, jute) or with a high content of recycled synthetic fibers.
- Bamboo flooring is a renewable resource that is a fast-growing grass that can be selectively harvested annually. Look for bamboo products that are FSC certified and have no formaldehyde added.
- Linoleum flooring consists of renewable ingredients that often include recycled content and the lifespan can be as high as 30-40 years.
- Paints that use water as the carrier rather than petroleum-based solvents, have lower VOC levels than oil-based paints and they can also be “recycled” by combining any excess; oil paints cannot be recycled in this way.

Sustainability

Building Materials Practices Continued

Insulation:

Heating and cooling account for 50 to 70% of the energy used in the average American home. Inadequate insulation and air leakage are leading causes of energy waste in most homes. Insulation:

- saves money.
- makes your house more comfortable by helping to maintain a uniform temperature.
- makes walls, ceilings, and floors warmer in the winter and cooler in the summer.

Windows:

You can use the energy performance ratings of windows, doors, and skylights to tell you their potential for gaining and losing heat, as well as transmitting sunlight into your home.

Lighting:

The most common energy-efficient lighting types include energy-saving CFLs, and LEDs. These bulbs are more energy-efficient than traditional incandescent bulbs.

CFLs — about 75% energy savings

Compact fluorescent lamps (CFLs) are simply curly versions of the long tube fluorescent light bulbs. An ENERGY STAR-qualified CFL uses about one-fourth the energy and lasts ten times longer than a comparable incandescent bulb that puts out the same amount of light.

LEDs — about 80% – 85% energy savings

The light emitting diode (LED) uses the same technology as the little indicator light on your cell phone, but designed to light your home. It is one of today's most energy-efficient and rapidly developing technologies. LED's last up to 25 times longer than the traditional incandescent bulbs they replace. While LEDs are more expensive at this early stage, they still save money because



If every American home replaced just one light bulb with a light bulb that's earned the ENERGY STAR, we would save enough energy to light 3 million homes for a year, save about \$600 million in annual energy costs, and prevent 9 billion pounds of greenhouse gas emissions per year, equivalent to those from about 800,000 cars.

Source: Energystar

Appliances:

Look for appliances with an ENERGY STAR rating. Energy efficient choices can save families about a third on their energy bill with similar savings of greenhouse gas emissions, without sacrificing features, style or comfort. To learn more go to www.energystar.gov.

Americans, with the help of ENERGY STAR, saved enough energy in the past year to avoid greenhouse gas emissions equivalent to those from 33 million cars — all while saving nearly \$18 billion on their utility bills.

www.energystar.gov

Heating and cooling account for about 56% of the energy use in a typical U.S. home, making it the largest energy expense for most homes.

Source: EPA.gov



Energy Efficiency and Conservation Goals

1. To link transportation and land use in order to enhance transit options for residents and the labor force.
2. To promote and encourage energy efficiency for residential and commercial buildings.
3. Encourage the use of renewable energy and resources such as solar, wind, geothermal, and bio fuels.
4. Continue to promote and encourage both residents and businesses to reduce waste and increase recycling.
5. To optimize tree planting and protection of existing trees for maximum carbon reduction and to increase water conservation measures.
6. Keep abreast of new policies and research regarding energy efficiency and provide support for local, state, and Federal efforts to promote energy conservation measures.
7. Educate and Promote using Public Relations to encourage energy conservation and support for the Village Energy Efficiency Conservation Strategy.

In addition to the overall Goals, the following sustainable policies and action items are recommended as they relate to land use and development of the community, transportation, and housing.



Land Use Policies to Promote Sustainability

1. Encourage alternatives to use of gas powered vehicles such public transit, alternatively fueled vehicles, bicycle and pedestrian routes, and bicycle and pedestrian friendly development design.
2. Encourage all types of development to use alternative renewable energy sources and meaningful energy conservation measures.
3. Encourage development and businesses to reduce the use of chemicals and synthetic compounds in their construction and building materials, operations, products, and services.
4. Encourage methods of landscape design and maintenance to reduce or eliminate the use of pesticides, herbicides, and synthetic fertilizers as well as encouraging the use of compost and conserving water.
5. Support compact and mixed use development that minimizes the need to drive, re-uses existing infill and brownfield sites, that avoids the extension of suburban sprawl.
6. Encourage participatory approaches to planning for sustainability, involving the local community in setting a vision and implementation.
7. Support Federal, State and Local programs to offer incentives for sustainable development and practices.

Sustainability



Land Use Actions Towards Sustainability

1. Compact development that minimizes the need to drive.
2. A mix of integrated uses such as housing, shops, work places, civic uses, within walking or bicycling distance.
3. Human scaled development that is pedestrian friendly.
4. Development oriented around public transit.
5. Home based occupations and work that reduce the need to commute.
6. Guiding development to existing developed areas thus minimizing development of outlying undeveloped areas.
7. Remediation and redevelopment of brownfield sites and other lands that suffer from environmental constraints.
8. Establish financial and regulatory incentives for infill development and eliminate disincentives.



Transportation Actions Towards Sustainability

1. Reduction in vehicle trips and miles through compact, infill, mixed use development.
2. Use of alternatives to driving including walking, bicycling, and public transit.
3. Local street designs that encourage pedestrian and bicycle use.
4. Street designs that support and enhance access between neighborhoods and to commercial areas.



Housing and Building Actions Towards Sustainability

1. Solar oriented design of development.
2. Minimize impervious surfaces to reduce storm water run-off.
3. Use of regenerative energy heating and cooling source alternatives.
4. Provision of housing near places of employment.
5. Selection of building materials which require less energy intensive production methods and long distance transport.

Public Input

Chapter Contents: Public Process, Community Survey

Public Process

Over the course of 11 months beginning in September, 2014, the Village's Comprehensive Plan Subcommittee, a subcommittee of the Plan Commission, met to discuss and provide direction on the new Comprehensive Plan. During this process, a Community Survey was conducted in order to obtain input on the Plan. The Subcommittee forwarded a draft of the Comprehensive Plan to the Plan Commission who held a public hearing in August, 2015. Prior to the public hearing, the draft plan was placed on the Village's web page to allow for public comment. The Plan was then considered by the Village Board in September, 2015.

Community Survey

A community survey was utilized to obtain public input issues related to growth and development, historic preservation, sustainable development, and improving corridors. The survey was posted on the Village's web page beginning April 6th, 2015 through July, 2015 and there were 535 responses. The Village promoted the survey through a posting on our Facebook and Twitter pages, and through the Park District, Library, Senior Center and Chamber of Commerce. Full results of the survey can be found at www.vah.com

A summary of certain questions is highlighted as follows:

The Village's current population is 75,101. Please indicate one of the following desired populations for the community 15 years from now in Year 2030.

70,000-75,000 (0% to 7% decline)	13%
75,001-80,000 (0% to 7% increase)	66%
80,001-85,000 (7% to 13% increase)	18%
85,001-90,000 (13% to 20% increase)	3%

Which of the following types of development would you like to see more of in the Village.

Restaurants	72%
Entertainment	70%
Mixed Use	48%

Public Input

How strongly would you support or oppose policies regarding growth in the Village.

	<i>Strongly Support/Support</i>	<i>Oppose/Strongly Oppose</i>
Policies the limit growth	45%	45%
Policies that pace growth in targeted areas	83%	12%
No policies, unlimited growth	13%	77%

Presently how satisfied or dissatisfied are you with the following aspects of the Village.

	<i>Strongly Satisfied/Satisfied</i>	<i>Dissatisfied/Strongly Dissatisfied</i>
The number of retail businesses	61%	38%
The overall appearance of your Neighborhood	88%	12%
The overall appearance of the Village	87%	13%
The amount of open space	74%	23%
The distribution of commercial and Residential property	81%	14%

Please indicate how you feel about the following statements.

	<i>Strongly Agree/Agree</i>	<i>Disagree/Strongly Disagree</i>
Older historic buildings in the Village should be preserved	91%	6%
The Village should improve the appearance of certain corridors along major roadways	90%	8%
The Village should encourage sustainable green development for new construction by encouraging energy efficient buildings that have less impact on the environment	85%	11%
Commercial Areas along some majorstreets lack landscaping	77%	15%
A decline in population is good for the community	11%	79%

Public Input

Please indicate the level of importance for each issue described below as it relates to the Village.

	<i>Very / Somewhat Important</i>	<i>Not Important</i>
Improving the appearance of the Village	93%	7%
Expand transportation options	69%	27%
Redevelopment of older commercial areas	92%	7%
Development that has less impact on the environment	77%	17%
Increase the tax base with new compact mixed use development	74%	17%
Providing more open space	70%	24%
Increase the number of jobs located in the Village	85%	11%

Public Input

(Page Intentionally Left Blank For Double-Sided Printing)



Appendix



CONTENTS



1	VILLAGE OF ARLINGTON HEIGHTS OFFICAL MAP	93
----------	---	-----------

(Page Intentionally Left Blank For Double-Sided Printing)

Arlington Heights

Cook County, Illinois

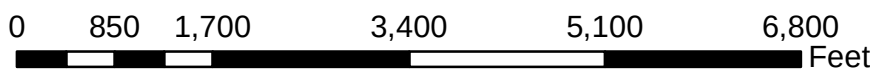
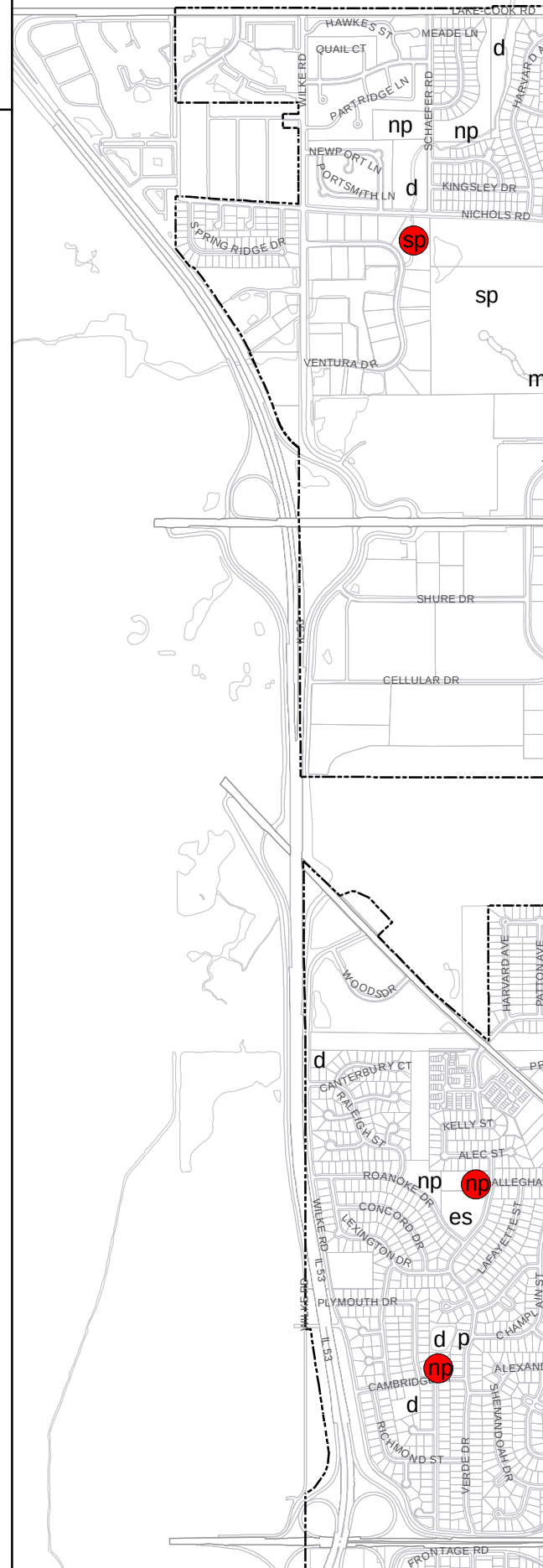
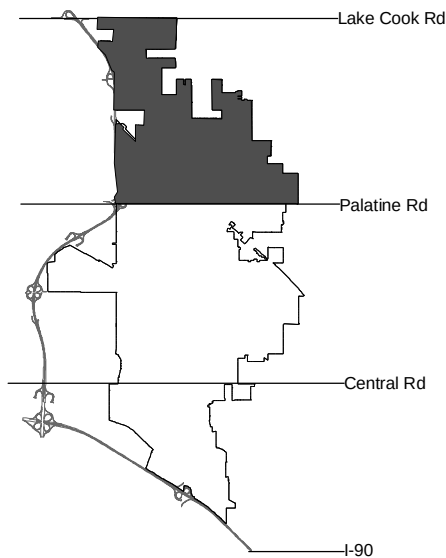
Official Map North

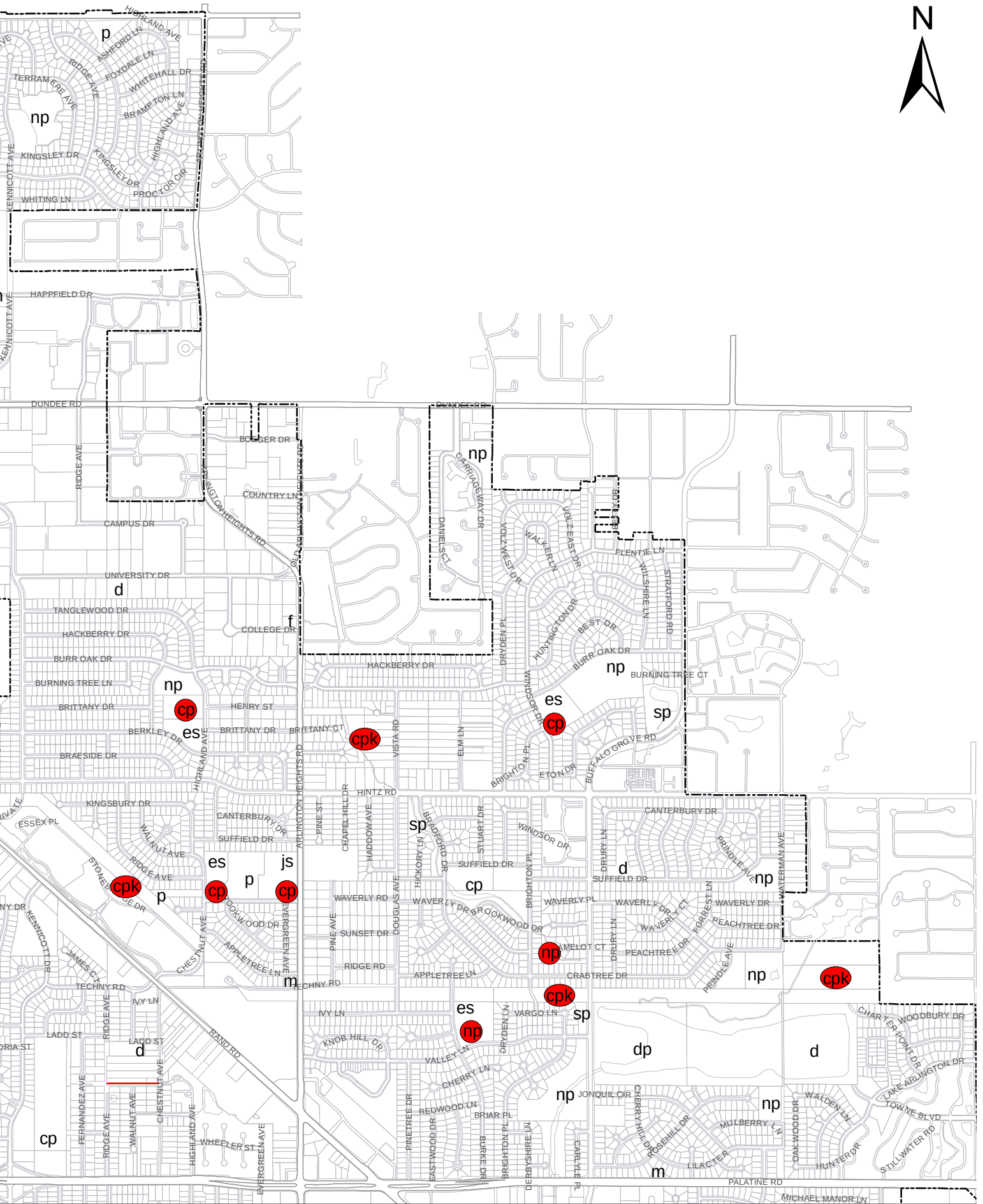
Existing

Proposed

es		ELEMENTARY SCHOOL
js		JUNIOR HIGH SCHOOL
hs		HIGH SCHOOL
u		UNIVERSITY
p		PLAYLOT
np		NEIGHBORHOOD PARK
cp		COMMUNITY PARK
sp		SPECIAL PURPOSE PARK
cpk		CONNECTOR PARK
dp		DISTRICT PARK
cc		COMMUNITY CENTER
f		FIRE STATION
d		DETENTION BASIN
h		HOSPITAL
l		LIBRARY
m		MUNICIPAL USE
g		OTHER GOVERNMENT USE

	EXPRESSWAY
	MAJOR ARTERIAL STREET 100 FT MINIMUM RIGHT-OF-WAY
	SECONDARY ARTERIAL STREET 80 FT MINIMUM RIGHT-OF-WAY
	CBD STREET
	COLLECTOR STREET 60-80 FT RIGHT-OF-WAY
	SUB-COLLECTOR STREET 66 FT MINIMUM RIGHT-OF-WAY
	LOCAL STREET 66 FT MINIMUM RIGHT-OF-WAY
	Proposed Street



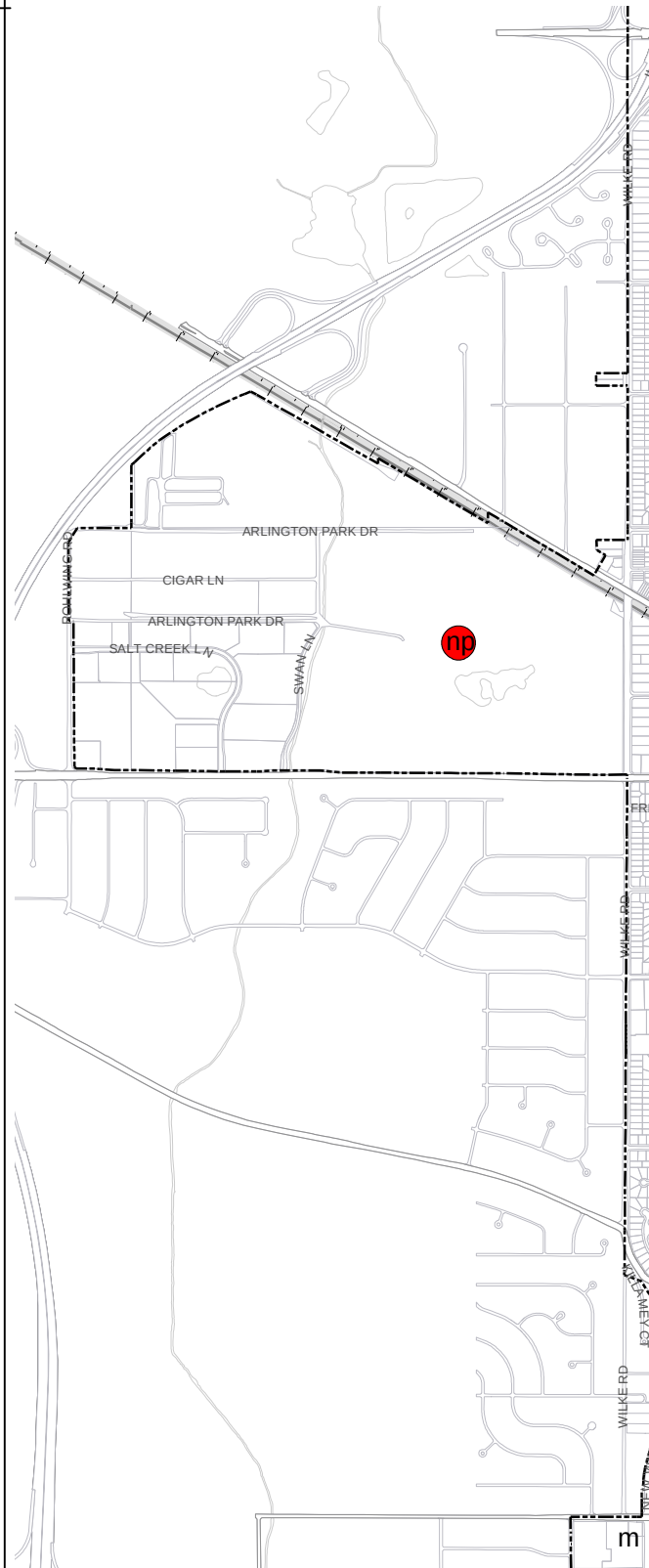
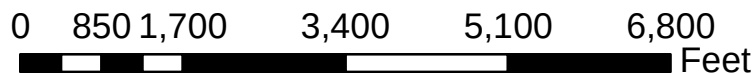
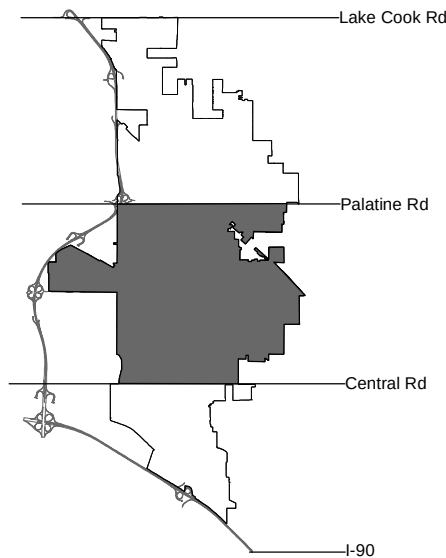


Arlington Heights

Cook County, Illinois

Official Map Central

Existing	Proposed	
es		ELEMENTARY SCHOOL
js		JUNIOR HIGH SCHOOL
hs		HIGH SCHOOL
u		UNIVERSITY
p		PLAYLOT
np		NEIGHBORHOOD PARK
cp		COMMUNITY PARK
sp		SPECIAL PURPOSE PARK
cpk		CONNECTOR PARK
dp		DISTRICT PARK
cc		COMMUNITY CENTER
f		FIRE STATION
d		DETENTION BASIN
h		HOSPITAL
l		LIBRARY
m		MUNICIPAL USE
g		OTHER GOVERNMENT USE
		EXPRESSWAY
		MAJOR ARTERIAL STREET 100 FT MINIMUM RIGHT-OF-WAY
		SECONDARY ARTERIAL STREET 80 FT MINIMUM RIGHT-OF-WAY
		CBD STREET
		COLLECTOR STREET 60-80 FT RIGHT-OF-WAY
		SUB-COLLECTOR STREET 66 FT MINIMUM RIGHT-OF-WAY
		LOCAL STREET 66 FT MINIMUM RIGHT-OF-WAY
		Proposed Street





Arlington Heights

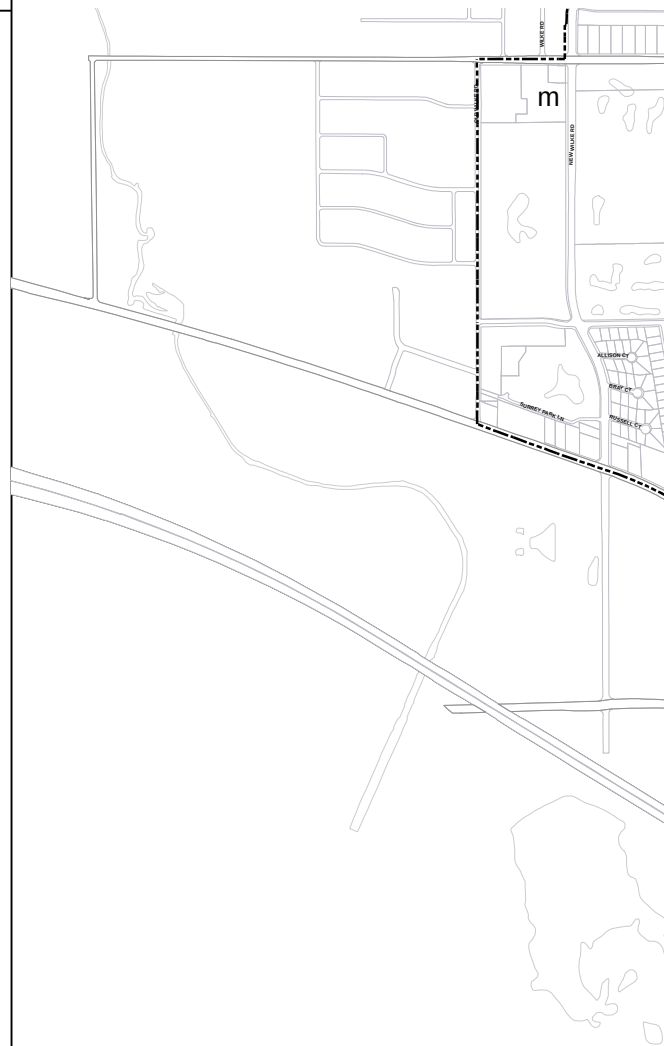
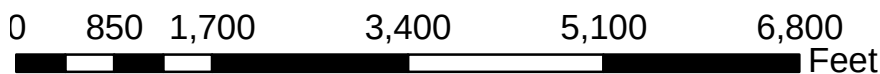
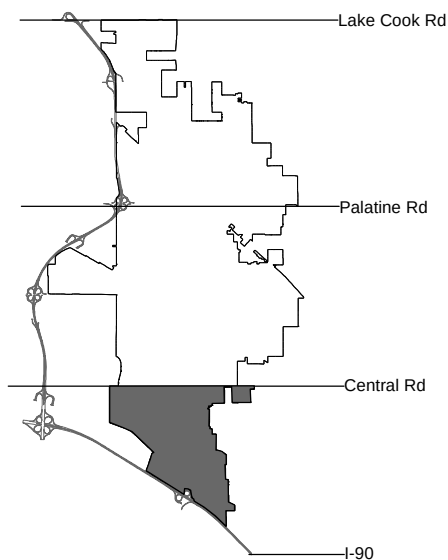
Cook County, Illinois

Official Map South

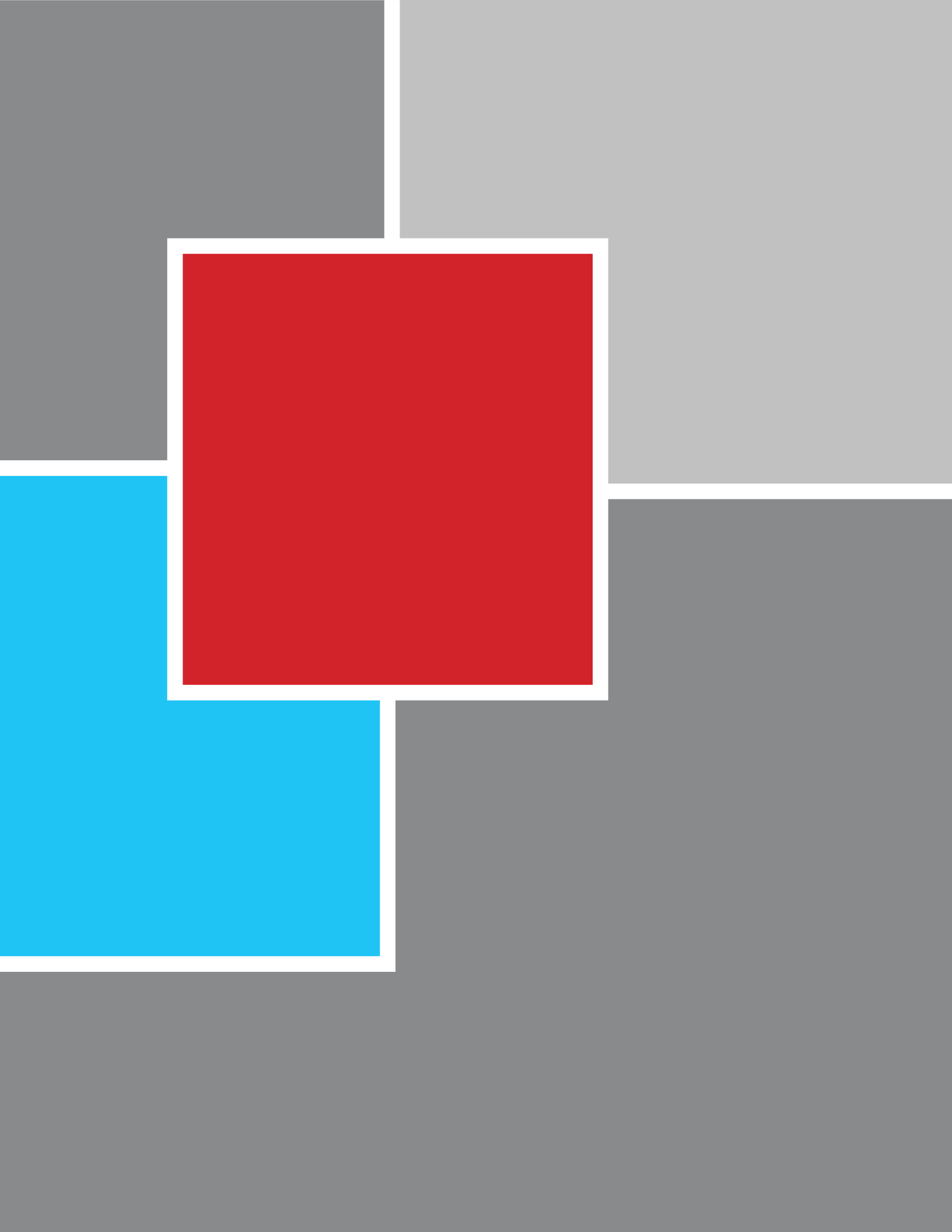
Existing

Proposed

es		ELEMENTARY SCHOOL
js		JUNIOR HIGH SCHOOL
hs		HIGH SCHOOL
u		UNIVERSITY
p		PLAYLOT
np		NEIGHBORHOOD PARK
cp		COMMUNITY PARK
sp		SPECIAL PURPOSE PARK
cpk		CONNECTOR PARK
dp		DISTRICT PARK
cc		COMMUNITY CENTER
f		FIRE STATION
d		DETENTION BASIN
h		HOSPITAL
l		LIBRARY
m		MUNICIPAL USE
g		OTHER GOVERNMENT USE
		EXPRESSWAY
		MAJOR ARTERIAL STREET 100 FT MINIMUM RIGHT-OF-WAY
		SECONDARY ARTERIAL STREET 80 FT MINIMUM RIGHT-OF-WAY
		CBD STREET
		COLLECTOR STREET 60-80 FT RIGHT-OF-WAY
		SUB-COLLECTOR STREET 66 FT MINIMUM RIGHT-OF-WAY
		LOCAL STREET 66 FT MINIMUM RIGHT-OF-WAY
		Proposed Street









Item: Ordinance - Chapter 28 Variation - Holy Nation Presbyterian Church

Department: Planning/Legal

An Ordinance Granting a Variation from Chapter 28 of the Arlington Heights Municipal Code
(Holy Nation Presbyterian Church, 2501 N. Chestnut Ave.)

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
Chapter 28 Variation - Holy Nation Presbyterian Church	Ordinance

AN ORDINANCE GRANTING A VARIATION FROM
CHAPTER 28 OF THE ARLINGTON HEIGHTS MUNICIPAL CODE

WHEREAS, the Plan Commission, in Petition Number 15-010, pursuant to notice, conducted a public hearing on September 16, 2015 for a variation from Chapter 28 of the Arlington Heights Municipal Code for the property located at 2501 N. Chestnut Avenue, Arlington Heights, Illinois; and

WHEREAS, the President and Board of Trustees have considered the report and recommendation of the Plan Commission and have determined that authorizing and granting the request, subject to certain conditions hereinafter described, would be in the best interests of the Village of Arlington Heights,

NOW, THEREFORE, BE IT ORDAINED BY THE PRESIDENT AND BOARD OF TRUSTEES OF THE VILLAGE OF ARLINGTON HEIGHTS:

SECTION ONE: That a variation from Chapter 28 of the Arlington Heights Municipal Code, Section 11.4, Schedule of Parking, is hereby granted to allow a reduction to the minimum number of parking spaces required from 308 parking spaces to 135 parking spaces, consisting of 62 existing parking spaces and 73 land-banked parking spaces, a variation of 173 spaces, for the property legally described as:

Lot 1 in Rand/Berkley School Subdivision, a subdivision of part of the West half of the Northwest quarter, of Section 42 North, Range 11, East of the Third Principal Meridian, in Cook County, Illinois, according to Plat of Subdivision recorded February 2, 1993, as Document 93085967.

P.I.N. 03-17-100-015-0000

commonly described as 2501 N. Chestnut Avenue, Arlington Heights, Illinois, in substantial compliance with the following plans submitted by the Petitioner:

The following plans have been prepared by K. H. Han and Architects, Inc.:

Existing Floor Plan, consisting of one sheet;

Room Schedule (Proposed Floor Plan), consisting of one sheet;
Proposed Floor Plan, consisting of one sheet;
Future Floor Plan, consisting of one sheet;
Room Schedule (Future Floor Plan), consisting of one sheet;
Existing Site Plan, consisting of one sheet;
Future Site Plan, consisting of one sheet;
Future Site Plan-Scheme 1, consisting of one sheet;
Future Site Plan-Scheme 2 (Phase 1), consisting of one sheet;
Future Site Plan-Scheme 2 (Phase 2), consisting of one sheet;
Future Site Plan-Scheme 3 (Phase 3), consisting of one sheet,

copies of which are on file and available for public inspection in the Village Clerk's office.

SECTION TWO: That the variation from Chapter 28 of the Arlington Heights Municipal Code granted by this Ordinance is subject to the following conditions, to which the Petitioner has agreed:

1. The Petitioner shall provide parking data and information for Glenkirk's ongoing operation at this site.
2. The maximum capacity shall not exceed 200 people.
3. If parking beyond what is provided for the church and its ancillary functions is insufficient as determined by the Village, the Petitioner shall have six months to install the land-banked parking and work with the Village to develop and implement a parking mitigation plan that may include, but shall not be limited to operation restrictions, further capacity limitations, and/or installation of additional parking accommodations elsewhere on site.
4. No overlapping services/events shall be permitted that negatively impact available parking.
5. The Petitioner shall work with the Park District to enter into a shared parking agreement to allow the public to park in the Petitioner's parking lot when church activities are not scheduled. The Petitioner shall work with the Village and Park District to implement shared parking lot expansion if deemed feasible.
6. The gymnasium space cannot be leased to an outside entity when the church is being used.
7. The Petitioner shall provide landscaping adjacent to the north parking lot on the north side. The landscaping shall be layered and include a mix of evergreen shrubs in order to provide a dense layered buffer between the parking area and the residential district.
8. The Petitioner shall maintain the landscaped "arboretum" area on the north end of the subject property.

9. New lighting shall be installed in the existing parking lot. All photometrics shall meet all Village requirements. All parking lot lighting shall have automatic timers that turn the lights off no later than one hour after the last scheduled event of the day.

10. If the parking lot is expanded towards the playground, appropriate fencing shall be installed as a safety precaution.

11. The Petitioner shall comply with all Federal, State, and Village codes, regulations, and policies.

SECTION THREE: That this Ordinance shall be in full force and effect from and after its passage and approval in the manner provided by law and shall be recorded by the Village Clerk in the Office of the Recorder of Cook County.

AYES:

NAYS:

PASSED AND APPROVED this 19th day of October, 2015.

Village President

ATTEST:

Village Clerk

MISCORD: Holy Nation Presbyterian Church



Item: Ordinance - Comprehensive Plan Amendment - 2501 N. Chestnut Ave.

Department: Planning/Legal

An Ordinance Amending the Comprehensive Plan of the Village of Arlington Heights
(2501 N. Chestnut Avenue)

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
Comprehensive Plan Amendment - 2501 N. Chestnut Ave.	Ordinance

AN ORDINANCE AMENDING THE COMPREHENSIVE PLAN
OF THE VILLAGE OF ARLINGTON HEIGHTS

WHEREAS, the Plan Commission of the Village of Arlington Heights, in Project Number 15-010, conducted a public hearing on September 16, 2015, pursuant to published notice, to consider an amendment to the Comprehensive Plan, which includes a change to the land use designation for the property located at 2501 N. Chestnut Avenue; and

WHEREAS, the President and Board of Trustees, have considered the report and recommendation of the Plan Commission and determined that such amendment to the Comprehensive Plan is in the best interests of the Village of Arlington Heights,

NOW, THEREFORE, BE IT ORDAINED BY THE PRESIDENT AND BOARD OF TRUSTEES OF THE VILLAGE OF ARLINGTON HEIGHTS:

SECTION ONE: The Comprehensive Plan of the Village of Arlington Heights is hereby amended by changing the land use designation for the property legally described as follows:

Lot 1 in Rand/Berkley School Subdivision, a subdivision of part of the West half of the Northwest quarter, of Section 17, Township 42 North, Range 11, East of the Third Principal Meridian, in Cook County, Illinois, according to Plat of Subdivision recorded February 2, 1993, as Document 93085967.

P.I.N. 03-17-100-015-0000

and commonly described as 2501 N. Chestnut Avenue, Arlington Heights, Illinois from a "Schools" use to an "Institutional" use.

SECTION TWO: The revision to the Comprehensive Plan shall be placed on file with the Village Clerk and shall be available for public inspection.

SECTION THREE: This Ordinance shall be in full force and effect from and after its passage and approval in the manner provided by law and shall be recorded in the Office of the Cook County Recorder.

AYES:

NAYS:

PASSED AND APPROVED this 19th day of October, 2015.

Village President

ATTEST:

Village Clerk

Comprehensive Plan – Comp Plan 39 – 2501 N. Chestnut Ave.



Item: Ordinance - 25 mph Speed Limit

Department: Engineering/Legal

BACKGROUND

A resident living along Chesterfield Drive in the Surrey Ridge subdivision has made a request to have the speed limit lowered along his street. A spot speed survey was conducted by the Police Department and the results of the data suggest that a reduction from the current statutory unposted 30 mph speed limit to 25 mph is warranted. This segment of Chesterfield Drive has a significant 'dog-legged' bend in the roadway alignment, and the motorist speed performance measured during the speed count reflected this condition.

Looking a bit closer at this part of town, many of the subdivisions built when this area street system was designed established a street pattern in a non-grid fashion. The popular street layout approach at that time was to introduce curvilinear road networks to try and reduce speed since the long straight city type block standards would be replaced by a winding road pattern.

Over the years the Village has conducted numerous spot speed counts along Harvard, Noyes, White Oak, Fernandez, Highland, and several other streets in the area. The results of these studies have always come back with data to suggest that the majority of motorists have reduced speeds to compensate for the curved street system.

While some of the streets in this subdivision are already posted 25 mph, in order to establish a consistent approach to the neighborhood as a whole, it is suggested to expand the request to include the 25 mph speed limit throughout the subdivision. This recommendation is suggested to cover all Village local streets from New Wilke Road to Arlington Heights Road and from White Oak Street to Golf Road, as shown on the map attached to the ordinance.

RECOMMENDATION

It is recommended that the Village Board approve the attached Ordinance Establishing the Speed Limit on Certain Streets located between New Wilke and Arlington Heights Roads and White Oak Street and Golf Road.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
25 mph speed limit	Ordinance
Map of streets included in 25 mph speed limit	Exhibits

AN ORDINANCE ESTABLISHING
THE SPEED LIMIT ON CERTAIN STREETS
IN THE VILLAGE OF ARLINGTON HEIGHTS

WHEREAS, traffic surveys and/or studies have been made to determine the proper rate of speed to be imposed as the maximum speed limit of certain streets within the Village of Arlington Heights; and

WHEREAS, the President and Board of Trustees have considered such surveys and studies and have determined that the public interest requires that speed be limited on certain streets as hereinafter set forth; and

WHEREAS, it is the desire of the President and Board of Trustees to limit the speed of traffic on said streets as hereinafter set forth,

NOW, THEREFORE, BE IT ORDAINED BY THE PRESIDENT AND BOARD OF TRUSTEES OF THE VILLAGE OF ARLINGTON HEIGHTS:

SECTION ONE: That the maximum speed for the Village local residential streets located between the following streets within the corporate limits of the Village of Arlington Heights, with the designated streets highlighted on the map attached hereto and made a part hereof, is established at limit 25 miles per hour:

**‘VILLAGE LOCAL RESIDENTIAL’ STREETS LOCATED BETWEEN
NEW WILKE ROAD AND ARLINGTON HEIGHTS ROAD**

**‘VILLAGE LOCAL RESIDENTIAL’ STREETS LOCATED BETWEEN
WHITE OAK STREET AND GOLF ROAD**

SECTION TWO: It shall be unlawful for any person to drive any vehicle upon such streets at a speed which is greater than the speed designated above. The fact that the speed of the vehicle does not exceed the applicable maximum speed limit does not relieve the driver from the duty to decrease speed when approaching and crossing an intersection or when a special hazard exists with respect to pedestrians or other traffic and by reason of weather or street conditions and speed shall be decreased as may be necessary to avoid colliding with any person or vehicle or on entering the street in compliance with legal requirements and the duty of all persons to use due care.

SECTION THREE: The Village Manager is hereby directed to post appropriate signs upon the designated streets for the purpose of notifying drivers of all vehicles as to the applicable maximum speed limit.

SECTION FOUR: Any person, firm or corporation violating any of the terms of this Ordinance shall be fined not more than \$750 for each such offense.

SECTION FIVE: This Ordinance shall be in full force and effect from and after its

passage and approval, publication in pamphlet form and the posting of said signs in the manner provided by law.

AYES:

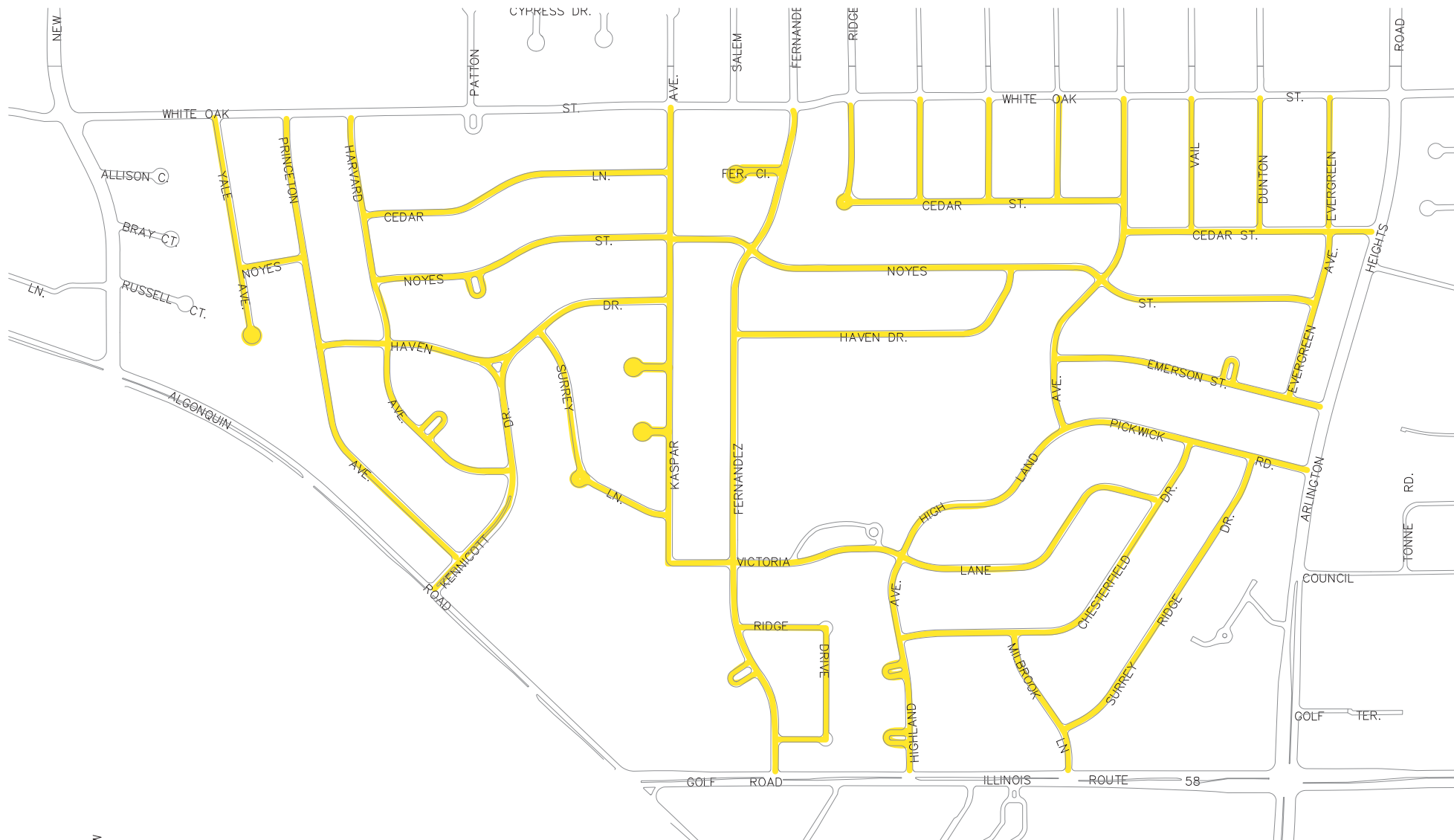
NAYS:

PASSED AND APPROVED this 19th day of October, 2015.

Village President

Village Clerk

TRAFFICREGS:25SPEEDZ.ONE Reduce from 30 mph2



Roads within Subdivision



Item: Workers' Compensation Settlement - Manthy

Department: Human Resources

At the August 21, 2015 Closed Session, the Village Board authorized settlement of the workers' compensation claim for Firefighter Richard Manthy. Firefighter Manthy was diagnosed with a tear in his rotator cuff that occurred while carrying 150 pounds of equipment up a flight of stairs while fighting an apartment fire.

The settlement amount of \$35,628 falls within the authorization previously granted by the Board.

Recommendation

It is recommended that the Village Board approve a settlement of \$35,628 for the workers' compensation claim of Firefighter Richard Manthy.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:



Item: Workers' Compensation Settlement - Perkovich

Department: Human Resources

BACKGROUND

At the August 21, 2015 Closed Session, the Village Board authorized settlement of the workers' compensation claim for Firefighter Michael Perkovich. Firefighter Perkovich was diagnosed with a hernia caused from lifting a roll of five inch hose when he felt pain in his abdomen and right shoulder. The settlement amount of \$14,251 falls within the authorization previously granted by the Board.

RECOMMENDATION

It is recommended that the Village Board approve a settlement of \$14,251 for the worker's compensation claim of Firefighter Michael Perkovich.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:



Item: The Moorings - 811 E. Central Rd. - PC#15-012

Department: Planning & Community Development

REQUESTED ACTION

Planned Unit Development Amendment by amending Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow:

- a. A new 2-story resident fellowship hall;
- b. A new 4-story assisted living building;
- c. A new 1-story (with basement) Memory Care building;
- d. Demolish the existing sheltered care building; and
- e. Demolish (2) quad villas.

VARIATIONS REQUIRED

- 1. A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two story buildings to allow inner court for a three story building without the required 12 foot emergency access.
- 2. A variation from Chapter 28 Section 5.1-8.14 Minimum Distance from building wall to paved area to allow a building wall for the memory care building to be 7 feet from a paved area instead of the required 12 feet.
- 3. A variation from Chapter 28, Section 11.4 Schedule of Parking Requirements to allow 538 parking spaces where 578 is required, a variation of 40 spaces.
- 4. A variation from Chapter 28, Section 5.1-8.9 Maximum Height, to allow the Assisted Living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.
- 5. A variation from Chapter 28, Section 5.1-8.10 Dwelling Standards to allow assisted living units to be 585 square feet in area where 650 square feet is required for 1 bedroom units, a variation of 65 square feet per unit, and to allow studio units 481 square feet in size where 550 is required, a variation of 69 square feet per unit.

RECOMMENDATION

A public hearing was held by the Plan Commission on September 30, 2015 where Commissioner Green moved and Commissioner Jensen seconded:

A motion to recommend to the Village Board of Trustees approval of PC #15-012, a Planned Unit Development Amendment by amending Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow:

- A. A new two-story resident fellowship hall
- B. A new four-story assisted living building
- C. A new one-story (with basement) memory care building
- D. Demolish the existing sheltered care building
- E. And demolish two quad villas

And the following variations:

1. A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two-story buildings to allow inner court for a three-story building without the required 12-foot emergency access.
2. A variation from Chapter 28, Section 5.1-8.14, Minimum Distance from Building Wall to Paved Area, to allow a building wall for the memory care building to be seven feet from a paved area instead of the required 12 feet.
3. A variation from Chapter 28, Section 11.4, Schedule of Parking Requirements, to allow 538 parking spaces where 581 is required, a variation of 43 spaces.
4. A variation from Chapter 28, Section 5.1-8.9, Maximum Height, to allow the assisted living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.
5. A variation from Chapter 28, Section 5.1-8.10, Dwelling Standards, to allow assisted living units to be 588 square feet in area where 650 square feet is required for one-bedroom units, a variation of 65 square feet per unit, and to allow studio units 481 square feet in size where 550 is required, a variation of 69 square feet per unit.

This recommendation is subject to the following conditions:

1. Condition from Ordinance 85-154 regarding the requirement to install a traffic signal if warranted at the property owner's expense shall remain in full force and effect.
2. The Petitioner shall work with Village Staff on possible relocation of additional

trees on site.

3. Compliance with the Design Commission motion dated August 25, 2015.

4. Approval of an MWRD permit for storm water.

5. A landscape and tree presentation bond is required prior to issuance of a building permit.

6. Compliance with all federal, state, and Village codes and policies.

Roll Call Vote: Commissioners Ennes, Jensen, Sigalos, Green and Chairman Lorenzini voted in favor. Motion carried.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
PC Staff Report	Board or Commission Report
PC Minutes 9/30/15 DRAFT	Minutes
Location Map	Exhibits
DC Staff Report	Board or Commission Report
DC Minutes	Minutes
Project Narrative	Correspondence
Volume I - Civil Drawings - a	Exhibits
Volume I - Civil Drawings - b	Exhibits
Volume I - Civil Drawings - c	Exhibits
Volume II - Assisted Living - a	Exhibits
Volume II - Assisted Living - b	Exhibits
Volume III - Residential Fellowship Hall	Exhibits
Volume IV - Memory Care	Exhibits
Revised Partial Plans - Assisted Living & Fellowship Hall	Exhibits
Site Lighting	Exhibits
Landscape Plans - Revised	Exhibits
Traffic & Parking Study	Exhibits
Parking Study Analysis	Exhibits
Drainage Study - Revised	Exhibits

Market Study
Department Comments
Petitioner Response to Department
Comments
Variation Response
Resident Comment-Pictures
Market Impact Analysis
PC Timeline Tracker

Exhibits
Correspondence
Correspondence
Correspondence
Exhibits
Exhibits
Correspondence

STAFF DEVELOPMENT COMMITTEE REPORT (revised)

To: Plan Commission
Prepared By: Bill Enright, Deputy Director Planning and Community Development
Meeting Date: September 30, 2015
Date Prepared: September 28, 2015
Project Title: Presbyterian Homes, The Moorings of Arlington Heights
Address: 811 E. Central Road (SEC of Central Rd. and Douglas Ave.)

BACKGROUND INFORMATION

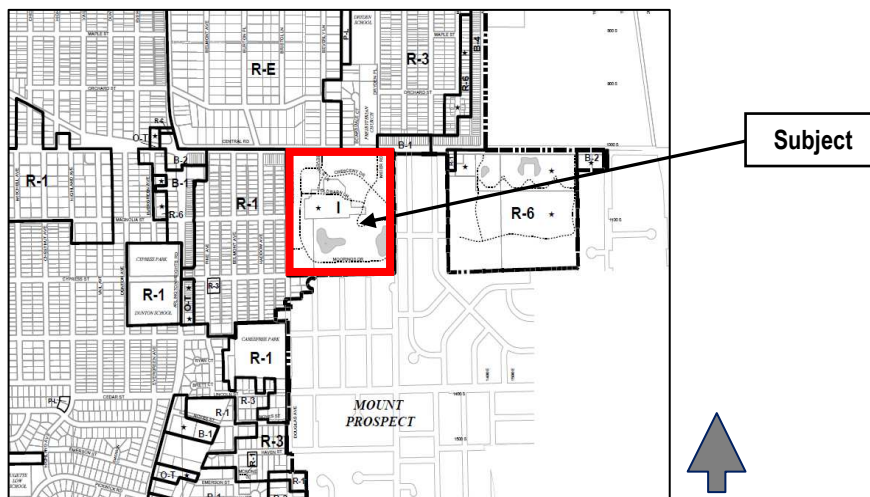
Petitioner: Nancy Tolan, Vice President Facilities, Planning and Construction
Address: Presbyterian Homes
3200 Grant Street
Evanston, IL 60201
Existing Zoning: I, Institutional District

Requested Action:

1. Planned Unit Development Amendment by amending Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow:
 - a) A new 2-story resident fellowship hall;
 - b) A new 4-story assisted living building;
 - c) A new 1-story (with basement) Memory Care building;
 - d) Demolish the existing sheltered care building; and
 - e) Demolish (2) quad villas.

Variations Required:

- A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two story buildings to allow inner court for a three story building without the required 12 foot emergency access.
- A variation from Chapter 28 Section 5.1-8.14 Minimum Distance from building wall to paved area to allow a building wall for the memory care building to be 7 feet from a paved area instead of the required 12 feet.
- A variation from Chapter 28, Section 11.4 Schedule of Parking Requirements to allow 538 parking spaces where 578 is required, a variation of 40 spaces.
- A variation from Chapter 28, Section 5.1-8.9 Maximum Height, to allow the Assisted Living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.
- A variation from Chapter 28, Section 5.1-8.10 Dwelling Standards to allow assisted living units to be 585 square feet in area where 650 square feet is required for 1 bedroom units, a variation of 65 square feet per unit, and to allow studio units 481 square feet in size where 550 is required, a variation of 69 square feet per unit.



Surrounding Land Uses:

Direction	Existing Zoning	Existing Use	Comprehensive Plan
North	R-E and R-3 One Family Dwelling District	Church and Single Family Dwellings	Single Family Detached and Institutional
South	R-1 One Family Dwelling District & Village of Mount Prospect	Single Family	Single Family (and Village of Mount Prospect)
East	Village of Mount Prospect	Single Family	Village of Mount Prospect
West	R-1 One Family Dwelling District	Single Family	Single Family Detached

Summary:

The subject property is 41.5 acres. The original PUD was approved in 1985 and has been amended numerous times since (A summary of the previous approvals is appended to this report). The property is developed with multiple buildings that serve as a retirement community. These include a four and five-story apartment building, a two-story skilled care center, a one to three stories sheltered care facility, a number of villa units, detention facilities, parking and other associated improvements.

The proposed PUD amendment will include a fellowship hall for worshiping which will also serve as a multi-purpose room for the residents of The Moorings. With views of the existing pond, the proposed Fellowship Hall will serve as a central campus feature. Also included is the addition of an assisted living wing and an assisted living memory care wing. The assisted living wing will be located to the west of the existing pond and include 70 units. The memory care wing will include 20 beds and will be located at the location of the existing sheltered care wing which will be demolished. Both the assisted living and the memory care building will have grade-level entrances allowing each building access without traveling through another building. The assisted living memory care building will be connected to the existing skilled care building.

The Fellowship Hall is proposed to be 1 story with partial lower level and totaling approximately 18,000 square feet.

The assisted living wing is proposed to be 4 stories and 70 units with the first level parking partially underground. Of the 70 units, 64 units will be one bedroom units 585 square feet in area and 3 units will be two bedroom units approximately 830 square feet in area. There are also 3 studio units at 481 square feet. Public Spaces will include a lobby, dining area, cafe and a living room. Parking is underground at the north portion of the building and is at grade level as you proceed south along the ring road due to the grade level dropping from north to south.

The memory care wing is proposed to be 1-story with a total of 20 units, approximately 315 square feet each. Public spaces will include a lobby, dining area, living area, core support and utility.

Total units for The Moorings is only increasing from 463 to 470 units with this amendment.

Zoning and Comprehensive Plan

As previously mentioned the subject site is currently zoned I, Institutional and is designated in the Comprehensive Plan as I - Institutional. This use is in accordance with the Zoning Ordinance and Comprehensive Plan designations.

Plat and Subdivision Committee

The Plat and Subdivision committee of the Plan Commission met on November 12, 2014 and were supportive of the request.

Neighborhood Meeting

The petitioner on September 9, 2015 held a neighborhood meeting one each for the residents of The Moorings and for the adjacent residents. A summary of that meeting is provided in the packet.

Building Analysis

The proposed development architecture and landscaping was approved by Design Commission on August 25, 2015. Minutes of that meeting are in Novus as part of the packet. The Design Commission recommendation include enhancements to the assisted living building to provide less EIFS and more siding where the bays are located. The design of the proposed building expansions incorporate the principals outlined in the Village's Design Guidelines, which include the use of durable quality

materials such as face brick, the limited use of dryvit or light gauge materials, and the use of architectural details to provide visual interest. The petitioner is also to provide a detail of site furnishings to staff for review during permits.

The following variations are required regarding the buildings:

- **A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two story buildings to allow inner court for a three story building without the required 12 foot emergency access.**

Staff supports this variation as the inner court created by the Memory Care and Fellowship Hall buildings will have a fire lane provided to the south.

- **A variation from Chapter 28, Section 5.1-8.9 Maximum Height, to allow the Assisted Living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.**

Staff supports this variation as the Assisted Living building is set back approximately 165 feet at it's closet point to the west property line angling away from the west property line to a point that the building is approximately 250 feet setback at the terminus of the emergency access lane out to Douglas Ave.

In addition, the roof line meets the required 45 foot height, but due to the enhanced architectural element of the sloped roof line, this raises the code determined height to 48.5 feet. The sloped roof is a better architectural treatment of the roof as it screens rooftop mechanicals and fits in with the character of the campus.

- **A variation from Chapter 28, Section 5.1-8.10 Dwelling Standards to allow assisted living units to be 585 square feet in area where 650 square feet is required for 1 bedroom units, a variation of 65 square feet per unit; and to allow studio units at 481 square feet where 550 is required, a variation of 69 square feet per unit.**

Staff supports this variation as the unit sizes are smaller given the smaller size of the kitchen facilities which are more of a kitchenette given that meals are provided for in common dining areas. Also, the parking demand for assisted living is significantly less than parking for typical dwelling units as many seniors requiring assisted living no longer drive.

Site Plan & Landscape Analysis

The Moorings currently has extensive landscaping throughout the site which is very well maintained and mature. The new plans call for relocation of trees and over 100 new trees being planted. Staff would like for the petitioner to work with staff during the permit process to try and relocate a few more trees as feasible. A landscape and tree preservation compliance bond will be required as part of permitting. Overall the additional landscaping is comparable and compatible with the mature landscaping throughout the site. The Moorings has providing extensive landscaping of common areas such as around the perimeter of the new buildings and the parking lot and ring road drive areas. Of particular interest is the courtyard for the new Fellowship Hall, which has exceptional detail and plantings to make for a unique space.

The following variation regarding the site plan is required:

- **A variation from Chapter 28 Section 5.1-8.14 Minimum Distance from building wall to paved area to allow a building wall for the memory care building to be 7 feet from a paved area instead of the required 12 feet.**

Staff supports this variation as the landscape plan for the site is exceptional and the variation is just for three of the corners of the Memory Care building where it is less than the 12 foot requirement.

Stormwater Analysis

The Moorings campus detention system currently provides detention for the entire campus, and includes a system of five separate detention basins. The West Lake (pond/detention) will be enlarged to accommodate most of the new requirements of the site. In addition due to newer MWRD and Village standards, the release rate will be reduced so that storm water is released at a lesser rate thereby reducing storm water runoff downstream during large rain events. The detention pond releases into a 48 inch storm sewer at along the southern border of the site which releases to public storm sewers. An MWRD permit will be required as part of the permitting process. The petitioner's project narrative provides a summary of utilities and storm water

management. In addition, the developer has provided a storm water drainage analysis also included in the Novus packet. No public improvements are required for the proposed plan as improvements are on site.

Traffic & Parking Analysis

A condition of Ordinance 85-154 was, "The developer or its successors will design, construct and maintain, at its expense, a traffic signal on Central Road at any entrance to the property at such time as the warrants for a traffic signal established in the then current edition of the 'Manual on Uniform Traffic Control' are satisfied." A traffic study and parking analysis was prepared as part of the Planned Unit Development Amendment and evaluated whether warrants for a traffic signal are met. Based on the study, a traffic signal is not warranted. It should be noted that the 1985 condition shall remain in effect so that if a signal is warranted in the future, a signal shall be installed at the property owner's expense.

In addition, the traffic study reviewed existing traffic counts and projections, and due to the minimal addition of 7 units net and a fellowship hall to be used by residents, the traffic counts result in no significant impact on internal circulation or impacts to Central Road. In addition the level of service will not change at the two entrances with Central Road.

The following are the parking requirements for the campus per the proposed amendment:

		<u>Required Parking</u>
• Fellowship Hall: 1 parking space for every 5 seats.	486 seats	97
• Assisted Living: 1 parking space per unit:	70 units	70
• Memory Care: 1 parking space for every 2 beds.	20 beds	10
• Senior Apartments: 1 per unit	202 units	202
• Senior Villas: 2 per unit	73	146
• Skilled Care: 1 per 2 beds	105	53
Total Required:		578 required
Parking Provided:		538 provided
		(40 deficit)

Therefore the following variation is required for parking:

•A variation from Chapter 28, Section 11.4 Schedule of Parking Requirements to allow 538 parking spaces where 578 is required, a variation of 40 spaces.

Staff supports this variation for the following reasons:

- 1) The parking study submitted by the engineer indicates that the maximum usage of the site is 67% of the parking provided.
- 2) The Fellowship Hall requires 97 spaces, however this facility is to be used by the residents of the community, who are already counted as part of the other line items for parking. Village code requires accounting for this space even though practically it is primarily only used by residents and their guests.
- 3) The parking code ratio for the assisted living units is 1 per unit, however ITE standards and the parking counts in the traffic and parking study indicate that the actual ratio demand is closer to 0.5. Staff is in the process of collecting data on senior assisted housing to determine if the Village Code should be amended.

RECOMMENDATION

The Staff Development Committee recommends approval of PC #15-012, an amendment to The Moorings Planned Unit Development amending Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow:

- 2-story resident fellowship hall;
- 4-story assisted living building;
- 1-story (with basement) Memory Care building
- and related site improvements.

And the following variations:

- A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two story buildings to allow inner court for a three story building without the required 12 foot emergency access.
- A variation from Chapter 28 Section 5.1-8.14 Minimum Distance from building wall to paved area to allow a building wall for the memory care building to be 7 feet from a paved area instead of the required 12 feet.

- A variation from Chapter 28, Section 11.4 Schedule of Parking Requirements to allow 538 parking spaces where 578 is required, a variation of 40 spaces.
- A variation from Chapter 28, Section 5.1-8.9 Maximum Height, to allow the Assisted Living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.
- A variation from Chapter 28, Section 5.1-8.10 Dwelling Standards to allow assisted living units to be 585 square feet in area where 650 square feet is required for 1 bedroom units, a variation of 65 square feet per unit, and to allow studio units 481 square feet in size where 550 is required, a variation of 69 square feet per unit.

Said recommendation is subject to the following conditions:

1. Condition from Ordinance 85-154 regarding the requirement to install a traffic signal if warranted at the property owner's expense shall remain in full force and effect.
2. The petitioner shall work with Village staff on possible relocation of additional trees on site.
3. Compliance with the Design Commission motion dated August 25, 2015.
4. Approval of an MWRD permit for storm water.
5. A landscape and tree preservation bond is required prior to issuance of a building permit.
6. Compliance with all Federal, State, and Village Codes and Policies.

_____, September 25, 2015

Bill Enright

Deputy Director of Planning & Community Development

Cc: Randy Recklaus, Village Manager
All Department Heads

Summary of previous approvals

The original PUD for The Moorings was approved in 1985. The PUD has been amended numerous times since then. The following is a list of the ordinances and a preliminary list of the major actions associated with each of the ordinances.

Ordinance	Approval		Allowed
Ord. 85-154	PUD approval	☐ Rezoned the property from R-1 to I ☐ Established the PUD ☐ Approved subject to the Site Plan prepared by Burns & Associates	Allowed: ☐ Up to 5 story buildings ☐ 262 two-bedroom (or one-bedroom with den) units ☐ 8 villa units in a row ☐ Reduce parking requirement to 645
Ord. 88-57	PUD amendment	☐ Allow an overall reduction in the number of villa units ☐ Did not affect the midrise, the parking or the setbacks	☐ 262 apartment units ☐ 76 villa units
Ord. 89-43	PUD amendment	☐ Allow an increase in the number of villa units	☐ 346 total units ☐ 262 apartment units ☐ 84 villa units
Ord. 91-108	PUD amendment	☐ Allow an Adult Day care OR ☐ Permit the construction of a previously approved villa unit when the Adult Day Care ceases operation OR ☐ Permit the rehabilitation of the existing ranch house into a villa unit at such time the Adult Day Care ceases operation	☐ Variation from the required number of parking spaces for the adult day care only
Ord. 92-015	PUD amendment	☐ Allow expansion of the health care facility	☐ 346 total units ☐ 262 apartments ☐ 87 villa units
Ord. 93-051	PUD amendment	☐ Modify the architectural style of the remaining villa units ☐ Reconfigure the site plan	☐ Variation from the required minimum front yard for the quadruplex from 25' to 22'
1998	PUD amendment	☐ Allow the erection and operation of a commercial ham antenna	
Ord. 02-077	PUD amendment	☐ Permit modification to the previously approved site plan and relocation of the adult day care facility	☐ Obtain Vacation of ComED easement ☐ Maintain sanitary and water service
Ord. 06-069	PUD amendment	☐ Allow the expansion of 26 villas	☐ Reduction to required spacing between buildings ☐ Reduction to required spacing from building wall to paved area

DRAFT

PLAN

REPORT OF THE PROCEEDINGS OF A PUBLIC HEARING
BEFORE THE VILLAGE OF ARLINGTON HEIGHTS
PLAN COMMISSION

COMMISSION

RE: THE MOORINGS - 811 EAST CENTRAL ROAD - PC# 15-012

REPORT OF PROCEEDINGS had before the Village of
Arlington Heights Plan Commission Meeting taken at the
Arlington Heights Village Hall, 33 South Arlington Heights
Road, 3rd Floor Board Room, Arlington Heights, Illinois on the
30th day of September, 2015, at the hour of 7:30 p.m.

MEMBERS PRESENT:

JOE LORENZINI, Chairman
LYNN JENSEN
TERRY ENNES
BRUCE GREEN
JOHN SIGALOS

ALSO PRESENT:

BILL ENRIGHT, Deputy Director

DRAFT

CHAIRMAN LORENZINI: All right, good evening. I'd like to call this meeting of the Plan Commission to order. Would you all please rise and recite the pledge of allegiance with us?

(Pledge of allegiance.)

CHAIRMAN LORENZINI: Bill, roll call please.

MR. ENRIGHT: Commissioner Jensen.

COMMISSIONER JENSEN: Here.

MR. ENRIGHT: Commissioner Ennes.

COMMISSIONER ENNES: Here.

MR. ENRIGHT: Commissioner Green.

COMMISSIONER GREEN: Here.

MR. ENRIGHT: Commissioner Sigalos.

COMMISSIONER SIGALOS: Here.

MR. ENRIGHT: Chairman Lorenzini.

CHAIRMAN LORENZINI: Here. Okay, first item, next item on the agenda is approval of minutes from September 9th, 2015. There's five on the agenda to approve. Any corrections or comments or approval?

COMMISSIONER GREEN: I'd like to make a motion to approve.

CHAIRMAN LORENZINI: Second?

COMMISSIONER SIGALOS: I'll second.

CHAIRMAN LORENZINI: All in favor?

(Chorus of ayes.)

CHAIRMAN LORENZINI: Opposed?

(No response.)

CHAIRMAN LORENZINI: Thank you.

COMMISSIONER ENNES: I need to abstain from the first four, I was on vacation.

CHAIRMAN LORENZINI: Okay.

COMMISSIONER JENSEN: And I need to abstain from the last one.

CHAIRMAN LORENZINI: Okay, thank you. All right, the next item on the agenda is the public hearing. We have two public hearings tonight. There's quite a few people here, so if I can just explain the way this works?

The first thing we'll do, we'll have the petitioner come up and describe the project. Then we'll have the Staff report from Bill. Then each Commissioner will go around and ask questions from the Petitioner or from the Staff. Then after that, we'll open it up to the audience for questions or the public for questions. Then we'll come back for final questions and a final vote. Now, we'll do that for each of the public hearings.

So, the only thing I ask, we certainly encourage people to speak if they wish, but we would just ask you to keep your comments to this project that we're discussing and not to something, you know, that happened 20 years ago or somewhere else. So, with that, let's get started.

DRAFT

Bill, have all the proper notices been given?

MR. ENRIGHT: Yes.

CHAIRMAN LORENZINI: Okay. Is the Petitioner here?

MR. PEPPERS: Yes, we are.

CHAIRMAN LORENZINI: Would you please come forward and anybody else who may be testifying? We'll swear you in. Raise your right hand.

(Witnesses sworn.)

CHAIRMAN LORENZINI: Thank you. Has the Petitioner read the recommendations or exceptions in the report?

MR. PEPPERS: Yes, we have, Mr. Chairman.

CHAIRMAN LORENZINI: And do you agree with them?

MR. PEPPERS: We agree with all the conditions.

CHAIRMAN LORENZINI: Okay, very good. Thank you. Okay, would you like to give us a brief presentation?

MR. PEPPERS: Yes, thank you very much. For the record, my name is Nicholas S. Peppers of the law firm Storino, Ramello & Durkin, 9501 West Devon, Rosemont, Illinois, the attorney for the Applicant, Presbyterian Homes, Case No. PC 15-012, regarding the planned unit development amendment for The Moorings project of Arlington Heights.

First of all, I'd like to thank the Plan Commission for scheduling this meeting. I know it's not your normal night. We all have busy schedules. I'd like to thank you for finding the time to have this meeting. I'd like to thank Staff, especially Bill Enright here for helping us navigate through the Staff process to turn this forward to you.

We are here pursuant to proper notice and publications which we have given Bill. We are here tonight seeking an amendment to Ordinances 85-154 of The Moorings planned unit development which as been amended seven or eight times since then to permit the following:

- * The demolition of certain villas and sheltered care facility;
- * Construction of the new fellowship hall to serve The Moorings residents;
- * Construction of the new one-story memory care and four-story assisted living facilities.

Along with that, there will be five variations, which we'll touch on during the presentation, but quickly they are, excuse me, to permit:

1. A three-story courtyard without a 12-foot emergency access;
2. Building walls within 12 feet of paved surfaces in a few isolated locations;
3. A parking variation of a total of 43 spaces. We are providing 538 spaces. According to code, and we'll get into that, 581 will be required.
4. A height variation of three-and-a-half feet for the assisted living building only from 45 feet to 48.5 feet; and then

DRAFT

5. A minimum dwelling unit size for one-bedroom assisted living units from the required 650 to 585, and the studio units from 550 to 481.

We'll get into detail as you see the plans on all of those and touch upon our reasons why we think these variations appropriate.

Prior to tonight's meeting, we did meet with Plat & Sub as some of you may recall back in November 11th, 2014. We received a positive recommendation. After that, we did have two meetings with Design Commission, one conceptual in April and then a formal one in August 25th. We did receive Design Commission recommendation with a couple of recommendations, conditions, excuse me, which was one of the conditions in your report in your report which we'll agree to abide by.

Also, on September 9th, we did host a neighborhood meeting for not only the residents of The Moorings but also those within 250 feet, some of the noticed are the people who you'll see tonight, where we introduced the project, fielded questions, and told them that we'd also be here again tonight and they would have an opportunity to get onto the record whatever comments and concerns they have, which brings us before you tonight. The Applicant, consultants, and its experts have worked hard, as you'll see from this presentation, to bring forward a rather complete and detailed presentation of the project.

In a minute I'll introduce our planner Scott Freres of Lakota Group, our architect Craig Kimmel from RLPS Architects, and then Mike MaRous our expert appraisal, to walk through the project and discuss the variations that are listed before us. But you know, we are mindful of the time that this Commission has tonight. I know you read your application packets and you've already seen this project. So, we will be efficient in our presentation tonight. However, to the extent that we miss something, you need us to address something, we're always prepared to go back and to address those concerns. But we intend to be as efficient as possible tonight.

Before I introduce Scott to go and start on the project, I'd like to introduce Todd Swortzel, the president and CEO of Presbyterian Homes, to make a couple of opening remarks, and then I'd like to get to our presentation. Thank you.

CHAIRMAN LORENZINI: Could you please state your name, spell your last name, and give an address for the court reporter?

MR. SWORTZEL: Sure. My name is Todd Swortzel and it's spelled S-w-o-r-t-z-e-l. My address is 3200 Grant Street in Evanston, Illinois.

I just want to thank you tonight. I'm excited to be here and to present this project to you. We have a great team working on this and Presbyterian Homes is excited to serve the residents of this community.

We've been in Arlington Heights since 2000, 15 years ago, when we purchased The Moorings. This is the first major

DRAFT

change that we've made since we've been the owner, but we think it's essential for us to be able to serve seniors in the future. The residents, current residents of the community also are very excited and looking forward to what's being presented to you tonight, that they can benefit from it as they live in the community.

So, I just want to thank you for your time this evening. I know that you're in a hurry but I appreciate the time you're giving us to consider this. Thank you.

CHAIRMAN LORENZINI: Thank you. Okay, anybody coming up, please state your name, spell your last name, and give your address.

MR. FRERES: Mr. Chairman, my name is Scott Freres, I'm the principal of Lakota Group, 212 West, I'm sorry, 116 West Illinois Street, we just recently moved, Chicago, Illinois 60654.

Thanks very much for your attention this evening and your consideration. We do have a presentation before you, it will be brief and concise. I want to reiterate what Nick said, and that is we have a whole host of our experts with us. So, I'm the planner and Craig is the architect and Mike is the appraiser, and we're going through the bulk of the presentation. Should you have any questions with regards to engineering and parking, we have all of our folks with us this evening, so thank you very, very much for your time.

If I can get this to be over here, I'm going to just jump ahead a little bit. I'm going to organize the presentation briefly around an introduction to the project, the mission, the services that Todd already talked about, but our goal here today is to talk about an amendment to the PUD, reinvestment in The Moorings community. That's the program that's before you. The specifics, the details of it, you'll see in just a minute.

As Nick alluded to, there are five variation requests that are part of this proposal. You will see each of those reiterated throughout the presentation, talked about and answered in terms of how we responded to all of those. Again, they include the number of parking spaces, access lane to the courtyard, distance from building wall to paved area, minimum dwelling size units, and building height.

A little bit of history, briefly, on The Moorings, a lot of the community knows that it was previously the Magnus Farm. It had an open space feel to it, a character that many people in the community remember. In 1950, the use changed to a nursing facility. In 1986, a PUD was created by a separate entity. In 2000, Presbyterian Homes acquired the property and began a long-range plan of how to reinvest in it in moving forward into the future.

In 2005, the first visit before the Arlington Heights Board came through with improvement to the villas that were added to the campus. You will see those in just a moment. Here we are again 10 years later looking to reinvest again for the future of The Moorings campus as we change and look for an amendment to the PUD.

The topics, briefly, and I'm not going to hit on

DRAFT

these in any detail, but I think they're important, and they're important because we wanted our neighbors and friends and our own folks within the community to understand that we looked at context and character and connectivity in service to the site in a lot of different ways. It is important to understand all of those really in the framework that we are one site within the Village, we were on a major roadway, Central Avenue, centrally located within the community. We're serving a broad audience, and while our audience is focused within the Arlington Heights community, it's a bigger picture that we're looking at and that it's important to start up high at 30,000 feet. As we do that, as we focus down, we realize that we're also part of the neighborhood. The neighborhood is a very important component to us because the campus was developed very much in mind with understanding the relationships to the homes and businesses that surround us.

Our site is zoned R-1 Institutional Zoning. It sits within essentially a residential, a hole of a donut of a residential area. On our south and on our east, we have our friends in Mount Prospect, on the north and on the west is Arlington Heights. So, we're cognizant of what's happening from the zoning and land use context perspective. Then there's the visual context of what that area looks like. As we drive down the roads, as we walk through the neighborhoods, as we talk to our neighbors, we need to understand the character of those homes and those businesses that surround us and the scale of those. So, it's not just about the use, it's about the three dimensions of that use, how big is it, what does it look like, what is the architecture, what are the materials, we need to be cognizant.

We did this study really as an effort to say we understand what's next to us. We care about what's next to us. We knew it was important take care of those that are around us in terms of screening and buffering and making sure that our uses are compatible as we move forward with developing the site.

These pictures generally give you a sense of the scale and character that primarily are one, maybe two-story, in some areas, single family residential, nice homes, well taken care of around the site, homes on Douglas, homes on the south that stub up into our property that really are part of the neighborhood. There are no through connecting streets, so we are an isolated entity, but we do realize that we have access points with regards to fire lanes that are part of our campus as well. Some of these pictures just give you the sense of that.

So, the internal, understanding our campus from within. We have a series of buildings that are focused around the core center. At the core area is the main heart of the campus. It's where all of the services and facilities are that bring everybody together. It's kind of the main street of the campus.

Surrounded by the campus, you'll have not only the entrance areas, you come in off of Central, a very nice entrance, well-landscaped, very simple, set back in terms of the character of driving back into the site. Very pastoral feeling as you drive through the

DRAFT

campus on the drive with our ponds and our walkways and the pedestrian areas. You can see the cottages and villas, which are our single family product around the center.

In the center of our site is our independent living or our commons, that main street area. It's the taller component of our site. It's the four or five-story building that sits in the center of the site. Flat roof, here is a sense of it, here is a little picture that gives you a sense of the scale and the character. Bigger building but set back in and broken down in terms of size so it doesn't have a great impact in terms of the overall scale of it.

Here is the sense of the architecture and the scale of the building, just to give you a sense. It's a flat roof structure. It has balconies, it has some green space that surround it, the main entry comes in from the north.

Immediately adjacent to that and connected to that is our skilled care area and our service areas. This is where all of the trucks and loading come into the site. It comes in right near where you see that circle where that round barn is. That skilled care is a connected component of that. Pictures here show really two to three-story buildings in some areas. The scale and the character is a little different. It's got a roof form on it but an older scale, older architecture, older character as well to it.

Then far west of the main complex of buildings is our sheltered care building. This is a much simpler scale building, rather innocuous with regards to architectural style and the character, but nonetheless an important component surrounded by a little bit more parking in terms of the feel of the site and a three-story building in terms of the character and scale and brick facade. Here we are again with the picture. Important to see these because it's important to understand the context of what we're building here.

The last component of our existing site are our cottages. There's two different styles of cottages. There are the original cottages highlighted in yellow. They are essentially highlighted by a duplex or a quad, a four-building. They have garages that come off the front and there are outdoor living spaces off the back. The scale, again older, dated architecture, good quality, taken care of, nice landscape around, good buffering around the perimeter of those areas. They face the loop drive, that's part of our loop drive system.

Back in 2005, as we mentioned, we came in with our first plans to bring reinvestment back to the property. The goal was to really rethink that architecture of that and kind of that cottage style architecture of the villa, that it has some peaked roof forms and it has a little portico or front entrance and has a nice outdoor patio space, and a much more accentuated landscaping, again building on the beautiful grounds and character of the site that's already there.

It gives you a sense of the existing plan, and it's important to know that we have an existing circulation system and we're working within our existing circulation system as part of the

DRAFT

plan that we're proposing to you this evening. The circular ring road drive accesses the main access off of Central, and then there are two stubs that are fire lane. One is off of the north to Central and one is off of the, excuse me, the west now back to Douglas. Both of those are really the access points for record purposes.

We also have the building entries, and why we show this is very important, Craig will get into it in just a bit, these building entries are important. They define the place so that people come in there and people know where the entrance is for the different types of uses are. As we add on, as we build, we have to redefine those entrances, and that connectivity between those buildings is critical to the flow and efficiency of the campus and those who live there. Here's the service areas that show how we're using it and where you're coming in to service these existing buildings.

We have a pedestrian network that's very well defined in the campus, heavily used, nicely landscaped that circumnavigates the entire property on the inside of the ring road system, it goes around our pond areas. It's certainly an important component for both the recreation, fitness, and just general enjoyment of the outdoor spaces, another key component that we are going to work with as we move forward in our proposal. What are we doing? Very simply, we are expanding in two key areas that we talked about before. One of those areas was the sheltered care area that I spoke of. I'm not sure if this, Bill, if this thing works. Oh, there, it does work a little bit.

This is our existing skill care. Where our sheltered care was in this location, and then we had some quad building of these villas or cottages that flanked along the western edge of our existing circulation drive or ring road.

What are those uses that we're putting in there? Briefly, the first component is a resident fellowship hall, a one, maybe two-story in terms of scale of building. Really the core area, the link, the bridge, the connection between where we are now, bringing it into this assisted living and connecting it back to the main street. It is the bridge that builds those beautiful architecture, defining architecture, and starting to frame that on that critical open space that everybody gets a value out of.

The second piece is the assisted living. Assisted living is a building that's broken down into many forms to create variety to break down the architecture, to add scale and interest, and make what would be a long building a very interesting building that's broken into different pieces, and addresses the road and our adjacent internal neighbors very nicely. Again, a four-story building, residential architecture, Craig will talk about this in a minute.

Now, the last building to the north, one to two-story building is our memory care unit. Again connected to assisted, connected to the fellowship, connected because of the need to bring those services and focus on that. But what happens with that building is it creates a spectacular cloistered courtyard space that you see in

DRAFT

green in between A and C. We'll talk about that with regards to landscaping and how that works and how we address one of our variations that's related to that.

Just to give you a sense of the scale and character, you can see that what's important in this picture before Craig comes on up is the fact that the architecture, I can see you back over there, the architecture of the old building and the architecture of the new building, very important to see that we're respecting the materials that are there but we're moving to a different form, more detailed, more character, more residential in feel. Very, very critical and important for framing that pond and we're making a spectacular open space element that everybody within that community could enjoy. With that, I'll turn it over to you.

MR. KIMMEL: Hello, I'm Craig Kimmel with RLPS Architects. The address is 250 Valleybrook Drive, Lancaster, Pennsylvania. It's great to be here.

CHAIRMAN LORENZINI: Spell your last name?

MR. KIMMEL: Kimmel, K-i-m-m-e-l.

CHAIRMAN LORENZINI: Thank you.

MR. KIMMEL: It's great to be here. As we start to look at how these buildings start to frame views and how they start to define themselves architecturally, we really look at these buildings as kind of a bridge. They kind of work against some of the tall volumes of the independent living structures that are four and five stories. Also, we're also anchored against the cottages which are one stories. So, we're really looking to try and blend some of those features between the two buildings to create kind of a transition if you will between the most institutional part of the campus to the most residential.

So, as we start looking at what that translates into as we look at sections, one of the things that was pretty paramount for us is that we definitely wanted the new buildings to not sit taller than the existing buildings. So, if you look closely at this slide, and I apologize for the scale, you can see the dotted line that kind of runs across the top of the tallest of our buildings. So, we're sitting about five feet lower than the height of the existing structures as we kind of work our way from center to edge of the campus, and really in both directions.

As we blow up into a kind of larger scale, some of the other things that we're kind of relating to are this separation distance from the property lines. That was really important to us as we started looking at how this building kind of situated itself between the pond that existed really in the center of the campus and the cottages and villas that sit on the perimeter. So, that existing building height was critical to us as was that separation distance, and we really worked hard to try and keep this building as tight to that core as we possibly could.

As we start looking at sight lines from the property, in this graphic it's actually from a person standing 45 feet

DRAFT

in off of the property line actually on Douglas where you can start to see those visual lines where they're trying to keep the scale of the building back far enough that it really has fairly minimal or negligible impact on anybody's view scape that exists down Douglas Avenue. There are a few exceptions to that and we'll talk about that as we go through the presentation.

As we start looking at this campus then, one of the things that was really paramount as we started looking at trying to reinvent the sheltered care, because the assisted living building is really a replacement facility for sheltered care that is basically coming down as part of this process, so we needed to build the assisted living building not where the sheltered care was because people are living there. So, we needed to be able to transition them into a new building and then go back and reinvent a portion of the site that the sheltered care existed on. So, as we look at that and we start looking at how that circulation inside the building works, for an assisted living resident, for a memory care resident, it became really critical that we kept those as tight to the core, to the main street that Scott talked about as possible and not allow those to start moving away because the frailty level of these residents are such that we really want to minimize travel distance so that they can really continue to enjoy life, take part in activities that are really germane to having them have a fruitful existence in these different levels of care.

As we move upstairs or on to the lower level, you can see the green is basically a service loop and the yellow is the public loop. So, we're really on this floor kind of crossing them but trying to keep them isolated, creating that loop between the basement of memory care and the health center component so that we really have the ability to service all of these buildings very well. That really becomes critical in terms of just quality of care for the people that are going to be living here.

So, the first building we'll talk a little bit about is resident fellowship hall. It is kind of the core. It becomes kind of the symbolic center to the whole campus. It is kind of the religious center to the campus. It is the one space in the new construction that is being served by all, or that is serving all levels of care. So, the healthcare residents come to this building as do independent living and the assisted living and memory care. So, its location as central is really critical to its success and use as a building that really brings the whole community together. This is just an image of what that looks like from across the pond, and just an enlargement of that as well. So, it really becomes the focal point architecturally and becomes really that center piece that starts to define in a way what The Moorings at Arlington Heights will become.

Assisted living is directly adjacent to that. It is basically a three-story building that falls out of grade as you move to the south. We are working with some grade changes, so as we move to the south the building does fall out because it's really critical for seniors that everything is on one level. So, that became a fundamental

DRAFT

kind of defining element as we started positioning these buildings vertically on the site, which also kind of lends to the building height variation that we'll get into in a minute.

The character of the buildings was really critical as we looked at bringing masonry into the bases of the building, introducing different building material characters. The Design Commission really had very minor comments after we got through the process of working with them, really I think had great comments and ultimately really applauded kind of the design of the building. Just a blowup of the front entry porte-cochere.

One of the variations is really the unit size for the assisted living, and that exists in the one-bedroom and also in the studio. You'll see in the variation, the delta is about the same in both unit types, and really that is primarily a result of the fact that people aren't spending all day in these units. They are not really apartments. This is a building that is IDPH, so it's a space where residents sleep. They do spend some time there but a lot of their activities, all of their dining, their laundry services, living room spaces are all provided in more of a congregate area on each floor. We basically have divided the building up into neighborhoods, so each neighborhood is about 14 to 15 residents, and they each share their own activity living space.

So, when we start looking at the size of the unit, it really isn't like a typical dwelling unit. It's a little bit different because of the way people who are in these kinds of facilities live. They really live a lot of their day outside of their actual dwelling unit.

Same thing really exists for the studio. We only have three of these and they're actually designed in a way that they can be combined with a one-bedroom to create a two-bedroom as an option. But basically the same exact situation occurs here. We really don't have cooking in these units. We basically have a small area similar to what you would have in a hotel room where you may have a microwave. But there's really no cooking in this, and all of that meal preparation is done by staff and is done outside the actual dwelling unit. Just an example of some of those common spaces that we've done in other similar communities.

So, when we start looking at memory care then, we're really looking at a building that's one-story. It is set up as a neighborhood of 20 residents, but it is a little bit unique in terms of its care because it's really addressing the specific needs of a specific population. As Scott mentioned, the inside of the building, the courtyard side is really where all of the activity is, it's where all the life of this building is. So, when we look at the building from this side, it's kind of the front in terms of the formal front; but in terms of how the building actually lives daily, it's really the back of the building. So, when we look at the parking and the proximity of the parking to the building, it's really not the front. People are spending their entire days basically on this side of the

DRAFT

building which is really the courtyard.

So, we've got great outdoor gardens, opportunities for them to interact with nature both physically and also on days when it's not nice to be outside. They certainly have the ability to view that. And all of the social spaces associated with this building are aligned along this edge, so you've got your living rooms, dining rooms, activity, TV rooms even, all kind of participate on the garden side of the building. Scott?

MR. FRERES: I want to switch for a second and put my landscape hat on. We have quite a campus landscape planned. Our focus is really on a couple of key areas with regards to the site. You've seen it all in the pictures so I won't get into it in any detail. But there's a couple of key landscape components. One of the foundation plantings and how we address plantings around the building, certainly we want to make sure safety and security is always important, but these buildings are going to have a really nice landscape package at their foundations as a component of this plan, and also providing a full access point from sidewalks along those spaces.

As I mentioned before, we have a courtyard. The courtyard, in the image that you saw before you, both are part of a discussion under variation number three. It has the distance from the building wall to paved areas that created the two areas you see highlighted. While we don't meet the standard, we have, I would say, accentuated the landscape area in those and buffer to those areas to the extent that we've really softened it and created a really beautiful environment in that space. We believe that alleviates any kind of concern for that distance offset in those areas.

Then also with regards to the site and circulation, as you look at all of this, we think about how the building is centrally located and contiguous. Everything is part of a loop system here. You can see the path that goes around the pond, we'll talk about that in a second. You can see the access that comes into the -- oops, sorry. There we go. There you go, thank you.

The cloistered courtyard is one of the highlights you've heard talked about, and it really is a space for people to gather. It's going to be programmed for a lot of different uses, whether there's events out there, the open lawn that's there for tent uses, the small area in the south meditation yard off of the chapel space, the memory garden. Again, getting people out into those areas and utilizing it with regards to our seasonal variations and temperature, we want to make this space as attractive all year round and provide seasonal interest for people just to look at them from within the buildings.

Again, landscaping around the building, thinking about the building as a whole, that building, the assisted living building really addresses the pond, and the pond acts as the key component. While we've landscaped on the west side, we'll talk about that a little bit more in specifics in just a minute, the pond side offers a great opportunity to really focus those views, that walkway

DRAFT

space which is also our fire lane, I'll talk about that in just a second, but to really accentuate the views to that water space. Really that water space is important in terms of the edge and the condition and how we treat it, making sure we stabilize it, we naturalize that pond as with the landscape character that's part of it.

Circulation is another component that's important. As I mentioned before, our pattern and movement for traffic space is the same as it is today with the exception of the little area that you see right here which is really our drop-off area just as an access to the, controlled access into the --

CHAIRMAN LORENZINI: We can't see your pointer.

MR. FRERES: Okay. That's the, if you look in the building, you'll see our little drop-off space. That really is the entry point to the assisted living. That's where that corridor starts and where that access moves up to the memory care area. It also serves our parking lot, which we'll talk about in just a second. We have our circulation in terms of pedestrian and how we've taken what we have and tied it to the rest of the system that's already out in place.

Lastly, as I've mentioned, the wider path that you see around the pond is in fact a pathway but it's also providing that emergency fire access lane all the way around the back side of the pond up against all of our buildings. That comes into play really in this conversation, the access to the courtyard, we're talking about variation. While we don't have road access into that courtyard, we have easy access with regards to foot traffic and the wide pathways to get in there does not eat it off. It is accessible, and we believe reasonably accessible for fire and emergency from both the south and from the north. Again, looking at how that circulation works with regards to fire access, there is easy access from all vantage points to the buildings.

Parking. Briefly, there are two areas or three areas that are highlighted in yellowish, kind of ochre color. There is one to the very north that's a small surface parking lot. There is another surface parking lot immediately to the west of that memory care building. The box that you see on the south is actually underground parking that's within the basement or the lower level of the assisted living. Those are the new parking components that are servicing these buildings in addition to all the parking that's already existing on the campus today. To give you a sense of the scale and how much is there, we've numbered the total parking that's provided as part of those buildings.

When we talk about parking, we also have a variation that we are working around, and we can get into all the specifics of the variation, but suffice it to say at the end of the day we're about 43 short. I use the number 43 as opposed to the 40 that's in there because of the unit count discrepancy with beds, 73 beds versus 70 units. We just want it to be apples to apples with regards to that shortage.

But the real component behind here that strives to

DRAFT

emphasize why the shortage is there is the relationship of parking as the ordinance defines parking for the resident fellowship hall, the amount of parking necessary. This building that we've talked about is for our residents and it is internal to our campus. It is utilized by our residents. It's already existing on the site, and as we've tracked it and we've managed it over time, we've realized there's very little parking demand that comes from the outside world to use that with regards to a daily basis. There may be special occasions but very rarely. We believe it's justified in terms of the overall package to reflect less parking demand for that particular area. The same with regards to the balance of parking for the AL units, and the Staff report nicely describes the lessened demand for that parking that really is in effect through half of a parking space per unit or less as more realistic with regards to the standards.

I want to show you in the aggregate, the important component in the aggregate is that shortage of 43. If you look at the bottom, you see the total parking on campus, and what we are starting with and what we are ending up with at the end of the day, we've added about 18 spaces overall in the campus. So, we're really trying to let everybody understand that we're removing some units, we're adding some units, but at the end of the day it's a very negligible increase. I think it's seven total units that we're adding to the whole project, and that extra parking kind of reflects that in terms of what we're doing. Ultimately, we're adding more units of people who don't drive cars, so we're not adding those who are driving, we are adding those who don't drive. That's an important component to consider in that variation request.

A little view across the site from our neighbors along Douglas Avenue, it's important to recognize and important to address some of the concerns that we've heard from our folks along Douglas, particularly with regards to key views into the site. And I want to have a little discussion with you to make sure that you know, that we have met with families, walked with them, we understand their concern and we're working towards solving that. We've got some images here this evening that we believe are very important for you to see.

The first and one of the most open views into the site is along that access road up to Douglas, our fire lane to the west. This is a view looking from in, out back to Douglas to our neighbors. This is another view looking back out. We've walked along the whole coastline of Douglas looking back in. This is what we see along Douglas looking back into our site, our white picket fence which is really kind of the hallmark on the edge of our site, looking back at our cottages or our villas that are there.

What you can't see behind there is the existing three-story sheltered care that's behind there. It gives us a sense of scale and the existing vegetation that's blocking it and that's important. This is showing you really where that line is of the existing building. So, the building that's going in today is of less height, less in terms of height of that same area in that same place.

DRAFT

These views, two and three are important views, very open views into the site. While we recognize that there is, it kind of blurred out on me a little bit, but this is a view looking from number two which is looking back into the site, what we're trying to highlight here, and I wish I could point and show you that in the background, we're looking from Douglas now, in the background you can begin to see the top of our four-story new assisted living building, you can kind of see it, that it's tucked back in there. This is extrapolating the existing imagery by taking pictures from a vantage point, we're putting it in those pictures and then we're dropping in, in real time our building location on the plan so you get a sense of that. It's important, because what we're showing here is that we're not hiding every inch of the building but we're making a concerted effort to defer and block those views because those views are open today back into our site as well even with the existing mature vegetation.

AUDIENCE MEMBER: Can I ask a question while you've got these pictures up?

CHAIRMAN LORENZINI: Excuse me, we're going to have to wait.

AUDIENCE MEMBER: I mean you've been talking for a half hour.

CHAIRMAN LORENZINI: Well, that's, sometimes --

AUDIENCE MEMBER: I've got places to go, too.

CHAIRMAN LORENZINI: Sometimes this goes to midnight, sir. We've got to follow our procedure, I'm sorry.

AUDIENCE MEMBER: Yeah, I'm not buying a place there, so you know.

MR. FRERES: Number three, which is a key access point into the site again, as we've talked about, here is the existing view and there is the building. We recognize that that building is a four-story building in the background and that distance was talked about by Craig. What we want to show is the idea that we believe we can bring landscaping into the foreground and begin to break down that view. What it's not showing is that there's landscaping against the building. The view that's there today has very few parkway trees on our property. So implementing larger parkway trees immediately, bringing evergreens in the corner, and that photo is a little bit washed out, but bringing evergreens in on that corner, we're going to break down the view of the building. We don't expect it to go away but we do believe we can make a substantial dent in it and we will continually work with the lining those buildings to make sure that the views are blocked.

Last view here, if I can just do this back to the aerial view overlooking the whole site. And Craig, I think that might be your discussion of building height on the aerial that we talked about a little bit about before. There you go. Yes, I'm going to let you talk about that.

MR. KIMMEL: All right, thanks. So, just a point of clarification, and I missed this earlier so I apologize.

DRAFT

CHAIRMAN LORENZINI: Could you give your name again for the court reporter?

MR. KIMMEL: Craig Kimmel, K-i-m-m-e-l, again. In terms of the assisted living building, just kind of related to that 40 versus 43 on the parking, basically what we're proposing is 70 one bedroom apartment assisted living units and three studios. So that gets us to the 73 units total, so that's just out of clarity. It is possible that you could convert three one-bedrooms and three studios into two-bedrooms, in which case you'd have 67 one-bedrooms and three two-bedrooms. That ends up being 70 units but still 73 beds. So, if we think about it in those terms, I think 73 is really the appropriate number. So, I just wanted to kind of get that into the record.

As we look at the building height issue, one of the things that we were really concerned about as we started looking at the design of this as well as the architectural character was really, you know, the reality that we have to screen the equipment that exists on the roof. So you can see in this graphic which is a section cut through the assisted living building, that there is almost a story of roof that basically is being used to completely conceal the mechanical equipment that basically sits in a well that's in the center of the building. So as we start looking at that building height issue, the 48 foot 6 versus 45, really it just has to do with where it falls on that slope of that screen in essence that's providing an architectural character to the building but also really providing a function to hide that equipment that exists up there.

As we start looking at some of the building height, oops, let me just back up a little bit here. Some of the things that I just wanted to touch on in terms of why the building is kind of the way it is. When we start looking at those neighborhoods of 15, we have an elevator in each of those neighborhoods that allows a resident to go a very short distance horizontally, to get an elevator to go down to some of the social spaces like dining and activity spaces. So, by spreading the building out and lessening its height, it really starts to be counterintuitive to serving the population that we're serving. So, we're trying to keep the hallway lines very minimized and allow them to very easily move horizontally to get to all of the functions in the building that allow them to live a full life.

I think as we, we touched base on this section a little bit before as it relates to the scale, and I think those photos really kind of show it very well in terms of that separation distance. You know, in terms of the overall variation, we're about 280 feet I think minimum here from the front face of a building to the nearest point of our four-story building. At that closest point, we've actually reduced the height of the roof so that it actually is lower than the other parts of the building to try and be sensitive to that. When you start looking then at the overall length of the building from the front of the house to the more typical condition, which is along that access drive, your dimension actually goes from 283 to around 330 feet. So, we're basically a football field away from the face of the

DRAFT

houses along Douglas to the point where you actually see the building face that's kind of angled going away, so it does vary depending on where you take that measurement.

I think with that, I'll jump back forward here to storm water.

MR. FRERES: Always an exciting topic, storm water. We're almost at the end, we'll move along quickly. It's important to understand storm water, our understanding of it and our management of it and our concern for it is of utmost importance. We are not asking any variations to the ordinance. In fact, we're meeting or exceeding all of them. The most important thing is that we're meeting those that are established by the MWRD, which have changed and become more restrictive and more focused and highly regulated. We are also recognizing that above and beyond that, we have your own Staff that's managing and watching what we're doing from the IDPH as well.

So, all those components are built into the thinking also built in to the thinking, that was interesting. Almost at the end now, we're almost at the end. There you go.

(Pause for technical difficulties.)

MR. ENRIGHT: Do you know what slide you were on?

MR. FRERES: If we go into that we can get pictures there. Any one of those is fine when we went off. There you go, perfect. Does it go out when we go into slide show or no? No, it's fine. There you go, thank you, Bill.

An important component is reducing runoff, it's the most important thing as our engineers will tell you. The key component is making sure that we reduce it, an hour of the storm at a hundred-year peak and a one percent storm event, a 16 percent reduction in the amount of water that's coming off of that site being held and managed there. That's the most important thing to takeaway from this is to understand that we're holding it, managing it to a greater degree than what it is right now. We're also applying the best management practices we can with regards to runoff, capturing it, underground holding, as well as just recirculating it and using our own water recapture from our ponds to our irrigation.

Those are the key components that will be utilized throughout the site as a part of this plan. Just to give you a sense of how we look at it from a brief perspective, our site is 41 acres. The project area is about just shy of eight acres in terms of that. But when we balance the two existing conditions versus the proposed conditions, we're obviously increasing our impervious surface and we are, you know, aware of that and we're making sure that we're balancing our landscaped areas. By the end of the day, we're reducing that runoff and that's the keynote. The bottom note in there is we're reducing the runoff rate, even though we've increased the amount of impervious, we're reducing that runoff because the rates in the rules as part of MWRD are so much more restrictive.

So, what's the takeaway? The most important takeaway for our neighbors to understand again is that reduction in the

DRAFT

runoff, the time in terms of the runoff and the volume, the reduced time and concentration of how we're holding it, and we are managing the requirements of all of these agencies above and beyond those requirements. From a physical standpoint, what you see is that the pond is bigger. We're actually adding to the pond, we're bring the pond a little bit farther to the south. It's not evident in the slide, but we're bringing it a little bit further south to get a little bit more potential and compensatory storage capacity.

I'll turn it over to Mike.

MR. MaROUS: Good evening, Michael MaRous, I'm the President of MaRous & Company, 300 South Northwest Highway, Park Ridge, Illinois.

CHAIRMAN LORENZINI: Spell your name please?

MR. MaROUS: M-a-R-o-u-s. Simply, I have been appraising real estate for 39 years and actually have done probably 50 appraisals in the Village of Arlington Heights. Actually I've worked for the Village for almost 20 years in various valuation and land use issues.

What was done here was to look at the proposed project, look at the benefits, look at the potential negatives, look at the expenditures, and look at its existing use and the proposed use, and look at its potential impact on property values. Over the last few years, we've actually done studies for senior projects in Lake Forest, several in Evanston, one in Highland Park, and one in Grayslake. We have prepared a report that has been submitted to you and I'll briefly summarize what was done.

It basically was per your ordinance to study what I just suggested and to determine if there was any negative or any impact to the surrounding neighborhood. As part of that, considered studies in similar situation with similar demographics, similar type use at modern high quality senior facilities throughout the metropolitan area. Clearly, the proposed development is providing significant investment, upgrades in landscaping, similar in height, building mass and appearance to the previous development, and the amount of anticipated traffic is comparable.

When we look at impacts, we look at the normal potential issues such as lights, such as traffic, such as noise, such as change of use. In this instance, we looked at basically comparisons of sale and resale in the immediate neighborhood and it actually reflected strong increase. Then we looked at a matched pair analyses of properties approximate to the senior facility, and we did that for the subject area, we did it in Northbrook and we did it in Cary. The finding was there was no measurable impact on the value of the residential properties adjacent to the senior and assisted living facilities.

In the matched pair, again we're trying to find a similar house with similar physical characteristics, similar amenities, similar age, close to the project, and one in a similar neighborhood, similar characteristics, and then I look at the transactions, make an

DRAFT

analysis, and then come to a conclusion to see if there was any impact. And really briefly, in my analysis of this project, and again it's detailed in the study that was prepared, I found no negative impact, and in my opinion it will be a very positive impact for this neighborhood. Thank you.

MR. PEPPERS: If you'll indulge me, I just want to conclude, I have a few concluding remarks. As you can tell, Presbyterian Homes has made a strategic commitment to invest what would be north of \$70 million dollars into this project to rejuvenate the facilities that are out there right now and realign those with the needs of the seniors for now and in the future. As you have seen, the proposal is to demolish those dated structures that don't serve those needs and instead will result in, after all is said and done, of only seven new units to this project.

Presbyterian Homes has really taken and undertaking a substantial time and money to bring these experts to you, as you could tell from this extensive presentation. And we've really prepared a project sensitive to the neighbors, sensitive to the existing facilities, and really centralized these buildings to minimize those impacts. This isn't a cornfield development where we're going right up on the boundary line, or like what we did in downtown, lot line to lot line and having impacts on everyone.

This is very well thought out, well designed and architecturally enhanced and landscape enhanced project as you can tell. Finally, we had Mr. MaRous prepare his report, testify and to evaluate the variations that we're requesting. Again, his conclusion was that there was no materially negative impact on the surrounding property owners. We've used Mr. MaRous in a variety of projects and he's an expert in the area.

We do have a team here. We have others who have not spoken that are available to answer any questions you have. We respectfully request that you provide a positive recommendation to the Village Board, and if you have any questions or comments, we are available. Thank you very much.

CHAIRMAN LORENZINI: Thank you. Okay, so one gentleman was a little, you know, sometimes these meetings go long. So, the next thing Mr. Enright's going to do a Staff presentation, the Village's Planning Department viewpoint. We'll all be asking questions, and then we'll open it up to the public for questions. So, it's quite a long process. Mr. Enright, please, the Staff report?

MR. ENRIGHT: Chairman and members of the board and the public, I'll be very brief. The Petitioner has done a very thorough presentation, so I think it will be more important to hear from the public and the deliberations among the Planning Commission. However, the developer has submitted a very thorough application addressing traffic, parking, engineering, architecture, site planning, and landscaping. It's been thoroughly vetted by all the departments of the Village; the Police, Fire, Engineering, Public Works and Planning. We've worked with the developer to come up with the best plan feasible

DRAFT

for the project.

We see this as not just a very important investment by the Presbyterian Homes in their project but also an important investment in the Village of Arlington Heights. The Moorings has been a great neighbor of the community for years, even prior to Presbyterian Homes taking over ownership. They continue to be a great neighbor. It's an excellent project. I've driven through there numerous times and around the site numerous times over the last 30 days to observe the lay of the land a little closer. We are fully in support at the administrative level of the PUD amendment and the various variations that go with that.

With respect to the recommendation for approval, Staff suggests a few fairly minor conditions of approval. One of which is, condition number one, that there is an Ordinance 85-154 which approved a PUD amendment back in 1985 to the site, and that was regarding the requirement to install a traffic signal on Central Road if warranted at the property owner's expense, if it was warranted in the future. As part of this petition, Eriksson Engineering did a very thorough analysis of not only parking, but the traffic circulation and traffic impacts of the development which would increase very marginally if at all with this project because they're only adding a net seven units.

And the warrant study for traffic signal at either of the entrances on Central Road was not met, so there is not enough traffic coming to and from the site to warrant a traffic signal there. However, that condition should stay in full force and effect as most conditions do from previous ordinances. Therefore, that's a condition, just to alert the property owner, that condition, that there is a signal warrant in the future they would have to install it and maintain it and pay for it.

Secondly, the Petitioner shall work with Village Staff on possible relocation of additional trees on site. There may be a few trees that possibly could be relocated on site. They're doing an excellent job. There's a lot of landscaping, mature landscaping and new landscaping that they're proposing with this development, so it's quite exceptional. We want to work with them on the possibility of saving a few more if feasible. Having said that, they are planting over 100 new trees on site.

The third condition would be compliance with the Design Commission motion. This went through the Design Commission review process, which is a seven-person group, appointed citizen group. They made a recommendation to approve the architecture with a few minor conditions of approval in August of 2015.

Fourth, as the developer alluded to, approval of an MWRD permit, that's the Metropolitan Water Reclamation District, which is the overseeing agency for storm water control in the region. The Village will have to review that in addition to the MWRD Agency as well as the Village of Mount Prospect because this eventually ends up in their public system, the storm water from this site.

DRAFT

Fifthly, a landscape and tree preservation bond, which is a normal requirement as required prior to the issuance of a permit.

Then we have a normal kind of a catchall number six, compliance with all Federal, State and Village codes and policies.

With that, I would conclude Staff's presentation, but of course we're available to answer any questions on the project.

CHAIRMAN LORENZINI: Thank you, Bill. Do we have a motion to include the Staff report into the public record?

COMMISSIONER ENNES: So moved.

COMMISSIONER JENSEN: Second.

CHAIRMAN LORENZINI: Thank you. All in favor?

(Chorus of ayes.)

CHAIRMAN LORENZINI: Okay. Next, we'll go to the Commissioners for questions. Commissioner Sigalos, would you like to start?

COMMISSIONER SIGALOS: Yes. I've got to tell you, after that very excellent detailed presentation, you've really answered all the questions I had regarding parking and the variance of the size of the units and so forth. The only question I had, is this, I understand this is phase one of a multi-phase project? Overall project?

CHAIRMAN LORENZINI: State your name, spell your last name, and your address please.

MS. TOLAN: Hi, I'm Nancy Tolan, T-o-l-a-n. Also 3200 Grant Street in Evanston.

The phasing of this project is really as was described. We have a sheltered care building that's currently occupied. So, the intent is to construct a resident fellowship hall and assisted living simultaneously, and then relocate residents from sheltered care into assisted living, and then construct memory care.

COMMISSIONER SIGALOS: Okay, so this project, this \$70 plus million project is what's before us now but there is no future down the line phase two, phase three further developments of this site?

MS. TOLAN: There are not future plans to develop. There is good practices and understanding, you know, of how we manage our land moving forward. But we do not have projects planned beyond these two phases, yes.

COMMISSIONER SIGALOS: That's all I have. I think it was an excellent presentation.

CHAIRMAN LORENZINI: Thank you, John. Commissioner Jensen?

COMMISSIONER JENSEN: Yes, I think you've done a wonderful job of fleshing out what you brought before the Plat & Sub Committee, and so I'm very pleased with the presentation. I think the Staff work is very good.

My only comment was that I did not find your market study to be real helpful. You had 22 pages, two slides, a title page and a page summary and a lot of graphs, and I'm used to looking at

DRAFT

a lot of graphs. They didn't mean very much to me in general. The vacancy rates were helpful. So as you bring this before the Board, you might want to reconsider what you want to put in front of them in terms of a market study because I found this to be a distraction.

But other than that, I'm very supportive of the project. I think it's a great project, a great project for the community, and I think it will serve The Moorings community well.

CHAIRMAN LORENZINI: Thank you, Lynn. Commissioner Ennes?

COMMISSIONER ENNES: While I didn't have the benefit of the Plat & Sub Committee, my compliments to the Petitioner for a very well thought out comprehensive plan. We see a lot of proposals and very few them are as detailed as this. So, my compliments to you on that.

I do have a couple of questions. In regard to the seven additional units, will those seven additional units provide housing for seven people or 14 people? Whoever might be able to answer it.

MR. KIMMEL: Seven.

COMMISSIONER ENNES: For seven.

MR. KIMMEL: Yes, they're individual occupancies.

COMMISSIONER ENNES: Okay, so we really have a net improvement in parking.

MR. KIMMEL: Yes.

COMMISSIONER ENNES: Okay. Once the project is completed, do you know what the lot coverage ratio is going to be for parking and buildings? I'm not looking for an exact number, just --

MR. ENRIGHT: Well they do meet code, I know that and they do have it in their submittal somewhere.

CHAIRMAN LORENZINI: Come back up to the mic please.

MR. FRERES: Yes, 17 percent per building. Yes, per building. I don't know if you want me to go all the way over to --

COMMISSIONER ENNES: No, that list is very long, it's just very long.

MR. FRERES: It's very long. It was on that slide where I showed the existing and the proposed --

COMMISSIONER ENNES: Okay. I might kill your name, Mr. Swortzel?

MR. FRERES: Scott Freres.

COMMISSIONER ENNES: Okay, I'm sorry. While you're up, your slide on the Douglas Avenue view number two.

MR. FRERES: Okay. Let's bring that up real quick.

COMMISSIONER ENNES: Actually, your architect may, if he's the one who prepared this directional view to show the height for the lot line, might be better able to answer this. Okay, and please forgive me, I am not an architect and it amazes me sometimes when we see this type of, ah, view number two.

MR. KIMMEL: View two, there you go. Yes.

COMMISSIONER ENNES: Okay. Sometimes when we see these

DRAFT

and I go back and look at the properties after they're developed, it seems like the buildings are so much higher than what I thought these drawings were. So, my question to you is what do you do when you prepare a view like this? Because you've got to --

MR. KIMMEL: How do we generate the view? Okay.

COMMISSIONER ENNES: What are you doing to make sure that that's what the height is going to look like from the lot line?

MR. KIMMEL: Well, what we do is we're using a software program called Revit, so we're building the building, the proposed building and the buildings around it three dimensionally.

COMMISSIONER ENNES: Right, okay.

MR. KIMMEL: So, that gives us a height and a depth and the general character of the building. We're also modeling the topography, the site grading, so we know how the building is sitting on the site. We then take the photograph and we know where the photograph, the point at which it's taken, so within the computer-generated model we position a view from that point that the photograph was taken. Then we basically superimpose the photograph on the computer image and we make a little bit of adjustment because they're not always exact. So, in this case where you have foreground buildings, you can actually use the edges of foreground buildings to basically make sure that your view and your height and your angle are basically as comparable in the model as they can be to the original photograph. They're not, these are not perfect, I mean they can't be perfect.

COMMISSIONER ENNES: But I'm not going to come out later and see that the building is half the size of the white ridge line around that cottage?

MR. KIMMEL: No, no. I mean there is a little bit of margin for error in this because you're working with a photograph that in its very nature distorts the image a little bit through the lens that it's being taken from.

COMMISSIONER ENNES: One last question.

CHAIRMAN LORENZINI: Excuse me, leave these images up, okay?

COMMISSIONER ENNES: I don't know if this is really a statistical term that you use in laying out something like this, but what is the effective setback of all the buildings on your perimeter? Or maybe not effective, what is the shortest distance from one of your building improvements to the street?

MR. KIMMEL: I think, the closest distance I think is the 283-foot dimension.

COMMISSIONER ENNES: The 283 goes to the house on the other side of the street, doesn't it?

MR. KIMMEL: No, 283 is to the property line I believe.

MR. ENRIGHT: Well, I calculated, I think it's less than that. The closest point of the assisted living building to their west property line, and the property line is, you know, inside of the curb line by about 15-20 feet because they've got a parkway, is about

DRAFT

165 feet to the closest point to the property line.

COMMISSIONER ENNES: Okay, which is considerable.

MR. ENRIGHT: But then you've got another 66 feet of street right of way which is the street and a parkway on the other side.

COMMISSIONER ENNES: Okay. That's all I have, thank you very much.

CHAIRMAN LORENZINI: Thank you, Terry. Commissioner Green?

COMMISSIONER GREEN: In the Plat & Sub, I was impressed by what was brought to us. After seeing the finished product, kudos to all the planning and the architect for what they've done and I think it's a great project. I look at this view here and I know that the building is going to be back there, but the most impressive part is that it's a 41-acre site and to be that far away from a sight line is a great project.

The Moorings has always been a real, what I think a real topnotch project within Arlington Heights for many years. I had the privilege of working on that project back in 1985. So, I'm pretty familiar with it for a long time. Good job, guys!

CHAIRMAN LORENZINI: Thank you, Bruce. I have a question for the architect, if you could come back please? So, this view I'm looking at right here, the new building, that is the new building in the background?

MR. KIMMEL: It is the new building in the background.

CHAIRMAN LORENZINI: Okay, and that's the view from sight line two?

MR. KIMMEL: Sight line two.

CHAIRMAN LORENZINI: Now, can we go back to the aerial, Bill, that shows sight lines one, two and three, where they're taken from? A couple of slides back. Okay, now, let's go to the sight line, the sights have three before and after you do the planting.

MR. KIMMEL: Okay. Go forward.

CHAIRMAN LORENZINI: Okay, so that's the new building there?

MR. KIMMEL: That is the new building.

CHAIRMAN LORENZINI: If it was built today with the existing trees, that's what it would look like?

MR. KIMMEL: Correct.

CHAIRMAN LORENZINI: On the next slide, it shows the trees planted?

MR. KIMMEL: Yes.

CHAIRMAN LORENZINI: Okay. How long in the future after those are planted is that view?

MR. KIMMEL: Ten years to get full maturity of the street trees.

CHAIRMAN LORENZINI: Okay. All right. Mr. MaRous?

MR. MaROUS: Yes.

CHAIRMAN LORENZINI: I'm sorry, I hope I don't murder

DRAFT

your name.

MR. MaROUS: MaRous.

CHAIRMAN LORENZINI: MaRous. You said there was no substantial impact to the property values. Just give me an example of what would impact, not that this is going to, but let's say there was a project that would impact the property values, what type of things would they have to do to cause an impact to the property values?

MR. MaROUS: Waste transfer station.

CHAIRMAN LORENZINI: No, but with a facility like this.

MR. MaROUS: Oh, a facility like this?

CHAIRMAN LORENZINI: What could they possibly do to decrease the value of the homes?

MR. MaROUS: I think looking at this view right here if it was the main entrance and if it was wider and it accommodated all the truck traffic, the garbage trucks, et cetera, maybe have a standing area for cabs or other transportation that was sitting and parked on Douglas.

CHAIRMAN LORENZINI: Okay, that's good enough. All right, thank you. All right, that's all I have.

So, we'll go on to the public comment portion now. So, let me just ask the question, all those who want to make a statement or ask a question, would you please raise your hand? Okay, and may I ask, the yellow buttons, what do those say? I love?

AUDIENCE MEMBER: The Moorings.

CHAIRMAN LORENZINI: The Moorings, okay. Thank you. All right, so let's start on my right, your left side of the room. We'll start in the first row and then go to the next row and the next row. Does anybody on the first row want to speak? Please come forward, state your name, spell your last name please and give your address.

QUESTIONS FROM AUDIENCE

MS. JOHNSON: Margaret Johnson, J-o-h-n-s-o-n, The Moorings resident, 811 East Central Road, Arlington Heights, Illinois, Apartment 415. I'd like to share my thoughts, which are the thoughts of a resident and who loves to live at The Moorings.

So, good evening. I'm Margaret Johnson, a resident at The Moorings since 2000. In a couple of weeks, I'll have been there 15 years, anyway as God would bless here, yeah, right.

I'd like to share with you how the buildings that you are now currently reviewing would be a benefit to The Moorings residents and to the neighborhood. Two of the buildings I'd like to share a few thoughts on are the new assisted living building and fellowship hall. First, I would like to point out, and I do, that The Moorings with its beautiful, well-kept grounds are not only a blessing to those who live there, but also to its surrounding neighborhood. The improvements that are listed are needed to modernize the assisted living homes for today's residents, but also to keep The Moorings in

DRAFT

demand for generations to come.

The Moorings has, I'm nervous.

CHAIRMAN LORENZINI: It's okay, you're doing fine.

MS. JOHNSON: A successful Moorings maintains a successful neighborhood, always as beautiful as you see here today. The Moorings is a continuing care facility that's offering health and services to independent, assisted, memory, and healthcare. For some independent living residents, assisted living is going to become necessary. The design, the additional space and accommodations of the new building allow each one to truly continue to live in a very comfortable home.

The building is beautiful in my opinion. Inside and outside in its design, you create a perfect balance to the community and also to the grounds. Add the landscaping and trees, flowers, the greenery, a pond and even some swans, and as you look out the window you see a paradise garden. Truly a very special place to call home. I believe that the assisted living building and all the plans that you're reviewing were designed with the good of everyone in mind.

Now I'd like to share a few thoughts on fellowship hall, something I hold very close to my heart. The Moorings residents are men and women that come from all walks of life. They're very talented, very kind, very caring. They're people of all faiths, coming together, respecting one another, and they're the soul of the community. Fellowship hall would be the heart, it would be the center of community life.

The Moorings has a well developed and dedicated spiritual life group under the guidance of two chaplains. As a member for many years, I with others help serve and befriend many. I was so moved by those suffering major illness and end-of-life issues with no special place to go. It's become clear to me that a sacred space was absolutely needed so they can share and pray with their family and their friends and their loved ones. They needed a quiet and a peaceful place to be with family, friends, and also for themselves.

In addition to these individual needs, fellowship hall's location and the first that we've ever had a space large enough with easy access for everyone, would allow one to invite and to welcome the community as a whole to share in many, many programs. Some of these programs would include worship services, concerts, bible studies, memorial services, lectures, holiday celebrations and much more. We look forward, the residents, to the fellowship hall completion knowing it will be the center of community life, for in our coming together we create and we deepen friendships, we strengthen the community as a whole, and it helps us to grow in unity and in love which is good for each and every person that lives there.

I give thanks to all who have worked on this plan, and I thank you for your work and your discernment. I with the rest of the residents look forward to these plans becoming a reality. Thank you so much.

DRAFT

CHAIRMAN LORENZINI: Thank you very much. Anybody else on first row who want to speak? Yes, ma'am, come forward. State your name, spell your last name please, and your address.

MS. BECKER: Vivian Becker, B-e-c-k-e-r. I'm one of the more than 450 residents of The Moorings. This became my home when I bought into it six years ago. Being part of this community makes me already then a homeowner and a taxpayer in this Village, and I see myself living here until the end of my days. I feel that this planned development at The Moorings will improve my investment in the community, in The Moorings itself, plus in the Village of Arlington Heights.

This continuing care senior facility is already a great asset to the Village. And any additional developments to the campus can only be more beneficial to the entire neighborhood. Thank you.

CHAIRMAN LORENZINI: Thank you. Anybody else on the first row who wish to speak? Okay, the second row, anybody? Yes, ma'am, come forward please. State your name, spell your last name please, and your address.

MS. FEELEY: My name is Eileen, E-i-l-e-e-n, Feeley, F-e-e-l-e-y. I'd like to focus on the assisted living. As each of us lives another day, we not only get older but we sometimes get more frail. Moving to a place like The Moorings provides a safe, secure place where all we need is available to us.

As a total community, people at The Moorings become each other's friends and neighbors. They've lost their lifelong friends, they've lost members of their family, and they begin to be a new family for each other. Then someone recognizes that they need more intensive support, so they graduate into the assisted living property which is a plus as far as their physical care is concerned, but it is not a plus as far as their mental capacity because the units presently in the assisted living area were not designed to be that. They were meant for a more health-oriented lifestyle.

So, presently, I have a neighbor across the hall. That neighbor turned 99 years old. At that point in time, she moved to assisted living. You'll notice I approached the podium slowly because right as she moved I broke my ankle. So, it's not possible for me to walk the great distance that presently exists between the independent living where she and I both were and the assisted living where she is.

We also have a World War II nurse in her 90's, obviously someone who has crossed the ocean dozens of time caring for the wounded. It's a little difficult to live in such a small space. It's not even possible for three of us to sit and converse. If we move to a generalized area like the living rooms that are available, it's difficult for her to go that far.

Geriatrics has researched this type of facility. One of the things that they've discovered and recommend is that people keep their own belongings. Now, every man has a favorite chair and every woman has a favorite gewgaw that they're not willing to give up.

DRAFT

Presently, both can't be kept. You can only keep the barest amount of your clothing because there's not a lot of closet space. You can keep perhaps one or two pictures, and we all have pictures of births and weddings that are very important to us. So, we really would like to keep those.

As you look at the new drawing and you see Building B connected to the fellowship hall area, you can see that if my friend and I wanted to meet, each of us would only have to go half the distance that it presently takes us to visit each other. So, this would be a tremendous help to those who have suddenly become separated from the new family they just generated and now are separated from.

I think that the recommendation to enlarge the space is in line with current geriatric research. I think the fact that Arlington Heights offers such really great medical services is a plus for The Moorings. I would hope that as your family ages, they would come to join us at The Moorings.

CHAIRMAN LORENZINI: Thank you. Anybody else on the second row? Yes, ma'am.

MS. HORSWILL: I am Jane Horswill, H-o-r-s-w-i-l-l. I live at 1042 South Moorings Drive, Arlington Heights, Illinois 60005.

I'm here to talk about the memory center and I can hardly wait until that gets built. It sounds wonderful. I come before you this evening as a person who once spent 32 years in the medical health profession. I now live at The Moorings in a villa, which is considered independent living. My husband is now in the memory center with dementia. We have had the feeling that we would never grow old, but unfortunately old age creeps up on everyone, and so we moved to The Moorings for continued care.

Everyone in this room will eventually get old if one does not have a fatal accident before becoming elderly. Most of you will need care at some point. The Moorings offers independent living, assisted living for more care, rehab department, and a memory center for those who have Alzheimer's or dementia. As of now, there is still no cure for these diseases.

Have any of you gone to one of these retirement homes or have a loved one in a home? The Moorings definitely needs to modernize its facilities that more and more elderly need to have care.

Alzheimer's disease was rare a few years ago. Now, Alzheimer's disease is the second highest cause of death in the USA.

With memory loss on the rise, there needs to be a larger memory center. The new space will provide a more overall home-like environment for the residents. The residents will not have to share their dining room and activity space. Memory care and assisted living is not just an investment in The Moorings and in its current and future residents; it is an investment in the community.

If you have to think about a retirement home, would you not like a nice place to move to in your later years? Think about it. Thank you for listening.

CHAIRMAN LORENZINI: Thank you. Anybody else on the

DRAFT

second row? Okay, we can just continue. Come forward, ma'am, but let me just ask a quick question. Everybody in favor of this project, would you please raise your hand? Okay. That just gives us Commissioners an idea. I still want you, if you want to come up and speak in favor, that's fine; or if you want to speak otherwise, that's fine. But this kind of gives us an idea of what you mostly are feeling. Yes, ma'am, your name and address, and spell it.

MS. BAUMGARTNER: My name is Charlotte Baumgartner, and I live at 753 Crescent Drive. I've been a resident of The Moorings for 11 years. As a nurse, I know how important exercise is to keep one's body healthy and fit. However, only in the last two years have I experienced the personal value of exercise and it changed my life.

We really need an appropriate dedicated space for our exercise program. Our locker room will become more than one shower, one toilet, and nine lockers. Right now, the limited space discourages residents from attending water aerobics or our arthritis class. The cardio and strength training class sometimes is 15 minutes less due to another event scheduled in the same room.

The assisted living residents exercise in the TV and activity room. We have no fitness space now that realistically fits the culture we live in. We have two women in their mid-90's in our chair cardio strength class, and another 100-year-old woman in our chair yoga class.

I believe The Moorings continuing care community is an asset to the Village. I would like to be assured that soon new residents and our present residents will be encouraged to exercise in an adequate beautiful space designed for keeping us healthy and fit throughout our lives. Thank you.

CHAIRMAN LORENZINI: Thank you. Anybody else on the third row? Anybody on the next row? The next row? Anybody else on this side of the room?

Okay. Let's cover this side of the room. Anybody on the second row? Oh, I'm sorry, sir, come forward. State your name, spell your last name please and your address.

MR. HINES: Excuse me, my name is Dave Hines. I live at 108 Hatlen Avenue, Mount Prospect which is the street east of Audrey, so two blocks over from The Moorings.

Just a couple of concerns. I don't really have a problem with The Moorings itself. As a neighbor or a unit, again I'm two blocks over so I can't speak to the adjoining neighbors, we flooded three times at our property. We flooded once in '87, I think it was a 500-year rain. We flooded in '89, I think that was a 200-year rain. I may have the numbers reversed, I don't remember. And we flooded in 2011.

The first flood was due to a construction dike breaking. If you look at Audrey, there's a swale that comes down. We're directly behind that swale. Where the mud came over, we have pictures of the mud. My neighbor had 36 inches in his basement, I had 18, and it went on down fast at Hatlen Avenue.

DRAFT

My concern is, with the flooding, three issues. Construction, flooding while the project is going on, I want to make sure there's adequate dikes that won't break during torrential rains. We have the sewer concerns from elderly neighbors who aren't here right now. I understand that Mount Prospect and Arlington Heights share a sanitary sewer system. So, I know we're only talking about adding seven people, but I want to make sure that there is not additional usage or usage that hasn't been worked out with the Village of Mount Prospect in addition to Arlington Heights also.

Then the third would be the storm and the sanitary, I'm sorry, the storm water runoff. It sounds like you can compensate for it with a 100-year rain, but I'm more concerned with the higher rains than that. I know you have some underground trenches, I don't know if those are connected underneath the parking lots that release them at a slow rate. So, that's my concern with the flooding during and when the project is complete.

I understand from a previous meeting, and maybe you can just clarify this later or address it, that the project was supposed to start in 2016 and it was going to complete in two-and-a-half years. Then I also have a question about how is the project being funded? So, I'll turn the microphone over to whoever wants to answer.

CHAIRMAN LORENZINI: Okay. As far as flooding goes, the overall detention of the area is being improved. So, it's going to help whatever flooding occurs or has occurred, and they meet all of the requirements. But now you do have a legitimate concern about during construction. What happens if something goes wrong? Bill, could you or somebody answer that?

MR. ENRIGHT: Their engineer would have to, you know, I don't know all the particulars of how they're phasing the construction with respect to when they're going to start the detention versus the buildings. But I'm assuming that's --

CHAIRMAN LORENZINI: Well, I think the question is during construction, how do you ensure you don't increase the chance of flooding, where you at least keep it where it's at now?

MR. ENRIGHT: Well, hopefully one of the first things they would do would be to enlarge the facilities that they're going to enlarge, the west lake. But they'll have to testify to that.

CHAIRMAN LORENZINI: Can somebody --

MR. RENNER: Mike Renner, vice president with Eriksson Engineering.

CHAIRMAN LORENZINI: Would you spell your last name please?

MR. RENNER: Renner, R-e-n-n-e-r. Address is 145 Commerce Drive, Grayslake Illinois.

The question that you had asked is how do we mitigate any flooding or issues during construction. Although the details haven't been worked out quite yet, we will have to comply with the Village of Arlington Heights requirements for any sediment and erosion control during construction as well as MWRD. There will be a

DRAFT

plan that is created that will include such things as sediment traps and erosion control fence.

All of this will be, for the most part, contained centrally to our campus. There is very little area affected, really isn't any construction that is taking place outside of the ring road with the exception of there is one sewer connection. But all the heavy duty construction is going to be taking place internal to the ring road where we can actually manage that. We'll probably put up a curtain adjacent to the pond to keep all of the erosion out of the pond. But there will be soil and erosion control elements that are placed on the property.

CHAIRMAN LORENZINI: Okay. The other question that I heard was we're making the storm water situation better by retaining more of the water, making the pond larger. But what about the sanitary? Where is the sanitary going? Is this going to make the situation, well, there's only seven more units so I don't know how bad it could make it.

MR. RENNER: That change to the sanitary is a small increase to the system. So, I don't think there's any concerns for capacity to downstream receiving sewer. We will have to comply with MWRD, the Village of Mount Prospect or Arlington Heights in connecting to that downstream sewer. We'll have to prove capacity.

CHAIRMAN LORENZINI: I think the last question was start and finish of the project and financing.

MR. SWORTZEL: The dates that he mentioned were correct. The plan start date is spring or early summer of 2016. The duration is going to be two to two-and-a-half years. Because it's a phase project, we need to complete the fellowship hall and assisted living before we are able to remove the existing sheltered care building and build memory support. So, it does create an extension of the construction period to two-and-a-half years.

The project will be financed through normal financing that we will do with investor investment, probably through municipal bonds.

CHAIRMAN LORENZINI: Okay, thank you. All right, anybody else on this side of the room have questions, comments? Okay. All right, if that's, yes, sir, did you have something? Please come forward. State your name, spell it for the court reporter please, and your address.

MR. BABICZ: Hi, my name is Ted Babicz and I am at 1124 South Douglas Avenue in Arlington Heights, Illinois.

CHAIRMAN LORENZINI: Can you spell your last name please?

MR. BABICZ: Babicz is B-a-b-i-c-z. I'm here as one of the concerned neighbors for the 1000 and 1100 block South Douglas Avenue in Arlington Heights. I'm looking forward to your support as far as the Planning Board to take a good hard look at some of the concerns of the residents and alternatives that we will present here to you.

DRAFT

We attended the meeting, fellow residents and I attended the meeting with The Moorings as far as neighbors on 9/9/15. They presented their expansion of the properties, which they've all talked about tonight.

Just a little background, I was there in 1987 and part of the overall Douglas Avenue organization that worked with the Village as well as The Moorings which at that time I think had another name for the property, Lutheran General property. We came to a successful agreement, all parties being there, and the project took off.

Today, The Moorings is integrated within a quiet neighborhood on all sides of the property with residents owning single and two-story homes. Some of the residents who have been on Douglas for a short period of time, they're improving their homes; a lot of us have been there ten plus years.

What you have here is a new institutional building being introduced, you know, on the Douglas Avenue side. It's a residential side of Arlington Heights. What's there today works, single-family villas within the homes surrounding the neighborhood. In my particular case, that is my view of the new Moorings project. I live directly across from that. I also have six neighbors that will also share in that view.

One of the things that, you know, taking a look at, I was very surprised taking a look at the documentation that was sent to us on Friday, September 25th, I was clearly surprised that there was a great concern for businesses, homes, the church, North and Central Avenue into the east and south Mount Prospect residents. Douglas Avenue didn't even have a, I'm sorry, did not even get a simple honorable mention when all these considerations and documentation have been put together.

I did review the detailed drawings. I uncovered some disturbing information in Drawing A.102, partial ground floor plan, Area C. Something that we're not talking about here is the use of that building on that corner to be, number one, a loading dock and a disposal for garbage. There is a compactor within that building. So, what we're going to get is we're going to get noise from the loading dock. It's going to be an open thoroughfare with trucks, semi-tractor trailers, automobiles, pollution increase, noise at all times of the day and the evening. Garbage guys like to come at 3:00 a.m. in the morning to take the garbage and move it away from the property.

A question I also have is will they use Douglas Avenue as an entrance, you know, to this docking area? The trash compactor that's located next to the proposed dock will produce garbage smell, maybe, you know, an infestation of bugs and rodents. Again, I still look at the, you know, the 3:00 a.m. visits of where the beepers are. I've been in many hotels and that type of thing within some of the areas throughout the United States and that's generally when they do their business. That's my experience.

This document location, if you look at it in

DRAFT

reference is number two, that view number two there is directly across. It's within 150 feet of Douglas Avenue, and to me that's a major concern. There's going to be noise and pollution from all that's there.

I did meet with the Village Planning Department, Latika Bhide and her manager Bill Enright. We reviewed some of the drawings. We took a look at various components of the project and the like. We saw a lot of nice layouts, and one of the things I did not see or failed to see is what you're looking at here. I did ask Bill, Bill agreed that it was reasonable to ask The Moorings folks to put these drawings together with a perspective looking from the Douglas side of the street.

So, from that point, I met personally with Nancy Tolan and the landscape architect, Scott Freres of the Lakota Group, and we did walk Douglas Avenue. I walked Douglas Avenue with these folks to take a look at the property, properties of Douglas Avenue and with respect to the properties in The Moorings property. We also went inside of Moorings and we took a tour from the facilities, trying to get somewhat of an idea of what it looked like.

So, in regard to that, we talked about why the building being where it is and their, you know, their rights or their, I heard the message that this location best suited their needs. They wanted to provide the right services according to market needs and remain competitive. I also got my question why to which, you know, they presented their reasons why they want the project to be where it is.

We left the meeting with an agreement to work together with the Village, with The Moorings folks as well as the residents of Douglas Avenue. On Monday, September 28th, I received an e-mail from Nancy with the superimposed layouts of the property which included pictures and renderings of the proposed buildings from the Douglas residents' view. I was mostly interested in resident view number three because I'm across the street from that view location. Very concerned to see the mass and the height of the assisted care building, let alone the color scheme. There's a lot of red buildings there, the color scheme is totally different and it kind of sticks out.

From the rendering itself, number two, the gentleman that lives at 1116 South Douglas is the one that directly would be looking in that area. He took one look at that drawing and says, hey, there's something wrong with it. It appears that the new buildings, and I appreciate, Terry, I appreciate your comment about there's a building growing after it's been built. He says that kind of looks like it's been positioned in the middle of the property. I'll show you, I'll share something a little farther down here where I came up with some calculations.

I asked Nancy to take a look and to check, you know, to check and see if all of this was done correctly. She said the proposed building images were generated from the site plan from photos taken within the last week, so I'm certain that these are accurate and

DRAFT

positioned correctly. If one looks at the photographs, you can plainly see they are generated by Google Maps and dated August 2012. Images from Google Maps are panoramic views that are somewhat distorted, therefore, giving a not-so-true image.

I secondly asked Nancy for the dimensions from the Arlington Heights properties on Douglas Avenue to one of the curbs that is on Moorings Drive which would be on the east side. She came back with those numbers and I went through and I calculated using basic trig.

CHAIRMAN LORENZINI: Excuse me, let me just ask a quick question. Who's Nancy?

MR. BABICZ: I'm sorry, Nancy.

CHAIRMAN LORENZINI: Oh, okay, that's all right.

MR. BABICZ: I'm sorry, Nancy Tolan. I took, I just simply took the dimensions for the buildings, what was given to me by Nancy Tolan, and did a calculation and find that there's probably about 24.6 feet that are missing from that view. Just basic, simple trigonometry using 9.63 as the dimension looking up, and taking the buildings that are, the villas that are there, I've added, I've actually added height to that. If I lowered it down to where it was, I'd probably get a bigger dimension there. So, there are some missing views out of that height, there's a big difference.

As you can tell, I'm not in favor totally of the proposed project along Douglas Avenue. The Moorings have been great neighbors. They keep up the property, they cut their grass, the fencing around the property is great. The neighbors, you know, when they come to walk on our side of the street, they have all been very pleasant and the like. We never had any problems with them.

I know The Moorings wants to survive, answer the needs of the baby boom aging generation and older. We want them to remain strong and to be a good neighbor and to keep up their property. There is a saying, "We do not plan to fail; however, we sometimes fail to plan." This is a golden opportunity to plan to do the right thing for all parties.

I have a question for Craig Kimmel. There was a meeting that was held in November 2nd, 2014. I'll use what you stated at that meeting. He said that they would be introducing two new apartment buildings with 45 units and 41 units. He explained that the buildings would be connected to the common space on the first floor. He also said that there would be another four-story apartment building on the back end. So, I mean that's something that, are they going to, is there a plan?

CHAIRMAN LORENZINI: Well, let's finish your comments, and then we'll get their response.

MR. BABICZ: All right. So, what I'm asking is that, the folks from The Moorings, to take a re-look at the picture renderings. Please use current pictures and not Google to give true projections of the building for numbers one, two and three. Maybe one, it's the same level, that's, you know, okay, fine, but the thing is

DRAFT

that, you know, you use a straight projection, great, but people always look around. So, you know, that's one of the components.

Incidentally, in the drawings with your dimensions, the Douglas properties have a distance of 30 feet from the building to the property line, the street is only 24-foot wide between the curb. Ultimately, I would ask that the new proposed buildings be relocated somewhere else on the property. If not, rethink the height of the project to two floors and redistribute the remaining assisted living units to other areas of the project in the campus. To use one example is the Autumn Leaves complex, you folks probably have worked on it. It's simple, it's elegant, and it's a single story.

Take a look at the redesign of the new buildings. To match the existing buildings that are out there, most of all, I mean even for villas as well as the five solid structures you have in place today are all red. You know, we're introducing new colors and it really sticks out as far as the drawings themselves.

I'm going to ask what are the traffic patterns going to be within The Moorings? Specially with semis, trucks, all the rest of that. How will they be entering and leaving the property? Will they be exiting on or through the emergency entrance off of Douglas Avenue?

If this project goes through, I as well as the residents of Douglas Avenue are requesting that the emergency exit or entrance on the 1100 block south of Douglas be permanently closed. It is, since 1987, there has been no emergency equipment to my, my neighbors', nor The Moorings' Nancy Tolan's knowledge, by the Police Department and/or the Fire Department using this entrance. It's been used mainly for snow removal and for the entrance to The Moorings lawn service. This closed area could mask whatever you're seeing here, because we have a nice little view here from the trees, would mask the view totally of the new structures that are there. I wish that you gentlemen would consider that.

In the current proposed drawings in the south assisted buildings, the details, there's a garage and laundry facility. Garages need ventilation, they have noisy fans. Where are those fans going to be located? People really need to make sure that you take a look at that. They shouldn't be on the Douglas Avenue side, they should be into The Moorings side, or venting somewhere through the roof through that access area that they have planned.

Soiled laundry from the patients' beds should be very smelly and where does the stink go? I'm hoping that the fans exhaust that and will either go into The Moorings courtyard or up above. The question is, you know, does The Moorings really need underground parking? Could it be located to another surface parking area? Can the extra floor space be used for assisted living or the residents?

Again, I go back to The Moorings, the drive, the thoroughfare, you're 150 feet of the residential section of South Douglas Avenue, you know, and I go back to the noise and peace of the

DRAFT

neighborhood.

The initial project for the assisted living building will take two years, or two-and-a-half years as I heard tonight. The balance of the project will take another three years to the total of, reading some of the documentation, five years for the total project. Can we be reassured that there will be no construction workers, no cars, no trucks or equipment on South Douglas Avenue? This was promised by The Moorings staff. You know, then we ask that, we'd like to see that, you know, in writing if possible.

Then again what we also look at is we need to ask the question of what's in it for the Douglas residents for the pain and suffering and dust, dirt, noise and disruption? We went through The Moorings' 1987 project and it was very, very disruptive, very dusty. Part of the flooding problems that we had in 1987 was due to berming on the property.

This project was worked on without any knowledge of the residents on the periphery of The Moorings property. We were introduced to it on September 9th, which was late in the game in the approval process. We're asking for our voices to be heard and our requests given thought and consideration for all parties. We look forward to working with each and every one of you. Thank you.

CHAIRMAN LORENZINI: Thank you, sir. Bill what's the relation, you made those comments for those concerned about pickup time and traffic and whatnot. Does anything we're doing here violate any city codes?

MR. ENRIGHT: No, and there will be no entry or exiting to Douglas Avenue. This is strictly a fire lane. We can certainly investigate with our Fire Department whether or not they would like to keep that open. It's only accessible, in theory at least, to the Fire Department but not for everyday traffic.

CHAIRMAN LORENZINI: But is it needed for code in any way for fire access?

MR. ENRIGHT: It's part of the original PUD so we would have to look to see whether or not it's necessary. There are two egress and ingress points off of Central that are pretty far apart. So, it probably would not be required by code but we would have to investigate that with the Fire Department, because if we could properly close it off, if The Moorings was amenable to that, there could be additional landscaping there along that fence line. So, it's something we will certainly investigate with the Fire Department prior to this moving forward to the Village Board.

CHAIRMAN LORENZINI: All right. A lot of the other comments dealt with the design and layout and whatnot, and that's been approved by the Design Commission. To have to redesign this project at this point, I think we're past that.

My other concern is there's a lot of statements made about the accuracy on the views given. Would you like to address that? Would somebody like to address those in any way?

MR. KIMMEL: Yes, I think one of the things that is a

DRAFT

little bit deceptive about the site is it is not flat. So, as you move south on Douglas, the grade does drop and it equally drops as you move south from what is the entry to assisted living down past this view, down around the base of the building. So, the elevation of the building does change as you move around the building.

In addition, the roofline, and I mentioned this a little bit earlier, where the building bends and is closest to Douglas, we have reduced the roofline so that view and view two where the building has a little bit lower perception is also because that is not the same ridge line as the view that's on the screen right now. It is lower by, I think about five feet. So, that does make up for some of that delta. It does not kind of translate to 26-and-a-half feet, so I'm not sure; the methodology that we used for all of the views is basically the same. I know that this photograph was definitely not a Google image, it was just taken, I think, Scott, a week ago? So, I'm not positive about image two and whether that was a Google image or not.

CHAIRMAN LORENZINI: Okay. We're certainly going to come back to the Commissioners to ask follow-up questions. But is there anybody else in the audience?

COMMISSIONER ENNES: If I could, one of the questions that was raised was in regard to garbage pickup. Bill, aren't there limitations on when haulers can remove waste from institutional properties?

MR. ENRIGHT: Well, not necessarily institutional but it's generally 7:00 to 7:00. But sometimes they come a little earlier, sometimes a little later, but everybody gets their garbage picked up, I mean there's garbage trucks all over.

COMMISSIONER ENNES: I abut an institutional property, and for a couple of months we had a problem with that. We talked to them, they got their hauler to quit coming in so early.

CHAIRMAN LORENZINI: Sir, did you have a comment? State your name, spell your last name please and give your address.

MR. PHILLIPS: Name is Robert Phillips, P-h-i-l-l-i-p-s, 1136 South Douglas. My question is do you anticipate any displacement of staff parking on Douglas which occurred when you repaved your parking lot recently? We had staff sitting outside our houses early in the morning on the way to work, not a very comfortable feeling, near my house, my wife, people sitting in their car.

CHAIRMAN LORENZINI: Yes, Nancy, come forward. First, let me ask, Bill, is there any restrictions on parking on that street?

MR. ENRIGHT: I don't believe there are any right now, but certainly the Plan Commission could make it a condition of the approval if you wanted to limit any, you know, any sort of parking on the street for --

CHAIRMAN LORENZINI: But how do you, if we did that, how would you distinguish between residents' guests and The Moorings?

MR. ENRIGHT: It's difficult but let's hear from the Petitioner. They're going to have to submit as part of the permit

DRAFT

where they're going to park everybody. Their peak parking is about 65 percent of their onsite parking right now so they do have ample parking to accommodate a lot of people right now for, and that's my understanding, that they'll be able to accommodate their contractors.

CHAIRMAN LORENZINI: So, part of the permit is to accommodate parking?

MR. ENRIGHT: Well, part of their permit is to give us a plan for how they're going to accommodate and how they're going to phase construction to address all those types of issues.

CHAIRMAN LORENZINI: And that's up to Village's approval?

MR. ENRIGHT: Absolutely, the permits get approved by the Village, yes.

MS. TOLAN: Thank you. I apologize to the neighbors. There was a period of time where we were resurfacing our parking lots, and during that period of time those were not available for parking. But we do have ample parking on our site for our guests and residents and staff. I'm not aware of any other time except for when we were resurfacing the lots when parking was an issue. It is our plan to have all staff parking on the property when we are under construction. We will also manage construction traffic to and from the campus off of Central Road. Obviously we will park on the property or we will provide satellite parking and busing for our workers. So, we will not be parking on Douglas Avenue.

CHAIRMAN LORENZINI: Okay, thank you. Anybody else from the public? Yes, ma'am. State your name, spell your last name please, and give your address.

MRS. PHILLIPS: Jan Phillips, P-h-i-l-l-i-p-s, 1136 Douglas. Very clear what the benefits are to The Moorings residents this proposal will bring as well as financially no doubt to The Moorings organization. Unfortunately, those quality of life The Moorings residents gain and the organization gains financially are inverse for us, I would say, in spite of what the findings and their group shared. No doubt if anyone on the board were to live directly across from this, I think you'd have a hard time arguing that property values would not be impacted, considerations set for buyers of your property to begin with are negatively impacted, and just the overall feel of your neighborhood from what has historically been a very residential, lovely place to look at across the street from The Moorings because of the way they've maintained the property prior. But this building and its size, scope and placement is very concerning to our way of life and our financial benefits for our property.

Trees are great, they don't work miracles. They've got to grow. As you can clearly see on slide three here, this is opting to use cheap new trees and not place more mature trees in there. So, ten years was the figure from the organization themselves to get us to the next view of view three.

Number two, we unfortunately live in Illinois where trees are barren for a very good section of the year. So, it

DRAFT

will address the problem in some seasons but not all. So, I think my final I guess ask to the group would just be to weigh not only the benefits to The Moorings residents, not only the benefits to The Moorings organization, but to those people who live across the street on Douglas so you can find a more balanced solution that benefits everyone. Thank you.

CHAIRMAN LORENZINI: Thank you. Anybody else? Okay, if not, we'll close the public portion of the hearing and go back to comments. Lynn, would you like to start?

COMMISSIONER JENSEN: Well, I would like to ask about the property valuations if I could. You used the technique of paired matchings. Is that the state of art in doing this kind of a valuation? You did five or six paired matchings?

CHAIRMAN LORENZINI: I'd just ask that everybody repeat their name just for the court reporter.

MR. MaROUS: Michael S. MaRous. Yes, that is the analysis that is used.

COMMISSIONER JENSEN: Is that state of the art?

MR. MaROUS: Yes, it is.

COMMISSIONER JENSEN: Okay, because it is, it still has a certain anecdotal element to it. I mean you're taking a couple of pairings, you're obviously selecting one and you're pairing it with something you could select a lot of different ways. So, is there anything you can assure us about the objectivity of how you pick and pair the matches?

MR. MaROUS: An attempt to find properties that have the most similar characteristics meaning age, appeal, design, square footage, modernization, location, anything that may have an impact, due to flooding, due to say a forced sale, a foreclosure would not be utilized. Looking for arms length transactions and also, you know, similar market periods because I think we're all aware most of the transactions from probably 2008 to 2012 were down considerably. So, even if we used during that time period, we'd try and use two similar properties during similar market periods. So, no, it's an art, it's not a science, it's not perfect.

COMMISSIONER JENSEN: Sure.

MR. MaROUS: But the other things that are looked at are, you know, the economic and the benefits, the amenities to the community, the infrastructure that it provides. I think you heard the \$70 million investment which also means jobs, which also means permanent jobs there, which also means higher real estate taxes, which also means in this situation significantly upgraded landscaping. I think we've all seen major facilities that haven't been modernized and what the negative impact that is to a neighborhood.

COMMISSIONER JENSEN: Okay, thank you.

CHAIRMAN LORENZINI: Terry?

COMMISSIONER ENNES: Mr. MaRous, I also have a valuation question.

MR. MaROUS: No problem.

DRAFT

COMMISSIONER ENNES: Would you be a designated appraiser?

MR. MaROUS: I was awarded the MAI designation in 1980, which is the highest designation in the world, yes.

COMMISSIONER ENNES: Okay. When you did these paired matchings, you looked at comparable properties away from the subject and adjacent to the subject in comparison?

MR. MaROUS: Yes, the target is close to the subject, control is away. Yes.

COMMISSIONER ENNES: Okay. Did you, were you able to find paired sales where you had a property adjacent to the subject and sold before the change and then sold after the change? Were you able to do any comparisons like that?

MR. MaROUS: Which is called the sale-resale. We have looked at that. We had seen it and none of those were included in the study.

COMMISSIONER ENNES: It's a very difficult thing to find. I just wanted to know if they were included in your review.

MR. MaROUS: Well, and it also comes to a matter of timing such as this instance where there is an announcement of the project, so that's kind of the pre-project which is one period, then during the construction, and then what I would say a little bit of a maturation of one or two years. So, you have to be real careful as to how you compare your periods.

COMMISSIONER ENNES: Okay. Thank you, that's all I have.

CHAIRMAN LORENZINI: Bruce?

COMMISSIONER GREEN: Just a comment. I think all my questions have been answered, but the emergency exits are something that are required by and requested by the Fire Department. I can't imagine that they would look back on this and say we don't want to be as safe as we are currently. There might be other ways to treat these entrances in and out. There might be an opportunity to put some partially landscape pavers and things. They just have to be able to get through the gates. These are breakaway gates, I assume that when they hit these things, they would hit them and just they break away with the fire truck in. So, I wouldn't hold out a lot of hope that these things are going to go away. That's just been my experience.

CHAIRMAN LORENZINI: Thank you. John?

COMMISSIONER SIGALOS: I really don't have any further questions at this point.

CHAIRMAN LORENZINI: I just have one question. Is this the before or after with the landscaping?

MR. FRERES: Before.

CHAIRMAN LORENZINI: So this is what it would look like after the trees are planted?

MR. FRERES: Yeah, that's outside. It's important to recognize it, because this is today.

CHAIRMAN LORENZINI: So, those are the existing trees?

DRAFT

MR. FRERES: Those are the trees in 10 years and it's important, somebody may have mentioned that they're small and not significant. The trees that we would intend to put in here are six to eight-inch caliper trees, big trees. A, because we're committed to moving some of the trees that are on the site, we're going to try and find someone to actually move them which would make a big impact. Two, if we put bigger ones in, in 10 years they will be a full size. Most trees take 25 to 30 years.

CHAIRMAN LORENZINI: Even putting six-inchers in there would take 10 years?

MR. FRERES: Yes. There is in the foreground, you can see off the side of the railing, on either side of the entrance, there are some evergreens in there. We recognize that those trees will lose their leaves and we want to make sure there's a secondary line of defense.

CHAIRMAN LORENZINI: Okay, thank you.

COMMISSIONER JENSEN: I'd like to make a valuation question again. We've had both in the e-mail that Mr. Babicz sent and what Ms. Phillips raised, that they said it's obvious it would decrease the value of the property. Do you have anything for this Commission to consider that would be supportive of that statement? Because we do have what has been stated as the state of the art in making this kind of valuations. So, I'd like to know, is there something we're missing that you're aware of that would be evidence to support your assertions?

MR. BABICZ: No, I do not have any other data or --

CHAIRMAN LORENZINI: Can you come up so we can hear?

MR. BABICZ: Again, Ted Babicz, 1124 South Douglas Avenue, B-a-b-i-c-z. No, I do not have any data. It's strictly speculation. When we do have a project of this type, people are going to look at it and they're going to look at it negatively, especially when it's under construction. I probably will not be able to sell my property for a reasonable value for the next five years. So, it's going to make that portion very difficult.

COMMISSIONER JENSEN: Well, is the duration of this, is this five years or is it two-and-a-half years?

MR. KIMMEL: Two-and-a-half.

MR. BABICZ: That's phase one.

MR. KIMMEL: No.

CHAIRMAN LORENZINI: If you're going to speak, come up to the mic please.

MR. KIMMEL: There are two phases to the project. The first phase is approximately 15 months, the second phase is approximately 15 months. The total duration is 30 months.

CHAIRMAN LORENZINI: When will these trees be planted?

MR. KIMMEL: These trees would potentially be planted --

MR. FRERES: Right away.

MR. KIMMEL: They're going to be one of the first things done if we're going to be transplanting trees.

DRAFT

COMMISSIONER JENSEN: Okay, thank you.

CHAIRMAN LORENZINI: All right, anything else? Any other comments?

COMMISSIONER SIGALOS: If I could just make a comment, just for the residents on Douglas or on adjoining streets. Four or five years ago, a similar facility, Lutheran Home, came to the Village and wanted to build a large addition right in a very residential neighborhood. They had similar parking problems and the residents had parking problems on the streets and they had concerns about the mass of the addition and what that would look like. I've got a number of personal friends that live right across the street from the Lutheran Home, down the street from the Lutheran Home. Now that that addition has been completed, they have absolutely no concerns at all. It blends in very well with the neighborhood and they've done an excellent job there with their landscaping and so forth.

So, I kind of liken that to what this building will look like and this is set back much farther off the street than the Lutheran Home petition request. That's my only comment.

CHAIRMAN LORENZINI: Any other comments, recommendations?

COMMISSIONER GREEN: I'd like to make a recommendation.

A motion to recommend to the Village Board of Trustees approval of PC #15-012, a Planned Unit Development Amendment by amending Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow:

- A) A new two-story resident fellowship hall
- B) A new four-story assisted living building
- C) A new one-story (with basement) memory care building
- D) Demolish the existing sheltered care building
- E) And demolish two quad villas

And the following variations:

1. A variation from Chapter 28, Section 5.1-8.11 from the requirement that inner courts are permitted for one and two-story buildings to allow inner court for a three-story building without the required 12-foot emergency access.
2. A variation from Chapter 28, Section 5.1-8.14, *Minimum Distance from Building Wall to Paved Area*, to allow a building wall for the memory care building to be seven feet from a paved area instead of the required 12 feet.
3. A variation from Chapter 28, Section 11.4, *Schedule of Parking Requirements*, to allow 538 parking spaces where 581 is required, a variation of 43 spaces.
4. A variation from Chapter 28, Section 5.1-8.9, *Maximum Height*, to allow the assisted living building to be 48.5 feet tall whereas 45 feet maximum is permitted, a variation of 3.5 feet.

DRAFT

5. A variation from Chapter 28, Section 51.-8.10, *Dwelling Standards*, to allow assisted living units to be 588 square feet in area where 650 square feet is required for one-bedroom units, a variation of 65 square feet per unit, and to allow studio units 481 square feet in size where 550 is required, a variation of 69 square feet per unit.

This recommendation is subject to the following conditions:

1. Condition from Ordinance 85-154 regarding the requirement to install a traffic signal if warranted at the property owner's expense shall remain in full force and effect.
2. The Petitioner shall work with Village Staff on possible relocation of additional trees on site.
3. Compliance with the Design Commission motion dated August 25, 2015.
4. Approval of an MWRD permit for storm water.
5. A landscape and tree presentation bond is required prior to issuance of a building permit.
6. Compliance with all federal, state, and Village codes and policies.

CHAIRMAN LORENZINI: Is there a second?

COMMISSIONER JENSEN: I'll second that.

CHAIRMAN LORENZINI: Roll call vote please.

MR. ENRIGHT: Commissioner Ennes.

COMMISSIONER ENNES: Yes.

MR. ENRIGHT: Commissioner Jensen.

COMMISSIONER JENSEN: Yes.

MR. ENRIGHT: Commissioner Sigalos.

COMMISSIONER SIGALOS: Yes.

MR. ENRIGHT: Commissioner Green.

COMMISSIONER GREEN: Yes.

MR. ENRIGHT: Chairman Lorenzini.

CHAIRMAN LORENZINI: Yes. Okay, you received a unanimous approval. This is just a recommendation to the Board of Trustees. The Trustees have the final approval of this project. Bill, is there a date this is going to go to the Board of Trustees?

MR. ENRIGHT: Monday night, October 19th at 8:00 p.m. in this room.

CHAIRMAN LORENZINI: Thank you. Congratulations and good luck with everything! Thank you all for attending.

There is one other hearing we have to go to, so if you're going to continue to talk, would you please go out in the hallway and we'll move on to the second hearing? If you would like your plans back, you can have them.

(Whereupon, the public hearing on the above-mentioned petition was adjourned at 9:40 p.m.)



The Moorings
SEC of Central Rd. and Douglas Ave.
Prepared by: The Village of Arlington Heights
Department of Planning & Community Development
November 2014

STAFF DESIGN COMMISSION REPORT

PROJECT INFORMATION:

Project Name: The Moorings – Assisted Living, Fellowship Hall, & Memory Care
Project Address: 811 E. Central Rd.
Prepared By: Steve Hautzinger

Date Prepared: August 18, 2015

PETITIONER INFORMATION:

DC Number: 15-096
Petitioner Name: Nancy A.H. Tolan
Petitioner Address: Presbyterian Homes
3200 Grant Street
Evanston, IL 60201
Meeting Date: August 25, 2015

Requested Action(s):

1. Approval of the proposed architectural designs for a new Assisted Living building, Fellowship Hall, and Memory Care building at the existing Moorings property.

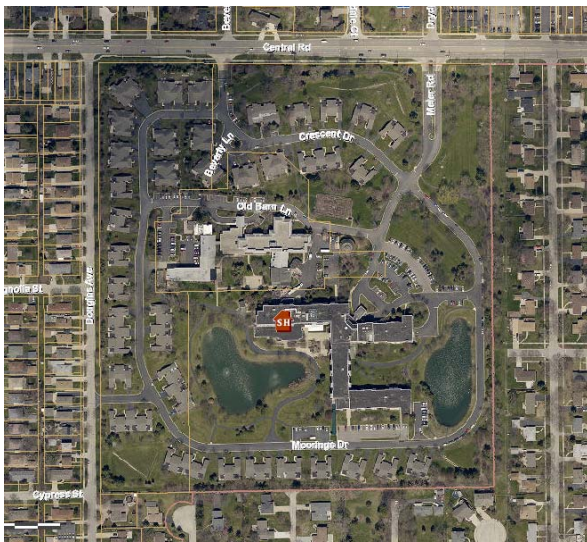
ANALYSIS

Summary:

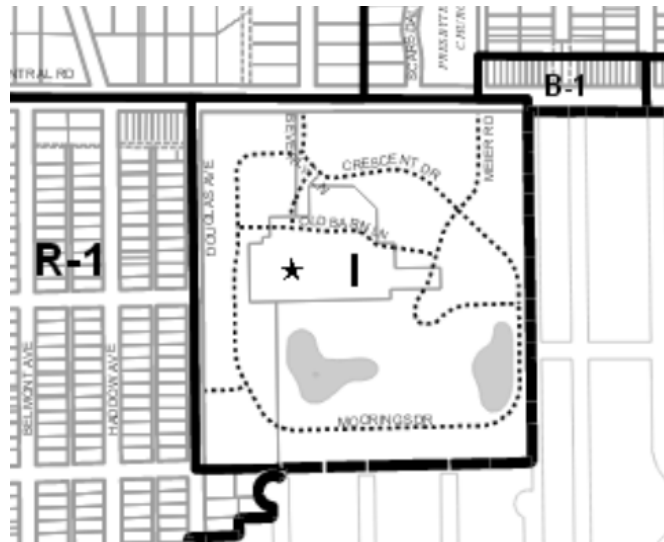
The subject design is being forwarded to the Design Commission for review pursuant to Chapter 6 of the Municipal Code, specifically Section 6-501 (e)(1), which states that the Design Commission "shall review all Plan Commission, Zoning Board of Appeals, Building Permit and Sign Permit applications for new construction and those improvements which affect the architectural design of the building, site improvements or signage to determine whether it meets with the standards, requirements and purposes of the Design Guidelines and Chapter 30, Sign Regulations."

The Moorings is an existing 41-acre senior living community that was originally approved as a Planned Unit Development in 1985. The existing campus includes a 5-story Independent Living Facility, a Skilled Care Facility, a Sheltered Care Building, and numerous independent living duplex cottages. At this time, the petitioner is proposing to build a new 4-story Assisted Living building, a new Fellowship Hall, and a new single story Memory Care building. This project does require Plan Commission approval for an amendment to the existing PUD.

Site:



Aerial Map



Zoning Map

Surrounding Land Uses:

<i>Direction</i>	<i>Existing Zoning</i>	<i>Existing Use</i>
Subject Property	I, Institutional District	The Moorings
North	R-3, One Family Dwelling District R-E, One Family Dwelling District	Single Family Residences Single Family Residences
East	Outside of Village Boundary (Mt. Prospect)	Single Family Residences
South	Outside of Village Boundary (Mt. Prospect)	Single Family Residences
West	R-1, One Family Dwelling District	Single Family Residences

Preliminary Design Commission Review:

This project received a preliminary Design Commission review on April 14, 2015. Overall, the Design Commission expressed support of the proposed Fellowship Hall design, and there were no comments on the proposed Memory Care building. The majority of the feedback pertained to the proposed 4-story Assisted Living facility, with highlights as follows:

1. Overall the articulation of the design was lacking. More depth, variety, and detailing was suggested, such as more detailing around the windows.
2. The entry of the building lacked prominence.
3. There was concern regarding the concern about the close proximity of the loading dock and service area to the residential cottages across the street.
4. Perspective renderings were requested to better communicate the design as it relates to the existing buildings on the site.
5. The existing landscaping is exceptional, and there were no concerns about the proposed landscaping.

Architectural Design:

The petitioner has developed the design and has addressed the Design Commissioner's comments. Perspective renderings have been provided which illustrate how the proposed buildings fit in well with the existing context of the Moorings. Overall, the design of the proposed development is very nicely done with nice materials and extensive landscaping. The proposed material palette is nicely coordinated, and the brick has been selected to match the existing 5-story Independent Living building. The use of the same material palette throughout all three of the proposed new buildings works very well to bring cohesiveness to the overall campus design.

The overall composition of the Assisted Living building is well done, and the proposed porte cochere provides a distinctive identity for the building's main entrance. Additionally, the loading/service area has been modified with a greater setback and enhanced screening. The only design comment is regarding the application of the EIFS and horizontal siding on the building façade. The two materials appear out of balance, and it is recommended to consider reversing the two materials so that the horizontal siding becomes the primary wall cladding, with the EIFS used as the accent color on the top floor and feature areas of the building. As proposed the heavier texture and darker color of the siding material looks out of place located above the smooth, lighter colored EIFS.

The design of the single story Memory Care building has very nice massing and scale. The only design comment on this building is the lack of prominence of the main entry. As proposed, the entry is recessed and unidentifiable. Consider adding a small portico to draw attention to the entry.

Mechanical Unit Screening:

All rooftop mechanical equipment is required to be fully screened from view. The petitioner is proposing a well between the two sides of the roof which works superbly to screen all of the rooftop mechanical equipment.

Landscaping:

Numerous trees on the site are identified for removal, therefore tree replacement will be evaluated as part of the Plan Commission review. If possible, it is encouraged to preserve additional trees adjacent to the west lake and near the court yard. Also, transplanting some of the trees elsewhere on the site should be explored.

It is recommended that the landscaping near the Memory Care building entry be enhanced with a mix of shrubs and perennials.

For the Assisted Living building, it is recommended to increase the height of the landscaping to help soften the brick base where there is a significant grade change on the west elevation at the south half of the building.

RECOMMENDATION:

It is recommended that the Design Commission approve the proposed architectural designs for the new Assisted Living building, Fellowship Hall, and Memory Care building at the existing Moorings campus located at 811 E. Central Road. This recommendation is subject to compliance with the plans dated 7/24/15 and received 7/27/15, Design Commission recommendations, compliance with all applicable Federal, State, and Village codes regulations and policies, the issuance of all required permits, and resolution of the following:

1. Consider reversing the EIFS and horizontal siding on the Assisted Living building.
2. Consider adding an entry portico at the main entrance of the Memory Care building.
3. Consider enhancing the landscaping near the Memory Care building entry with a mix of shrubs and perennials.
4. For the Assisted Living Building, it is recommended to increase the height of the landscaping to help soften the brick base where there is a significant grade change on the west elevation at the south half of the building.
5. This review deals with architectural design only and should not be construed to be an approval of, or to have any other impact on, any other zoning and/or land use issues or decisions that stem from zoning, sign code or building or any other reviews. In addition to the normal technical review, permit drawings will be reviewed for consistency with the Design Commission and any other Commission or Board approval conditions. It is the architect/homeowner/builder's responsibility to comply with the Design Commission approval and ensure that building permit plans and sign permit plans comply with all zoning code, building code and sign code requirements.

_____, August 18, 2015

Steve Hautzinger AIA, Design Planner

Cc: Charles Witherington Perkins, Director of Planning and Community Development, Latika Bhide, Development Planner, Petitioner, DC File 15-096

APPROVED
MINUTES OF
THE VILLAGE OF ARLINGTON HEIGHTS
DESIGN COMMISSION MEETING
HELD AT THE ARLINGTON HEIGHTS MUNICIPAL BUILDING
33 S. ARLINGTON HEIGHTS RD.
AUGUST 25, 2015

Acting Chair Bombick called the meeting to order at 6:35 p.m.

Members Present: Alan Bombick, Acting Chair
 John Fitzgerald
 Jonathan Kubow
 Ted Eckhardt, Chair

Members Absent: Anthony Fasolo

Also Present: Kevin Davis, Fairfield Homes for *922 N. Beverly Ln.*
 John Haran, E & J Builders for *1138 N. Mitchell Ave.*
 Michael Henderson, STR Partners for *Olive-Mary Stitt & Ivy Hill Schools*
 Ryan Schulz, A.H. School District 25 for *Olive-Mary Stitt & Ivy Hill Schools*
 Nancy Tolan, Presbyterian Homes for *The Moorings*
 Craig Kimmel, RLPS Architects for *The Moorings*
 Nick Peppers, Storino, Ramello & Durkin for *The Moorings*
 Scott Freres, The Lakota Group for *The Moorings*
 Steve Hautzinger, Staff Liaison

REVIEW OF MEETING MINUTES FROM AUGUST 11, 2015

A MOTION WAS MADE BY COMMISSIONER FITZGERALD, SECONDED BY COMMISSIONER KUBOW, TO APPROVE THE MEETING MINUTES OF AUGUST 11, 2015. ALL WERE IN FAVOR. THE MOTION CARRIED.

ITEM 5. INSTITUTIONAL REVIEW

DC#15-096 – The Moorings – 811 E. Central Rd.

Ms. Nancy Tolan, representing *Presbyterian Homes*, **Scott Freres**, representing *The Lakota Group*, **Nick Peppers**, representing *Storino, Ramello & Durkin*, and **Craig Kimmel**, representing *RLPS Architects*, were present on behalf of the project.

Acting Chair Bombick asked if there was any public comment on the project and there was no response from the audience.

Mr. Hautzinger presented Staff comments. The Moorings is an existing 41-acre senior living community that was originally approved as a Planned Unit Development in 1985. The existing campus includes a 5-story Independent Living Facility, a Skilled Care Facility, a Sheltered Care Building, and numerous independent living duplex cottages. At this time, the petitioner is proposing to build a new 4-story Assisted Living building, a new Fellowship Hall, and a new single story Memory Care building. This project does require Plan Commission approval for an amendment to the existing PUD.

This project received a preliminary Design Commission review on April 14, 2015. Overall, the Design Commission expressed support of the proposed Fellowship Hall design, and there were no comments on the proposed Memory Care building. The majority of the feedback pertained to the proposed 4-story Assisted Living facility, with highlights as follows:

1. Overall the articulation of the design was lacking. More depth, variety, and detailing was suggested, such as more detailing around the windows.
2. The entry of the building lacked prominence.
3. There was concern regarding the concern about the close proximity of the loading dock and service area to the residential cottages across the street.
4. Perspective renderings were requested to better communicate the design as it relates to the existing buildings on the site.
5. The existing landscaping is exceptional, and there were no concerns about the proposed landscaping.

The petitioner has developed the design and addressed the Design Commissioner's previous comments. Perspective renderings have been provided which illustrate how the proposed buildings fit in well with the existing context of the Moorings. Overall, the design of the proposed development is very nicely done, with nice materials and extensive landscaping. The proposed material palette is nicely coordinated, and the brick has been selected to match the existing 5-story Independent Living building. The use of the same material palette throughout all three of the proposed new buildings works very well to bring cohesiveness to the overall campus design.

The overall composition of the Assisted Living building is well done, and the proposed porte

cochere provides a distinctive identity for the building's main entrance. Additionally, the loading/service area has been modified with a greater setback and enhanced screening. The only design comment is regarding the application of the EIFS and horizontal siding on the building façade. The two materials appear out of balance, and it is recommended to consider reversing the two materials so that the horizontal siding becomes the primary wall cladding, with the EIFS used as the accent color on the top floor and feature areas of the building. As proposed the heavier texture and darker color of the siding material looks out of place located above the smooth, lighter colored EIFS.

The design of the single story Memory Care building has very nice massing and scale. The only design comment on this building is the lack of prominence of the main entry. As proposed, the entry is recessed and unidentifiable. Consider adding a small portico to draw attention to the entry.

All rooftop mechanical equipment is required to be fully screened from view. The petitioner is proposing a well between the two sides of the roof which works superbly to screen all of the rooftop mechanical equipment.

Numerous trees on the site are identified for removal; therefore tree replacement will be evaluated as part of the Plan Commission review. If possible, it is encouraged to preserve additional trees adjacent to the west lake and near the court yard. Also, transplanting some of the trees elsewhere on the site should be explored. It is recommended that the landscaping near the Memory Care building entry be enhanced with a mix of shrubs and perennials. For the Assisted Living building, it is recommended to increase the height of the landscaping to help soften the brick base where there is a significant grade change on the west elevation at the south half of the building.

Staff recommends approval of the proposed architectural designs for the new Assisted Living building, Fellowship Hall, and Memory Care building, with the following comments:

1. Consider reversing the EIFS and horizontal siding on the Assisted Living building.
2. Consider adding an entry portico at the main entrance of the Memory Care building.
3. Consider enhancing the landscaping near the Memory Care building entry with a mix of shrubs and perennials.
4. For the Assisted Living Building, it is recommended to increase the height of the landscaping to help soften the brick base where there is a significant grade change on the west elevation at the south half of the building.

Ms. Tolan gave background on Presbyterian Homes, a brief summary of the proposed project, and introduced the team of representatives present.

Mr. Freres gave a slide presentation regarding connectivity, context, and understanding the character around and within the 40-acre site. Photos of the surrounding areas were shown, with the site being surrounded predominantly by single-family and multi-family residential, with

the exception of a church and some small businesses to the north, and the Village of Mt. Prospect to the south and east. An aerial of the existing campus was shown, indicating the main entrance off Central and the location of the existing buildings. Photos of the existing buildings were also shown that reflect the scale and character of the site and include the Independent Living/Commons, Skilled Care, Sheltered Care, original cottages, and recent cottages. Vehicle circulation, building areas and pedestrian path were also pointed out and summarized.

The current proposal for a new Fellowship Hall building, Assisted Living building, and Memory Care building was presented and reviewed by **Mr. Kimmel**. He stated that the primary entrance to the Assisted Living building was minimized to detract visitors from using it as an entry point because they want to control entry into the Memory Care building that is connected through the lobby of the Assisted Living building. The service area of the Assisted Living building has been revised since the preliminary review, in order to create a larger landscape screening between the service area and the existing drive, and architectural changes were made as well to minimize the impact of the service area on the adjacent environment that exists along the entry drive. Circulation paths for both service and Assisted Living residents were also shown.

With regards to the Fellowship Hall, **Mr. Kimmel** explained that this building has evolved since the preliminary review, with changes that include pulling the brick up to create more of a masonry face to the building and creating more significance to the building. The building is central to both the pond and to the overall community, which is critical to the success of achieving all levels of care at the Fellowship Hall. Materials and colors being proposed for the Fellowship Hall were also reviewed.

Previous concerns made by the commissioners about the Assisted Living building, such as the size of the cross gables and the introduction of more residential detailing and trim work, were incorporated into the current proposal, with the idea of creating a nested gable that allowed the ability to create a larger element where the cross gable comes almost up to the ridge line of the building, and create smaller elements so as not to be repetitive around the building. Brick at the front entrance was pulled all the way up into the gable, which starts to complement the Fellowship building, and the brick was also extended out to create an opportunity to widen the windows and accentuate the front door and create asymmetry in the building.

The Memory Care building will be one-story, residential in appearance, and similar to the cottages, only larger. The building was designed to accentuate the social spaces located across the back of the building, which is where residents will spend the majority of their time. It will be connected to an outdoor controlled garden, metal roofing on the octagon shaped dining room, brick pulled in at the higher elements then transitioning down at the porch to lighter materials, and the eave height pulled out with a shed type element to give a stronger porch area with full shade.

Mr. Freres reviewed the foundation package for landscaping, which included not only the new buildings but bringing all of the buildings up to a new landscaping standard in terms of the

quality of material being used, variety of material, utilizing native plantings, and scale. Bigger plantings are being proposed along the streetscape and pond edges, in order to accentuate some of the spaces to not appear so open and bland. He pointed out one of the core areas of the campus, which will be the cloister courtyard space that touches many building facades, entries and windows, with a range of people utilizing the space on a daily basis, and all connected to access points. He also pointed out the pond, which is a focal point of all the buildings and accessible not only for pedestrians around the perimeter but as a fire lane around the building. Details such as stamped concrete or brick paver patio spaces, decorative railings, benches, pergola elements, and naturalized edges of the ponds are also being proposed. Primary circulation around the site will remain the same, with small changes to the circulation into the parking lot adjacent to the Memory Care building and drop-off at the Assisted Living building.

Mr. Freres also briefly discussed where parking is being proposed; surface parking adjacent to the Memory Care building, and underground parking at the Assisted Living building. Previous concerns about the service area at the Assisted Living building were addressed by reconfiguring the angle of the building, gaining distance off the road, landscaping the area, understanding the views from the adjacent cottage views, and introducing architectural elements from the buildings onto the service area. In closing, **Mr. Freres** stated that their timeline continues to move forward with a Plan Commission hearing date scheduled for the end of September, and they remain committed to starting the project next Spring.

Commissioner Kubow acknowledged the fantastic presentation by the petitioner, learning about the history and seeing the context of the site, which was very helpful. He felt the petitioner addressed a lot of the commissioners' previous concerns, and he felt the service area was very well done. With regards to the Assisted Living building, he felt that overall the composition was good; however, more contrast was necessary to help the stucco pop. He also asked about the reasons for recessing the portico entrance on the Memory Care building. The petitioner explained that the Memory Care entrance is being downplayed because it is not really an entrance, and resident family members will be encouraged to use the Assisted Living entrance that is a common entry for all of the buildings because it will allow better control of people going in and out of the buildings.

Commissioner Eckhardt questioned the lack of an entrance near the circular drive to allow drivers to travel down the ring road and pull to the front entrance, as opposed to driving all the way through the parking lot to get to the front door. The petitioner said this was primarily an issue of the vertical grade change in front of the canopy area, which is set because of the existing building, as well as the important desire to maintain the same elevation of that floor throughout the entire building.

With regards to Staff's suggestion to considering reversing the EIFS and horizontal siding on the Assisted Living building, **Commissioner Eckhardt** felt it might be more appropriate to have siding in the middle of the building facade and a smoother surface on top. He was undecided about the architecture of 3 different materials and 4 different material colors being proposed,

and then breaking it up in such a way to make the building look like row homes. He understood the base and the brick; however, he was unsure about the middle portion of stucco. The petitioner replied that using material and color on a large building like this is a way to break up the building, define elements, and create some verticality. **Commissioner Eckhardt** supported the idea of the tall, brick element behind the entrance portico, and felt that the bay windows and 2 pediment gables worked well together; however, he was concerned about the large 2-story expanse of EIFS being proposed at the corner of the building, void of any windows. He suggested adding another element to help break it down.

Commissioner Eckhardt felt that the proposed design of the Memory Care building significantly achieved which elevation is the front and which is the back. He felt the middle section of the building should have siding and EIFS in between the two, to help the building get along better with the Assisted Living building. He had similar comments about the courtyard side of the building, and questioned the fenestration of the elevation and whether it was designed within the context of the adjacent building.

Commissioner Fitzgerald agreed with the comments already made. Looking at the recommendations in the Staff report, he now understood why the entry portico at the Memory Care building was being downplayed, and he was fine with that. He suggested adding landscaping with more height near the entry to the Memory Care building, such as small ornamental trees. He was okay with the height of landscaping being proposed on the west elevation at the south half of the Assisted Living building, which emphasizes and enhances the significant grade change, and he really liked what was done at the service entrance. Overall, he felt the project was beautiful.

Acting Chair Bombick's commented about the Assisted Living building. He was fine with the dark band of siding at the top of the building; however, he felt the building appeared busy and the materials and colors could be simplified. He was also bothered by the way the gables were detailed; the horizontal trim board that runs across the bottom of the gable creates a deep shadow and looks dated. He suggested the gables be detailed more like a traditional 1920's home. He agreed with previous comments; in general, the building needs to be simplified, although he was fine with the 3 layers and the dark layer on top. With regards to the Memory Care building, he felt that the courtyard side of the building would be stronger if it were all brick, with a change at the other end of the building. Overall, he felt the petitioner added a lot of detail and worked out a lot of things with the project.

Acting Chair Bombick also said that site furnishings shown by the petitioner should be packaged together with colors, and manufacturer name/number as part of the approval process. Street lighting, fence and pergola details were not shown and discussed tonight, which he was concerned about and wanted Staff to review.

In response to the previous concerns about the Assisted Living building, **Commissioner Fitzgerald** questioned just how busy the building would look since the colors would be close together; it seemed like nice detailing to him, and he pointed out that the rendering showed

very drastic color changes that in reality would not appear that way. **Acting Chair Bombick** questioned if part of the problem was that the bay windows were white and everything else was beige, which breaks things up. **Commissioner Eckhardt** was okay with the bay color being different.

Commissioner Eckhardt summarized the concerns stated by the commissioners:

1. Break up large expanses of EIFS on the Assisted Living building.
2. Enlarge the plant material in the courtyard of the Memory Care building.
3. Add siding at the west elevation (back of Memory Care building) on the bump-outs.
4. Consider increasing contrast of the siding color.
5. Consider through study elevations, using stucco on the top floor.
6. Courtyard side of Memory Care building appears to have 2 different sides and looks out of balance.

Commissioner Fitzgerald wanted #2 to be a requirement; add small ornamental trees in the courtyard of the Memory Care building, for Staff review and approval.

After further review of the exterior elevations, the commissioners were fine with the material arrangement on the courtyard side of the Memory Care building (#6).

Commissioner Eckhardt wanted #3 to be a requirement; change the EIFS to siding on the west elevation bay bump-outs on the Memory Care building.

Acting Chair Bombick reiterated his concerns about the gable details on the Assisted Living building; he did not like the horizontal details running across the face of the gable. He was fine with the top course of siding on the building, and the colors; however, he felt the building was too busy with all the material changes. **Commissioner Eckhardt** felt that the material changes were subtle. **Commissioner Kubow** commented that there are 2 ways of breaking up an elevation; either horizontally with planes, or vertically like a townhome. He felt the petitioner was doing both, which is why the building looks a bit busy, and he suggested breaking up the elevation vertically, similar to a townhome, as it might simplify the building. **Commissioner Eckhardt** was unsure if seeing a sense of rhythm on the building was necessary, as opposed to the random appearance currently being proposed.

Commissioner Fitzgerald reiterated that enhancing the grade change that occurs from left to right should be taken advantage of; currently the brick is dropped on the right side; however, if the brick was brought up to be level on the left side, it would actually be very symmetrical so he preferred to leave the brick base as proposed. **Commissioner Eckhardt** agreed and was not concerned about this; he was concerned about seeing the one tall element of blank EIFS and wanted a horizontal line added along the second-floor to break it up.

Acting Chair Bombick felt that the 3 openings next to the right of the entry canopy were really nice and would look beautiful, although it did not show up nicely on the rendering.

A MOTION WAS MADE BY COMMISSIONER ECKHARDT, TO APPROVE THE PROPOSED ARCHITECTURAL DESIGNS FOR THE NEW ASSISTED LIVING BUILDING, FELLOWSHIP HALL, AND MEMORY CARE BUILDING AT THE EXISTING MOORINGS CAMPUS LOCATED AT 811 E. CENTRAL ROAD. THIS RECOMMENDATION IS SUBJECT TO COMPLIANCE WITH THE PLANS DATED 7/24/15 AND RECEIVED 7/27/15, DESIGN COMMISSION RECOMMENDATIONS, COMPLIANCE WITH ALL APPLICABLE FEDERAL, STATE, AND VILLAGE CODES, REGULATIONS AND POLICIES, THE ISSUANCE OF ALL REQUIRED PERMITS, AND RESOLUTION OF THE FOLLOWING:

1. A REQUIREMENT THAT THE PLANT MATERIAL IN THE COURTYARD OF THE MEMORY CARE BUILDING BE INCREASED IN QUANTITY, TO BE REVIEWED BY STAFF.
2. A REQUIREMENT THAT THE WEST ELEVATION OF THE MEMORY CARE BUILDING BE ENHANCED WITH SIDING MATERIAL, IN LIEU OF EIFS AT THE 2 BAY PROJECTIONS UNDERNEATH THE GABLED ROOFS.
3. A RECOMMENDATION THAT THE PETITIONER STUDY THE EXTERIOR COLOR SCHEME TO DETERMINE IF A MORE CONTRASTING HARDI-BOARD COLOR IS NECESSARY.
4. A RECOMMENDATION TO ADD DETAILING TO BREAK UP THE 2-STORY BLANK EIFS WALL ADJACENT TO THE SERVICE/LOADING AREA.
5. THIS REVIEW REPRESENTS DESIGN APPROVAL ONLY AND SHOULD NOT BE CONSTRUED TO BE AN APPROVAL OF, OR TO HAVE ANY OTHER IMPACT ON, ANY OTHER ZONING AND/OR LAND USE ISSUES OR DECISIONS THAT STEM FROM ZONING, SIGN CODE OR BUILDING OR ANY OTHER REVIEWS.
6. IT IS THE PETITIONER'S RESPONSIBILITY TO SUBMIT THE APPROPRIATE PERMIT APPLICATION(S) TO THE BUILDING DEPARTMENT FOR REVIEW AND APPROVAL PRIOR TO PROCEEDING WITH ANY WORK. IN ADDITION TO THE NORMAL TECHNICAL REVIEW, PERMIT DRAWINGS WILL BE REVIEWED FOR CONSISTENCY WITH THE DESIGN COMMISSION AND ANY OTHER COMMISSION OR BOARD APPROVAL CONDITIONS. IT IS THE PETITIONER'S RESPONSIBILITY TO INCORPORATE ALL REQUIREMENTS LISTED ON THE CERTIFICATE OF APPROPRIATENESS INTO THE PERMIT DRAWINGS, AND TO ENSURE THAT BUILDING PERMIT PLANS AND SIGN PERMIT PLANS COMPLY WITH ALL ZONING CODE, BUILDING CODE AND SIGN CODE REQUIREMENTS.

Acting Chair Bombick asked that the petitioner be required to provide a complete package of site furnishings, such as furniture cuts, lighting, fences, etc., for Staff review.

A MOTION WAS MADE BY COMMISSIONER ECKHARDT TO ADD THE FOLLOWING TO THE MOTION:

7. A REQUIREMENT THAT THE PETITIONER PROVIDE A COMPLETE PACKAGE OF SITE FURNISHINGS TO STAFF FOR APPROVAL.

COMMISSIONER FITZGERALD SECONDED THE MOTION.

ECKHARDT, AYE; FITZGERALD, AYE; KUBOW, AYE; BOMBICK, AYE.
ALL WERE IN FAVOR. THE MOTION CARRIED.

The Moorings of Arlington Heights

Village of Arlington Heights – Plan Commission Submittal Project Narrative

July 10, 2015

I. Concept

The Moorings of Arlington Heights is a Continuing Care Retirement Community (CCRC). A CCRC is a particular type of retirement community that offers several levels of health care on one campus. The Moorings currently has Independent Living, Sheltered Care, and Skilled Care.

The residents of independent living apartments and villas at The Moorings desire updated and modern accommodations at the assisted living and memory support levels of care. Although occupancy is high, Sheltered Care residents have complained about the size of the current apartments and the distance to the elevator or dining venue.

The continued maturing of the independent living residents at The Moorings of Arlington Heights has created significant demand for not only assisted living services, but also memory support services in an assisted living environment. The current assisted living building (sheltered care, originally built in the 1950's) is outdated, institutional and inadequate for this aging campus population. The recommendation is to build new, modern assisted living apartments to serve the needs of our older adults.

The Moorings of Arlington Heights also wants to provide a more refined Resident Fellowship Hall to serve the religious gatherings at the community. Currently the religious gatherings are held in the Harbor Room which is a multi-purpose space. The Resident Fellowship Hall building will also have new spaces to meet market demands for resident services with a beauty shop, clinic and wellness facilities.

The overall demand for all forms of senior's housing in the northwestern suburbs is very high, not only during the initial study period (from 2014-2019) but well beyond when projected through 2040. The 2013 *Senior Housing Needs Assessment for the Northwest Suburban Housing Collaborative* reports that "there will continue to be the need for more...market rate housing to serve the increasing senior population." This project is designed to not only satisfy the needs of The Moorings contractual residents, but also to respond to the community's demand for assisted living and memory support services.

II. Goals

1. Provide a new Assisted Living building, Memory Care building, Resident Fellowship Hall building and renovate part of the wellness center in the commons building. The aforementioned new buildings and renovations will meet the demands of current and future residents' needs, support The Village of Arlington Heights' goals as delineated in the 2013 *Senior Housing Needs Assessment for the Northwest Suburban Housing Collaborative* report, and keep the Moorings current with trends and resident expectations.
2. The new Assisted Living building will replace the existing institutional Sheltered Care building. The new Assisted Living building will provide a neighborhood concept for the resident rooms providing an elegant lifestyle for assisted living residents.
3. The new Memory Care building provides a new critical level of health care service for the Moorings. The new building provides 20 beds of memory care in a small house context.
4. The new Resident Fellowship Hall provides a refined religious gathering space, beauty salon and expanded wellness spaces centrally located on the campus. The additional new spaces included with the Resident Fellowship Hall will enhance resident services and respond to the fact that "Seniors are looking for more educational, health and fitness opportunities in addition to social activities..." according to the 2013 *Senior Housing Needs Assessment for the Northwest Suburban Housing Collaborative* report.
5. The existing commons building will include a renovated wellness center to update the pool, spa and locker rooms. The spaces are being updated because equipment and the layout of some of the spaces are outdated. The update coincides with the new wellness components being provided in the Resident Fellowship Hall.
6. A new full service kitchen in the basement of the Assisted Living building will enhance the food service menu and dining experience for the Assisted Living, Memory Care and Skilled Care buildings.

III. Description

A. Description

The proposed project will provide a new 73-bed Assisted Living building, a new 20-bed Memory Care building with basement and a new Resident Fellowship Hall building. The pool, spa and locker rooms of the existing wellness facility in the commons building are being upgraded. The existing Sheltered Care building will be demolished and 2 of the quad villas will be demolished. The new Resident Fellowship Hall will become the center of the facility. It's centrally located on the campus between all levels of care.

The existing and proposed unit counts for the facility are as follows:
(Numerous apartment units have been combined, and will continue to be combined, over the years to meet market demand for larger units. This has, and will continue to, reduce the overall number of apartment units.)

Unit Counts			
Year	2006 PUD Allowance	Current	Proposed
Apartment Units	262	212	202
Villa Units	87	81	73
Independent Living Total	349	293	275
Skilled Care beds		105	105*
Sheltered Care beds		45	-
Assisted Living beds		-	73
Memory Care beds		-	20
High Care Total Beds		150	198*

* In order to meet the needs and the lifestyle expectations of our residents we expect to convert many of our semi-private skilled care rooms to private rooms, which may reduce skilled care occupancy by as many as 35 beds.

B. Square Footage

New Square Footage

New Assisted Living:	118,715 S.F.
New Memory Care:	31,645 S.F.
<u>Resident Fellowship Hall:</u>	<u>26,700 S.F.</u>
Total:	177,060 S.F.

Revised Square Footage

Commons Building Renovation:	8,136 S.F.
------------------------------	------------

C. Design

The design of the new buildings on the Moorings campus were developed to relate to the characteristics of the adjacent residential neighborhoods and draw from the positive qualities of the existing campus buildings. The materials are consistent for all new buildings, but their arrangements are unique to each building. The materials evolved from the existing campus and neighborhood palette to create an updated residential character.

The new Resident Fellowship Hall spans between the existing buildings and the new Assisted Living and Memory Care buildings. The steep cross

gable roof over the sanctuary centers the building on the campus. The simple but commanding appearance gives the building a stable yet inviting exterior. The windows open the building to the pond to the south and the Cloister Garden to the north.

The Assisted Living Building is a residentially scaled building with a gable roof. The grade rises up one story to the entry on the north end of the building giving it a smaller appearance. The mass of the building is not a straight line north to south. The undulations in the mass break down the length of the building. They also accentuate the grouping of the Assisted Living neighborhoods within the building. The exterior façade is broken down with a combination of multiple building materials and residential massing elements. Bay windows emphasize each resident room and provide vertical elements on the exterior. Cross gable and nested cross gable elements break up the roof line and coordinate with the bay windows locations. The material placement extends both horizontally and vertically to provide a residential scale and quality.

The Memory Care building is a one story building with a basement. The building spaces facing the campus road are made up of mostly resident rooms. This façade uses the same multiple materials as the other new buildings. Gable roof elements break up the roof line and coordinate with the square window bays in the resident rooms. The casement windows are proportioned and scaled to present a residential character. The façade of the building that faces the courtyard is flooded with daylight. The social spaces (activity rooms, dining room, living rooms) are on this side of the building. The windows are larger on this elevation. The center of this façade is accentuated with an engaged octagonal element that has a trellis wrapped around it creating a porch-like feel.

D. Height

The Moorings property is currently zoned I-PUD. The typical I-Institutional zoning district limits development to 45' and 4-stories.

When The Moorings property was re-zoned from R-1 to I-PUD in 1985 there was a variation included "to permit the construction of buildings up to five stories in heights, with an average of 49.5 feet at the highest point".

Below is the definition of Building Height from Arlington Heights:

3.2-28 Building Height. The vertical distance measured from the sidewalk level or its equivalent established grade opposite the middle of the front of the building to the highest point of the roof in the case of a flat roof; to the deck line of a mansard roof; and to the mean height level between eaves

and ridge of a gable, hip or gambrel roof; provided that where buildings are set back from the street line, the height of a building may be measured from the average elevation of the finished lot grade at the front of the building.

All of the proposed buildings are below the previously approved building height restriction of 49.5 feet. The perceived height of the new buildings is lower because of their relationship to the existing buildings on the site and their sloped roofs with significantly lower eave height. The following are the heights of the proposed buildings:

Assisted Living:	48'-4" (includes sloped roof) 42'-8" (eave height)
Resident Fellowship Hall:	35'-5" (includes sloped roof) 23'-2" (eave height)
Memory Care:	24'-7" (includes sloped roof) 15'-3" (eave height)

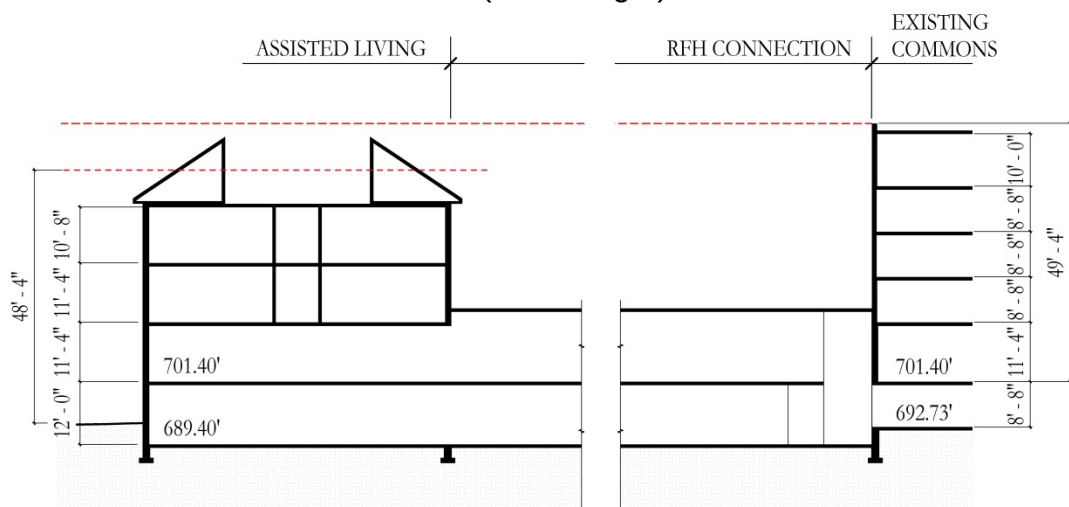


Figure 1: Assisted Living Roof Height

E. Exterior Building Materials

The exterior materials for the proposed buildings have been selected to complement the existing buildings, draw inspiration from adjacent neighborhoods and create a fresh look for the campus.

All of the proposed buildings have a brick base. The brick color matches the brick on the most recently built villas. The color blends with the brick on existing buildings. The height of the brick varies as it wraps around the buildings to break up the mass and add emphasis where desired (A.L. entrance, Resident Fellowship Hall, transitional corners of the building,

etc.) Exterior Insulation Finish System (EIFS) and fiber cement lap siding are used above the brick base. The EIFS is a lighter color (Amarillo White) and serves as a backdrop for the fiber cement siding. The fiber cement siding has a textured finish and is a mixture of 2 colors (Khaki Brown and Autumn Tan). The fiber cement siding is used horizontally and vertically to breakdown mass, provide a play in texture and color, and reflect on residential style. The bay windows are clad in a smooth white fiber cement finish. The color and texture emphasize the bay window element against the siding and EIFS backdrop.

F. Roof

The sloped roofs reinforce the residential scale and character of the buildings and serve to reduce the overall appearance of the new building heights.

A gable roof is used on the Assisted Living and Memory Care buildings to be consistent with the residential style. The gable roof is generally covered with 30 year, high definition asphalt shingles. There are a few areas where a standing seam metal roof is used to emphasize points of interest (A.L. Porte Cochere, Memory Care octagonal element, etc.). There is a well in the center of the gable roof that hides mechanical units and other rooftop equipment. Cross gables and nested gables within the cross gables are used to break up the roof line and emphasize the bay window locations.

The Resident Fellowship Hall has a cross gable roof element over the sanctuary. There are flat roofs on either side of the cross gable roof to help emphasize this element. There is no mechanical equipment on the roof of the Resident Fellowship Hall.

G. Project Plan

The project plan centrally locates the new Resident Fellowship Hall on The Moorings campus to be easily accessible by all residents and specifically to be sensitive to Skilled Care and Assisted Living residents' travel distances to daily activities. It also introduces a second service kitchen on the ground floor of the new Assisted Living building and a dedicated service corridor that connects vertically to buildings, separating service carts and the associated traffic from resident corridors. The new Assisted Living and Memory Care buildings are adjacent to each other and share a new, common entry. The Memory Care building takes advantage of the new Cloister Garden to provide a therapeutic, secure outdoor space accessible to memory care residents.

H. Site Design

1. Parking and Traffic

See Separate Parking & Traffic Summary and Exhibits included in this submittal.

2. Utilities and Storm Water Management

a. Water

The Moorings water system provides potable water and fire protection to the 41 acre campus. The existing system is fed by two 10-inch connections to public water main. One of the connections is located near the southwest corner of the campus and connects to water main along Douglas Avenue. The second connection is located at the northwest corner of the campus and connects to watermain along Central Avenue. There are three campus sub-systems, all comprised of 10-inch water main, that serve separate areas of the campus. These systems are comprised of a southern loop that primarily serves the main building and villas south of Moorings Drive, a northern loop that primarily serves the villas north of Old Barn Lane, and a partial loop that is comprised of public watermain on Douglas Avenue and watermain along Moorings Drive that serves the villas west of Moorings Drive.

During all phases of site improvements the existing loops will be maintained and improved upon where necessary to accommodate the new building footprints. The systems being improved during these phases of development include the southern and western loops that will be shifted to accommodate the site design. Fire hydrants will be placed in these areas of improvement, where not existing, at intervals meeting Village of Arlington Heights approval.

b. Sanitary

The sanitary systems serving The Moorings campus are comprised of three lines that make connections to a 21" public sewer located on the south side of Central Avenue. The systems are comprised of a 10" line running south to north along Moorings Drive, an 8" line serving the northern villas, and a 12" line that runs west to east along the southern end of the campus and then north to Central Road.

These existing sewer mains will not be affected during these phases of improvement and will remain in place. Existing services no longer required will be removed. It is anticipated that new sanitary service connections for the Assisted Living and Memory Care buildings will be made on the existing 10-inch line running along Moorings Drive. Calculations will be performed to ensure that the existing line has excess capacity for these new connections.

c. Storm Sewer and Storm Water Management

Storm Water Management

The Moorings campus detention system currently provides detention for the entire 41 acre campus. This system was permitted through the Village of Arlington Heights and the Metropolitan Water Reclamation District in 1987. The Moorings Metropolitan Water Reclamation District permit number is 87-787.

The detention system is comprised of five separate detention basins: West Lake, Southwest Basin, North Basin, East Lake, and Southeast Basin. Of the approximately 7.75 acres being improved for this project, most will be tributary to West Lake.

Areas of proposed improvement will be designed to meet or exceed the updated storm water management standards set for by both the Village of Arlington Heights and the Metropolitan Water Reclamation District. Some of these standards include a reduced release rate from West Lake, thereby reducing the storm water runoff downstream during large rain events. Another is the infiltration of the first 1-inch of rainfall from hard surfaces, thereby affectively reducing the intensity of large rain events and re-charging local ground water systems. To accomplish this, the footprint of West Lake will be expanded and infiltration basins will be provided throughout the areas of improvement to hold storm water runoff until it is able to infiltrate into the ground naturally.

The restricted storm water release from West Lake will remain tributary to the 48-inch sewer running west to east beneath an existing swale at the south end of the campus.

Storm Sewer

Storm water is conveyed to West Lake through two pipe networks. One located to the northwest of the lake that conveys storm water from the north end of the site and one that conveys runoff from the Skilled Care courtyard. To account for the new building footprints, both systems will be re-designed and improved. The northwest system will be removed and re-designed beginning at the intersection of Moorings Drive and Old Barn Lane while the courtyard system will be removed entirely and replaced with an improved system. The new systems will be designed to convey the 100-year runoff, rather than the typical 10-year runoff, from the improved site and will include infiltration basins to reduce runoff to West Lake.

3. Landscape Design

As part of the proposed building program, Presbyterian Homes seeks to maintain a beautifully landscaped character for the benefit of The Moorings campus residents, visitors, and staff. The proposed landscape development plan is designed to maintain and enhance the existing campus landscape character while also creating new site amenities for the enjoyment of residents. The carefully planned landscape design for the proposed new Assisted Living, Memory Care and Resident Fellowship Hall buildings seeks to accentuate views of the existing pond as a central community focal element while also defining a new internal “Cloister Garden” courtyard. The plan is designed to seamlessly integrate and enhance the overall image of the campus while meeting or exceeding the intent set forth in the Village of Arlington Heights’ landscape and tree preservation codes and ordinances.

The Landscape Development Plan depicts proposed improvements to those targeted campus areas affected by the planned new facilities. Plant materials have been carefully selected to not only provide year round visual interest and an effective transition to existing campus buildings and landscape material, but also to be low maintenance and durable. The plan depicts several seating areas and garden nodes around the pond and building foundations, most notably in the central “Cloister Garden” courtyard. This controlled access courtyard area serves a range of residents and provides several fountains and raised accessible planting beds allowing for contemplative and interactive outdoor opportunities. A meandering walking loop path frames an informal open central lawn

and connects to a secure sensory garden for memory care residents.

Existing trees and vegetation located adjacent to the perimeter of the proposed site will remain protected at all times and in areas where construction activities require removal, preservation techniques will be implemented in order to preserve those trees not located within new building or paving areas. A mix of deciduous, ornamental and evergreen trees will be planted in replacement of trees removed.

Shade trees including a variety of Maple, Ginkgo, Honeylocust, Oak, Linden, Pear and Elm will be installed at sizes ranging from 3-inch caliper to 14' height clump form. Eight to twelve-foot Fir and Spruce evergreen trees will be provided for both year-round interest and targeted screening and buffering and four to ten-foot height single and multi-stem ornamental trees including Serviceberry, Birch, Hornbeam, Red Bud, Dogwood, Magnolia, Crabapple and Lilacs are used as accent elements throughout the site planting palette. Additionally, flowering and evergreen shrubs and perennials and groundcover serve as understory unifying elements adjacent to and throughout foundation landscape beds.

4. Site Lighting

Site Lighting will be provided to accommodate the new buildings on campus. The parking areas and building entrances have been designed to meet Illuminating Engineering Society (IES) standards for safe lighting levels and comply with the Villagr photometric standards. The roadway lighting levels are developed to be consistent with the current campus standards. The lighting fixtures will have cut-off devices to eliminate light glare into adjacent resident windows. The site lighting is accomplished with street pole lights, pedestrian pole lights and bollard lighting.

5. Project Data

a. Site Area

The Moorings Lot Size 41.0 Acres

b. Buildings

Building Coverage Ratio

Existing	0.15
Proposed	0.17

Building Floor Area

Existing	475,944 S.F.
Net Proposed	<u>123,889 S.F.</u>
Total	599,833 S.F. (33.6% of allowable area)
Total Allowable	1,785,223 S.F.

Building Lot Coverage

Existing	266,880 S.F.
Net Proposed	<u>37,175 S.F.</u>
Total	304,055 S.F. (42.5% of allowable coverage)
Total Allowable	715,423 S.F.

IV. Zoning Requirements

A. Request

The proposed request is for an amendment to the existing Planned Unit Development. The following modifications are requested:

1. Build a new 2 story Resident Fellowship Hall
2. Build a new 4 story Assisted Living building
3. Build a new 1 story (w/basement) Memory Care building
4. Demolish the existing Sheltered Care building
5. Demolish (2) quad villas

B. Variation

The Moorings of Arlington Heights is requesting one variation from the Village Ordinance/Code on parking requirements.

The proposed plan provides a *cumulative on-site parking supply for 538 spaces*. This includes 11 accessible spaces, which meets the accessible parking requirements. Through the planned new facilities modifications to the site, (58) spaces will be **removed** in order to implement the proposed site plan. A total of (78) new spaces will be **added**, creating a *net cumulative gain of 20 new spaces provided on-site*.

The *Village ordinance-regulated* parking requirement of 543 *cumulative spaces* for the proposed plan was calculated based on the Village of Arlington Heights' *current* Zoning Ordinance. This calculation, detailed in the chart on the following page, includes all *campus* unit requirements and

Presbyterian Homes' interpretation of the requirements for the proposed Resident Fellowship Hall. ***We believe a parking variation for the Resident Fellowship Hall is warranted based on our planned and historical use of this space as noted in our discussion below.***

Planned Resident Fellowship Hall Parking Demand

The Village of Arlington Heights parking requirement calculations assume that the proposed Resident Fellowship Hall is similar and consistent in all respects with a traditional chapel or religious facility land use. The current and planned Resident Fellowship Hall provides some of the same functions, however, it is intended solely for the use of on-site Moorings residents for various activities and programs which will not generate any significant traffic or parking need from off-campus visitors. Like many of the support facilities at this senior living community, it is designed to be connected and walkable (accessible) for the residents via an interconnected, internal pedestrian circulation system.

The hall will, on occasion, be used for memorial services. The Mooring's religious services team reports that most attendees of memorial services are from within the campus. In addition to on-site residents, memorial services typically draw 10-25 outside guests with a maximum of 20 vehicles. On very rare occasions (once every year or two) we may see a few more visitors. The Moorings has an internal parking management team that oversees and manages parking during these types of events and does not believe that there is, or will be, a lack of available parking for these types of events.

In conclusion, our calculation of the number of seats shown for the proposed Resident Fellowship Hall (486 seats) is based on the building code capacity (1 seat per seven square feet of floor space) and does not accurately reflect the proposed usage of the space.

Additionally, the Moorings of Arlington Heights has provided resident vehicle ownership data for the apartments and villas on the existing campus which is currently 0.61 vehicles per unit. Residents in the skilled care and assisted living/memory care are not able to drive. Forty-three percent of the residential units do not have a vehicle. A parking survey of the campus was also completed to better understand and anticipate demand. Based on the analysis, a total *cumulative site* parking demand of 352 vehicles is projected for the proposed additional development. This amount is well *below* both the 543 spaces *cumulative ordinance* required, and the 538 spaces proposed *within our current plan*. These conclusions and data support our belief that a parking variation for our Resident Fellowship Hall use is warranted.

**Table 1: Zoning Code Requirements for
The Moorings Proposed Plan**

Unit Type	Units	Zoning Code Requirement	Total Spaces
Senior Apartments	202	One Space per Unit	202.0
Senior Villas	73	Two Spaces per Unit	146.0
Skilled Care	105	One Space per Two Beds	52.5
Assisted Living	70	One Space per Two Beds	35.0
Assisted Living: Memory Care	20	One Space per Two Beds	10.0
Resident Fellowship Hall	486 ⁽¹⁾ seats	One Space for each 5 Seats	97.2
	470		542.7 (445.5)⁽²⁾

(1) Approximately 3,400 sq. ft. at 7 sq. ft. per person = 486 seats

(2) Requirement without Resident Fellowship Hall

C. Project Schedule

1. Design

The design and construction document schedule is to be completed by the summer of 2016. This includes approvals from all required agencies (Village of Arlington Heights, Illinois Department of Public Health, Metropolitan Water Reclamation District and the Illinois Environmental Protection Agency).

2. Construction

Construction is scheduled to begin in July of 2016.

Construction phasing is shown on drawing A001 in the Volume I drawings.

Phase I and IA include the demolition of 2 existing quad villas and the construction of the Resident Fellowship Hall and the Assisted Living building. This phase is expected to last 15 months.

Phase II and IIA include the demolition of the existing Sheltered Care and the construction of the Memory Care. This phase is expected to last 18 months.

D. Neighbor Communication

The Moorings will schedule and conduct the required neighbor meetings prior to the scheduled Plan Commission Meeting.

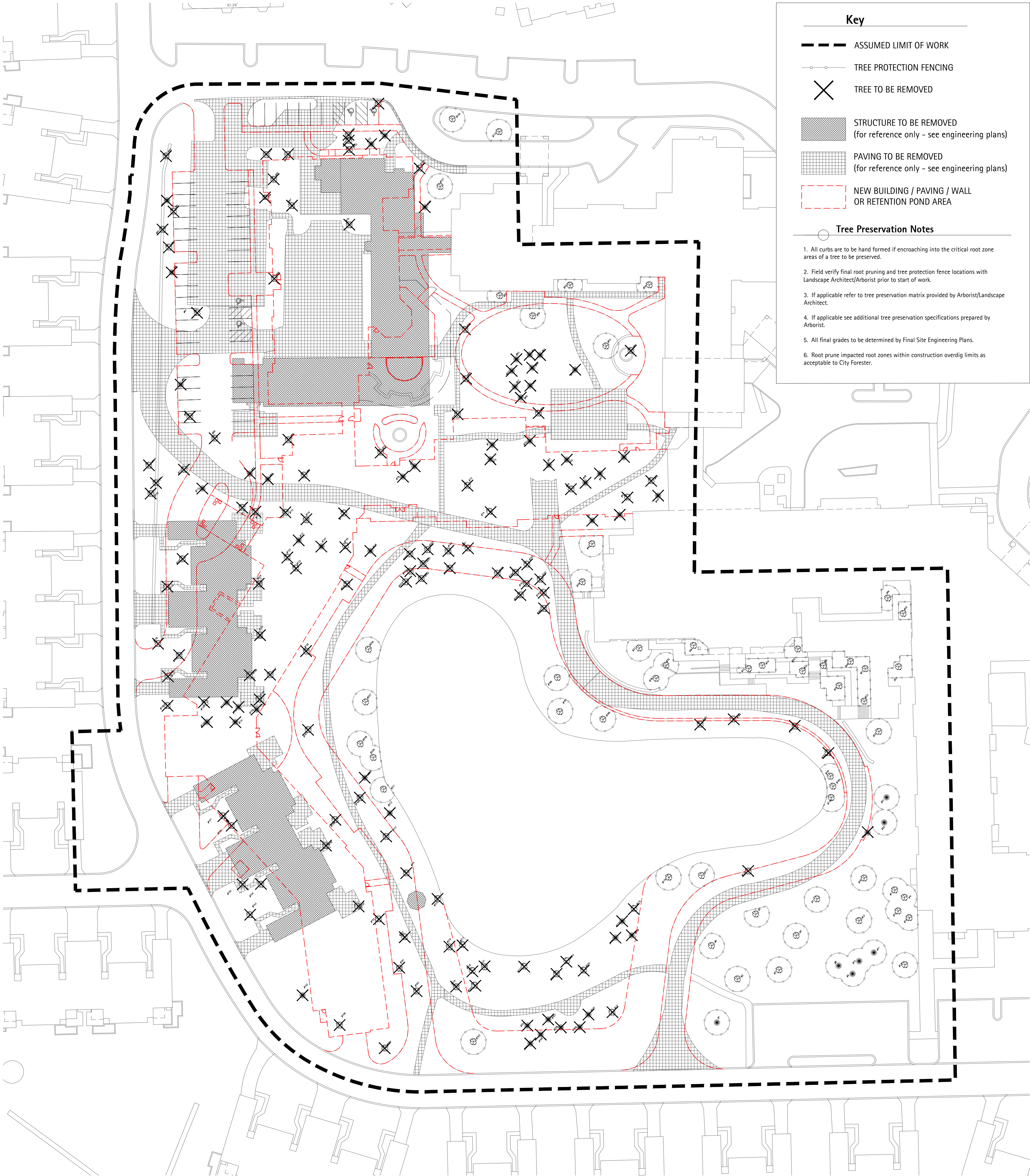
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

[illegible]



AERIAL IMAGE OF CAMPUS

VOLUME I CIVIL DRAWING NO.: 2014104		RENDERING DATE: 06/26/2015 SCALE: AS NOTED		REVISIONS NO. DATE DESCRIPTION		FOR THE MOORINGS OF ARLINGTON HEIGHTS PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: J.S.D. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.		rtps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS, LLP AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT SHALL BE THE NAME OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
---	--	--	--	-----------------------------------	--	--	--	--	--	--------------------------------------	--	---	--



Key

ASSUMED LIMIT OF WORK

TREE PROTECTION FENCING

TREE TO BE REMOVED

STRUCTURE TO BE REMOVED
(for reference only - see engineering plans)

PAVING TO BE REMOVED
(for reference only - see engineering plans)

NEW BUILDING / PAVING / WALL
OR RETENTION POND AREA

Tree Preservation Notes

1. All curbs are to be hand formed if encroaching into the critical root zone areas of a tree to be preserved.

2. Field verify final root pruning and tree protection fence locations with Landscape Architect/Arborist prior to start of work.

3. If applicable refer to tree preservation matrix provided by Arborist/Landscape Architect.

4. If applicable see additional tree preservation specifications prepared by Arborist.

5. All final grades to be determined by Final Site Engineering Plans.

6. Root prune impacted root zones within construction overdig limits as acceptable to City Forester.

TREE INVENTORY

Location:

The Moorings, 811 E. Central, Arlington Heights, IL

Date:

March 27, 2015

Condition:

5 = Excellent 4 = Good 3 = Fair 2 = Poor 1 = Dead

Tag No.	Size (dbh)	Species	Condition	Location
1	11"	Austrian Pine	5	SE at Green Canopy
2	7"	Red Maple	5	SE at Green Canopy
3	12"	Green Ash	3	SE at Green Canopy
4	6"	Hybrid Maple	5	SE at Green Canopy
5	3"	Norway Maple	5	SE at Green Canopy
6	3"	Burr Oak	5	SE at Green Canopy
7	6.0	Amur Maple	5	SE at Green Canopy
8	12"	Scots Pine	5	SE at Green Canopy
9	14"	Scots Pine	5	SE at Green Canopy
10	12"	Austrian Pine	5	SE at Green Canopy
11	13"	Scots Pine	5	SE at Green Canopy
12	16"	Honey Locust	5	SE at Green Canopy
13	17"	Elm	5	SE at Green Canopy
14	6", 5", 6"	Amur Maple	5	SE at Green Canopy
15	7", 7"	Amur Maple	5	SE at Green Canopy
16	7", 7"	Amur Maple	5	SE at Green Canopy
17	6", 5", 5"	Amur Maple	5	SE at Green Canopy
18	10"	Maple	5	SE at Green Canopy
19	13"	Scots Pine	5	SE at Green Canopy
20	10"	Scots Pine	5	SE at Green Canopy
21	12"	Scots Pine	5	SE at Green Canopy
22	7", 6", 8", 7"	Magnolia	5	Terrace
23	6"	Bradford Pear	5	Terrace
24	10", 5", 10"	Amur Maple	4	Terrace
25	10"	Norway Maple	4	Terrace
26	3", 3", 3", 3", 3"	Serviceberry	4	Terrace
27	4"	Bradford Pear	5	Terrace
28	6"	Bradford Pear	5	Terrace
29	3", 3", 3", 3", 3"	Serviceberry	5	Terrace
30	3", 3", 3", 3"	Japanese Tree Lilac	5	Terrace
31	6" Multi-Stem	Magnolia	5	Terrace
32	11"	Norway Maple	5	Terrace
33	17" Multi-Stem	Amur Maple	5	Terrace
34	3"	Weeping Cherry	5	Terrace
35	12"	Crabapple	5	Terrace
36	3", 3"	Magnolia	5	Terrace
37	8"	Crabapple	4	Terrace
38	16"	Norway Maple	5	Terrace
39	18"	Norway Maple	5	West of Building - East of Lake
40	14"	Norway Maple	4	West of Building - East of Lake
41	11"	Scots Pine	5	West of Building - East of Lake
42	12"	Scots Pine	5	West of Building - East of Lake
43	15"	Norway Maple	5	West of Building - East of Lake
44	10"	Scots Pine	5	West of Building - East of Lake
45	13"	Norway Maple	5	West of Building - East of Lake
46	14"	Douglas Fir	5	West of Building - East of Lake
47	14"	Scots Pine	5	West of Building - East of Lake
48	11"	Scots Pine	5	West of Building - East of Lake
49	16"	Norway Maple	5	West of Building - East of Lake
50	17"	Douglas Fir	5	West of Building - East of Lake
51	11", 10"	Douglas Fir	5	West of Building - East of Lake
52	17"	Concolor Fir	5	West Patio - Inside fenced area
53	31"	Norway Maple	4	West Patio - Inside fenced area
54	6", 4"	Crabapple	4	West Patio - Inside fenced area
55	6"	Crabapple	4	West Patio - Inside fenced area
56	7", 5", 6", 5"	Amur Maple	5	West Patio - Inside fenced area
57	4", 4", 4", 4"	Japanese Tree Lilac	5	West Patio - Inside fenced area
58	28"	Honey Locust	5	West Patio - Inside fenced area
59	4", 3", 3", 4"	Japanese Tree Lilac	5	West Patio - Inside fenced area
60	10"	Blue Spruce	4	West Patio - Inside fenced area
61	10"	Blue Spruce	4	West Patio - Inside fenced area
62	15"	Blue Spruce	4	West Patio - Inside fenced area
63	13"	Blue Spruce	4	West Patio - Inside fenced area
64	9"	Blue Spruce	4	West Patio - Inside fenced area
65	11"	Blue Spruce	4	West Patio - Inside fenced area
66	10"	Blue Spruce	4	West Patio - Inside fenced area
67	10"	Blue Spruce	4	West Patio - Inside fenced area
68	14"	Blue Spruce	4	West Patio - Inside fenced area
69	25"	Sugar Maple	3	West Patio - Inside fenced area
70	15"	Douglas Fir	4	West Patio - Inside fenced area
71	10"	Douglas Fir	5	West Patio - Inside fenced area
72	28"	Norway Maple	4	West Patio - Inside fenced area
73	14"	Ginkgo	5	West of Building & Steel Shed
74	18"	Norway Maple	5	West of Building & Steel Shed
75	11"	Blue Spruce	5	West of Building & Steel Shed
76	18"	Norway Maple	5	West of Building & Steel Shed
77	14"	White Spruce	4	West of Building & Steel Shed
78	12", 10"	Austrian Pine	5	West of Building & Steel Shed
79	21"	Norway Maple	3	West of Building & Steel Shed
80	30"	Ash	4	West of Building & Steel Shed
81	22"	Silver Maple	4	West of Building & Steel Shed
82	8"	White Spruce	4	West of Building & Steel Shed
83	12"	White Spruce	4	West of Building & Steel Shed
84	20"	Elm	4	West of Building & Steel Shed
85	37"	Silver Maple	5	West of Building & Steel Shed
86	13"	Blue Spruce	5	West of Building & Steel Shed
87	11"	Norway Maple	5	West of Building & Steel Shed
88	12"	Austrian Pine	5	West of Building & Steel Shed
89	5", 5", 5"	Amur Maple	4	West of Building & Steel Shed
90	5", 5", 5", 5", 6"	Amur Maple	4	West of Building & Steel Shed
91	5", 5", 5"	Amur Maple	4	West of Building & Steel Shed
92	15"	Austrian Pine	5	West of Building & Steel Shed
93	16"	Norway Maple	5	West of Building & Steel Shed
94	29"	Honey Locust	5	West of Building & Steel Shed
95	6"	Japanese Tree Lilac	5	West of Building & Steel Shed
96	3"	Magnolia	4	West of Building & Steel Shed
97	7"	Red Maple	3	West of Building & Steel Shed
98	4"	Bradford Pear	5	West of Building & Steel Shed
99	3"	Crabapple	5	West of Building & Steel Shed
100	6", 4", 5"	Japanese Tree Lilac	5	North of Rehabilitation Services
101	4"	Japanese Tree Lilac	5	North of Rehabilitation Services
102	6", 5", 4"	Japanese Tree Lilac	5	North of Rehabilitation Services
103	20"	Austrian Pine	5	North of Rehabilitation Services
104	21"	Austrian Pine	5	North of Rehabilitation Services

105	24"	Elm	4	North of Rehabilitation Services
106	6", 7", 7"	Amur Maple	3	North of Rehabilitation Services
107	9"	Sugar Maple	4	North of Rehabilitation Services
108	7", 3"	Hemlock	5	North of Rehabilitation Services
109	5", 3", 3", 4", 4", 5"	Hawthorn	4	North of Rehabilitation Services
110	5", 6", 5", 4"	Crabapple	5	North of Rehabilitation Services
111	29"	Silver Maple	4	Northwest of Lake
112	3"	White Spruce	4	Northwest of Lake
113	29"	Honey Locust	5	Northwest of Lake
114	3" Multi-Stem	Serviceberry	5	Northwest of Lake
115	23"	Honey Locust	5	Northwest of Lake
116	4", 4", 4", 3", 3"	Crabapple	4	Northwest of Lake
117	26"	Silver Maple	4	Northwest of Lake
118	27"	Tamarack	5	Northwest of Lake
119	31"	Silver Maple	5	Northwest of Lake
120	9"	Blue Spruce	4	Northwest of Lake
121	16"	Austrian Pine	5	Northwest of Lake
122	6", 5"	Crabapple	4	Northwest of Lake
123	4", 4", 4", 5"	Crabapple	4	Northwest of Lake
124	8", 9", 8", 6", 7"	Crabapple	5	Northwest of Lake
125	16" Multi-Stem	Crabapple	5	Northwest of Lake
126	3"	Red Maple	5	Northwest of Lake
127	4"	Sugar Maple	5	Northwest of Lake
128	3"	Pagoda Dogwood	5	Northwest of Lake
129	16" Multi-Stem	Crabapple	5	Northwest of Lake
130	12"	Austrian Pine	5	Northwest of Lake
131	8"	Austrian Pine	2	Northwest of Lake
132	6", 6"	Mulberry	4	Northwest of Lake
133	7", 6"	Mulberry	4	Northwest of Lake
134	10"	Bald Cypress	5	Northwest of Lake
135	8"	Bradford Pear	4	Northwest of Lake
136	4"	Crabapple	5	Front of Unit 1085
137	4"	Crabapple	5	Front of Unit 1085
138	8" Multi-Stem	Serviceberry	5	Front of Unit 1085
139	4"	Ginkgo	5	Front of Unit 1079
140	6", 4"	Crabapple	4	Front of Unit 1075
141	7" Multi-Stem	Serviceberry	5	Front of Unit 1071
142	4", 6", 6", 5"	Crabapple	4	Front of Unit 1071
143	6", 3", 6", 4"	Crabapple	4	Front of Unit 1071
144	10"	Crabapple	4	Front of Unit 1071
145	4"	Blue Spruce	5	Back of Unit 1093
146	9", 8"	Hawthorn	5	Back of Unit 1093
147	6", 6"	Hawthorn	5	Back of Unit 1093
148	8"	Red Maple	5	Back of Unit 1097
149	7", 6", 8", 8"	Crabapple	4	Back of Unit 1097
150	18" Multi-Stem	Crabapple	5	Back of Unit 1097
151	17"	Elm	3	Back of Unit 1105
152	3"	Blue Spruce	3	Front of Unit 1105
153	7", 8", 6", 6", 6"	Crabapple	5	Front of Unit 1105
154	10"	Butternut	5	Front of Unit 1101
155	14"	Redbud	4	Front of Unit 1097
156	3", 3", 4"	Serviceberry	5	Front of Unit 1097
157	7" Multi-Stem	Serviceberry	4	Front of Unit 1093
158	3"	Beech	5	South of Unit 1105
159	3"	Red Oak	5	South of Unit 1105
160	18"	Honey Locust	5	South of Unit 1105
161	16"	Honey Locust	5	South of Unit 1105
162	11"	Honey Locust	5	South of Unit 1105
163	7"	Red Maple	5	Southwest of Lake at Road
164	9"	Austrian Pine	4	Southwest of Lake at Road
165	11"	Austrian Pine	5	Southwest of Lake at Road
166	11"	Austrian Pine	5	Southwest of Lake at Road
167	10"	Austrian Pine	4	Southwest of Lake at Road
168	11"	Austrian Pine	5	Southwest of Lake at Road
169	12"	Austrian Pine	5	Southwest of Lake at Road
170	12"	Austrian Pine	5	Southwest of Lake at Road
171	4", 4", 4"	Crabapple	4	Southwest of Lake at Road
172	11"	Austrian Pine	4	Southeast of Lake
173	17"	Austrian Pine	5	Southeast of Lake
174	16"	Austrian Pine	5	Southeast of Lake
175	9"	Red Maple	5	Southeast of Lake
176	8"	Red Maple	3	Southeast of Lake
177	8"	Red Maple	5	Southeast of Lake
178	8"	Red Maple	5	Southeast of Lake
179	9"	Quaking Aspen	5	East of Pond
180	7"	Quaking Aspen	5	East of Pond
181	7"	Quaking Aspen	5	East of Pond
182	13"	Ash	4	Northeast of Pond
183	13"	Ash	4	Northeast of Pond
184	13"	Ash	4	Northeast of Pond
185	14"	Ash	4	Northeast of Pond
186	13"	Norway Maple	2	North of Pond
187	8"	Red Maple	4	North of Pond
188	14"	Norway Maple	5	North of Pond
189	14"	Honey Locust	5	North of Pond
190	8" Multi-Stem	Crabapple	5	North of Pond
191	8" Multi-Stem	Crabapple	5	North of Pond
192	8" Multi-Stem	Crabapple	5	North of Pond
193	7" Multi-Stem	Crabapple	5	North of Pond
194	7" Multi-Stem	Crabapple	5	North of Pond
195	7" Multi-Stem	Crabapple	5	North of Pond
196	6" Multi-Stem	Crabapple	4	North of Pond
197	12"	Honey Locust	5	Northwest of Pond
198	7" Multi-Stem	Crabapple	5	Northwest of Pond
199	7" Multi-Stem	Crabapple	5	Northwest of Pond
200	7" Multi-Stem	Crabapple	5	Northwest of Pond
201	7" Multi-Stem	Crabapple	5	Northwest of Pond
202	7" Multi-Stem	Crabapple	5	Northwest of Pond
203	7" Multi-Stem	Crabapple	5	Northwest of Pond
204	7" Multi-Stem	Crabapple	5	Northwest of Pond
205	7" Multi-Stem	Crabapple	5	Northwest of Pond
206	8"	Red Maple	4	Northwest of Pond
207	8"	Red Maple	4	Northwest of Pond
208	11"	Quaking Aspen	5	West of Pond
209	8"	Red Maple	5	West of Pond
210	12"	Austrian Pine	5	West of Pond
211	11"	Honey Locust	5	West of Pond
212	17"	Austrian Pine	5	West of Pond
213	10"	Honey Locust	5	West of Pond
214	15"	Honey Locust	5	West of Pond
215	11"	Honey Locust	5	Southwest of Pond
216	6"	Crabapple	5	South of Pond
217	6"	Crabapple	5	South of Pond
218	5" Multi-Stem	Crabapple	5	South of Pond
219	5" Multi-Stem	Crabapple	5	South of Pond
220	6" Multi-Stem	Crabapple	5	South of Pond
221	7" Multi-Stem	Crabapple	5	South of Pond
222	7" Multi-Stem	Crabapple	5	South of Pond
223	5"	Bradford Pear	4	South of Pond
224	7" Multi-Stem	Crabapple	5	South of Pond
225	7" Multi-Stem	Crabapple	5	South of Pond

LAKOTA
THE LAKOTA GROUP INC

116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS
OF ARLINGTON
HEIGHTS

Arlington Heights,
Illinois

Presbyterian
Homes

PLAN
COMMISSION
6/22/2015
NOT FOR
CONSTRUCTION

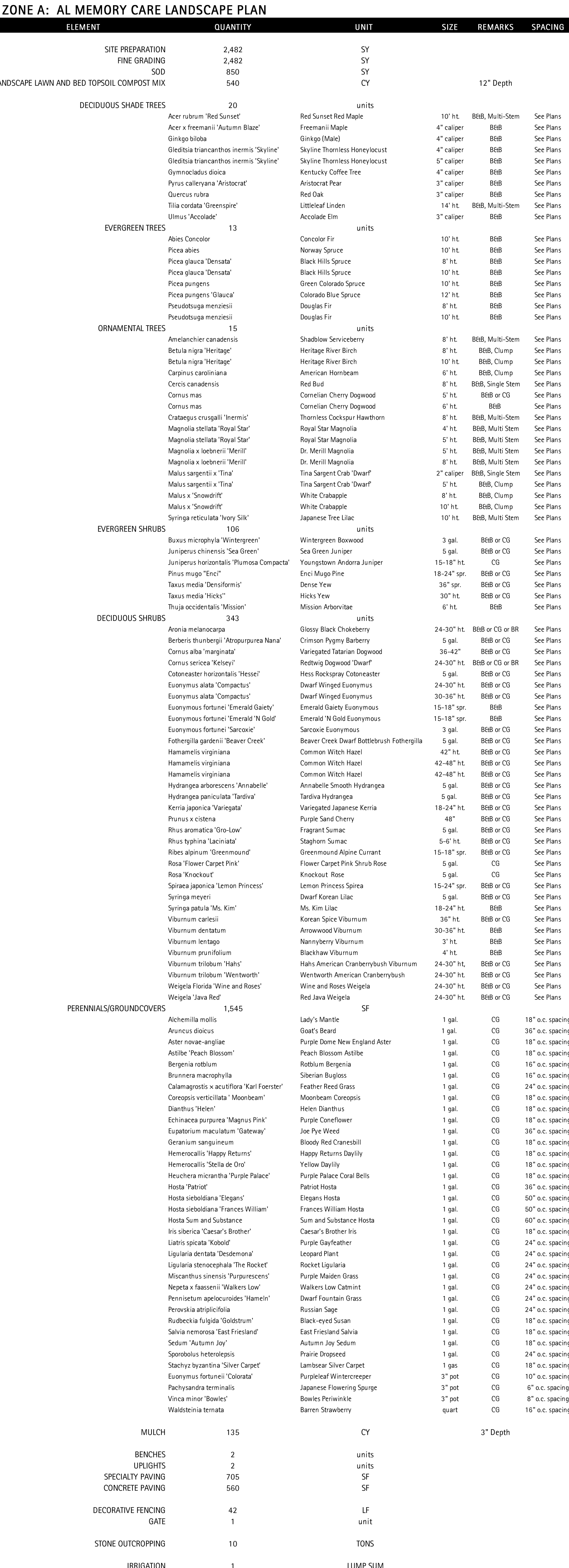
TREE SURVEY /
PRESERVATION
PLAN

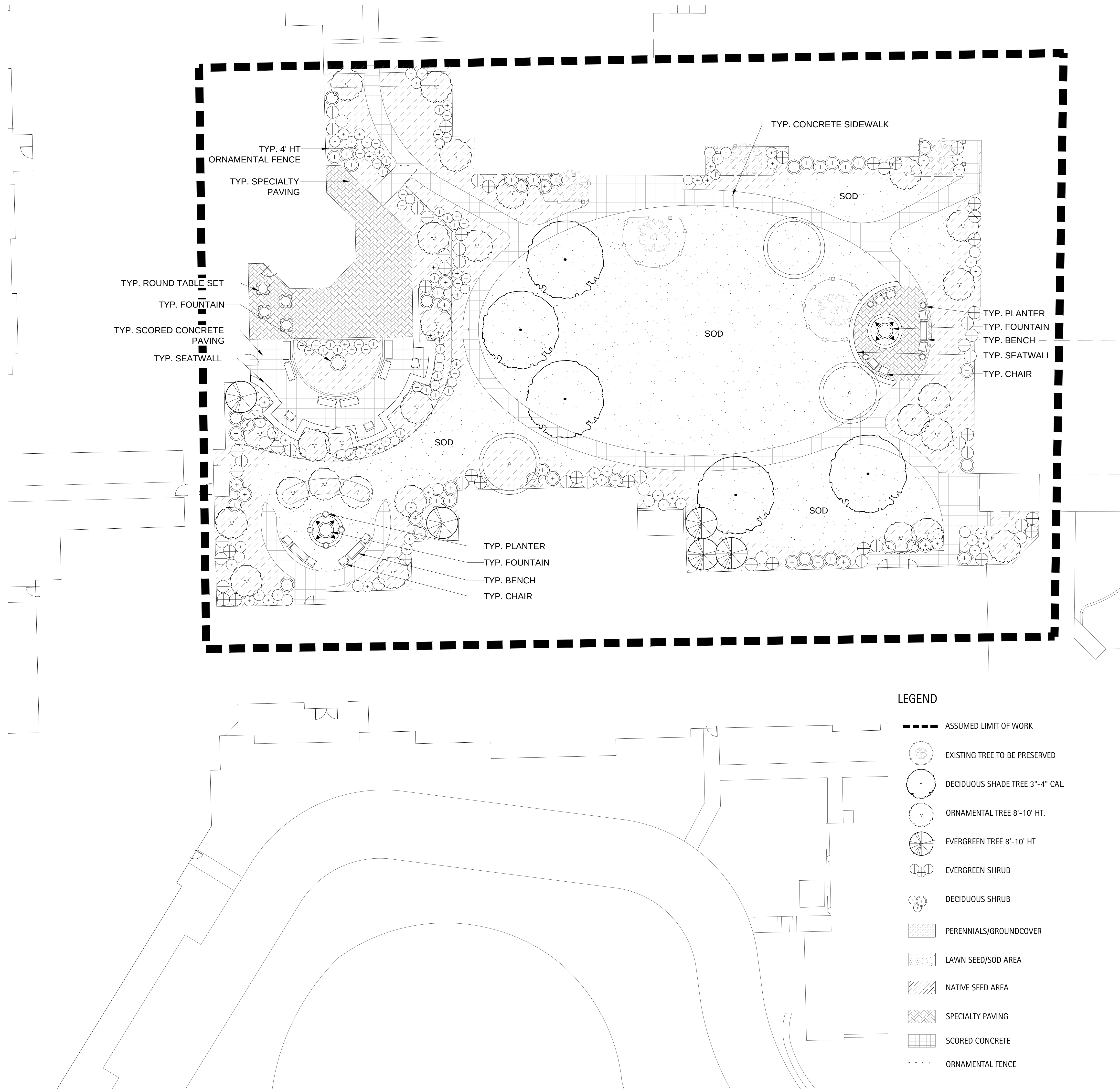
Revisions
PLAN COMMISSION 06/22/15

Date: 06/22/15
Drawn By: JW
Checked By: SF

0' 40' 80'

L-01





ZONE B : FELLOWSHIP HALL LANDSCAPE PLAN									
ELEMENT		QUANTITY	UNIT						
NDSCAPE LAWN AND BED TOPSOIL COMPOST MIX	SITE PREPARATION	2,640	SY						
	FINE GRADING	2,640	SY						
	XSD	1,451	SY						
	CMX	379	CY	12" Depth					
DECIDUOUS SHADE TREES		5	units						
Acer fraxinum 'Autumn Blaze'			Red Sunset Red Maple	10' ht.	B&B, Multi-Stem	See Plans			
Acer x freemanii 'Red Sun'			Freemanii Maple	4" caliper	B&B	See Plans			
Ginkgo biloba			Ginkgo (Male)	4" caliper	B&B	See Plans			
Gleditsia biancanthos inermis 'Skyline'			Skyline Thornless Honeylocust	4" caliper	B&B	See Plans			
Gleditsia biancanthos inermis 'Skyline'			Skyline Thornless Honeylocust	4" caliper	B&B	See Plans			
Gymnocladus dioica			Kentucky Coffee Tree	4" caliper	B&B	See Plans			
Pyrus calleryana 'Aristocrat'			Aristocrat Pear	3" caliper	B&B	See Plans			
Quercus rubra			Red Oak	3" caliper	B&B	See Plans			
Tilia cordata 'Greenspire'			Littletail Linden	14' ht.	B&B, Multi-Stem	See Plans			
Ulmus 'Accolade'			Accolade Elm	3" caliper	B&B	See Plans			
EVERGREEN TREES		5	units						
Abies Concolor			Concolor Fir	10' ht.	B&B	See Plans			
Picea abies			Norway Spruce	10' ht.	B&B	See Plans			
Picea glauca 'Densa'			Black Hills Spruce	8' ht.	B&B	See Plans			
Picea glauca 'Densa'			Black Hills Spruce	10' ht.	B&B	See Plans			
Picea pungens			Green Colorado Spruce	10' ht.	B&B	See Plans			
Picea pungens 'Glauca'			Colorado Blue Spruce	12' ht.	B&B	See Plans			
Pseudotsuga menziesii			Douglas Fir	8' ht.	B&B	See Plans			
Pseudotsuga menziesii			Douglas Fir	10' ht.	B&B	See Plans			
ORNAMENTAL TREES		30	units						
Amelanchier canadensis			Shadblow Serviceberry	8' ht.	B&B, Multi-Stem	See Plans			
Betula nigra 'Heritage'			Heritage River Birch	8' ht.	B&B, Clump	See Plans			
Betula nigra 'Heritage'			Heritage River Birch	10' ht.	B&B, Clump	See Plans			
Carpinus caroliniana			American Hornbeam	6' ht.	B&B, Clump	See Plans			
Cercis canadensis			Red Bud	8' ht.	B&B, Single Stem	See Plans			
Cornus mas			Cornelian Cherry Dogwood	5' ht.	B&B or CG	See Plans			
Cornus mas			Cornelian Cherry Dogwood	6' ht.	B&B	See Plans			
Crataegus coccinea 'Inermis'			Thornless Red Hawthorn	8' ht.	B&B, Multi-Stem	See Plans			
Magnolia stellata 'Royal Star'			Royal Star Magnolia	4' ht.	B&B, Multi-Stem	See Plans			
Magnolia stellata 'Royal Star'			Royal Star Magnolia	5' ht.	B&B, Multi-Stem	See Plans			
Magnolia x loebneri 'Meril'			Dr. Meril Magnolia	5' ht.	B&B, Multi-Stem	See Plans			
Magnolia x loebneri 'Meril'			Dr. Meril Magnolia	8' ht.	B&B, Multi-Stem	See Plans			
Malus sargentii x 'Tina'			Tina Sargent Crab 'Dwarf'	2' caliper	B&B, Single Stem	See Plans			
Malus sargentii x 'Tina'			Tina Sargent Crab 'Dwarf'	9' ht.	B&B, Clump	See Plans			
Malus x 'Snowdrift'			White Crabapple	9' ht.	B&B, Clump	See Plans			
Malus x 'Snowdrift'			White Crabapple	10' ht.	B&B, Clump	See Plans			
Syringa reticulata 'Ivory Silk'			Japanese Tree Lilac	10' ht.	B&B, Multi-Stem	See Plans			
EVERGREEN SHRUBS		65	units						
Juniperus microphylla 'Wintergreen'			Wintergreen Boxwood	3 gal.	B&B or CG	See Plans			
Buxus chinensis 'Sea Green'			Sea Green Juniper	3 gal.	B&B or CG	See Plans			
Juniperus horizontalis 'Pumila Compacta'			Spreading Dwarf Juniper	15-18" ht.	B&B or CG	See Plans			
Pinus mugo 'Etna'			Eric Mugo Pine	18-24" spr.	B&B or CG	See Plans			
Taxus media 'Densiformis'			Dense Yew	36" spr.	B&B or CG	See Plans			
Taxus media 'Hicks'			Hicks Yew	30" ht.	B&B or CG	See Plans			
Thuja occidentalis 'Mission'			Mission Arborvitae	6' ht.	B&B	See Plans			
DECIDUOUS SHRUBS		169	units						
Aronia melanocarpa			Glossy Black Chokeberry	24-30" ht.	B&B or CG or BR	See Plans			
Berberis thunbergii 'Atropurpurea Nana'			Crimson Pygmy Barberry	5 gal.	B&B or CG	See Plans			
Cornus alba 'marginata'			Vargegated Tartarian Dogwood	36-42"	B&B or CG	See Plans			
Cornus sericea 'Kelsey'			Redtwig Dogwood 'Dwarf'	24-30" ht.	B&B or CG or BR	See Plans			
Cotoneaster horizontalis 'Hesse'			Hess Rockspray Cotoneaster	5 gal.	B&B or CG	See Plans			
Euonymus alata 'Compacta'			Dwarf Winged Euonymus	24-30" ht.	B&B or CG	See Plans			
Euonymus alata 'Compacta'			Dwarf Winged Euonymus	30-36" ht.	B&B or CG	See Plans			
Euonymus fortunei 'Emerald Gold'			Emerald Gold Euonymus	15-18" spr.	B&B	See Plans			
Euonymus fortunei 'Emerald 'N Gold'			Emerald 'N Gold Euonymus	15-18" spr.	B&B	See Plans			
Euonymus fortunei 'Sarcoxie'			Sarcoxie Euonymus	3 gal.	B&B or CG	See Plans			
Fothergilla gardenii 'Beaver Creek'			Beaver Creek Dwarf Botherbush	3 gal.	B&B or CG	See Plans			
Fothergilla gardenii 'Beaver Creek'			Beaver Creek Dwarf Botherbush	42" ht.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42-48" ht.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42-48" ht.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42-48" ht.	B&B or CG	See Plans			
Hydrangea arborescens 'Annabelle'			Annabelle Smooth Hydrangea	5 gal.	B&B or CG	See Plans			
Hydrangea paniculata 'Tardiva'			Tardiva Hydrangea	5 gal.	B&B or CG	See Plans			
Kerria japonica 'Varegate'			Vargegated Japanese Kerria	18-24" ht.	B&B or CG	See Plans			
Prunus x cistena			Purple Sand Cherry	48"	B&B or CG	See Plans			
Rhus aromatica 'Dro-Low'			Shrubby Sumac	5 gal.	B&B or CG	See Plans			
Rhus typhina 'Lacinata'			Staghorn Sumac	5-6" ht.	B&B or CG	See Plans			
Ribes alpinum 'Greenmound'			Greenmound Alpine Currant	15-18" spr.	B&B or CG	See Plans			
Rosa 'Flower Carpet Pink'			Flower Carpet Pink Shrub Rose	5 gal.	CG	See Plans			
Rosa 'Knockout'			Knockout Rose	5 gal.	CG	See Plans			
Syringa japonica 'Iemon Princess'			Iemon Princess Spirea	15-24" spr.	B&B or CG	See Plans			
Syringa meyeri 'Dwarf Korean Lilac'			Dwarf Korean Lilac	5 gal.	B&B or CG	See Plans			
Syringa patula 'Ms. Kim'			Ms. Kim Lilac	18-24" ht.	B&B	See Plans			
Viburnum carlesii			Korean Spice Viburnum	36" ht.	B&B or CG	See Plans			
Viburnum dentatum			Arrowwood Viburnum	30-36" ht.	B&B	See Plans			
Viburnum lantana			Nannyberry Viburnum	3' ht.	B&B	See Plans			
Viburnum prunifolium			Blackberry Viburnum	4' ht.	B&B	See Plans			
Viburnum trilobum 'Hats'			Hats American Cranberrybush Viburnum	24-30" ht.	B&B or CG	See Plans			
Viburnum trilobum 'Wentworth'			Wentworth American Cranberrybush	24-30" ht.	B&B or CG	See Plans			
Weigela Florida 'Wine and Roses'			Wine and Roses Weigela	24-30" ht.	B&B or CG	See Plans			
Weigela 'Java Red'			Red Java Weigela	24-30" ht.	B&B or CG	See Plans			
PERENNIALS/GROUNDCOVERS		3,070	SF						
Alchemilla mollis			Lady's Mantle	1 gal.	CG	18" oc spacing			
Aruncifolios			Goats Beard	1 gal.	CG	36" oc spacing			
Aster noae-anglie			Purple Dome New England Aster	1 gal.	CG	18" oc spacing			
Astilbe 'Peach Blossom'			Peach Blossom Astilbe	1 gal.	CG	18" oc spacing			
Bergenia rotundum			Rotundum Bergenia	1 gal.	CG	16" oc spacing			
Brunnera macrophylla			Siberian Bugloss	1 gal.	CG	16" oc spacing			
Calamagrostis x acutiflora 'Karl Foerster'			Feather Reed Grass	1 gal.	CG	24" oc spacing			
Ceropegia verticillata 'Mangrove Pink'			Moonbeam Ceropegia	1 gal.	CG	18" oc spacing			
Dianthus 'Yelen'			Heien Dianthus	1 gal.	CG	18" oc spacing			
Echinacea purpurea 'Magnus Pink'			Purple Coneflower	1 gal.	CG	18" oc spacing			
Eupatorium maculatum 'Gateway'			Joe Pye Weed	1 gal.	CG	36" oc spacing			
Geranium sanguineum			Bloody Red Cranesbill	1 gal.	CG	18" oc spacing			
Hemerocallis 'Happy Returns'			Happy Returns Daylily	1 gal.	CG	18" oc spacing			
Hemerocallis 'Stella de Oro'			Yellowing Yellow Daylily	1 gal.	CG	18" oc spacing			
Heuchera micrantha 'Purple Palace'			Purple Palace Coral Bells	1 gal.	CG	18" oc spacing			
Hosta 'Patric'			Patric Hosta	1 gal.	CG	36" oc spacing			
Hosta sieboldiana 'Elegans'			Elegans Hosta	1 gal.	CG	50" oc spacing			
Hosta sieboldiana 'Frances Williams'			Frances Williams Hosta	1 gal.	CG	50" oc spacing			
Hosta Sum and Substance			Sum and Substance Hosta	1 gal.	CG	60" oc spacing			
Iris albertica 'Cesar's Brother'			Cesar's Brother Iris	1 gal.	CG	18" oc spacing			
Liatris spicata 'Kobold'			Purple Spikes 'Father'	1 gal.	CG	24" oc spacing			
Ligularia dentata 'Desdemona'			Leopard Plant	1 gal.	CG	24" oc spacing			
Ligularia stenocephala 'The Rocket'			Rocket Ligularia	1 gal.	CG	24" oc spacing			
Miscanthus sinensis 'Purpureus'			Purple Maiden Grass	1 gal.	CG	24" oc spacing			
Nepeta x faassenii 'Walkers Low'			Walkers Low Catmint	1 gal.	CG	24" oc spacing			
Penstemon alpestricus 'Hamelin'			Dwarf Footplant	1 gal.	CG	24" oc spacing			
Perovskia atrorubra			Russian Sage	1 gal.	CG	24" oc spacing			
Rudbeckia fulgida 'Goldstrum'			Black-eyed Susan	1 gal.	CG	18" oc spacing			
Salvia nemorosa 'East Friesland'			East Friesland Salvia	1 gal.	CG	18" oc spacing			
Sedum 'Autumn Joy'			Autumn Joy Sedum	1 gal.	CG	18" oc spacing			
Sporobolus heterolepis			Prairie Droopseed	1 gal.	CG	24" oc spacing			
Stachys byzantina 'Silver Carpet'			Lamb's Ear Silver Carpet	1 gal.	CG	18" oc spacing			
Euonymus fortunei 'Colovrat'			Ruffled Wintercreeper	1 gal.	CG	24" oc spacing			
Pachystima terminalis			Japanese Flowering Surge	3 pots	CG	6" spacing			
Viola minor 'Bowles'			Bowles Periwinkle	3 pots	CG	8" spacing			
Valdebenia terminalis			Barnes Strawberry	quart	CG	16" oc spacing			

LAKOTA
THE LAKOTA GROUP INC.

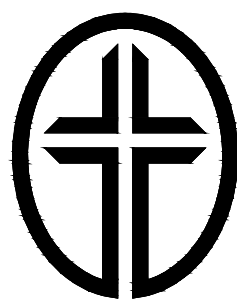
116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS OF ARLINGTON HEIGHTS

Arlington Heights,
Illinois

Presbyterian Homes



**PLAN
COMMISSION
6/22/2015
NOT FOR
CONSTRUCTION**



Call 48 hours before you dig
(Excluding Sat., Sun. & Holidays)

ZONE B - ELLOWSHIP HALL LANDSCAPE PLAN

Revisions	
PLAN COMMISSION	06/22/15

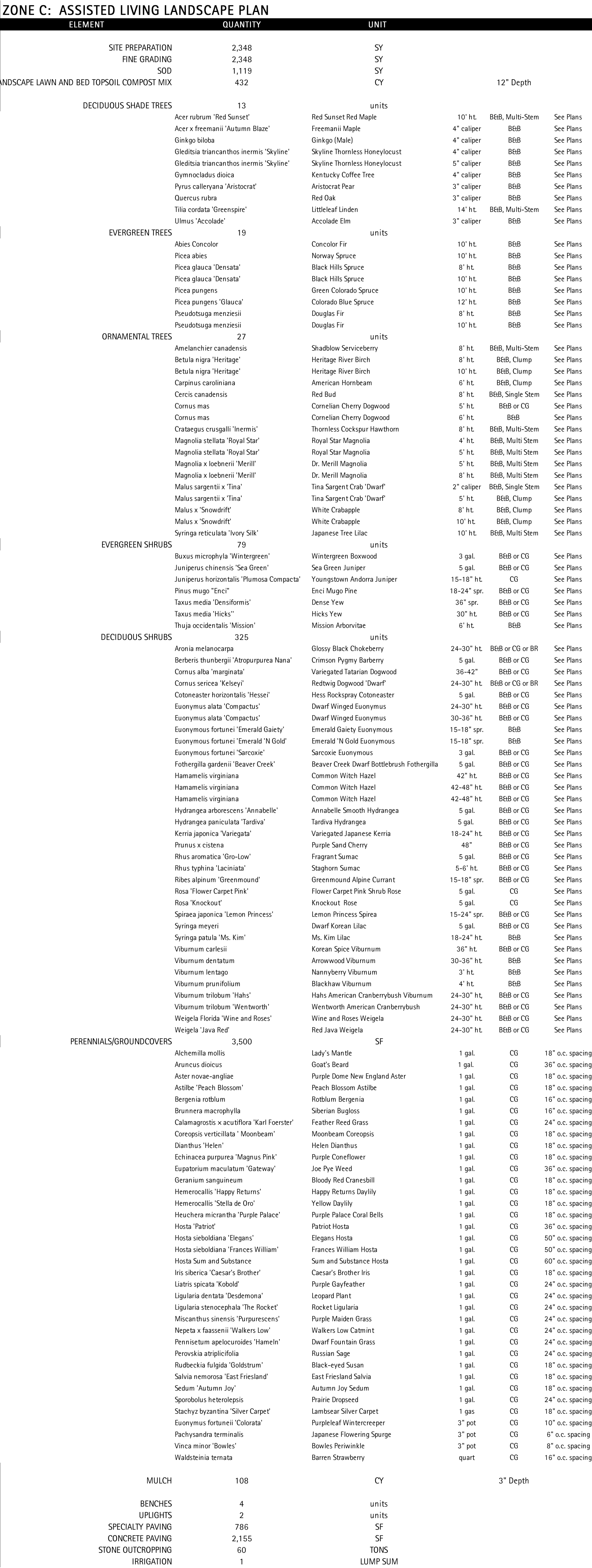
Date:	06/22/15
Drawn By:	JW
Checked By:	SF

Date:	06/22/15
Drawn By:	JW
Checked By:	SF



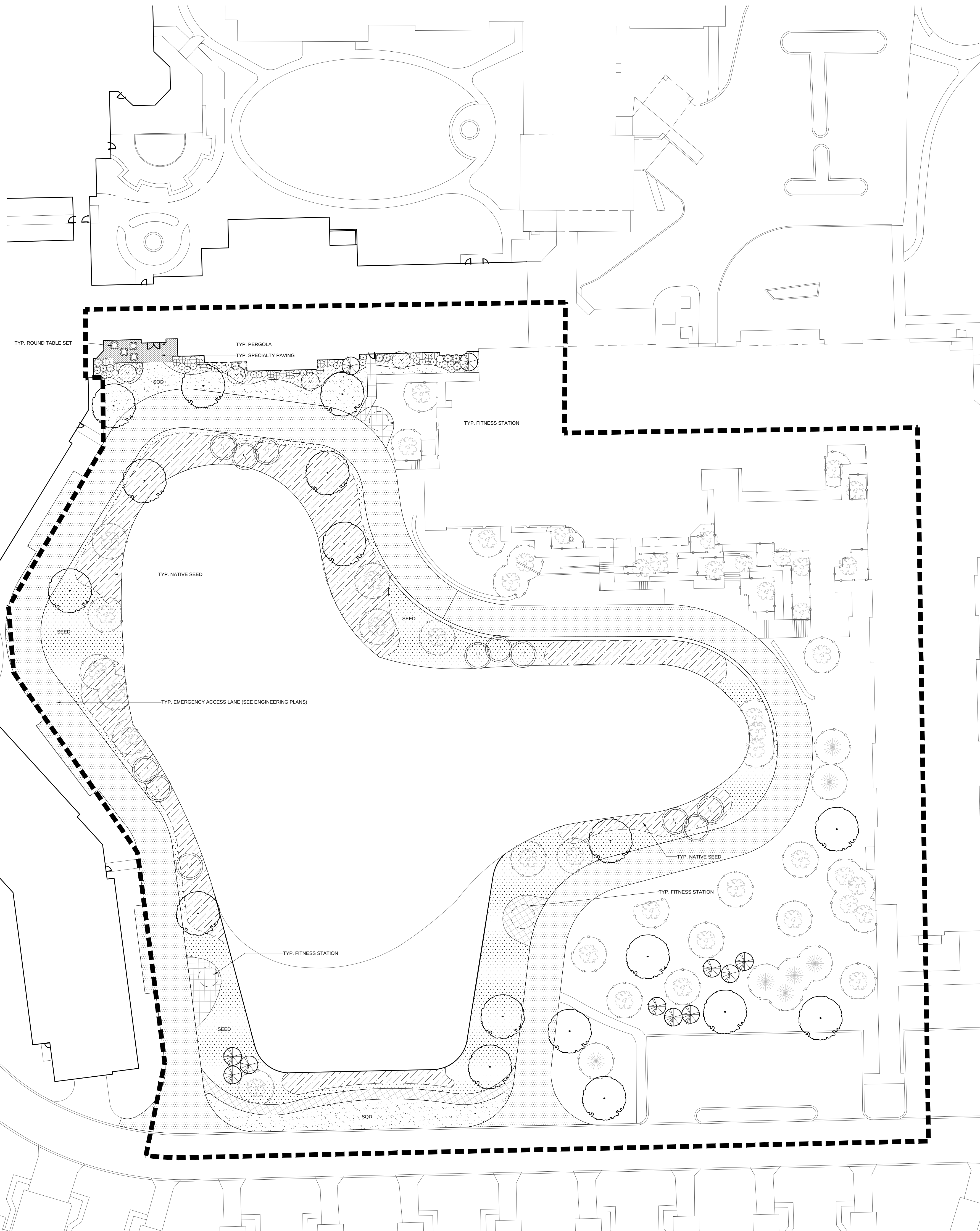
0' 15' 30'

L-03



LEGEND

■■■■ ASSUMED LIMIT OF WORK



ZONE D: RETENTION POND LANDSCAPE PLAN

ELEMENT		QUANTITY	UNIT		
LANDSCAPE LAWN AND BED TOPSOIL	SITE PREPARATION	1,773	SY		
	FINE GRADING	1,773	SY		
	SOD	498	SY		
	NATIVE SEED	63	CY		12" Depth
	LAWN SEED	1,542	SY		
DECIDUOUS SHADE TREES					
	17	units			
	Acer rubrum 'Red Sunset'	Red Sunset Red Maple	10' ht.	B&B, Multi-Stem	See Plans
	Acer x freemanii 'Autumn Blaze'	Freemanii Maple	4" caliper	B&B	See Plans
	Ginkgo biloba	Ginkgo (Male)	4" caliper	B&B	See Plans
	Gleditsia triacanthos inermis 'Skyline'	Skyline Thornless Honeylocust	4" caliper	B&B	See Plans
	Gleditsia triacanthos inermis 'Skyline'	Skyline Thornless Honeylocust	5" caliper	B&B	See Plans
	Gymnocladus dioica	Kentucky Coffee Tree	4" caliper	B&B	See Plans
	Pyrus calleryana 'Aristocrat'	Aristocrat Pear	3" caliper	B&B	See Plans
	Quercus rubra	Red Oak	3" caliper	B&B	See Plans
	Tilia cordata 'Greenspire'	Littleleaf Linden	14' ht.	B&B, Multi-Stem	See Plans
	Ulmus 'Accolade'	Accolade Elm	3" caliper	B&B	See Plans
EVERGREEN TREES					
	11	units			
	Abies Concolor	Concolor Fir	10' ht.	B&B	See Plans
	Picea abies	Norway Spruce	10' ht.	B&B	See Plans
	Picea glauca 'Densata'	Black Hills Spruce	8' ht.	B&B	See Plans
	Picea glauca 'Densata'	Black Hills Spruce	10' ht.	B&B	See Plans
	Picea pungens	Green Colorado Spruce	10' ht.	B&B	See Plans
	Picea pungens 'Glaucia'	Colorado Blue Spruce	12' ht.	B&B	See Plans
	Pseudotsuga menziesii	Douglas Fir	8' ht.	B&B	See Plans
	Pseudotsuga menziesii	Douglas Fir	10' ht.	B&B	See Plans
ORNAMENTAL TREES					
	16	units			
	Amelanchier canadensis	Shadlow Serviceberry	8' ht.	B&B, Multi-Stem	See Plans
	Betula nigra 'Heritage'	Heritage River Birch	8' ht.	B&B, Clump	See Plans
	Betula nigra 'Heritage'	Heritage River Birch	10' ht.	B&B, Clump	See Plans
	Carpinus caroliniana	American Hornbeam	6' ht.	B&B, Clump	See Plans
	Cercis canadensis	Red Bud	8' ht.	B&B, Single Stem	See Plans
	Cornus mas	Corneilan Cherry Dogwood	5' ht.	B&B or CG	See Plans
	Cornus mas	Corneilan Cherry Dogwood	6' ht.	B&B	See Plans
	Crataegus crusgalli 'Inermis'	Thornless Cockspur Hawthorn	8' ht.	B&B, Multi-Stem	See Plans
	Magnolia stellata 'Royal Star'	Royal Star Magnolia	4' ht.	B&B, Multi-Stem	See Plans
	Magnolia stellata 'Royal Star'	Royal Star Magnolia	5' ht.	B&B, Multi-Stem	See Plans
	Magnolia x leodermis 'Merill'	Dr. Merrill Magnolia	5' ht.	B&B, Multi-Stem	See Plans
	Magnolia x leodermis 'Merill'	Dr. Merrill Magnolia	8' ht.	B&B, Multi-Stem	See Plans
	Malus sargentii x 'Tina'	Tina Sargent Crab 'Dwarf'	2" caliper	B&B, Single Stem	See Plans
	Malus sargentii x 'Tina'	Tina Sargent Crab 'Dwarf'	5' ht.	B&B, Clump	See Plans
	Malus x 'Snowdrift'	White Crabapple	8' ht.	B&B, Clump	See Plans
	Malus x 'Snowdrift'	White Crabapple	10' ht.	B&B, Clump	See Plans
	Syringa reticulata 'Ivory Silk'	Japanese Tree Lilac	10' ht.	B&B, Multi-Stem	See Plans
EVERGREEN SHRUBS					
	74	units			
	Buxus microphylla 'Wintergreen'	Wintergreen Boxwood	2 gal.	B&B or CG	See Plans
	Juniperus chinensis 'Sea Green'	Sea Green Juniper	5 gal.	B&B or CG	See Plans
	Juniperus horizontalis 'Plumosa Compacta'	Youngstown Andorra Juniper	15-18" ht.	CG	See Plans
	Pinus mugo 'Erici'	Eric Mugo Pine	18-24" spr.	B&B or CG	See Plans
	Taxus media 'Densiformis'	Dense Yew	36" spr.	B&B or CG	See Plans
	Taxus media 'Hicks'	Hicks Yew	30" ht.	B&B or CG	See Plans
	Thuja occidentalis 'Mission'	Mission Arborvitae	6" ht.	B&B	See Plans
DECIDUOUS SHRUBS					
	45	units			
	Aronia melanocarpa	Glossy Black Chokeberry	24-30" ht.	B&B or CG or BR	See Plans
	Betula (Bunbleb) 'Akropurpurea Nana'	Clump Purple Birch	5 gal.	B&B or CG	See Plans
	Cornus alba 'marginata'	Variiegated Tartarian Dogwood	36-42"	B&B or CG	See Plans
	Cornus sericea 'Kelsey'	Redtwig Dogwood 'Dwarf'	24-30" ht.	B&B or CG or BR	See Plans
	Cotoneaster horizontalis 'Hesse'	Hess Rockspray Cotoneaster	5 gal.	B&B or CG	See Plans
	Euonymus alata 'Compactus'	Dwarf Winged Euonymus	24-30" ht.	B&B or CG	See Plans
	Euonymus alata 'Compactus'	Euonymus alata 'Compactus'	30-36" ht.	B&B or CG	See Plans
	Euonymus fortunei 'Emerald Gaiety'	Emerald Gaiety Euonymus	15-18" spr.	B&B	See Plans
	Euonymus fortunei 'Emerald 'N Gold'	Emerald 'N Gold Euonymus	15-18" spr.	B&B	See Plans
	Euonymus fortunei 'Sarcoke'	Sarcoke Euonymus	3 gal.	B&B or CG	See Plans
	Fothergilla gardenii 'Beaver Creek'	Beaver Creek Dwarf Bottlebrush Fothergilla	5 gal.	B&B or CG	See Plans
	Hamamelis virginiana	Common Witch Hazel	42" ht.	B&B or CG	See Plans
	Hamamelis virginiana	Common Witch Hazel	42-48" ht.	B&B or CG	See Plans
	Hamamelis virginiana	Common Witch Hazel	42-48" ht.	B&B or CG	See Plans
	Hydrangea arborescens 'Annabelle'	Annabelle Smooth Hydrangea	5 gal.	B&B or CG	See Plans
	Hydrangea paniculata 'Tardiva'	Tardiva Hydrangea	5 gal.	B&B or CG	See Plans
	Kerria japonica 'Variegata'	Variegated Japanese Kerria	18-24" ht.	B&B or CG	See Plans
	Prunus x cistena	Purple Sand Cherry	48"	B&B or CG	See Plans
	Rhus aromatica 'Dro-Low'	Fragnant Sumac	5 gal.	B&B or CG	See Plans
	Rhus typhina 'Laciniosa'	Staghorn Sumac	5-6" ht.	B&B or CG	See Plans
	Ribes alpinum 'Greenmound'	Greenmound Alpine Currant	15-18" spr.	B&B or CG	See Plans
	Rosa 'Flower Carpet Pink'	Flower Carpet Pink Shrub Rose	5 gal.	CG	See Plans
	Rosa 'Knockout'	Knockout Rose	5 gal.	CG	See Plans
	Spiraea japonica 'Lemon Princess'	Lemon Princess Spiraea	15-24" spr.	B&B or CG	See Plans
	Syringa meyeri	Dwarf Korean Lilac	5 gal.	B&B or CG	See Plans
	Syringa patula 'Ms. Kim'	Ms. Kim Lilac	18-24" ht.	B&B	See Plans
	Viburnum carlesii	Korean Spice Viburnum	36" ht.	B&B or CG	See Plans
	Viburnum dentata	Arrowwood Viburnum	30-36" ht.	B&B	See Plans
	Viburnum lentago	Nannybush Viburnum	3" ht.	B&B	See Plans
	Viburnum pumilifolium	Blackhaw Viburnum	4" ht.	B&B	See Plans
	Viburnum trilobum 'Hahs'	Hahs American Cranberrybush Viburnum	24-30" ht.	B&B or CG	See Plans
	Viburnum trilobum 'Wienworth'	Wienworth American Cranberrybush	24-30" ht.	B&B or CG	See Plans
	Weigela Florida 'Wine and Roses'	Wine and Roses Weigela	24-30" ht.	B&B or CG	See Plans
	Weigela 'Java Red'	Red Java Weigela	24-30" ht.	B&B or CG	See Plans
PERENNIALS/GROUNDCOVERS					
	511	SF			
	Achillea millefolium	Lady's Mantle	1 gal.	CG	18" oc. spacing
	Aucubus dioica	Gaul's Band	1 gal.	CG	36" oc. spacing
	Aster novae-angliae	Purple Dome New England Aster	1 gal.	CG	18" oc. spacing
	Astilbe 'Peach Blossom'	Peach Blossom Astilbe	1 gal.	CG	18" oc. spacing
	Bergenia rotblum	Rotblum Bergenia	1 gal.	CG	16" oc. spacing
	Brunnera macrophylla	Siberian Bugloss	1 gal.	CG	16" oc. spacing
	Calamagrostis x acutiflora 'Karl Foerster'	Feather Reed Grass	1 gal.	CG	24" oc. spacing
	Coreopsis verticillata 'Moonbeam'	Moonbeam Coreopsis	1 gal.	CG	18" oc. spacing
	Dianthus 'Helen'	Helen Dianthus	1 gal.	CG	18" oc. spacing
	Echinacea purpurea 'Magnus Pink'	Purple Coneflower	1 gal.	CG	18" oc. spacing
	Eupatorium maculatum 'Gateway'	Joe Pye Weed	1 gal.	CG	36" oc. spacing
	Geranium sanguineum	Bloody Red Cranebill	1 gal.	CG	18" oc. spacing
	Hemerocallis 'Happy Returns'	Happy Returns Daylily	1 gal.	CG	18" oc. spacing
	Hemerocallis 'Stella de Oro'	Yellow Daylily	1 gal.	CG	18" oc. spacing
	Heuchera micrantha 'Purple Palace'	Purple Palace Coral Bells	1 gal.	CG	18" oc. spacing
	Hosta 'Patriot'	Patriot Hosta	1 gal.	CG	36" oc. spacing
	Hosta sieboldiana 'Elegans'	Elegans Hosta	1 gal.	CG	50" oc. spacing
	Hosta sieboldiana 'Frances Williams'	Frances Williams Hosta	1 gal.	CG	50" oc. spacing
	Hosta Sem and Substance	Sem and Substance Hosta	1 gal.	CG	60" oc. spacing
	Iris sibirica 'Caesia's Brother'	Caesia's Brother Iris	1 gal.	CG	18" oc. spacing
	Liatris spicata 'Kolob'	Purple Gaylather	1 gal.	CG	24" oc. spacing
	Ligularia dentata 'Desdemona'	Leopard Plant	1 gal.	CG	24" oc. spacing
	Ligularia stenocephala 'The Rocket'	Rocket Ligularia	1 gal.	CG	24" oc. spacing
	Miscanthus sinensis 'Purpureusens'	Purple Maiden Grass	1 gal.	CG	24" oc. spacing
	Nepeta x faassenii 'Walkers Low'	Walkers Low Catmint	1 gal.	CG	24" oc. spacing
	Pennstemon apocynoides 'Hamelii'	Dwarf Fourtain Grass	1 gal.	CG	24" oc. spacing
	Penstemon antiphrasius	Russian Suedgrass	1 gal.	CG	24" oc. spacing
	Rudbeckia fulgida 'Goldstrum'	Black-eyed Susan	1 gal.	CG	18" oc. spacing
	Salvia nemorosa 'East Friesland'	East Friesland Salvia	1 gal.	CG	18" oc. spacing
	Sedum 'Autumn Joy'	Autumn Joy Sedum	1 gal.	CG	18" oc. spacing
	Sporobolus heterolepis	Prairie Dropseed	1 gal.	CG	24" oc. spacing
	Stachys byzantina 'Silver Carpet'	Lambear Silver Carpet	1 gas	CG	18" oc. spacing
	Euonymus fortunei 'Colorata'	Purpleleaf Wintercreeper	3" pot	CG	10" oc. spacing
	Pachysandra terminalis	Japanese Flowering Spurge	3" pot	CG	6" oc. spacing
	Vinca minor 'Bowles'	Bowles Periwinkle	3" pot	CG	8" oc. spacing
	Waldsteinia ternata	Barren Strawberry	quant	CG	16" oc. spacing
MULCH					
	16	CY			3" Depth
ROUND TABLE SETS					
	4	units			
PERGOLA					
	1	allowance			
SPECIALTY PAVING					
	495	SF			
CONCRETE PAVING					
	2,533	SF			
STONE OUTCROPPING					
	30	TONS			
FITNESS STATIONS					
	3	units			
IRRIGATION					
	1	LUMP SUM			

LAKOTA
THE LAKOTA GROUP INC.

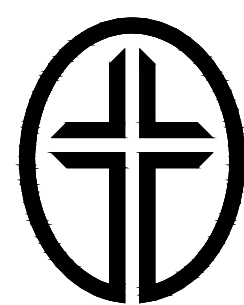
116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS OF ARLINGTON HEIGHTS

Arlington Heights,
Illinois

Presbyterian Homes



**PLAN
COMMISSION
6/22/2015
NOT FOR
CONSTRUCTION**



ZONE D - RETENTION POND LANDSCAPE PLAN

Revisions	
PLAN COMMISSION	06/22/15

Date:	06/22/15
Drawn By:	JW
Checked By:	SR



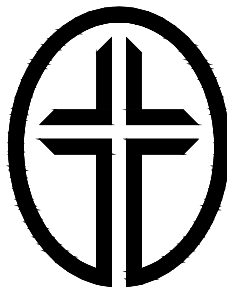
0' 30' 60'

L-05

THE MOORINGS
OF ARLINGTON
HEIGHTS

Arlington Heights,
Illinois

Presbyterian
Homes

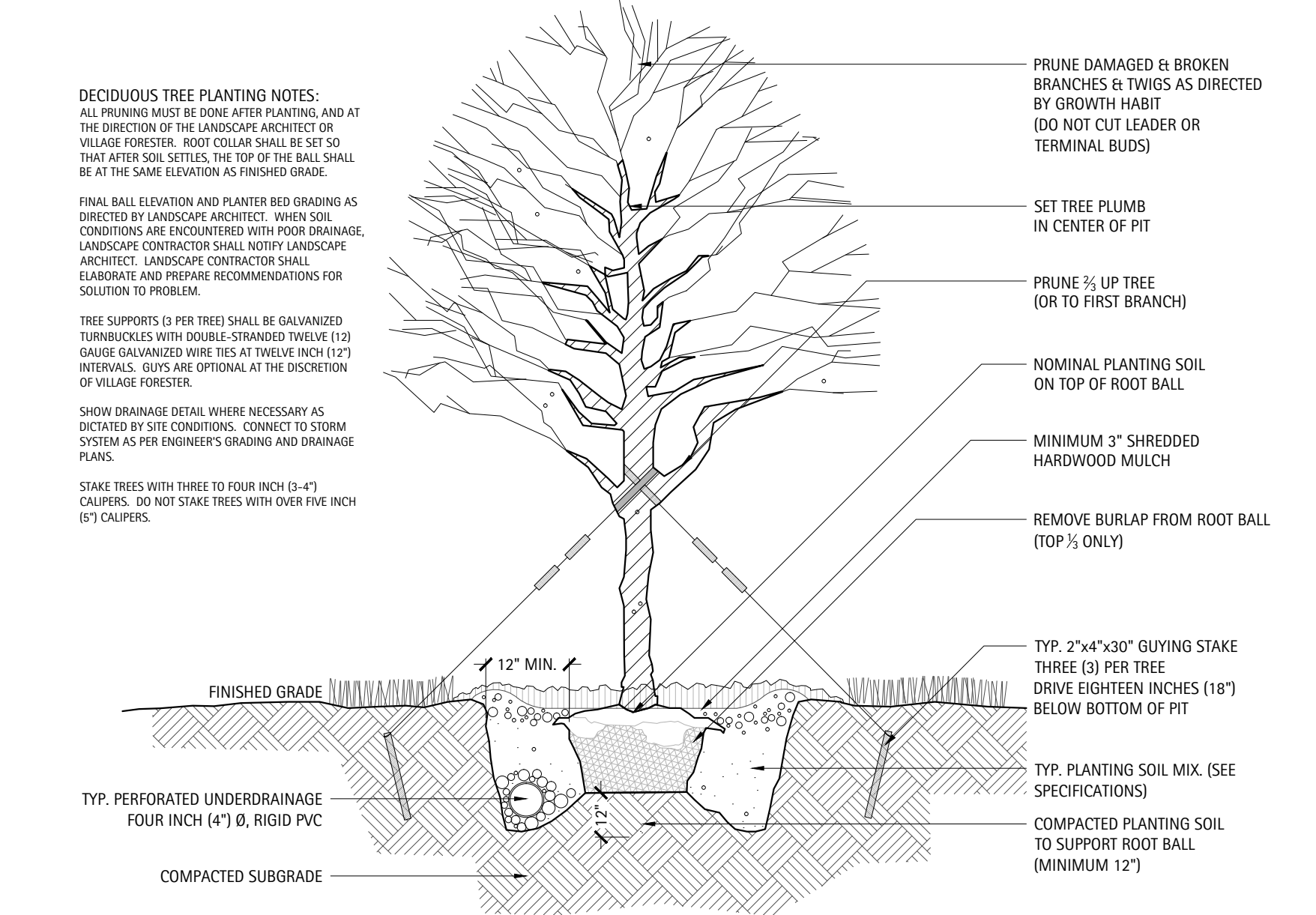


PLAN
COMMISSION
6/22/2015
NOT FOR
CONSTRUCTION

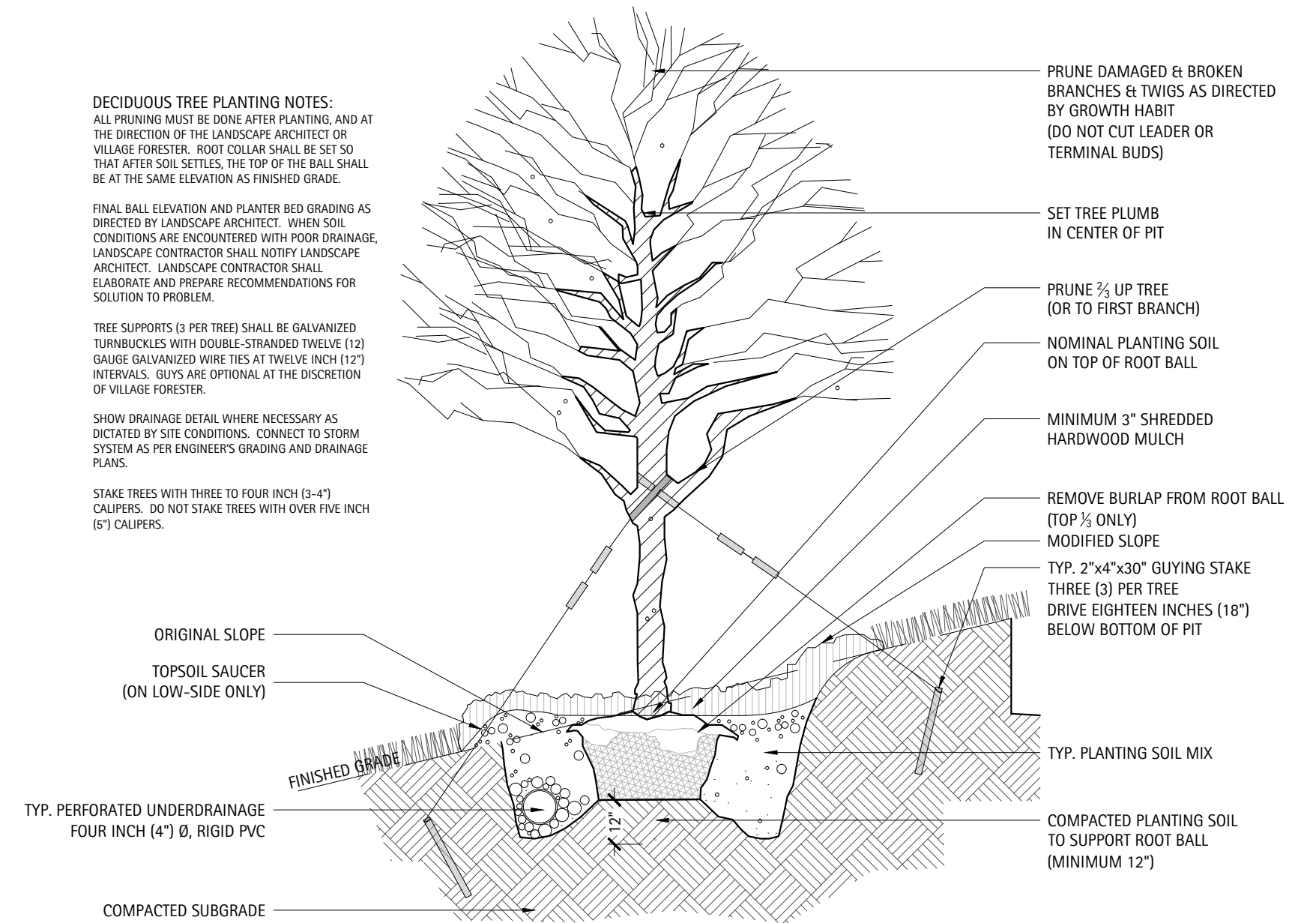


PLANTING
DETAILS

Revisions	
PLAN COMMISSION	06/22/15
Date:	06/22/15
Drawn By:	JW
Checked By:	SF



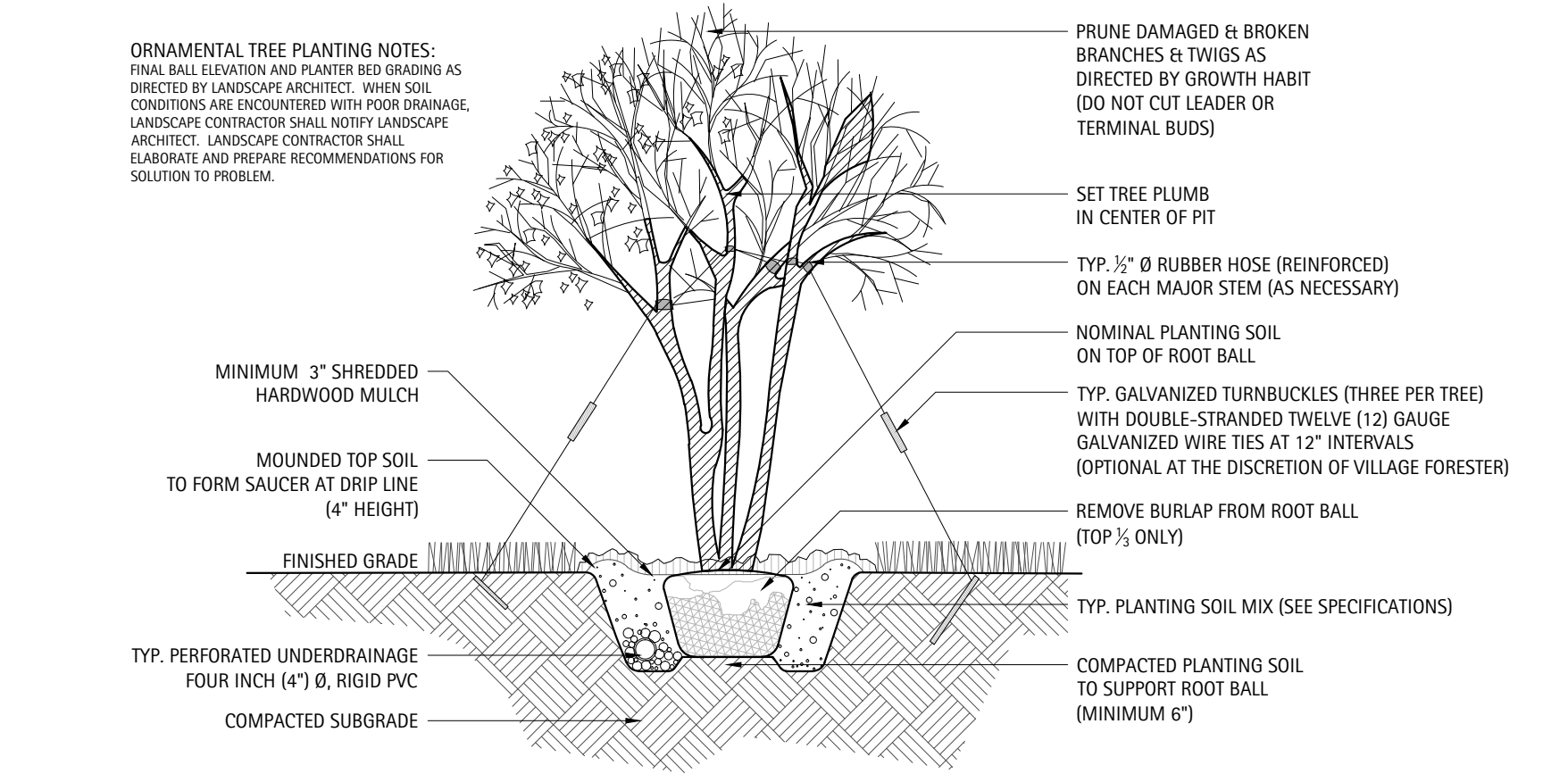
1 Typical Deciduous Tree Planting Detail
Scale: NTS



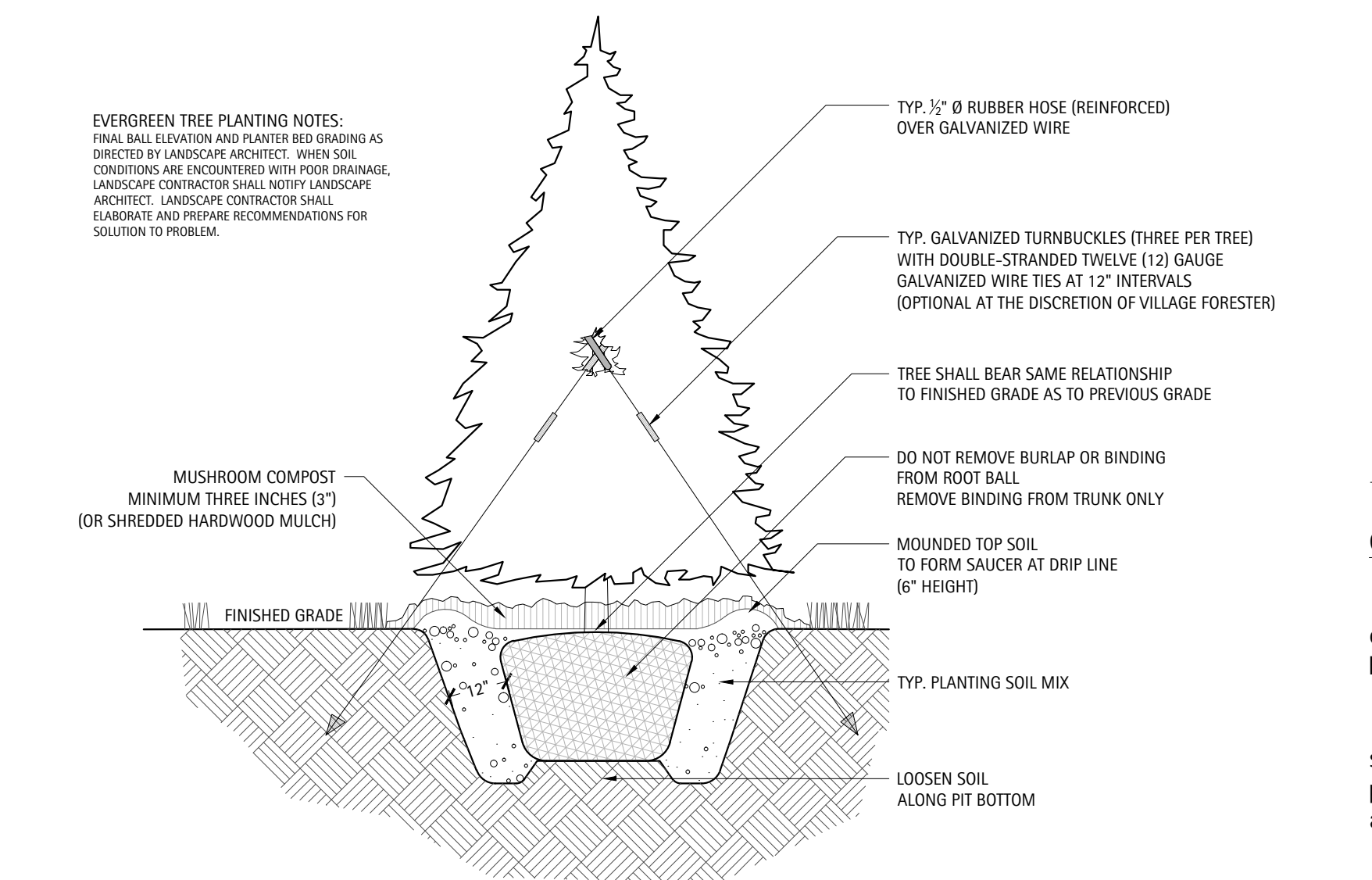
2 Typical Deciduous Tree Planting on Slope Detail
Scale: NTS

GENERAL NOTES

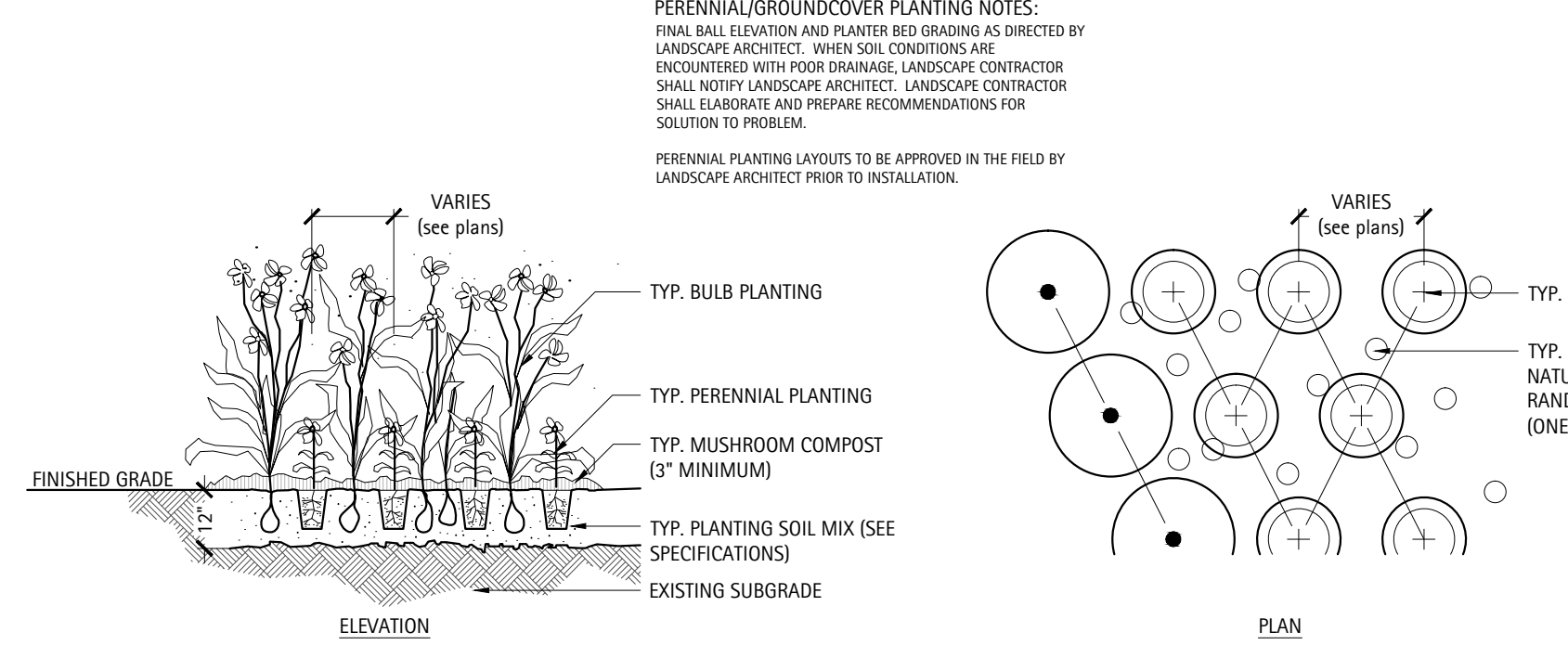
- Landscape Contractor shall verify all utility locations (existing and proposed) along with existing conditions and grades (existing and proposed), and note any discrepancies to owner, Engineer, and Landscape Architect immediately, before proceeding with any work.
- Base information for these plans was taken from Engineer's site survey, geometric, and grading plans. Contractor shall verify all dimensions and locations of existing and proposed features, and familiarize themselves with any obstacles encumbering the installation of this project.
- Any existing tree surveys or locations for these plans were prepared by the Engineer or a certified arborist. See plans for information.
- All soil/underground conditions shall be referred to soil testing reports prepared by the owner's consultant.
- Any archeological information relevant to these plans shall be referred to archeological survey and reports (if appropriate to job site) by the owner's consultant.



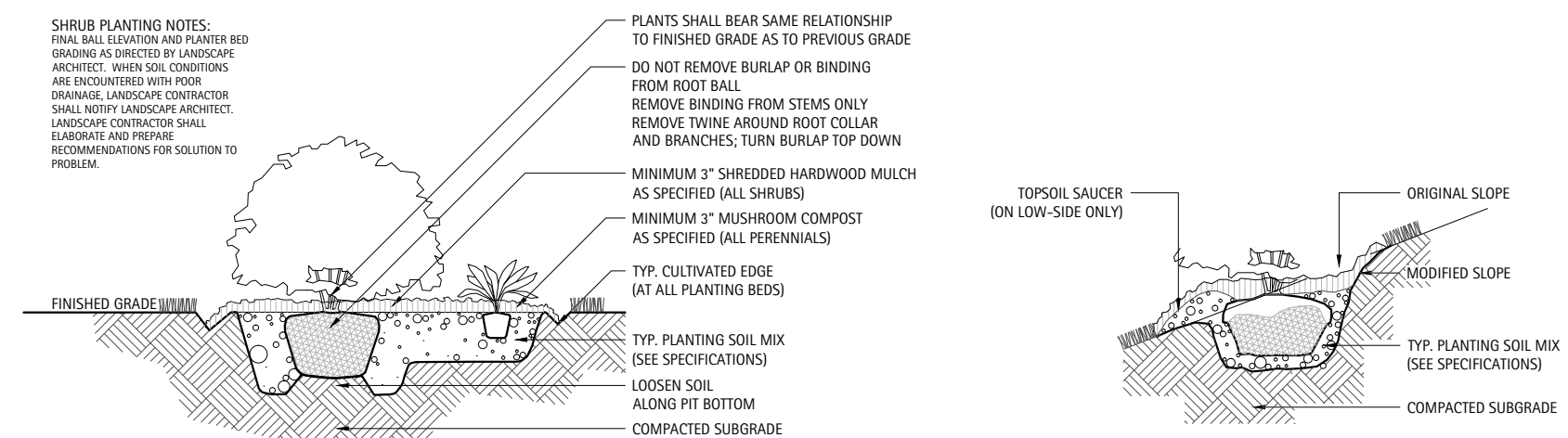
3 Typical Ornamental Tree Planting Detail
Scale: NTS



4 Typical Evergreen Tree Planting Detail
Scale: NTS



5 Typical Groundcover & Perennial Planting Detail
Scale: NTS



6 Typical Shrub Planting/Shrub Planting on Slope Detail
Scale: NTS

GENERAL PLANTING NOTES

GENERAL CONDITIONS

- Contractor shall familiarize themselves with all landscape specifications prior to commencement of work. Any questions or concerns shall be directed to Project Engineer or Landscape Architect in writing prior to landscape work commencement.
- All project limits shall be fenced with temporary plastic fencing at 48" height, staked at 4' on center, and clearly signed for construction activities. All existing, protected vegetation shall be fenced at a minimum of the plants drip line or as approved by Landscape Architect.
- The Landscape Contractor shall keep all areas clean and orderly at all times.
- The Landscape Contractor shall keep all roadways and walkways clear of mud and debris that result from landscape operations.

SITE GRADING & BERMING

- All grading and drainage shall be properly pitched to existing or proposed drainage swales and structures. Landscape Architect and Project Engineer shall field verify and approve.
- All stone work to be approved by Landscape Architect in field. All stone color samples shall be approved by Landscape Architect prior to ordering.

SOIL & PLANTING MIX

- All soil planting mix for backfill or beds, whether from on-site stockpile or new imported soil, shall be tested for approved specified pH levels and nutrient content. Submit testing agency with laboratory report to project Landscape Architect for approval, along with recommendations to amending soil as appropriate for use in planting.
- Topsoil shall be clean, pulverized soil from an acceptable source. Topsoil shall be free of debris, stones, and other material not more than one inch (1") diameter in size. Contractor shall provide the Landscape Architect with receipt of soil source and soil test results from a qualified lab upon request.
- It is anticipated that all planting areas, including lawn, shall be thoroughly tilled to a minimum of 12-18" depth. All on-site topsoil shall be amended and reused as approved, or removed off-site and disposed of properly. New planting soil mix shall be PM-35 soil mix by Midwest Trading, St. Charles, Illinois.
- Clean topsoil mix should have a tested and approved pH of 6.0 -- 7.0

- The Landscape Contractor shall prepare planting beds by adding A 3" depth of PM-35 soil mix manufactured by Midwest Trading, St. Charles, Illinois, thoroughly till the amended topsoil to a depth of 12".

- All excess materials and spoils resulting from the landscape work shall be legally disposed of off-site by the Landscape Contractor.

PLANTING STANDARDS

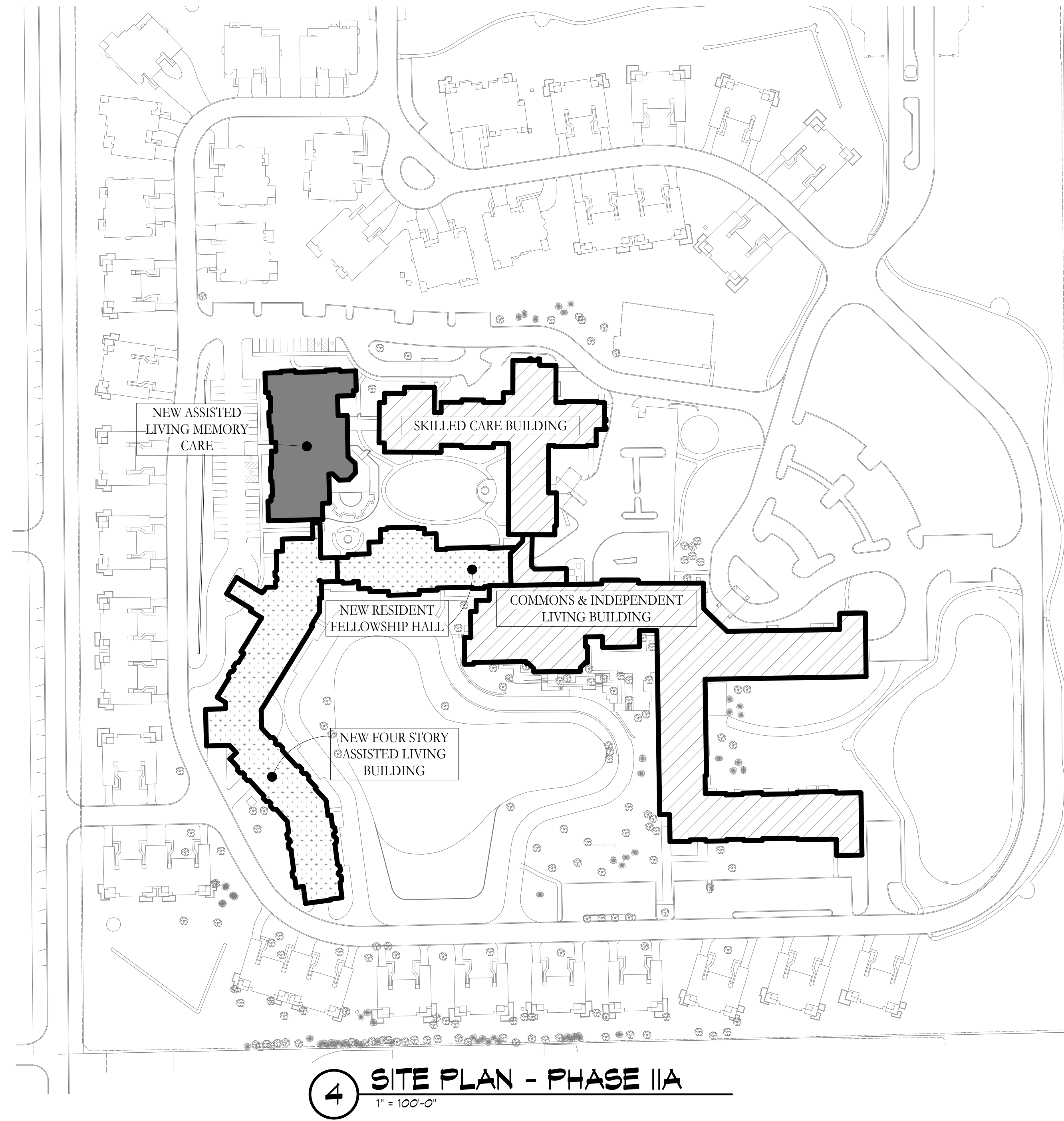
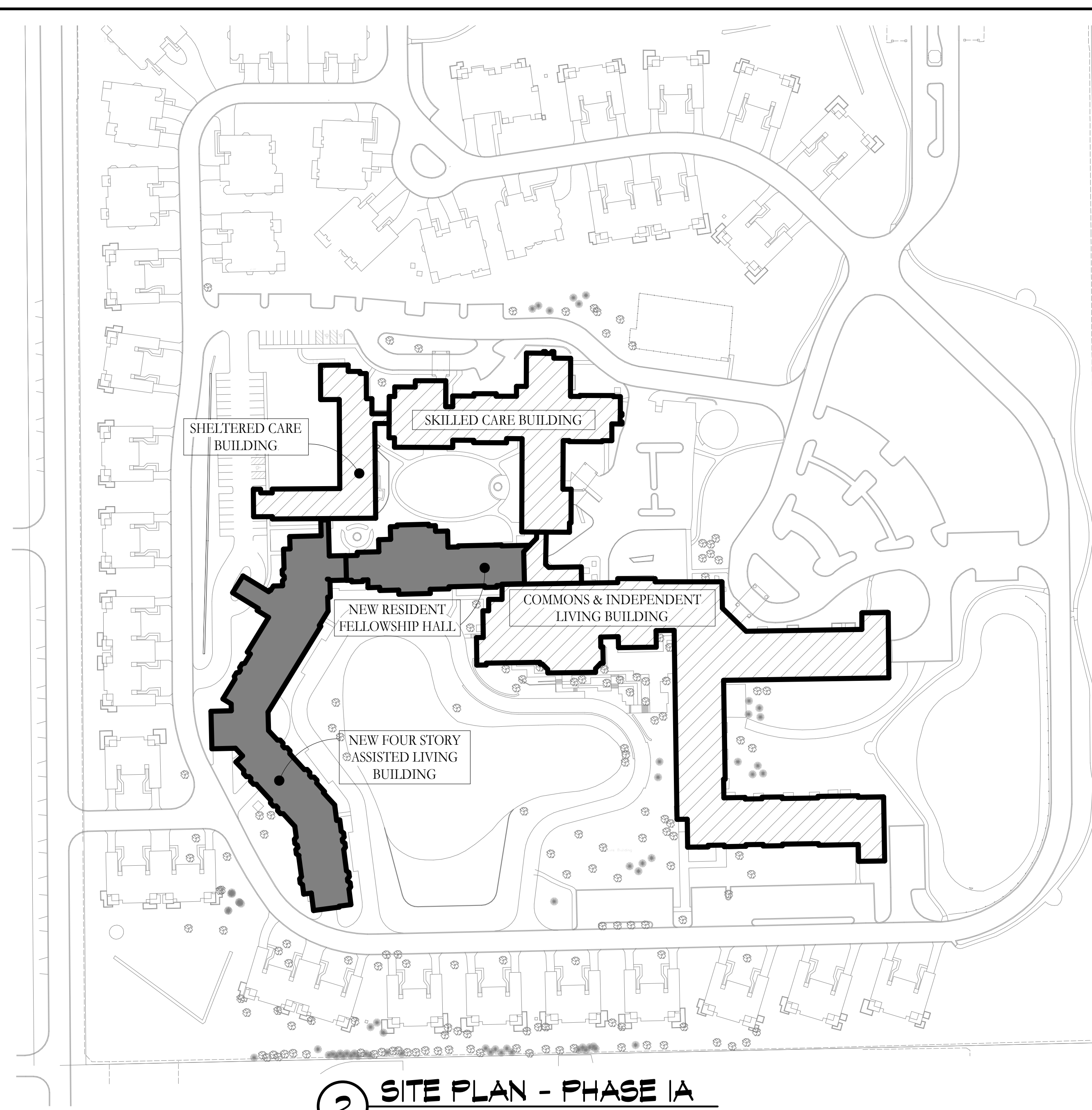
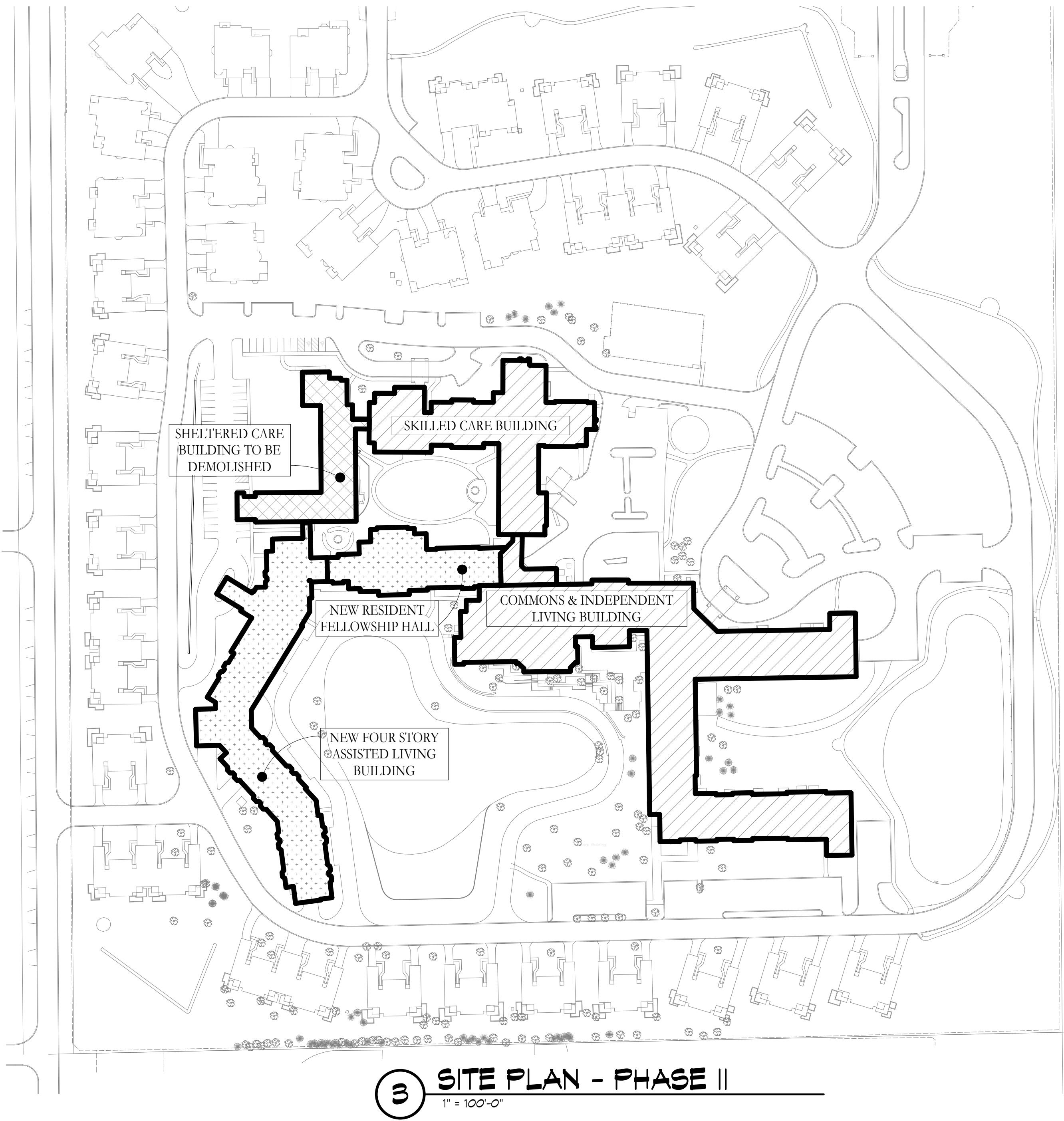
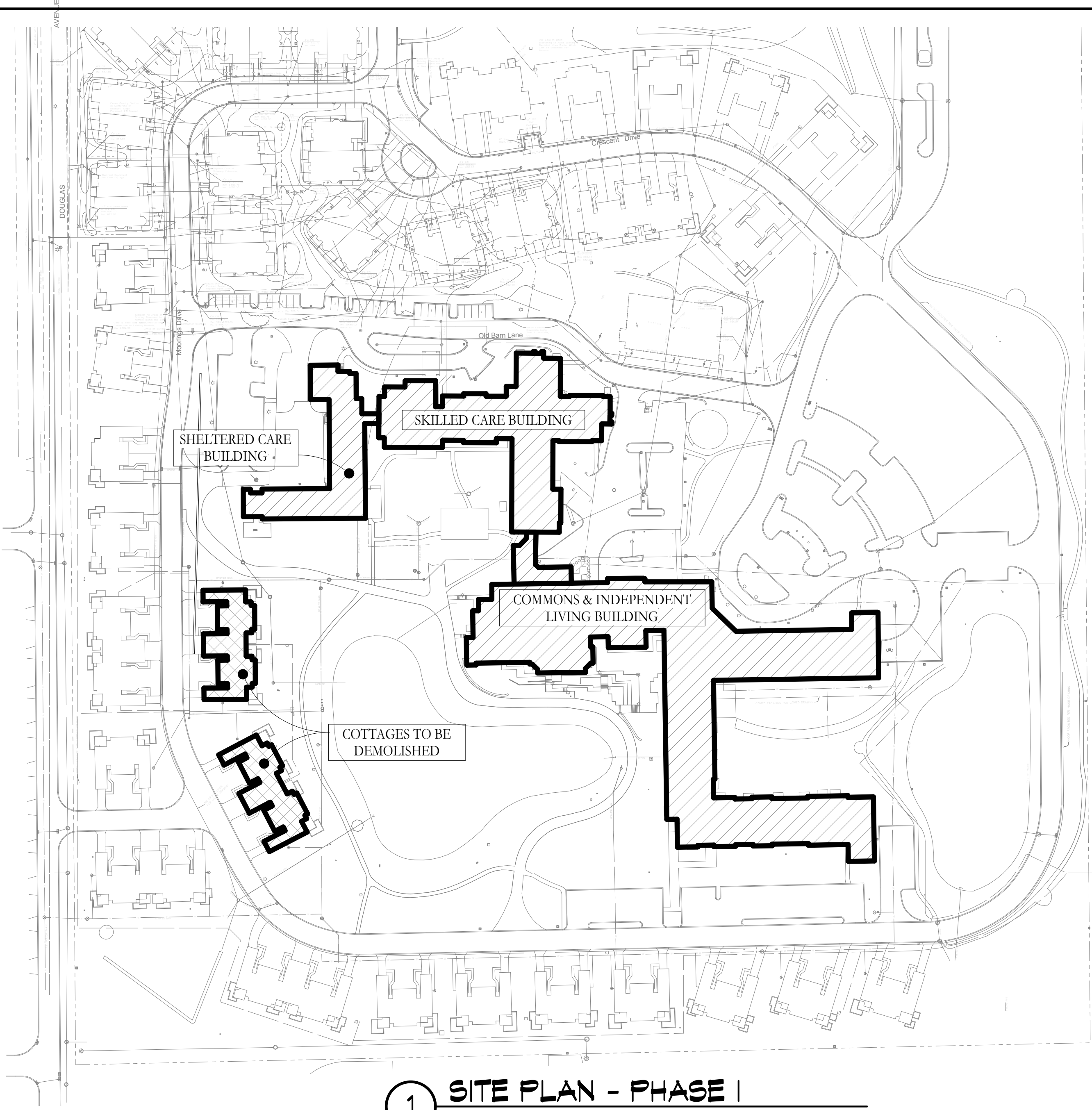
- All plant material shall be top-quality grade, free of defects, and meet accepted horticultural standards established by the American Nurserymen's Association (AAN) and as deemed appropriate by Landscape Architect. Landscape Architect shall have the right to reject any, and all, plant material delivered to the site that does not meet acceptable standards.
- Sizes shown on plant schedule are minimum acceptable sizes.
- All plants to be balled-in-burlap or container-grown as specified in plant schedule. All plastic root wrapping material shall be removed. Metal wire baskets shall be have all rope removed from the top of the ball and the metal basket shall be turned down as much as possible.
- All new and transplanted plants to be sprayed with an antidessecant within twenty-four (24) hours after planting. Antitranspirant shall be "Wiltpruf" or an approved equal.
- Landscape Architect shall field verify and approve all final staked tree, shrub, and perennial bed locations prior to installation.
- The Landscape Contractor shall repair to its original condition any plant material which becomes damaged as a result of landscape operations.
- All perennials shall be planted at least two (2) feet from the tree trunks planted within planting areas.
- Landscape Architect shall approve all plant materials for quality, condition and specified sizes. Plant material shall be approved at nursery location, during tagging or before removal and transport to job site. Shrubs, perennials and groundcovers shall be approved at job site prior to installation.

FERTILIZER & MULCHING

- Prior to mulching tree and shrub planting areas, apply time-release fertilizer by broadcasting over entire planting areas. Rate is to manufacturer's recommendations. Fertilizer is to have no less than 10% available phosphoric acid, and 3-8% total nitrogen soluble potash.
- All plantings shall receive a slow-release fertilizer with a ratio of 10/10/10.
- All trees and shrub beds shall receive a minimum of 3" thick shredded hardwood mulch top-dressing.
- All perennials and groundcover beds shall be top-dressed with two inches (2") minimum of mushroom compost.

MAINTENANCE & WARRANTIES

- All plants shall be thoroughly watered in at time of planting and watered and maintained throughout construction until final acceptance by owner. Contractor shall water all plants immediately after planting. Flood plants twice during the first twenty-four (24) hours after planting.
- Landscape Contractor shall warranty all trees, shrubs, perennials, and ornamental grasses under this contract will be healthy and in flourishing condition of active growth one year from date of final acceptance.
- All newly sodded or seeded areas shall be maintained, watered, and mowed throughout their growing seasons during construction and until final acceptance by owner.



VOLUME I CIVIL DRAWING NO: A001 COMMISSION NO: 2014104		PHASING SITE PLAN		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005		rmps architects® architects • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 • FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION				THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RMP ARCHITECTS, INC. AND IS TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS IT IS IN THE NAME OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
SCALE: AS NOTED		DATE: 06/26/2015		NO. DATE DESCRIPTION										

DEMOLITION NOTES

All Signs to Be Removed Shall Be Salvaged and Stored in the Owner's Facility for Future Use as Applicable.

Contractor Shall Keep All Local And County Streets Free and Clear of Construction Related Dirt/Out/Debris.

Coordinate Existing Utility Removal with Local Authorities and Utility Companies Having Jurisdiction.

Adjacent Buildings are to Remain Operational During Construction. Therefore, the temporary Relocation of All Necessary Utilities Serving the Existing Building Shall Be Coordinated Prior to the Commencement of Construction Operations.

All Sawcutting Shall be Full Depth to Provide a Clean Edge to Match New Construction. Match Existing Elevations at Points of Correction for New and Existing Pavement, Curb, Sidewalks, etc.. All Sawcut Locations Shown are Approximate and Should Be Field Adjusted to Accommodate Conditions, Joints, Material Type, etc. Remove Minimum Amount Necessary for Installation of Proposed Improvements.

Contractor Shall Provide and Shall Be Responsible for Any Necessary Traffic Control and Safety Measures During Demolition and Construction Operations Within or Near the Public Roadway.

All Light Poles to Be Removed From Private Property Shall Be Removed in Their Entirety, Including Base and All Appurtenances. Coordinate Abandonment of Electrical Lines With Electrical Engineer and Owner Prior to Demolition.

Perform Tree Pruning In All Locations Where Proposed Pavement And/Or Utility Installation Encroaches Within The Existing Drip Line Of Trees To Remain. All Trenching Within The Drip Line Of Existing Trees To Remain Shall Be Done Radially Away From Trunk If Roots In Excess Of 1" Diameter Are Exposed. Roots Must Be Cut By Reputable Tree Pruning Service Prior To Any Transverse Trenching. Obtain Approval Of The Architect Prior To Operations For A Variance From This Procedure.

Coordinate Tree Removal with Landscape Architect. All Trees To Be Removed Shall Be Removed in Their Entirety and Stumps Shall Be Ground to Proposed Subgrade. Use As Mulch for Proposed Landscaping Where Applicable and Acceptable to Architect.

Provide Tree Protection Fencing Prior To Construction Operations. Maintain Throughout Construction.

GEOMETRY NOTES

All Dimensions Contained Herein Reference Back Of Curb, Face Of Retaining Wall, Edge Of Pavement, Center of Structure And Outside Face Of Building Foundation Unless Otherwise Noted.

All Pavement Striping Shall Be 4" Wide Yellow Paint Per Specifications. All Cross Hatch Striping Shall Be 45° At 2'-0" Centers.

All Accessible Parking Signs (R7-8) Must Be Placed at the Center of the Space and Within 5 Feet of the Space.

Refer to Architectural Drawings for Exact Locations of All Buildings.

Refer to Architectural Drawings for Locations and Details of All Permanent Site Fencing.

UTILITY NOTES

Utility Service Lines as Shown Hereon are Approximate. Coordinate The Exact Locations With The Plumbing Drawings. Coordinate The Locations With The Plumbing Contractor and/or the Owner's Construction Representative Prior to Installation of Any New Utilities.

Refer to Plumbing Drawings for Continuation of All Utilities Within 5 Feet of Building Face.

Contractor Shall Field Verify Invert & Locations of Existing Utility Mains Prior to Installing Any On-Site Utilities or Structures. All Elevations and Inverts Referencing Said Utility Shall Be Field Verified Prior to Installation Of Any New Structures Or Utilities, and Adjustments Shall Be Made as Necessary. Contact Engineer Prior to Installation if Discrepancy Exists With These Drawings.

Contractor Shall Be Responsible For Coordinating the Relocation Of Any Utilities Encountered And Replacement Of Any Utilities Damaged Within Influence Zone Of New Construction. Contact Engineer If The Existing Utilities Vary Appreciably From The Plans.

All Water Main and Services Shall Be Installed at a Minimum Depth of 5.5' From Top of Finished Ground Elevation to Top of Main.

Protection of water supplies shall be as described in Section 370.350 of the Illinois Recommended Standards for Sewage Works or Section 41-2.01 of the Standard Specifications for Water and Sewer Main Construction in Illinois, latest edition.

Clean Out All Existing and Proposed Storm Catch Basins And Storm Sewers at the Completion of Construction.

The "Standard Specifications for Water and Sewer Main Construction in Illinois", Current Edition Shall Govern Work Where Applicable.

Coordinate Village Water Distribution Unit At 847-368-5800 Prior To Any Water Main Shutdown.

STRUCTURE NOTES

All Catch Basins to Be Installed in Paved Areas Shall Have Neenah R2204-D Frame & Grate or Approved Equal.

All Catch Basins to Be Installed in Landscaped Areas Shall Have Neenah R4340-B Frame & Grate or Approved Equal. For Cone Sections Install a Minimum of 4" Grade Rings For Topsoil Respread. For Flat Slab Tops Install the Following Minimum Height of Grade Rings:

- 4" Diameter Structure- 4"
- 5" Diameter Structure- 6"
- 6" Diameter Structure- 8"

All Catch Basins to Be Installed Along Curb and Gutter Shall Have Neenah R3281-A Frame & Grate or Approved Equal.

Where Structures are Shown Along the Curbline, Unless Specifically Stated Otherwise, It Is Intended That the Frame of the Structure Is To Fall Within the Flowline Of The Gutter or at the Pavement Edge Where No Gutter Exists.

All Manholes Shall Have Neenah R1713-B Frame & Closed Lid or Approved Equal, with "Storm" or "Sanitary" Imprinted as Appropriate.

All Existing Structures To Be Adjusted To Finished Grade As Necessary.

For All Manhole Structures to Be Adjusted, Install or Remove Adjusting Rings, New Cone Section or New Barrel Section As Necessary To Maintain Maximum Allowed Adjusting Ring Heights

All Sanitary Manholes Shall Include a Chimney Seal.

Field Verify The Condition of All Existing Utility Structures To Be Re-Used.

MWRDGC GENERAL NOTES

1. The MWRDGC Local Sewers Field Office must be notified at least two (2) working days prior to the commencement of work. Call (708) 588-4055.

2. Elevation datum is USGS.

3. All floor drains shall discharge to the sanitary sewer system.

4. All downspouts and footing drains, shall discharge to the storm system.

5. All sanitary sewer pipe materials (and storm sewer pipe material in combined sewer areas) and joints shall conform to:

- a. Reinforced Concrete Pipe (RCP): Pipe shall conform to ASTM C-76 1) Joints shall conform to ASTM C-443

- d. Polyvinyl Chloride Pipe (PVC 6"-15"dia.-SDR 26): Pipe shall conform to ASTM D-3034 1) Joints shall conform to ASTM D 3212.

- e. Polyvinyl Chloride Pipe (PVC-C900): Pipe shall conform to AWWA C-900-97 1) Joints shall conform to ASTM D-3139.

6. All sanitary sewer construction (and storm sewer construction in combined sewer areas); requires stone bedding 1/4" to 1" in size, with a minimum bedding thickness equal to 1/4 the outside diameter of the sewer pipe, but not less than four (4) inches nor more than eight (8) inches. Material shall be CA-11 or CA-13 and shall be extended at least 12 inches above the top of the pipe when using PVC.

7. "Band Seal" or similar flexible-type couplings shall be used in the connection of sewer pipe of dissimilar materials.

8. When connecting to an existing sewer main by means other than an existing wye, tee, or on existing manhole, one of the following methods shall be used:

- a. Circular saw-cut of the storm sewer main by proper tools ("sewer-top" machine or similar) and proper installation of hub-wye saddle or hub-tee saddle.
- b. Remove an entire section of pipe (breaking only the top of one bell) and replace with a wye or tee branch section.
- c. With pipe cutter, neatly and accurately cut out desired length of pipe for insertion of proper fitting, using "Band-Seal" or similar couplings to hold it firmly in place.

9. Whenever a sanitary/combined sewer crosses under a watermain, the minimum vertical distance from the top of the sewer to the bottom of the water main shall be 18 inches. Furthermore, a minimum horizontal distance of 10 feet between sanitary/combined sewers and water mains shall be maintained unless: The sewer is laid in a separate trench, keeping a minimum 18" vertical separation; or the sewer is laid in the same trench with the water main located on the opposite side on a bench of undisturbed earth, keeping a minimum 18" vertical separation. If either the vertical or horizontal distances described cannot be maintained, or the sewer crossed above the watermain, the sewer shall be constructed to water main standards. All sanitary sewers shall be tested in keeping with all MWRDGC requirements.

10. All existing septic systems to be abandoned. Abandoned tanks to be filled with granular material or removed.

11. All sanitary manholes, (and storm manholes in combined sewer areas), shall have a minimum inside diameter of 48 inches, and shall be cast in place or pre-cast reinforced concrete. Resilient connectors, conforming to ASTM C-923, shall be used between manhole and pipes.

12. Except for Foundation/Footing Drains provided to protect buildings, Drain Tiles/Field Tiles/Underdrains/Perforated Pipes are not to be installed or to be connected to the sanitary or Combined Sewers, Sanitary Sewers, or Storm Sewers tributary to Combined Sewers in Combined Sewer Areas. Construction of new facilities of this type is prohibited; and all existing Drain Tiles and Perforated Pipes encountered within the project area shall be plugged or removed and shall not be connected to Combined Sewers, Sanitary Sewers, or Storm Sewers tributary to Combined Sewers.

13. All abandoned sewers shall be plugged at both ends with a minimum of two (2) foot long non-shrink concrete/mortar plugs.

IEPA GENERAL NOTES

Sanitary Sewer Construction, as a Minimum, must comply with the following requirements:

Standard Specifications for Water and Sewer Main Construction in Illinois, latest edition, shall govern all sanitary sewer construction on this project.

Protection of water supplies shall be as described in Section 370.350 of the Illinois Recommended Standards for Sewage Works or Section 41-2.01 of the Standard Specifications for Water and Sewer Main Construction in Illinois, latest edition.

Flexible thermoplastic sanitary sewer pipe shall be installed in accordance with ASTM 2321-89 using _____ embedment material. Processed materials produced for highway construction should be classified in accordance with ASTM 2321-89, Section 5 and Table 1 according to particle size, shape and gradation.

4. Sewer bedding for rigid pipe sanitary sewers shall be Class B in accordance with ASTM D2321 as described in Appendix A of the Standard Specifications for Water and Sewer Main Construction in Illinois, latest edition.

All sanitary sewers shall be tested for infiltration, exfiltration or exfiltration of air under pressure, and for deflection of flexible thermoplastic pipe as described in Section 31-1 of the Standard Specifications for Water and Sewer Main Construction in Illinois, latest edition.

Pickholes in sanitary sewer manhole covers shall not be larger than 1 inch in diameter or shall be of the concealed type.

A drop pipe shall be provided for a sanitary sewer entering a manhole where its invert is more than 24 inches above the manhole invert.

Contractor shall test manhole tightness in accordance with ASTM C869-94 or ASTM C1244-93.

Leakage Testing Shall Be Conducted On All Manholes For Water/tightness In Accordance With ASTM D969-94 "Standard Practice For Infiltration And Exfiltration Acceptance Testing Of Installed Precast Concrete Pipe Sewer Lines", Vol. 04.05, Chemical Resistant Materials, Vitrified Clay, Concrete, Fiber-Cement Products; Mortars; Masonry (1996) (No Later Editions Or Amendments) Or ASTM C1244-93 "Standard Test Method For Concrete Sewer Manholes By The Negative Pressure (Vacuum) Test", Vol. 04.05, Chemical Resistant Materials, Vitrified Clay, Concrete, Fiber-Cement Products; Mortars; Masonry (1996) (No Later Editions Or Amendments) Prior To Placing into Service.

GRADING NOTES

The Grading and Construction of Proposed Improvements Shall Be Done In A Manner Which Will Allow For Positive Drainage, and Not Cause Ponding of Stormwater on the Surface of Proposed Improvements.

All Landscaped Areas Disturbed By Construction Shall Be Respread With 6 Inches (Min.) to 12 Inches (Max.) Topsoil and Hydrosseeded Unless Noted Otherwise On The Landscape Drawings.

Refer to Architectural Drawings for Locations and Patterns of Expansion and Control Joints in Concrete Pavement and Sidewalks.

SOIL EROSION & SEDIMENTATION CONTROL NOTES

Soil Disturbance Shall Be Conducted In Such A Manner as To Minimize Erosion. Soil Stabilization Measures Shall Consider the Time of Year, Site Conditions, and the Use of Temporary or Permanent Measures.

Soil Erosion and Sediment Control Features Shall Be Constructed Prior to the Commencement of Upland Disturbance.

Temporary Soil Stabilization Shall Be Applied to Topsoil Slopesides and Disturbed Areas Where Construction Activity Will Not Occur For A Period of More Than 14 Calendar Days. Within 7 Calendar Days of the End of Active Hydrologic Disturbance, The Sediment Control Measures Shall Be Maintained On A Continuing Basis Until The Site Is Permanently Stabilized And All Inspections Are Complete. Permanent Stabilization Shall Be Done Within 14 Days after Completion of Final Grading of Soil.

All Temporary And Permanent Erosion Control Measures Shall Be Removed Within 30 Days After Final Site Stabilization Is Achieved Or After The Temporary Measures Are No Longer Needed. Trapped Sediment And Other Disturbed Soil Areas Shall Be Permanently Stabilized.

Final Site Stabilization Is Defined By The EPA General Permit As Meaning That All Soil Disturbing Activities At The Site Have Been Completed, And That A Uniform Permanent Vegetative Cover With A Density Of 70 Percent Of The Cover For Unpaved Areas Not Covered By Permanent Structures Has Been Established Or Equivalent Permanent Stabilization Measures (Such As The Use Of Riprap, Gabions, Or Geotextiles) Have Been Employed.

All Storm Sewer Structures That Are, Or Will Be, Functioning During Construction Shall Be Protected, Filtered, Or Otherwise Treated To Remove Sediment. The General Contractor Shall Use "Dandy Pops" Inlet Protectors (or equal) in Landscaped Areas And "Dandy Bag" Inlet Protectors (or equal) in Paved Areas To Prevent Siltation.

All Temporary And Permanent Sediment And Erosion Control Measures Must Be Maintained, Repaired, And Inspected In Conformance With All Applicable IEPA-NPDES Phase II Requirements.

Following The Termination Of Construction Activities And Issuance Of The Required "Notice Of Termination", The Permittees Must Keep A Copy Of The Storm Water Pollution Prevention Plan, Inspection Reports, And Records Of All The Data Used To Complete The Notice Of Intent For A Period Of At Least Three Years Following Final Stabilization.

Install And Maintain Silt Fence At The Perimeter Of The Construction Zone And Wetland Areas And Shall Be Maintained Throughout Construction And Until Vegetation Has Been Fully Established.

The Erosion Control Measures Indicated On The Drawings Are The Minimum Requirements. Additional Measures May Be Required As Directed By The Engineer Or Governing Agency.

Unless Otherwise Indicated on the Drawings, Stabilize All Disturbed Ground Areas Where Slopes Exceed 6:1 or Within Swales with North American Green D575 Erosion Control Blanket, or Approved Equal.

Report Releases of Reportable Quantities of Oil or Hazardous Materials If They Occur In Accordance with IEPA NPDES Requirements.

All Concrete Washout Shall Conform To The "Temporary Concrete Washout Facility" Standards (Code 954) of the Illinois Urban Manual, Latest Edition

If Necessary, The SWPPP Shall Be Modified To Reflect Changes Required During The Effective Period Of The IEPA NPDES General Permit No. IEP10 and Local and County Permits.

GENERAL NOTES

The Location of Existing Underground Utilities, Such As Watermains, Sewers, Gas Lines, Etc., As Shown On The Plans, Has Been Determined From The Best Available Information and Is Given For The Convenience of The Contractor. However, The Owner and The Engineer Do Not Assume Responsibility In The Event That During Construction, Utilities Other Than Those Shown May Be Encountered, and That The Actual Location of Those Which Are Shown May Be Different From The Location As Shown On The Drawings. Contact Engineer Immediately If Surface and/or Subsurface Features are Different Than Shown On The Drawings.

Contractor Shall Notify The Engineer Without Delay of Any Discrepancies Between the Drawings and Existing Field Conditions.

Contractor Shall Notify The Owner, Engineer and The Village of Arlington Heights A Minimum of 48 Hours in Advance of Performing Any Work.

No Construction Traffic Will Be Permitted To Use Rohlfing Road Without Authorization Of The City of Rolling Meadows.

All Areas, On or Off Site, Disturbed During Construction Operations and Not Part of the Work As Shown Hereon Shall Be Restored To Original Condition to the Satisfaction of the Owner at No Additional Cost to the Owner. It is Incumbent Upon Contractor to Show That Damaged Areas Were Not Disturbed By Construction Operations.

These Drawings Assume That The Contractor Will Utilize An Electronic Drawing File and Stake All Site Improvements Using Coordinated Tied Into The Control Points. The Dimensions Indicated On The Drawings Are For The Convenience of The Contractor Only.

No Person May Utilize The Information Contained Within These Drawings Without Written Approval From Eriksson Engineering Associates, Ltd.

The Engineer Is Furnishing These Drawings For Construction Purposes As A Convenience To The Owner, Architect, Or Surveyor. Prior To The Use Of These Drawings For Construction Purposes, The User Of This Media Shall Verify All Dimensions And Locations Of Buildings With The Foundation Drawings And Architectural Site Plan. If Conflicts Exist The User Of This Information Shall Contact The Engineer Immediately.

Contractor Shall Provide An As-built Survey Prepared By A Licensed Professional Land Surveyor In Accordance With The Authorities Having Jurisdiction Including All Storm and Sanitary Sewers and Structure Locations, Sizes, Rim and Invert Elevations, and Watermain and Valve and Appurtenance Locations.

The Illinois Department Of Transportation Standard Specifications For Road And Bridge Construction Latest Edition, And All Addenda Thereto, Shall Govern The Earthwork And Paving Work Under This Contract Unless Noted Otherwise.

All Methods Of Construction And Materials To Conform To "A Manual of Practice for the Design of Public Improvements" as Provided by the Village of Arlington Heights Engineering Department.

INTENDED SEQUENCE OF MAJOR SEDIMENT AND EROSION CONTROL MEASURES

1. Install Stabilized Construction Entrance
2. Install All Downslope and Sideslope Perimeter Controls Before Commencement of Any Ground Disturbing Activity.
3. Do Not Disturb An Area Until It is Necessary For Construction To Proceed.
4. Cover and Stabilize Disturbed Areas As Soon As Possible.
5. When Practical, Time Construction Activities To Limit Impact From Seasonal Climate Changes or Weather Events.
6. Construct Sedimentation Basins and Structures.
7. Perform Grading Operations and Installation of Site Infrastructure and Pavement.
8. Install Permanent Seeding and Plantings.
9. Remove Accumulated Sediment From Basins and Along Silt Fence.
10. Construction of Infiltration Measures Shall Take Place Following Stabilization of Upstream Drainage Areas.
11. Remove Temporary Sediment and Erosion Control Measures Following Final Stabilization of All Disturbed Areas.

LEGEND

EXISTING	PROPOSED

RENOVATIONS & ADDITIONS TO THE MOORINGS OF ARLINGTON HEIGHTS

FOR PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY: CMF CHECKED BY: CSJ APPROVED BY: M.J.R.

SITE NOTES AND LEGEND

DRAWING NO: C0.1

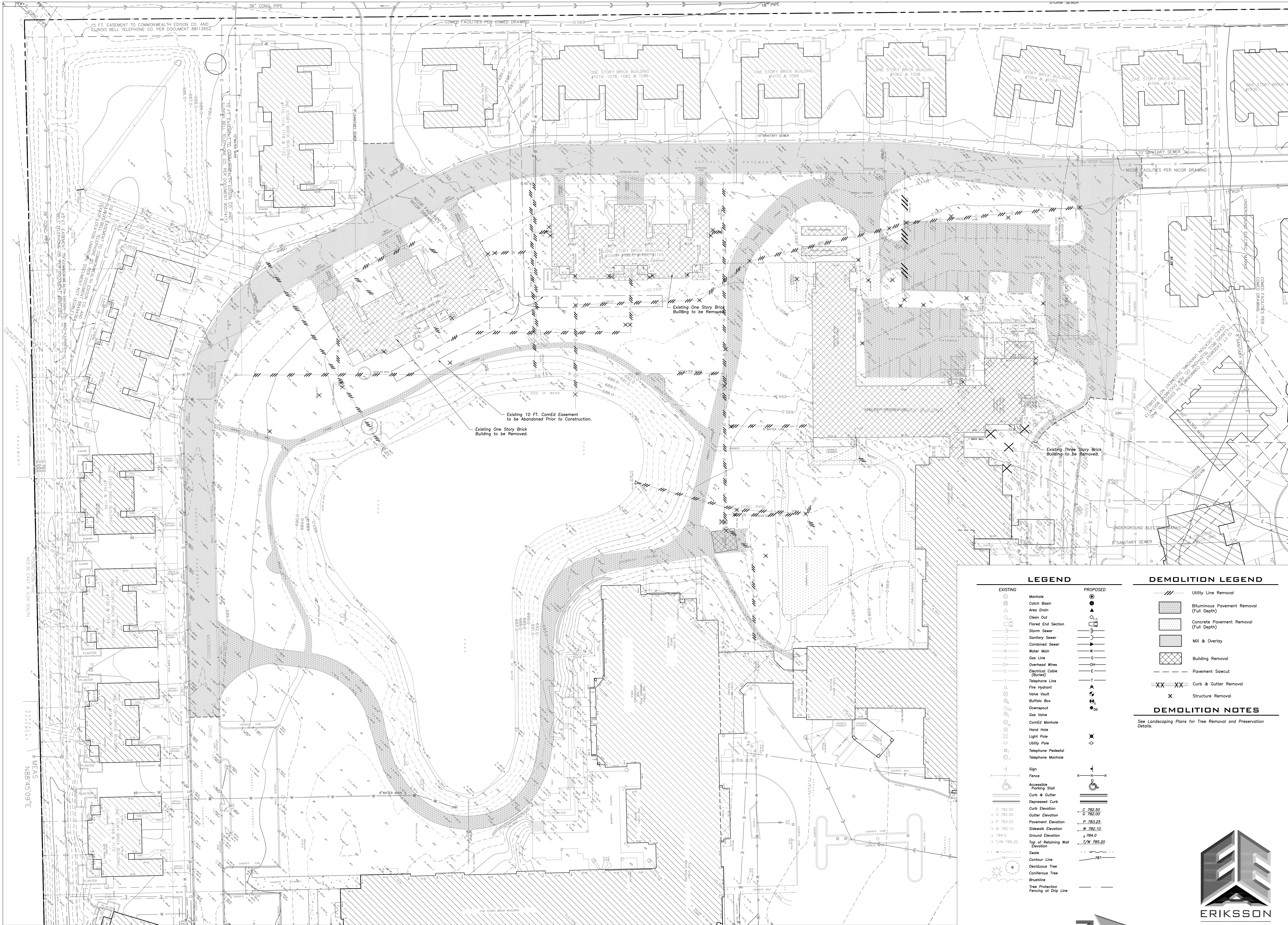
CONSTRUCTION NO: 2014104

AS NOTED

DATE: 4/27/2015



145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4864
EMAIL: INFO@EEA-LTD.COM



EXISTING

Manhole
Catch Basin
Area Drain
Clean Out
Flared End Section
Storm Sewer
Sanitary Sewer
Combined Sewer
Water Main
Gas Line
Overhead Wires
Electrical Cable (Buried)
Telephone Line
Fire Hydrant
Valve Vault
Buffalo Box
Downspout
Gas Valve
ComEd Manhole
Hand Hole
Light Pole
Utility Pole
Telephone Pedestal
Telephone Manhole
Sign
Fence
Accessibility
Parking Stall
Curb & Gutter
Depressed Curb
Curb Elevation
Gutter Elevation
Pavement Elevation
Sewer Elevation
Ground Elevation
Top of Retaining Wall
Elevation
Contour Line
Deciduous Tree
Coniferous Tree
Brushline
Tree Protection
Fencing at Drip Line

PROPOSED

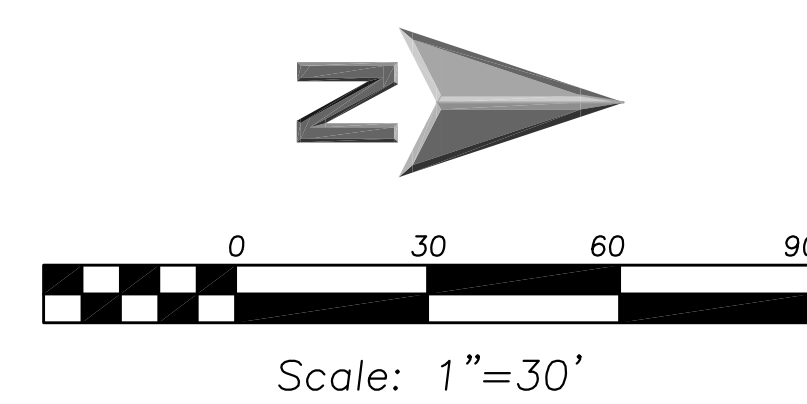
Utility Line Removal
Bituminous Pavement Removal (Full Depth)
Concrete Pavement Removal (Full Depth)
Mill & Overlay
Building Removal
Pavement Sawcut
Curb & Gutter Removal
Structure Removal

DEMOLITION LEGEND

Utility Line Removal
Bituminous Pavement Removal (Full Depth)
Concrete Pavement Removal (Full Depth)
Mill & Overlay
Building Removal
Pavement Sawcut
Curb & Gutter Removal
Structure Removal

DEMOLITION NOTES

See Landscaping Plans for Tree Removal and Preservation Details.



145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4804
EMAIL INFO@EEA-LTD.COM

REVISIONS

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

SITE DEMOLITION PLAN

C2.0

COMMISSION NO: SCALE: AS NOTED

DATE: 4/27/2015

FOR THE MOORINGS OF ARLINGTON HEIGHTS

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY: C.M.F. COORDINATOR BY: C.S.L. CHECKED BY: M.J.R. APPROVED BY:

DESIGN PHASE

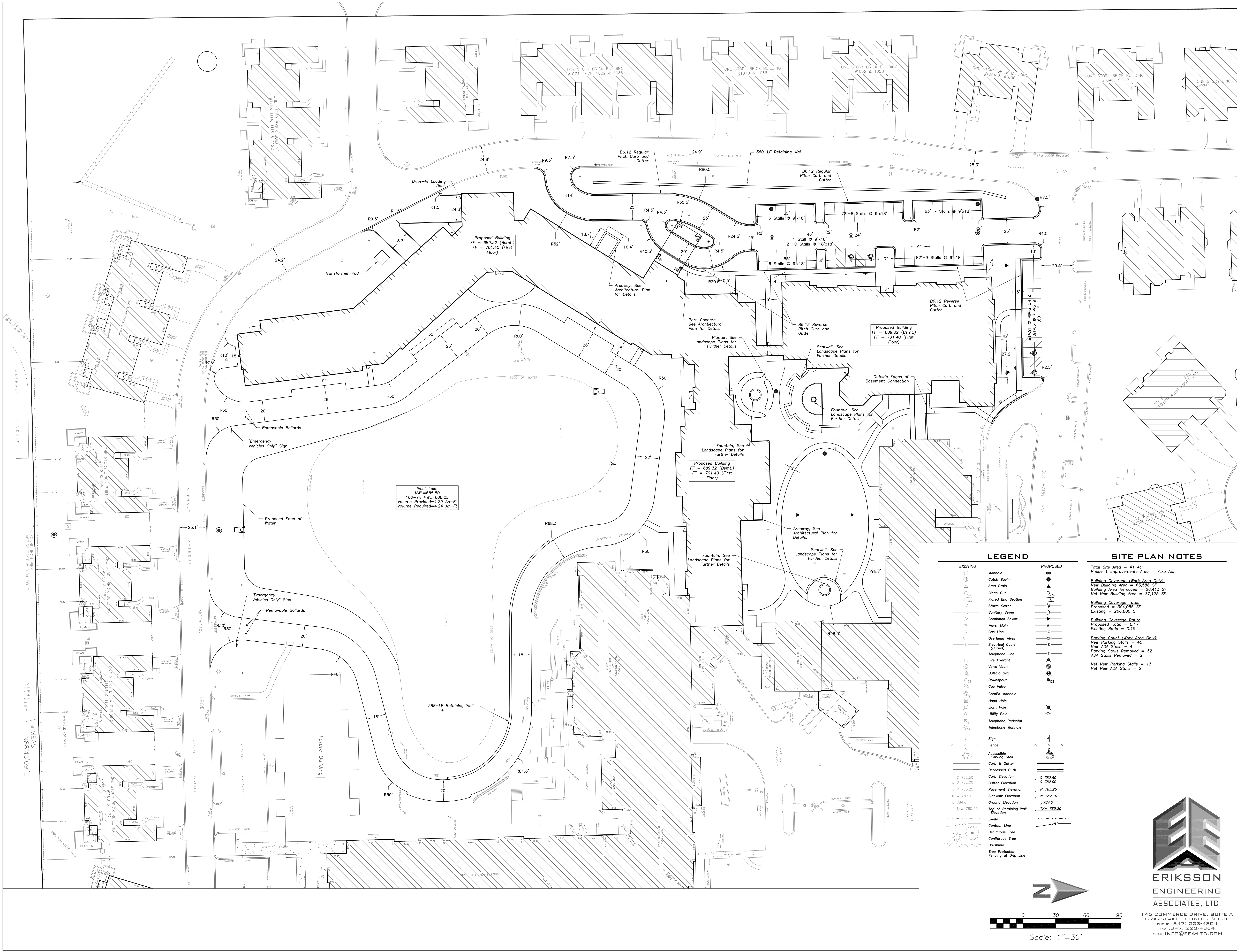
rlps architects®

architecture • master planning • interior design

250 VALLEYBROOK DRIVE, LANCASTER, PA 17601

717-560-9501 FAX: 717-560-2373 RLPS, LLP

THIS DRAWING IS AN INSTRUMENT OF SERVICE. THE ARCHITECT'S WORK SHALL BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS THE ARCHITECT'S NAME AND THE NAME OF THE ARCHITECT ARE SHOWN ON THIS DRAWING. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.



LEGEND

EXISTING	PROPOSED
Manhole	Manhole
Catch Basin	Catch Basin
Area Drain	Area Drain
Clean Out	Clean Out
Flared End Section	Flared End Section
Storm Sewer	Storm Sewer
Sanitary Sewer	Sanitary Sewer
Combined Sewer	Combined Sewer
Water Main	Water Main
Gas Line	Gas Line
Overhead Wires	Overhead Wires
Electrical Cable (Buried)	Electrical Cable (Buried)
Telephone Line	Telephone Line
Fire Hydrant	Fire Hydrant
Valve Vault	Valve Vault
Buffalo Box	Buffalo Box
Downspout	Downspout
Gas Valve	Gas Valve
CornEd Manhole	CornEd Manhole
Hand Hole	Hand Hole
Light Pole	Light Pole
Utility Pole	Utility Pole
Telephone Pedestal	Telephone Pedestal
Telephone Manhole	Telephone Manhole
Sign	Sign
Fence	Fence
Accessibile Parking Stall	Accessibile Parking Stall
Curb & Gutter	Curb & Gutter
Depressed Curb	Depressed Curb
Curb Elevation	Curb Elevation
Gutter Elevation	Gutter Elevation
Pavement Elevation	Pavement Elevation
Sidewalk Elevation	Sidewalk Elevation
Ground Elevation	Ground Elevation
Top of Retaining Wall Elevation	Top of Retaining Wall Elevation
Swale	Swale
Contour Line	Contour Line
Deciduous Tree	Deciduous Tree
Coniferous Tree	Coniferous Tree
Brushline	Brushline
Tree Protection Fencing at Drip Line	Tree Protection Fencing at Drip Line

SITE PLAN NOTES

Total Site Area = 41 Ac.
Phase I Improvements Area = 7.75 Ac.

Building Coverage (Work Area Only):
Building Area = 63,588 SF
Building Area Removed = 20,413 SF
Net New Building Area = 37,175 SF

Building Coverage Total:
Proposed = 304,055 SF
Existing = 266,880 SF

Building Coverage Ratio:
Proposed Ratio = 0.17
Existing Ratio = 0.15

Parking Count (Work Area Only):
New Parking Stalls = 45
New ADA Stalls = 4
Parking Stalls Removed = 32
ADA Stalls Removed = 2

Net New Parking Stalls = 13
Net New ADA Stalls = 2

Scale: 1"=30'

ERIKSSON ENGINEERING ASSOCIATES, LTD.
145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4864
EMAIL INFO@EEA-LTD.COM

REVISIONS

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

SITE GEOMETRY PLAN

DATE: 4/27/2015

AS NOTED

THE MOORINGS OF ARLINGTON HEIGHTS

FOR RENOVATIONS & ADDITIONS TO

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY: C.M.F. CHECKED BY: M.J.R. APPROVED BY: C.S.L.

DESIGN PHASE

rlps architects®

architecture • master planning • interior design

250 VALLEYBROOK DRIVE, LANCASTER, PA 17601

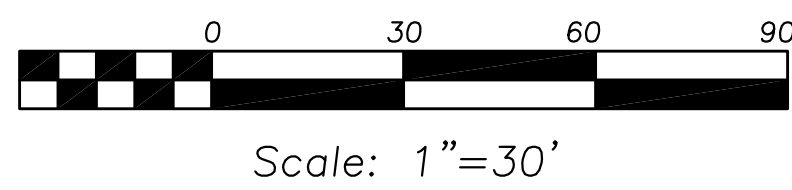
717-560-9501 FAX: 717-560-2373 RLPS, LLP

DRAWING NO.: C3.0

COMMISSION NO.: 2014104

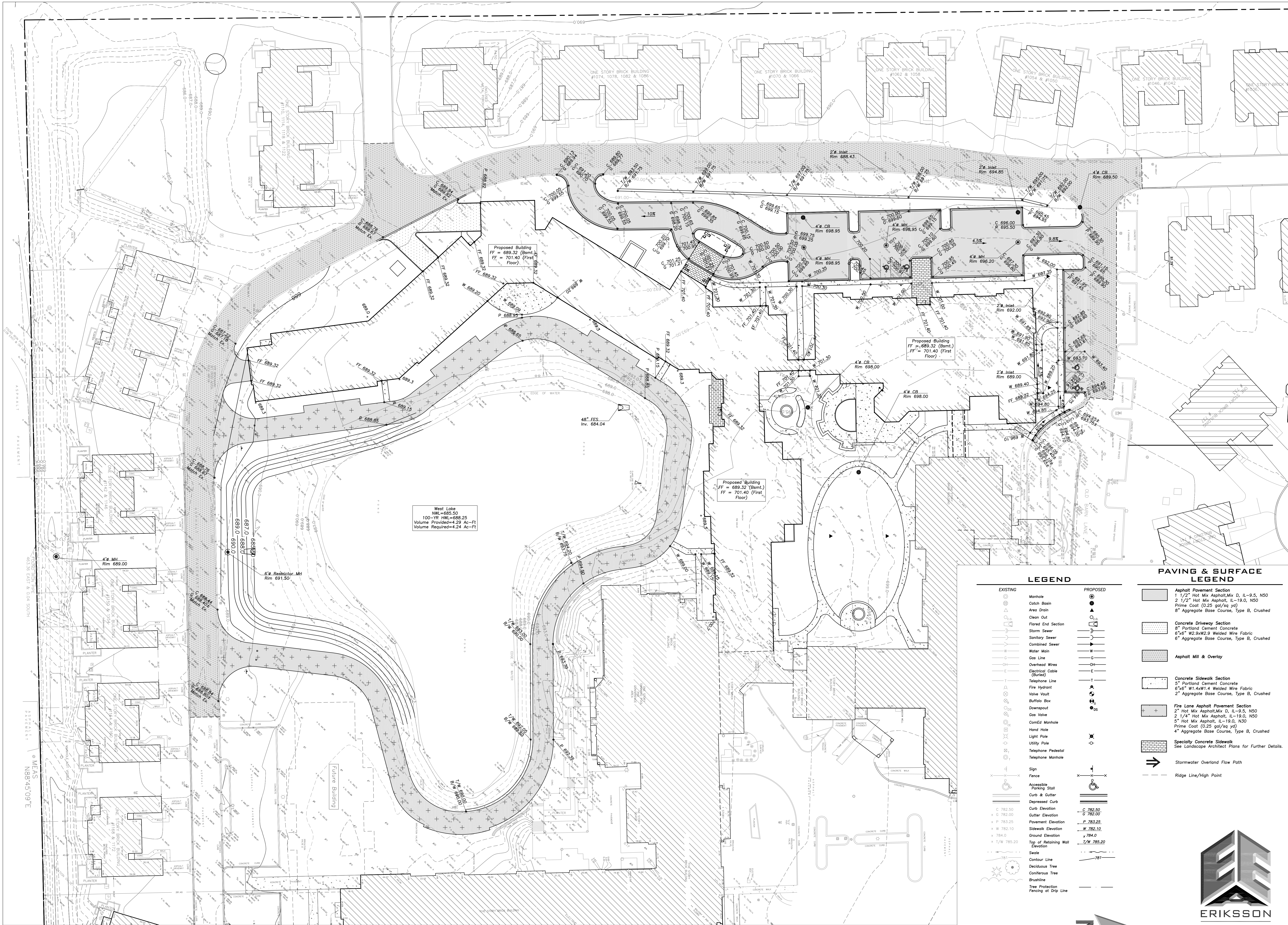
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, P.C. AND IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED, COPIED, OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION AND SIGNATURE OF THE ARCHITECT.

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.



THIS DRAWING AS AN INSTRUMENT OF SERVICE, IS THE PROPERTY OF THE ARCHITECT, AND MAY NOT BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS THE REPRODUCTION CARRIES THE NAME OF THE ARCHITECT

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK



LEGEND

EXISTING	PROPOSED
Manhole	Manhole
Catch Basin	Catch Basin
Area Drain	Area Drain
Clean Out	Clean Out
Flared End Section	Flared End Section
Storm Sewer	Storm Sewer
Sanitary Sewer	Sanitary Sewer
Combined Sewer	Combined Sewer
Water Main	Water Main
Gas Line	Gas Line
Overhead Wires	Overhead Wires
Electrical Cable (Buried)	Electrical Cable (Buried)
Telephone Line	Telephone Line
Fire Hydrant	Fire Hydrant
Valve Vault	Valve Vault
Buffalo Box	Buffalo Box
Downspout	Downspout
Gas Valve	Gas Valve
Corred Manhole	Corred Manhole
Hand Hole	Hand Hole
Light Pole	Light Pole
Utility Pole	Utility Pole
Telephone Pedestal	Telephone Pedestal
Telephone Manhole	Telephone Manhole
Sign	Sign
Fence	Fence
Accessibility	Accessibility
Stall	Stall
Curb & Gutter	Curb & Gutter
Depressed Curb	Depressed Curb
Curb Elevation	Curb Elevation
Gutter Elevation	Gutter Elevation
Pavement Elevation	Pavement Elevation
Sidewalk Elevation	Sidewalk Elevation
Ground Elevation	Ground Elevation
Top of Retaining Wall	Top of Retaining Wall
Elevation	Elevation
Contour Line	Contour Line
Deciduous Tree	Deciduous Tree
Coniferous Tree	Coniferous Tree
Brushline	Brushline
Tree Protection	Tree Protection
Fencing at Drip Line	Fencing at Drip Line

PAVING & SURFACE LEGEND

Asphalt Pavement Section	1 1/2" Hot Mix Asphalt, IL-9.5, N50
Concrete Driveway Section	8" Portland Cement Concrete
Asphalt Mill & Overlay	2" Hot Mix Asphalt, IL-9.5, N50
Concrete Sidewalk Section	5" Portland Cement Concrete
Fire Lane Asphalt Pavement Section	2" Hot Mix Asphalt, IL-9.5, N50
Specialty Concrete Sidewalk	See Landscape Architect Plans for Further Details.
Stormwater Overland Flow Path	
Ridge Line/High Point	

Scale: 1"=30'

ERIKSSON
ENGINEERING
ASSOCIATES, LTD.

145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4804
EMAIL: INFO@EEA-LTD.COM

GRADING AND PAVING PLAN

C5.0

COMMISSION NO.: 2014104

SCALE: AS NOTED

DATE: 4/27/2015

REVISIONS

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

FOR

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY: C.M.F. CHECKED BY: M.J.R. APPROVED BY: C.S.L.

THE MOORINGS OF ARLINGTON HEIGHTS

RENOVATIONS & ADDITIONS TO

DESIGN PHASE

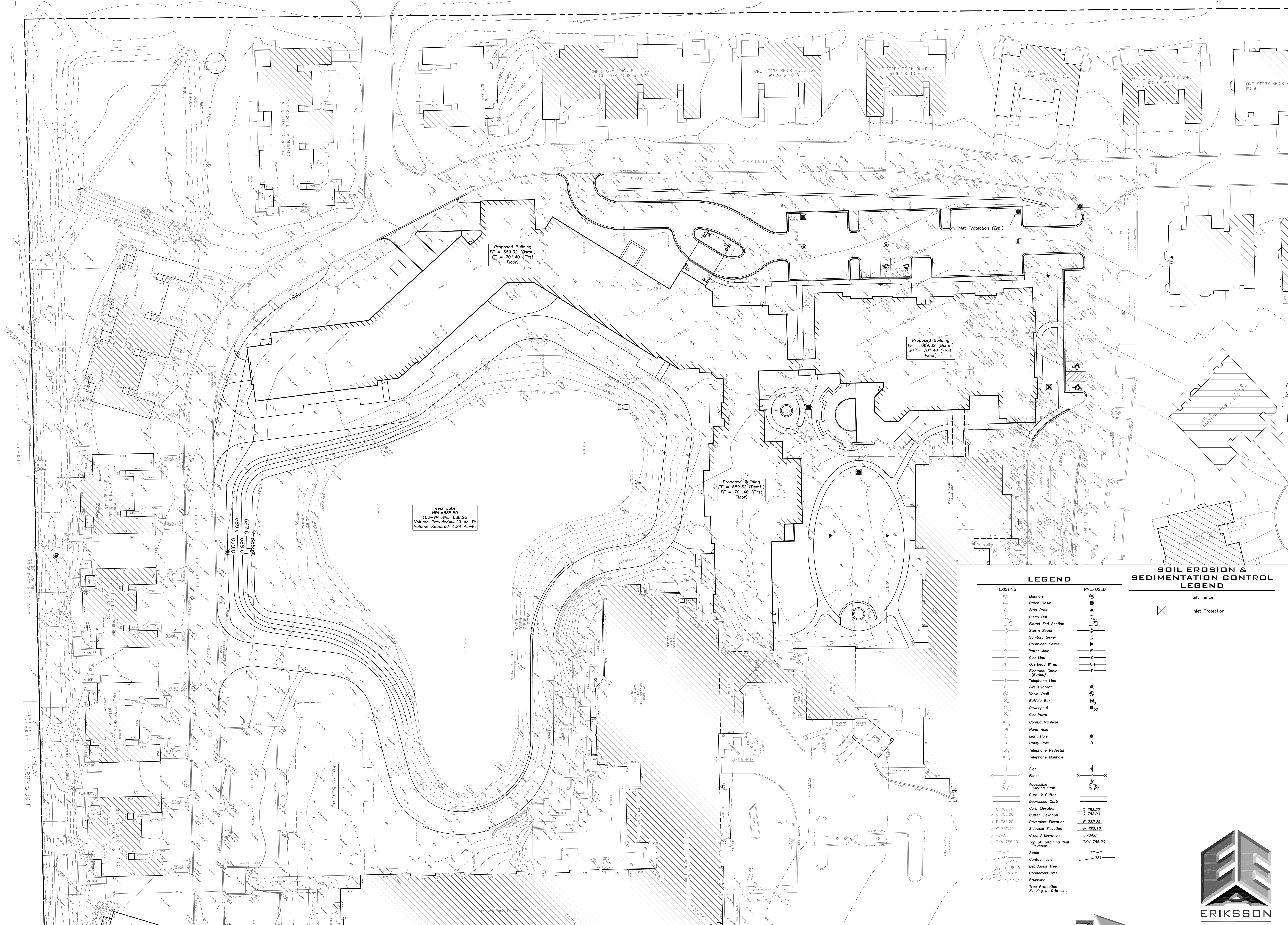
rlps architects®

architecture • master planning • interior design

250 VALLEYBROOK DRIVE, LANCASTER, PA 17601

717-560-9501 FAX: 717-560-2373 RLPS, LLP

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED, COPIED, OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION OF RLPS ARCHITECTS, LLP. THE ARCHITECT ASSUMES NO LIABILITY FOR ANY ERRORS OR OMISSIONS IN THIS DRAWING. THE ARCHITECT'S RESPONSIBILITY IS LIMITED TO THE DESIGN AND CONSTRUCTION OF THE PROJECT AS SHOWN ON THIS DRAWING. THE ARCHITECT DOES NOT WARRANT THE ACCURACY OF ANY INFORMATION PROVIDED BY OTHERS. THE ARCHITECT DOES NOT WARRANT THE ACCURACY OF ANY INFORMATION PROVIDED BY OTHERS. THE ARCHITECT DOES NOT WARRANT THE ACCURACY OF ANY INFORMATION PROVIDED BY OTHERS.



West Lake
NWL=685.50
100-YR NWL=688.25
Volume Provided=4.29 Ac-Ft
Volume Required=4.24 Ac-Ft

Proposed Building
FF = 689.32 (Bsmt.)
FF = 701.40 (First Floor)

Proposed Building
FF = 689.32 (Bsmt.)
FF = 701.40 (First Floor)

Proposed Building
FF = 689.32 (Bsmt.)
FF = 701.40 (First Floor)

LEGEND

EXISTING

- Manhole
- Catch Basin
- Area Drain
- Clean Out
- Flared End Section
- Storm Sewer
- Sanitary Sewer
- Combined Sewer
- Water Main
- Gas Line
- Overhead Wires
- Electrical Cable (Buried)
- Telephone Line
- Fire Hydrant
- Valve Vault
- Buffalo Box
- Downspout
- Gas Valve
- CornEd Manhole
- Hand Hole
- Light Pole
- Utility Pole
- Telephone Pedestal
- Telephone Manhole
- Sign
- Fence
- Access
- Parking Stall
- Curb & Gutter
- Depressed Curb
- Curb Elevation
- Gutter Elevation
- Pavement Elevation
- Sidewalk Elevation
- Ground Elevation
- Top of Retaining Wall Elevation
- Swale
- Contour Line
- Deciduous Tree
- Coniferous Tree
- Brushline
- Tree Protection
- Fencing at Drip Line

PROPOSED

- Manhole
- Catch Basin
- Area Drain
- Clean Out
- Flared End Section
- Storm Sewer
- Sanitary Sewer
- Combined Sewer
- Water Main
- Gas Line
- Overhead Wires
- Electrical Cable (Buried)
- Telephone Line
- Fire Hydrant
- Valve Vault
- Buffalo Box
- Downspout
- Gas Valve
- CornEd Manhole
- Hand Hole
- Light Pole
- Utility Pole
- Telephone Pedestal
- Telephone Manhole
- Sign
- Fence
- Access
- Parking Stall
- Curb & Gutter
- Depressed Curb
- Curb Elevation
- Gutter Elevation
- Pavement Elevation
- Sidewalk Elevation
- Ground Elevation
- Top of Retaining Wall Elevation
- Swale
- Contour Line
- Deciduous Tree
- Coniferous Tree
- Brushline
- Tree Protection
- Fencing at Drip Line

SOIL EROSION & SEDIMENTATION CONTROL LEGEND

- Silt Fence
- Inlet Protection

0 30 60 90

Scale: 1"=30'

ERIKSSON ENGINEERING ASSOCIATES, LTD.

145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4804
EMAIL INFO@EEA-LTD.COM

EROSION CONTROL PLAN

C6.0

COMMISSION NO: 2014104

NO. 1

DATE 06/22/2015

DESCRIPTION PUD Application Submittal

REVISIONS

NO. 1

DATE 06/22/2015

DESCRIPTION PUD Application Submittal

THE MOORINGS OF ARLINGTON HEIGHTS

FOR PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY: C.M.F. CHECKED BY: M.J.R. APPROVED BY: C.S.L.

rlps architects®

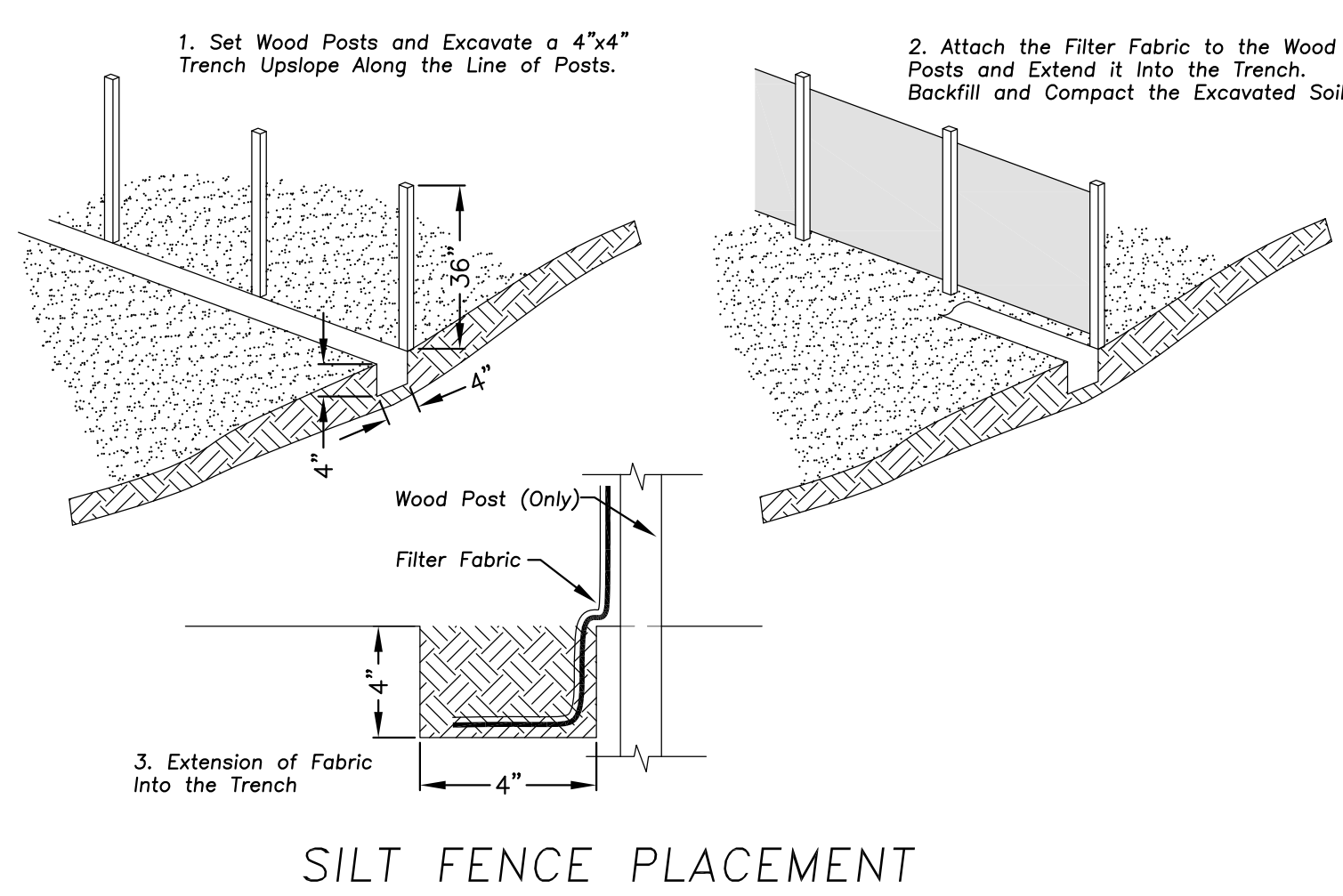
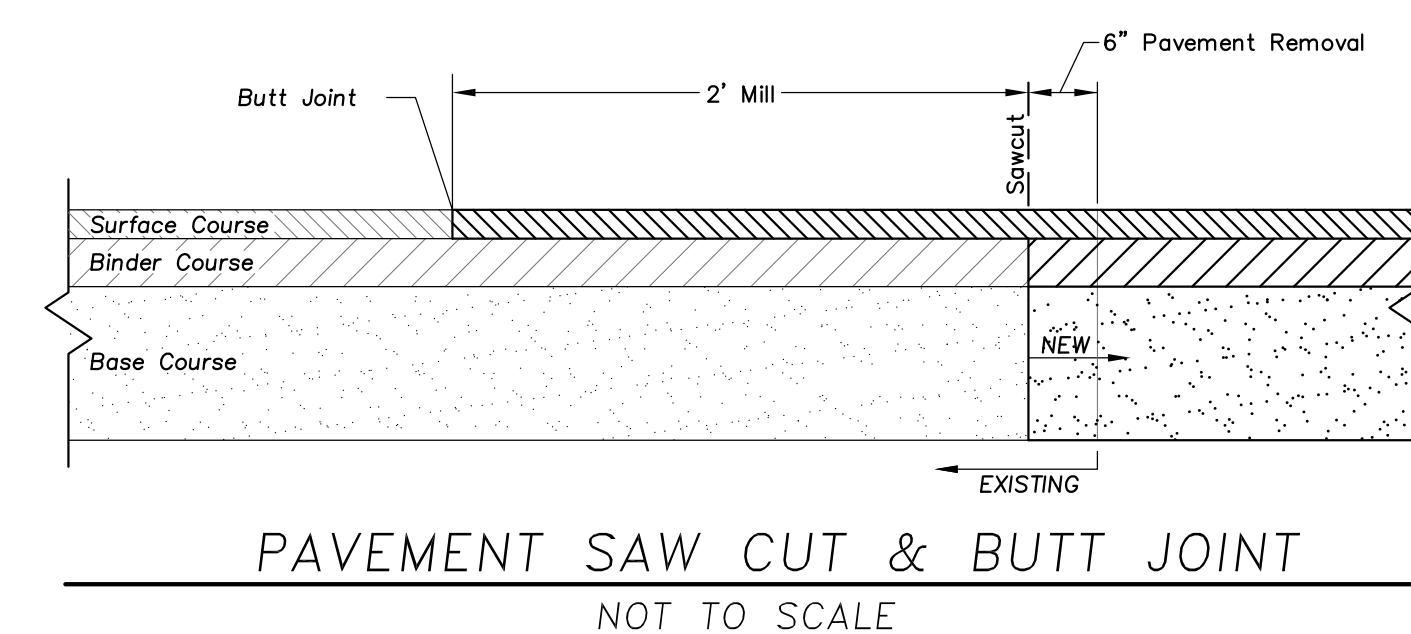
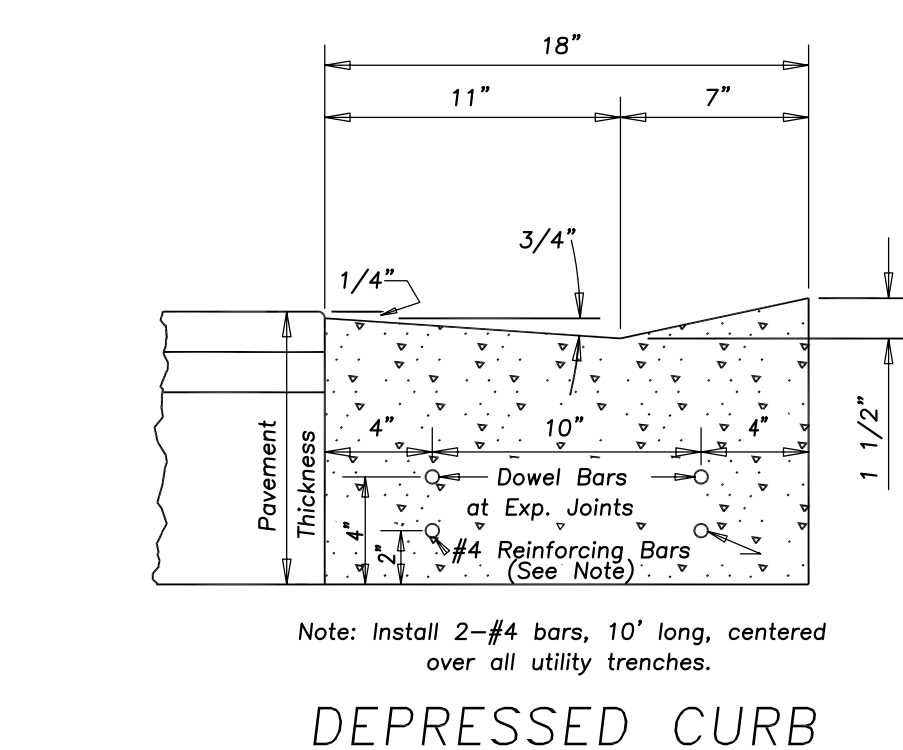
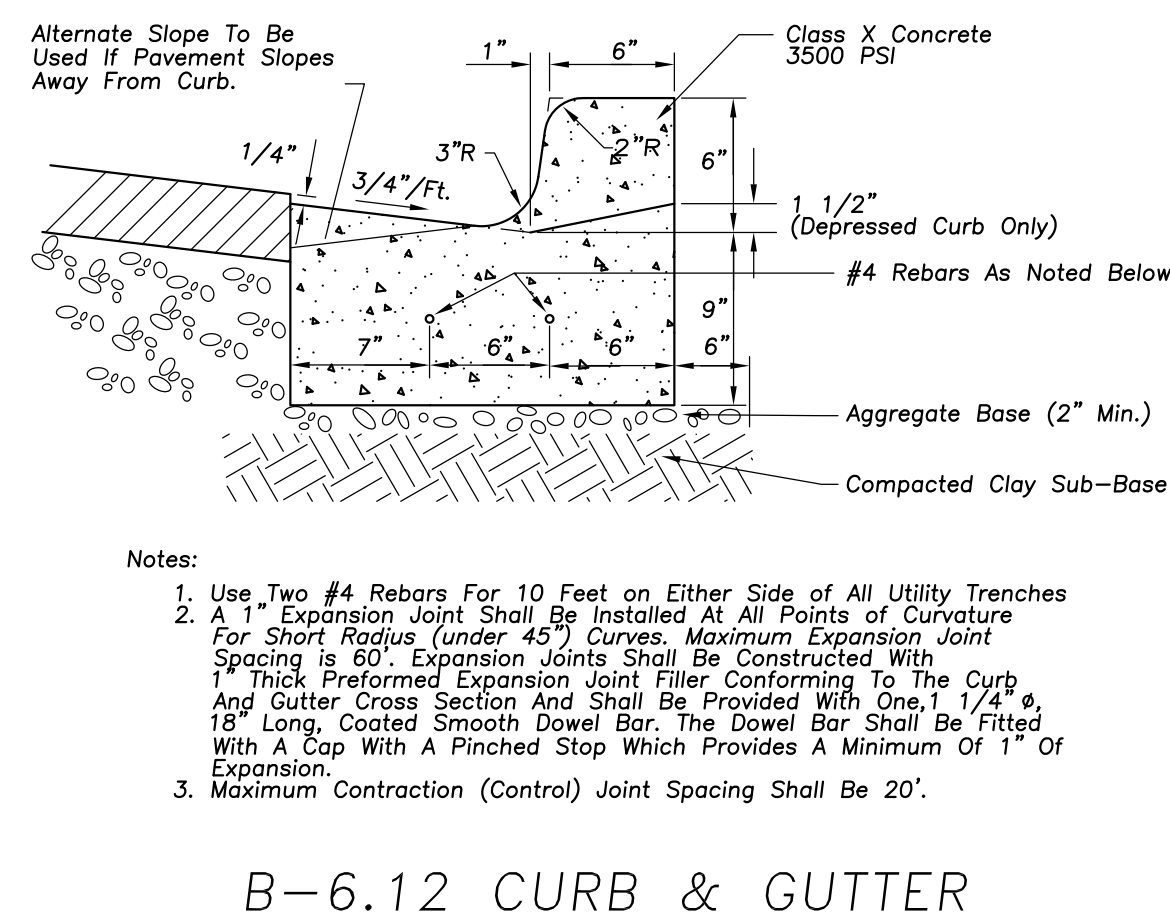
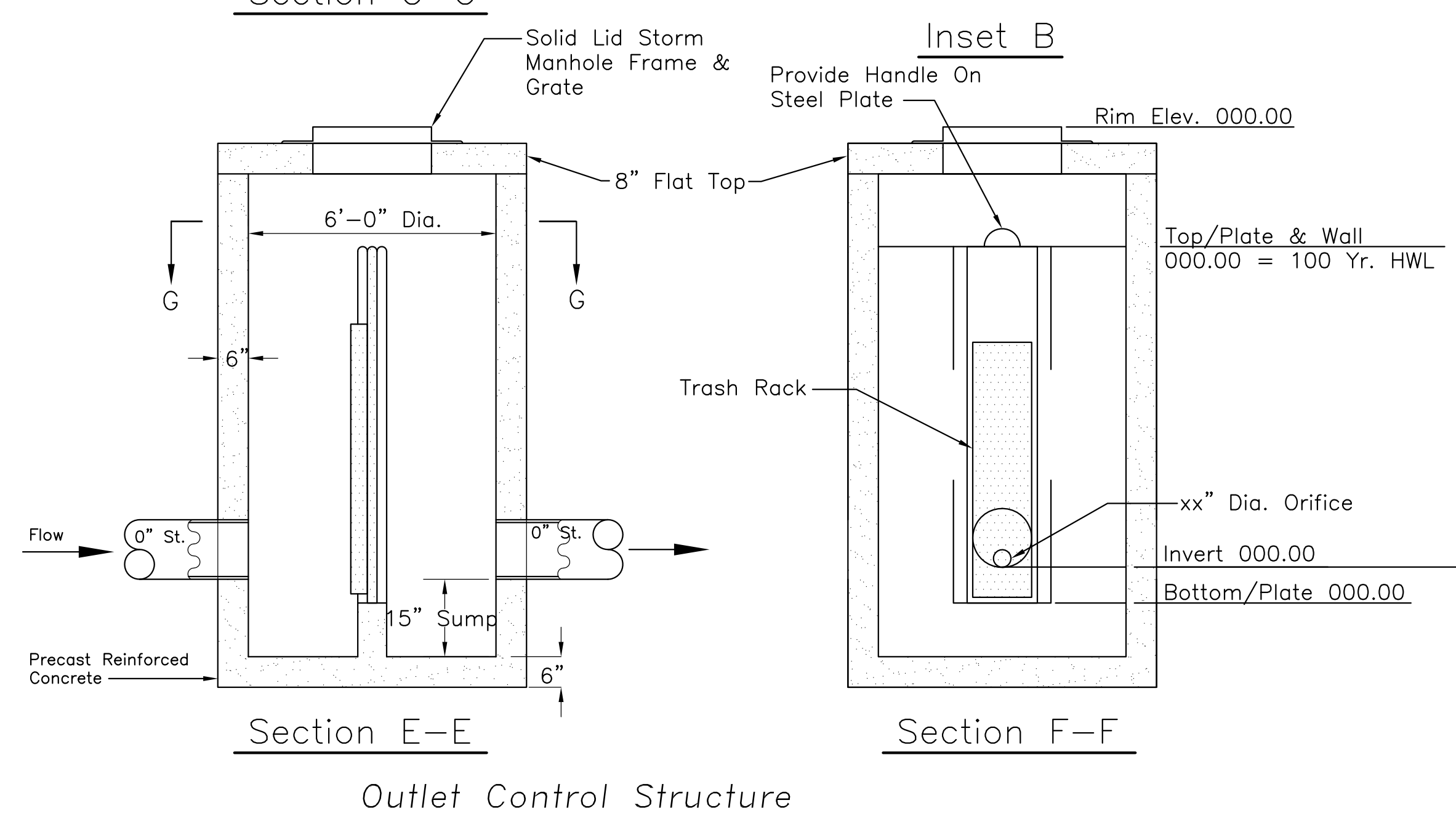
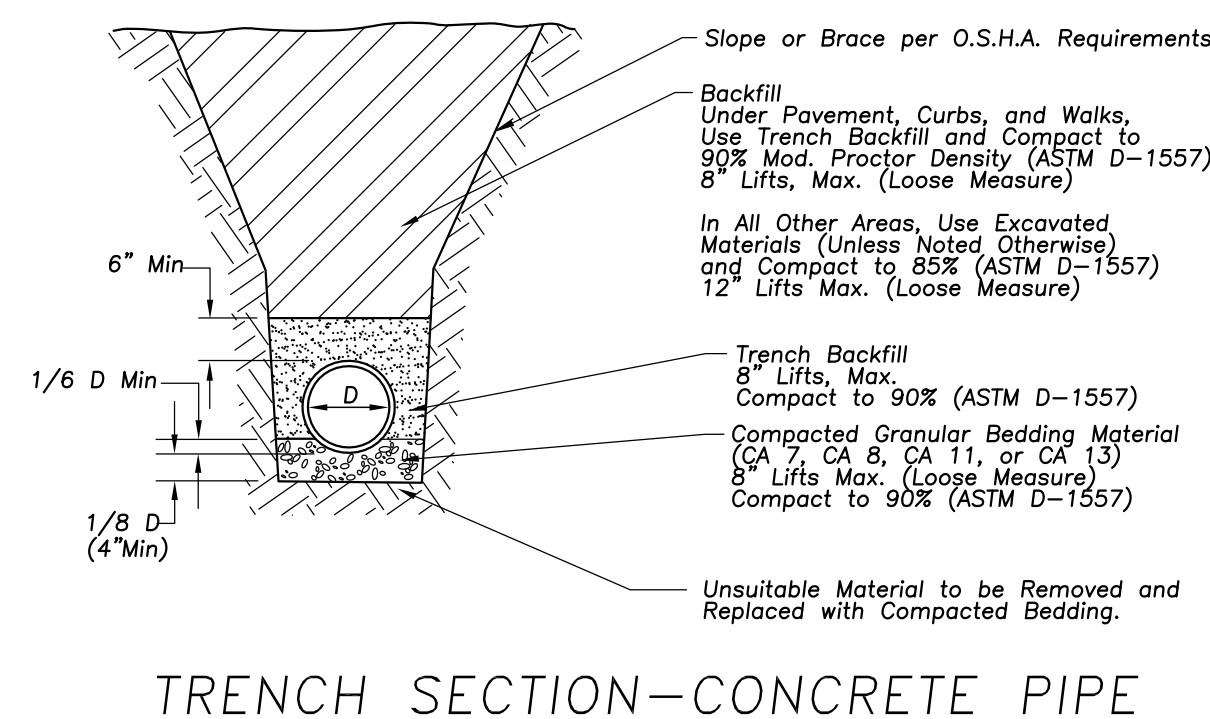
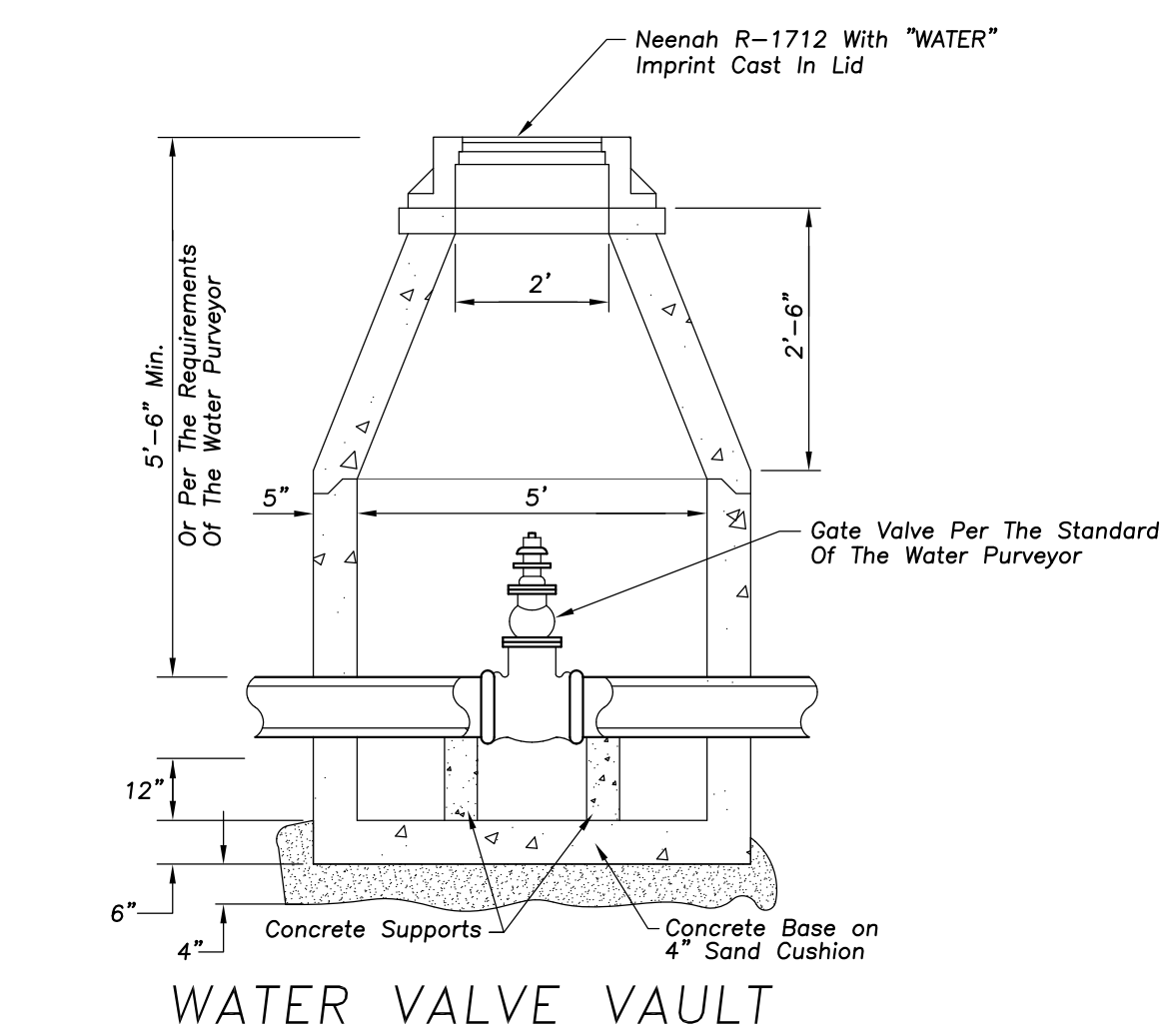
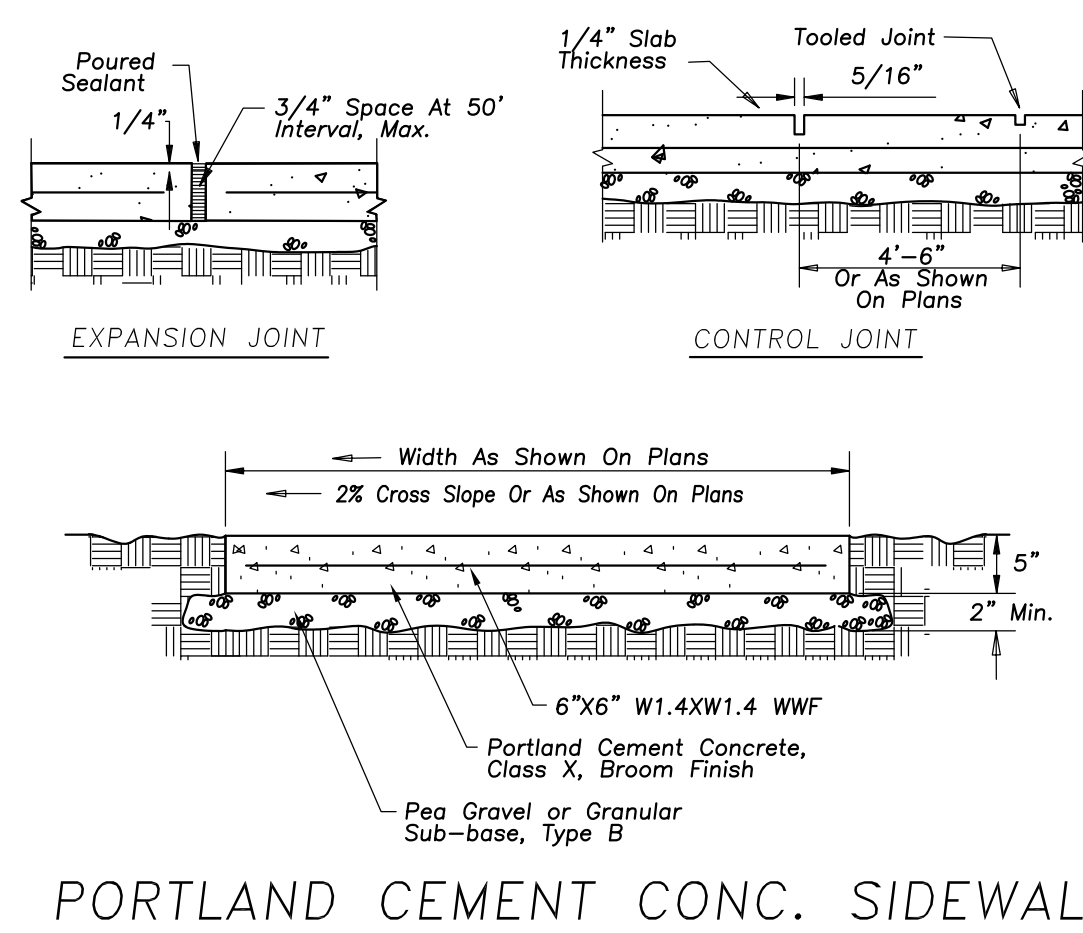
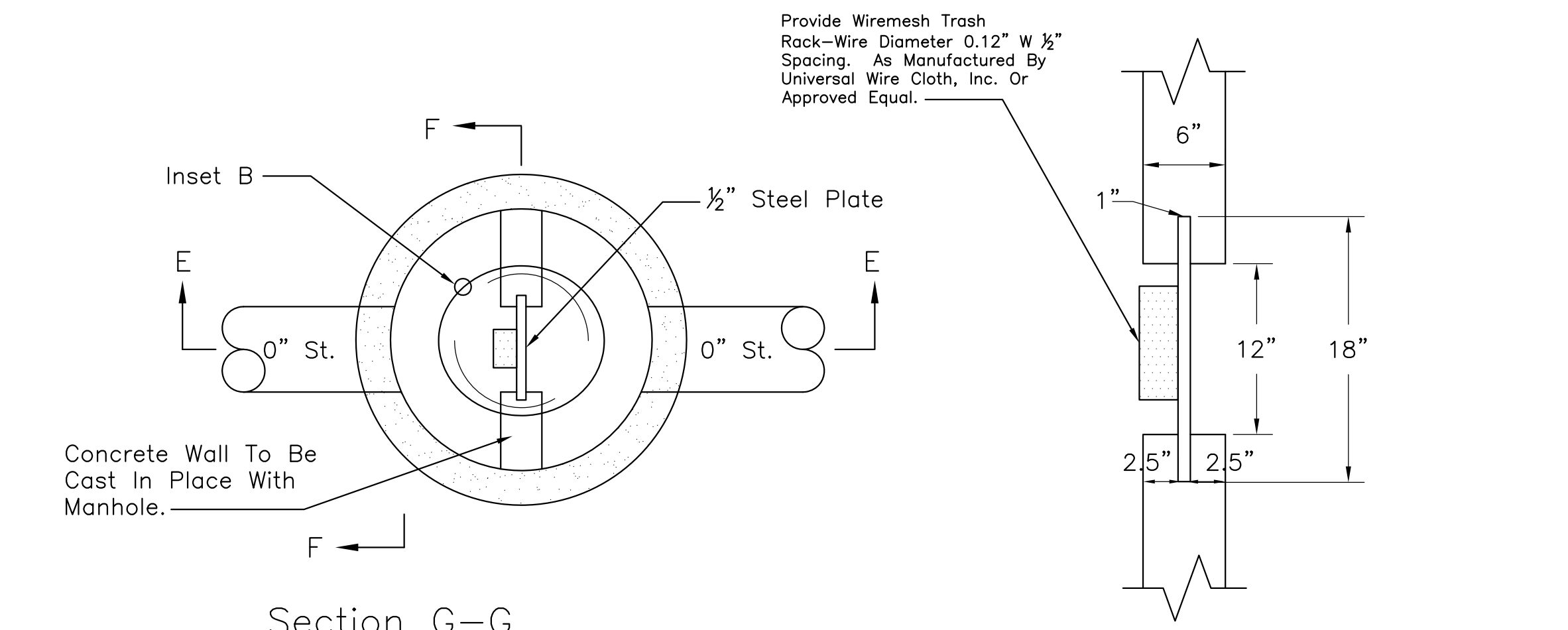
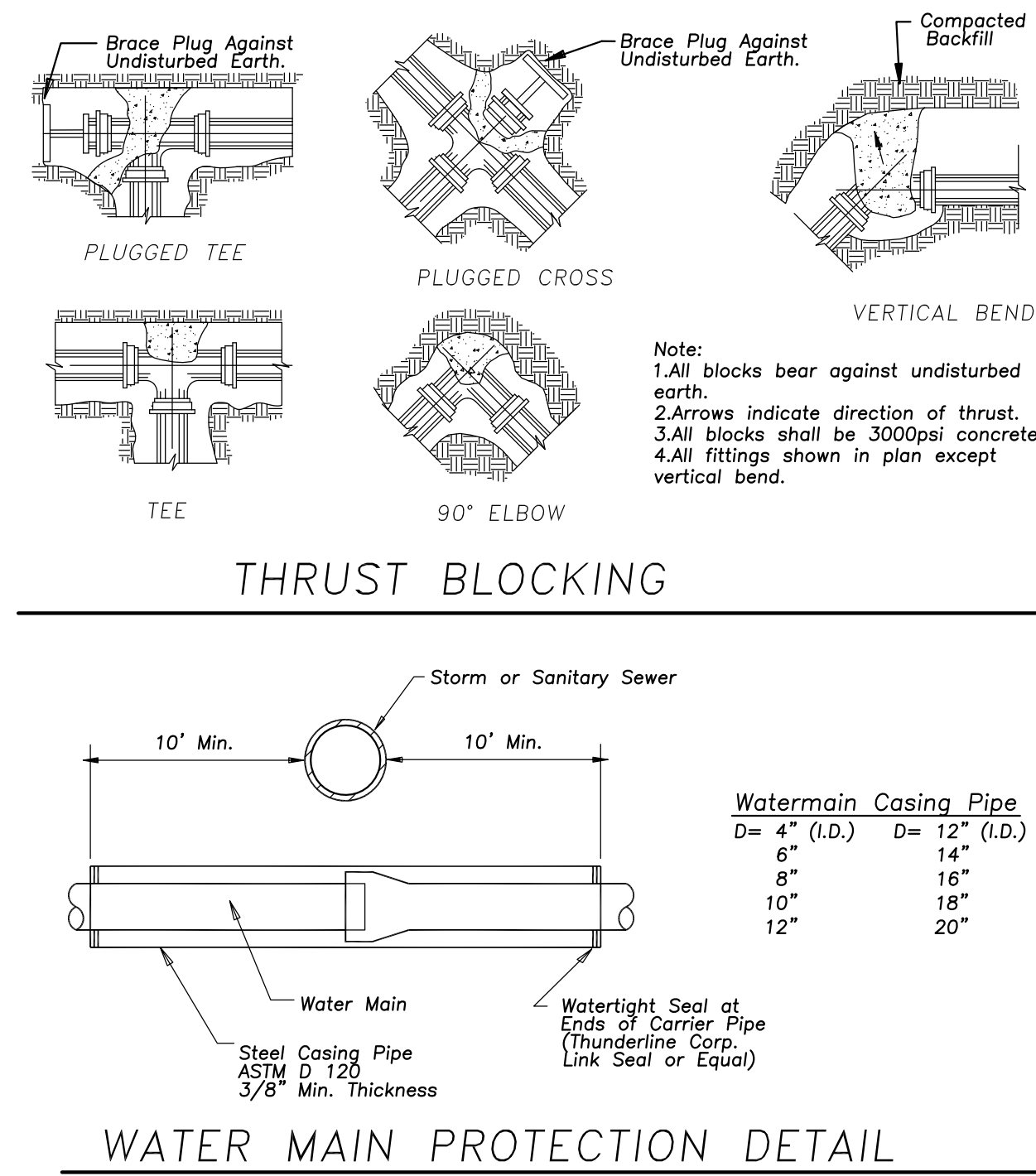
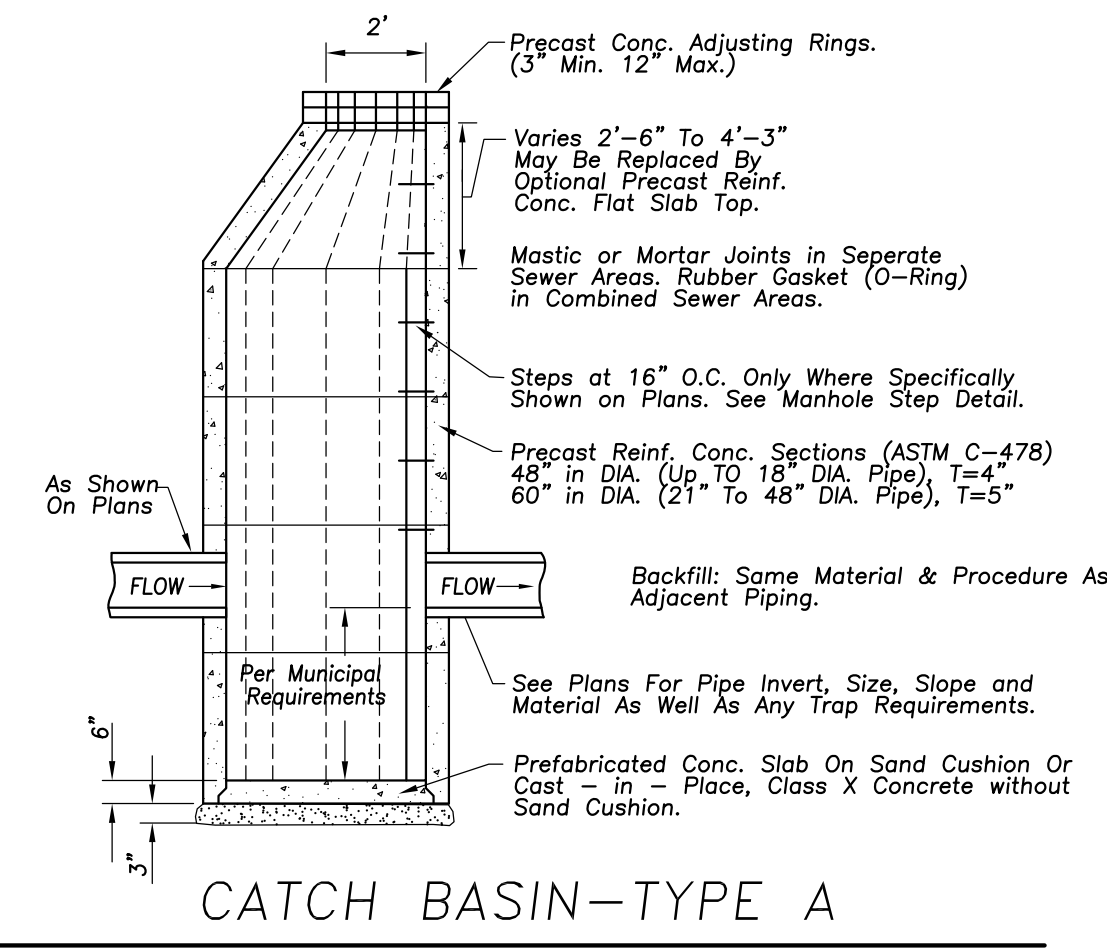
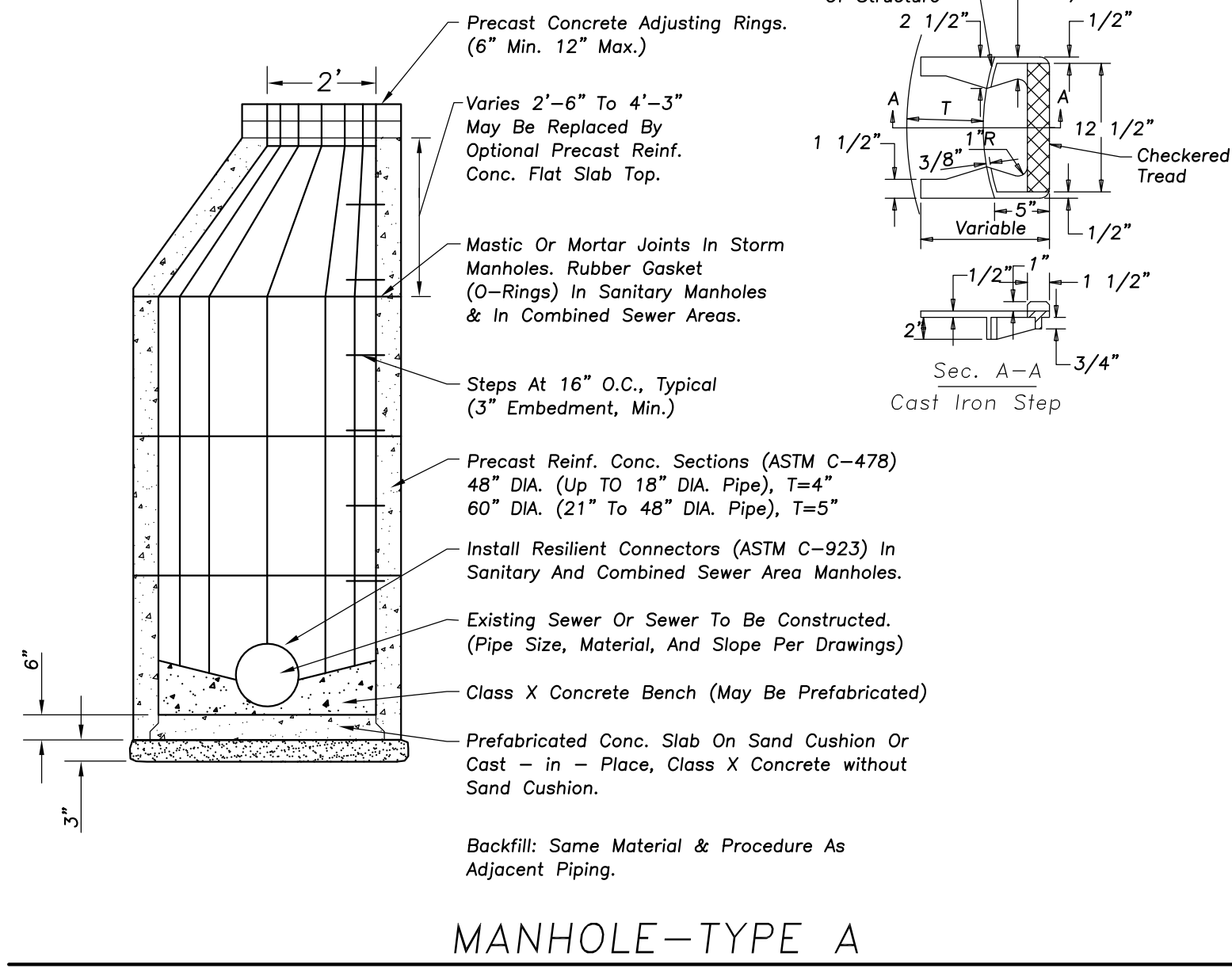
architecture • master planning • interior design

250 VALLEYBROOK DRIVE, LANCASTER, PA 17601

717-560-9501 FAX: 717-560-2373 RLPS, LLP

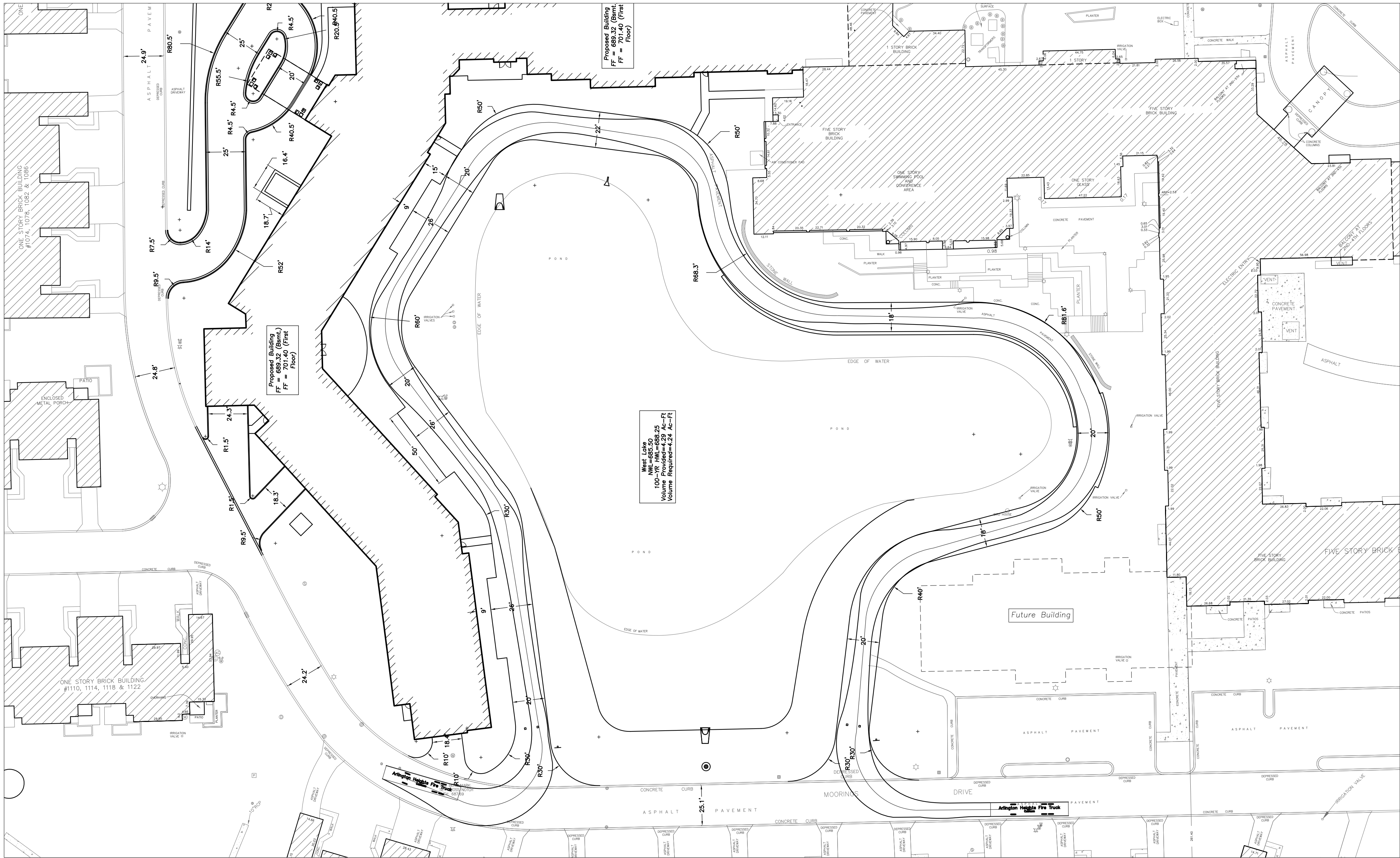
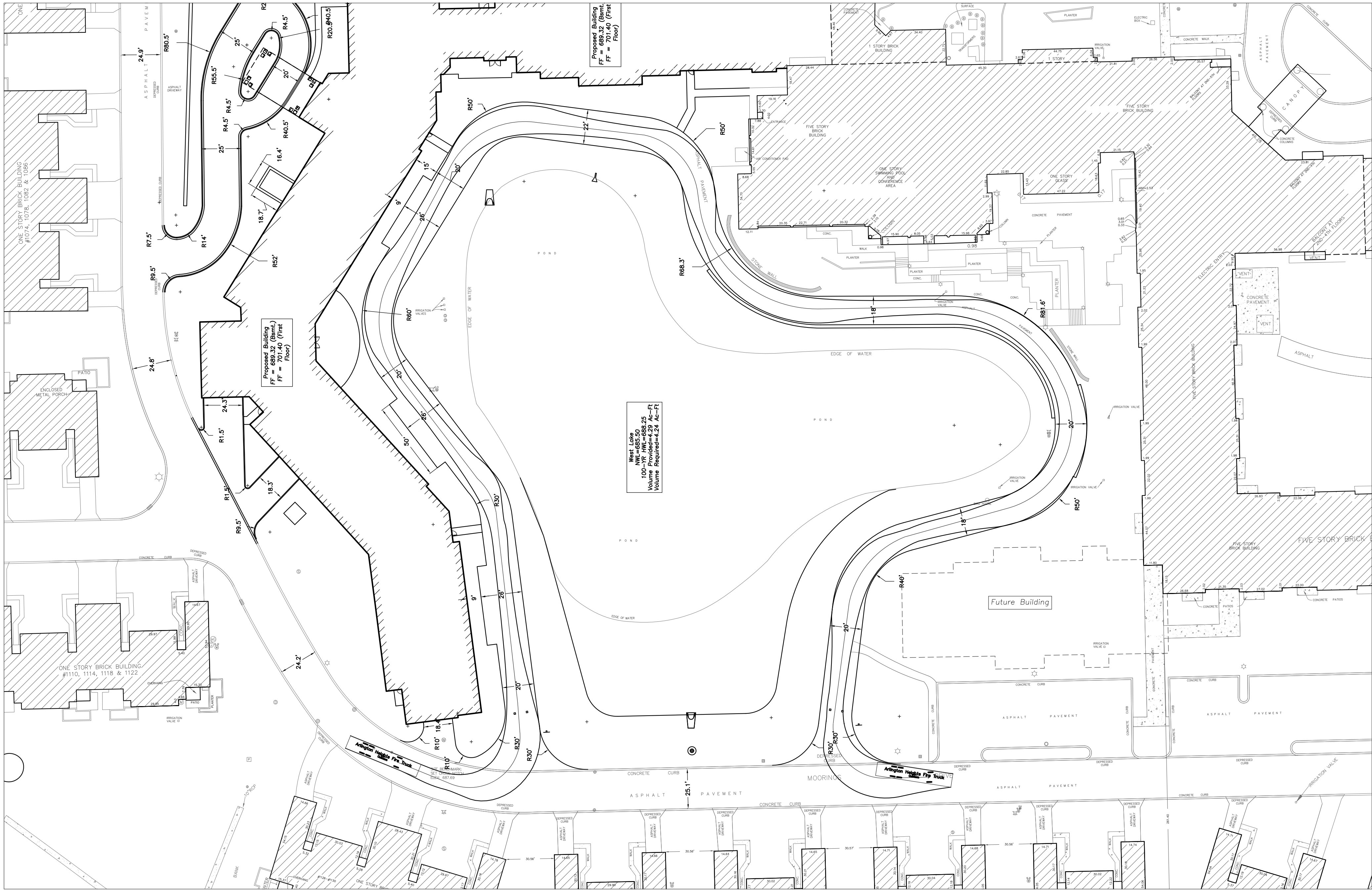
DESIGN PHASE

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED, COPIED, OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION OF RLPS ARCHITECTS, LLP. THE ARCHITECT ASSUMES NO LIABILITY FOR THE ACCURACY OF THE INFORMATION PROVIDED BY OTHERS. THE ARCHITECT SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

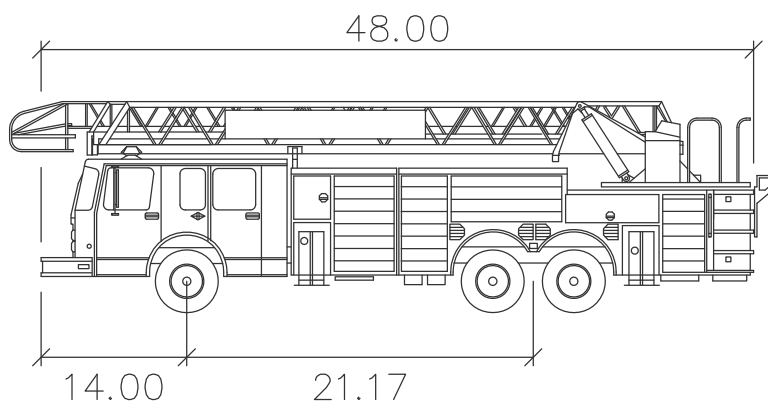


145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4864
EMAIL: INFO@EEA-LTD.COM

THIS DRAWING IS AN INSTRUMENT OF SERVICE. THE ENGINEER OR ARCHITECT HAS PREPARED THIS DRAWING FOR THE PROJECT AND HAS NOT BEEN REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED TO THE CONTRARY, THE ARCHITECT'S NAME OF THE ARCHITECT SHALL BE THE NAME OF THE ARCHITECT.		CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.							
DESIGN PHASE									
rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP									
THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: C.M.F. COORDINATOR BY: C.S.L. CHECKED BY: M.J.R. APPROVED BY:		REVISIONS <table border="1"> <tr> <th>NO.</th> <th>DATE</th> <th>DESCRIPTION</th> </tr> <tr> <td>1</td> <td>06/22/2015</td> <td>PUD Application Submittal</td> </tr> </table>		NO.	DATE	DESCRIPTION	1	06/22/2015	PUD Application Submittal
NO.	DATE	DESCRIPTION							
1	06/22/2015	PUD Application Submittal							
SITE WORK DETAILS		DATE: 4/27/2015							
SCALE: AS NOTED		DATE: 4/27/2015							
C7.0		2014104							



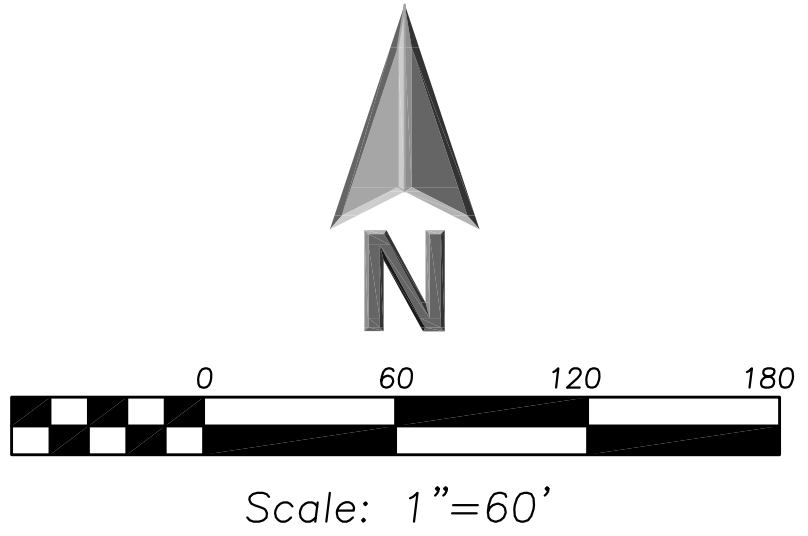
ARLINGTON HEIGHTS
FIRE TRUCK PROFILE



Width = 8.50
Track = 7.00
Lock to Lock Time = 3.0
Steering Angle = 40.0

LEGEND

EXISTING		PROPOSED
	Manhole	
	Catch Basin	
	Area Drain	
	Clean Out	
	Flared End Section	
	Storm Sewer	
	Sanitary Sewer	
	Combined Sewer	
	Water Main	
	Gas Line	
	Overhead Wires	
	Electrical Cable (Buried)	
	Telephone Line	
	Fire Hydrant	
	Valve Vault	
	Buffalo Box	
	Downspout	
	Gas Valve	
	ComEd Manhole	
	Hand Hole	
	Light Pole	
	Utility Pole	
	Telephone Pedestal	
	Telephone Manhole	
	Sign	
	Fence	
	Accessible Parking Stall	
	Curb & Gutter	
	Depressed Curb	
	Curb Elevation	
	Gutter Elevation	
	Pavement Elevation	
	Sidewalk Elevation	
	Ground Elevation	
	Top of Retaining Wall Elevation	
	Swale	
	Contour Line	
	Deciduous Tree	
	Coniferous Tree	
	Brushline	
	Tree Protection Fencing at Drop Line	



ERIKSSON
ENGINEERING
ASSOCIATES, LTD.

145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4804
EMAIL INFO@EEA-LTD.COM

FIRE LANE
TURNING EXHIBIT

DRAWING NO.:
C8.0

DATE:
4/27/2015

SCALE:
AS NOTED

REVISIONS

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

THE MOORINGS OF ARLINGTON HEIGHTS

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: C.M.F. CHECKED BY: C.S.L. APPROVED BY: M.J.R.

DESIGN PHASE

rlps architects®

architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

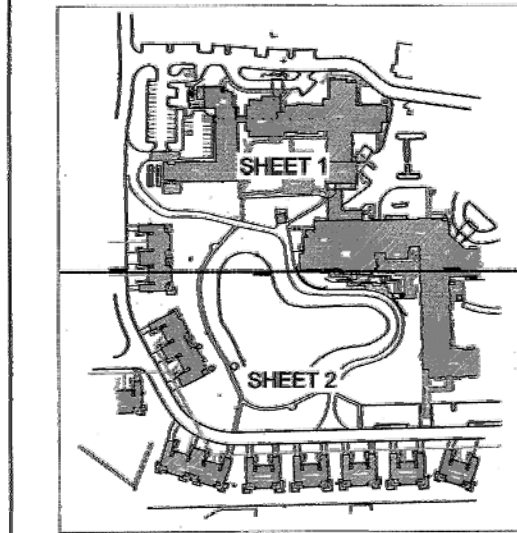
THIS DRAWING IS AN INSTRUMENT OF SERVICE. THE ARCHITECT'S RESPONSIBILITY IS TO THE CLIENT AND NOT TO THE PUBLIC. THE ARCHITECT'S WORK SHALL BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS THE ARCHITECT'S NAME AND THE NAME OF THE ARCHITECT FIRM ARE SHOWN ON THE DRAWING. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

Legend:

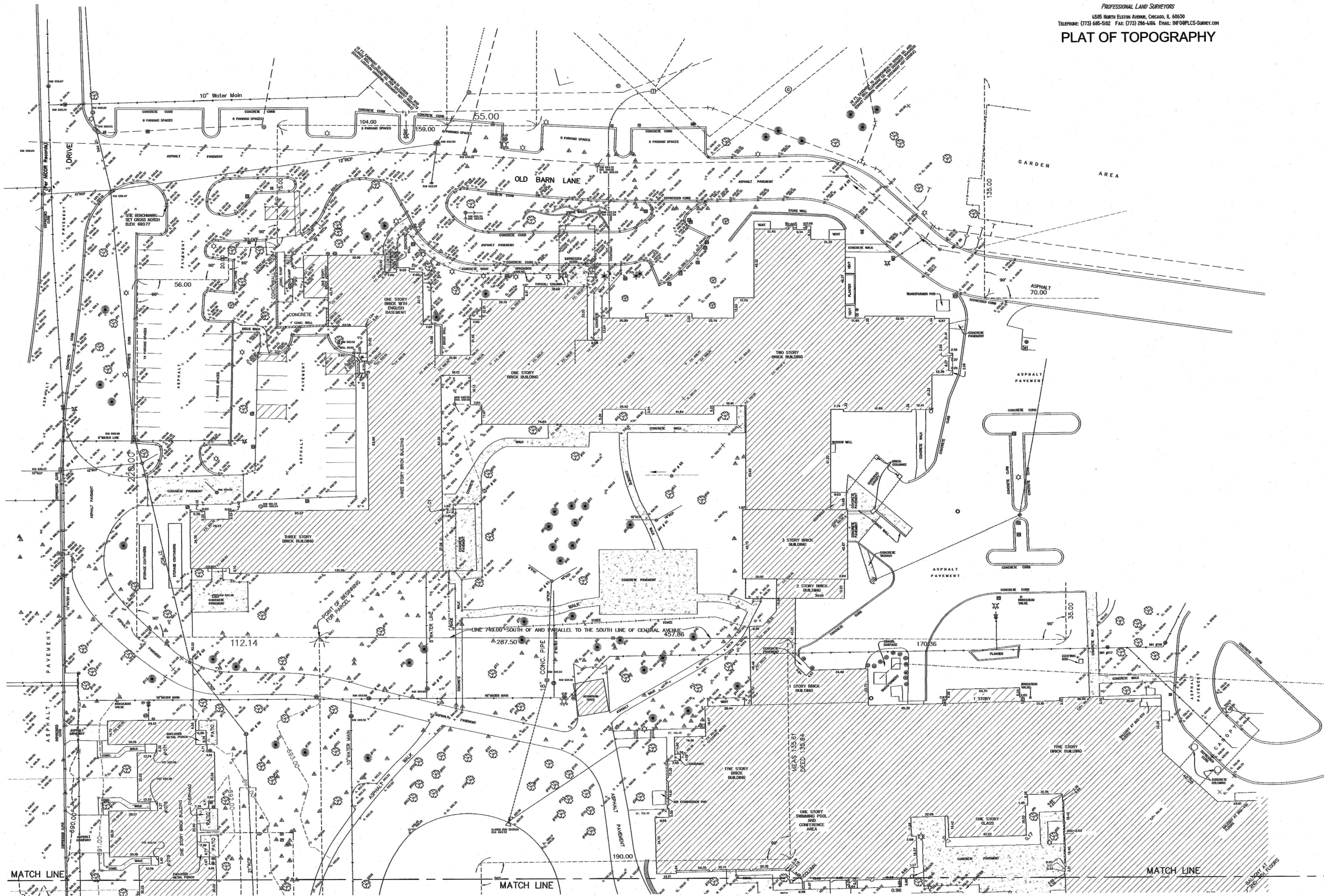
- Storm MH
- Storm CB
- Storm Inlet
- Storm Inlet
- San MH
- San Clean Out
- Water Valve Vault
- Water MH
- Water Buffalo Box
- Water Hand Hole
- Water Meter
- Water Fire Hydrant
- Telephone MH
- Telephone Vault
- Telephone Pedestal
- Public Telephone
- Combination Pedestal
- Utility Pole
- Electric Manhole
- Electric MH
- Electric Vault
- Electric Meter
- Electric Pad
- Electric Pedestal
- Electric Light Pole
- Electric Traffic Signal
- Pole with Traffic Signal
- Electric Traffic Control Box
- Electric Traffic Vault
- Gas Buffalo Box
- Gas Hand Hole
- Gas Meter
- Gas Valve
- Gas MH
- Gas Vault
- Gas Buffalo Box
- Cable TV Pedestal
- Parking Meter
- Sign Post
- Mail Box
- Bumper Post
- Guy Anchor
- Soil Boring
- Monumentation Established
- Unestablished Manhole
- Auto Sprinkler
- House Connection
- Fire Alarm
- Flag Pole
- Tree - Deciduous
- Tree - Evergreen

A=ASPHALT ELEVATION
CB=CONCRETE ELEVATION
F=FINISHED FLOOR ELEVATION
W=WATER ELEVATION
X=CONCRETE ELEVATION
Y=TOP OF SLOPE ELEVATION
Z=TOP OF BANK ELEVATION
C=CURB ELEVATION
L=ELEVATION

GRAPHIC SCALE
0 10 20
(FEET)
0 10 20
(METERS)



LOCATION MAP

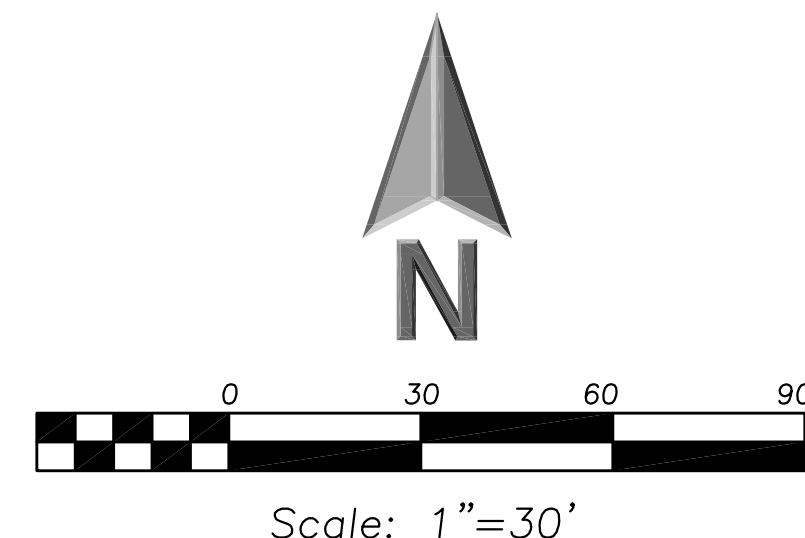


ADDITIONAL TOPOGRAPHY ADDED MAY 9, 2015
DESIGNED BY: GREMLY & BIEDERMANN
CHECKED BY: [Signature]
DATE: 05/15/2015
PROJECT: 2015-20606-001
SHEET: 1 OF 2

SURVEY NOTES:
Note R, S, M, denotes Record and Measured distances respectively.
Distances are marked in feet and decimal parts thereof. Compare all points BEFORE building by same and at once report any differences REPAIR change is done.
For easements, building lines and other conditions not shown on survey plat refer to your original, deed, contract, title policy and local building line regulations.
NO dimensions shall be assumed by scale measurement upon this plat.
Unless otherwise noted herein the Bearing, Elevation Datum and Coordinate Datum if used is ASSUMED.
COPYRIGHT CHICAGO GUARANTEE SURVEY COMPANY 2015 "All Rights Reserved"

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

State of Illinois
County of Cook
We, GREMLY & BIEDERMANN, INC., hereby certify that we have measured the elevations and bearings shown hereon and that the plat herein shown is a correct representation thereof.
Field measurements completed on MAY 9, 2015.
Signed on May 15, 2015
By: [Signature]
Professional Meas. Land Surveyor No. 22672
My license expires November 30, 2019
This professional service conforms to the current Illinois minimum standards for topographic surveys.



GREMLY & BIEDERMANN
A Division of
PLCS Corporation
PROFESSIONAL LAND SURVEYORS
4505 NORTH ELSTON AVENUE, CHICAGO, IL 60630
Telephone: (773) 645-5102 Fax: (773) 284-4384 Email: INFO@PLCS-SURVEY.COM
PLAT OF TOPOGRAPHY

PLAT OF SURVEY
(1 OF 2)
C9.0
2014104

REVISIONS

NO. DATE DESCRIPTION

FOR THE MOORINGS OF ARLINGTON HEIGHTS

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DESIGN PHASE

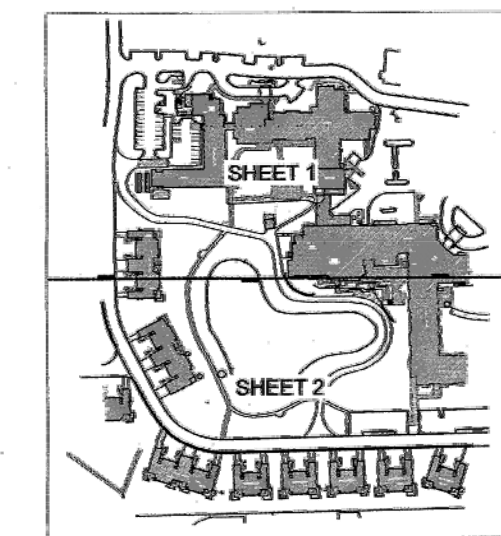
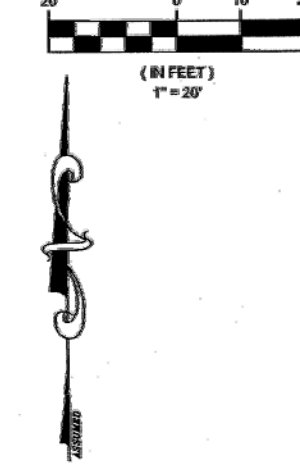
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF GREMLY & BIEDERMANN, INC. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND WITHOUT THE NAME OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

Legend:

- Storm MH
- Storm CB
- Storm Inlet
- Sun MH
- Sun Clean Out
- Water Valve Vault
- Water MH
- Water Buffalo Box
- Water Hand Hole
- Water Meter
- Telephone MH
- Telephone Vault
- Telephone Pedestal
- Public Telephone
- Combination Pedestal
- Utility Pole
- Electric Manhole
- Electric MH
- Electric Vault
- Electric Meter
- Electric Pod
- Electric Pedestal
- Electric Light Pole
- Electric Traffic Signal
- Pole with Traffic Signal
- Electric Traffic Control Box
- Gas Buffalo Box
- Gas Hand Hole
- Gas Meter
- Gas Valve
- Gas MH
- Gas Vault
- Gas Buffalo Box
- Cable TV Pedestal
- Parking Meter
- Sign Post
- Mail Box
- Bumper Post
- Guy Anchor
- Soil Boring
- Monumentation Found
- Monumentation Established
- Unidentified Markers
- Hose Connection
- Fire Alarm
- Flag Pole
- Tree - Deciduous
- Tree - Evergreen

A-ASPHALT ELEVATION
GR-GRASS ELEVATION
PF-FINISHED FLOOR ELEVATION
W-WALK ELEVATION
X-CONCRETE ELEVATION
TOE-TOP OF BULK ELEVATION
TOE-TOP OF BANK ELEVATION
C-CURB ELEVATION
CH-CHUTE ELEVATION
EL-ELEVATION

GRAPHIC SCALE
1"=30'



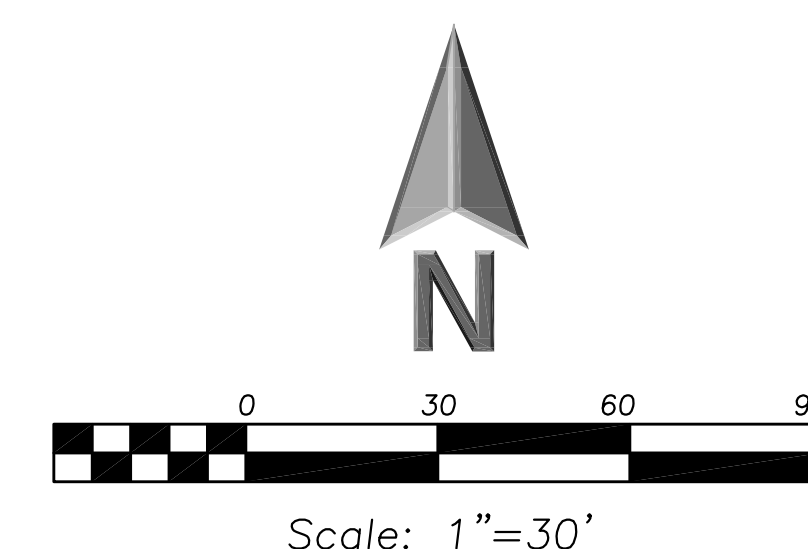
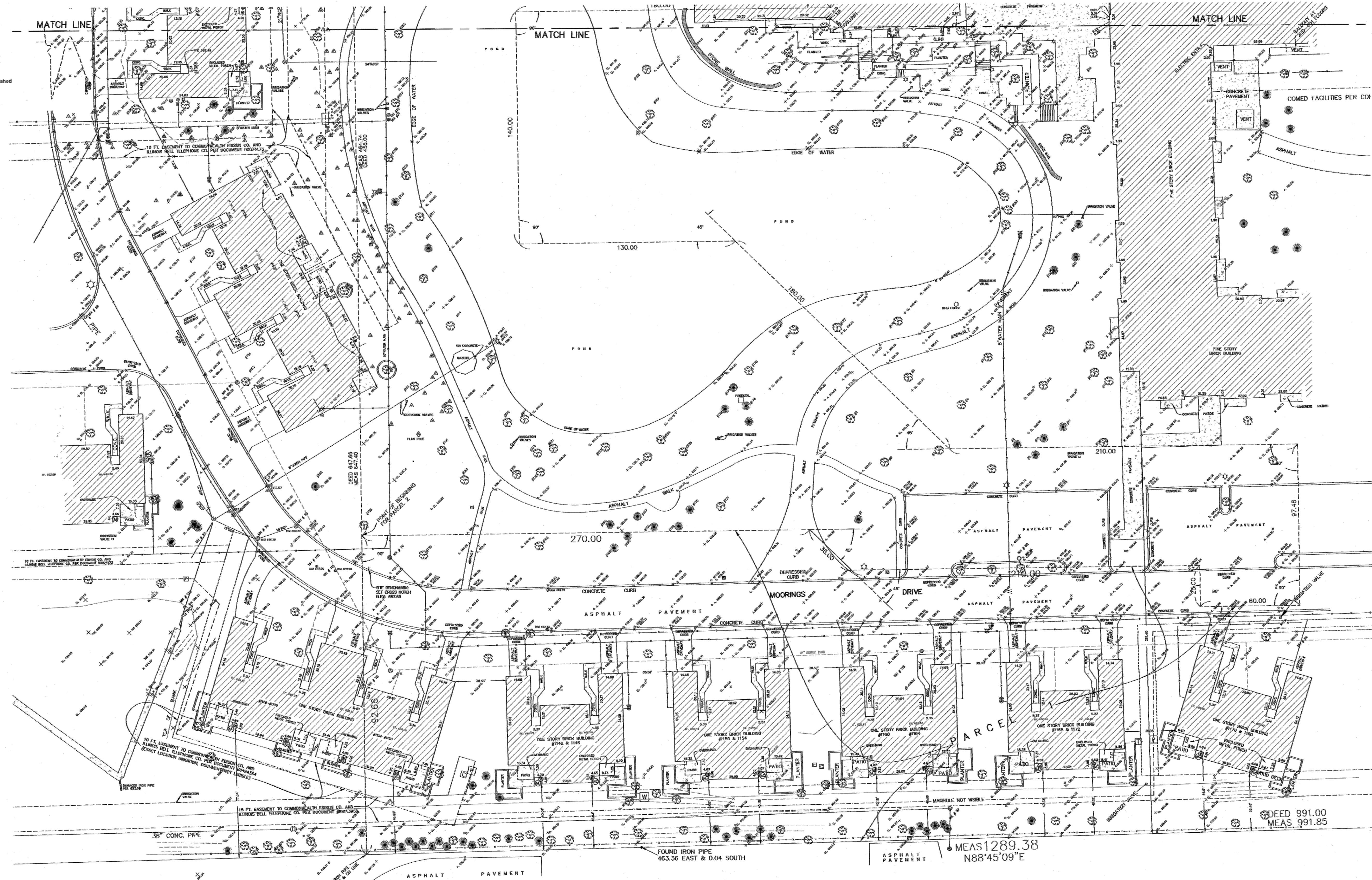
LOCATION MAP

ORDERED BY: GREMLEY & BIEDERMANN
PROJECT: PLCS CORPORATION
DATE: 06/22/2015
SHEET: 2 OF 2

SURVEY NOTES:
Note R. & M. denotes Record and Measured distances respectively.
Distances are marked in feet and decimal parts thereof. Compare all points BEFORE building by owner and at once report any differences BEFORE damage is done.
For easements, building lines and other restrictions not shown on survey plot refer to your deed, deed contract, life policy and local building line regulations.
NO dimensions shall be assumed by scale measurement upon this plot.
Monumentation or witness points were not set at the clients request.
Unless otherwise noted between the Bearing Basis, Elevation Datum and Coordinate Datum if used to ASSUMED.
COPYRIGHT CHICAGO GUARANTEE SURVEY COMPANY 2015 "All Rights Reserved"

NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

GREMLEY & BIEDERMANN
PLCS Corporation
PROFESSIONAL LAND SURVEYORS
4555 North Elston Avenue, Chicago, IL 60630
Telephone: (773) 465-6500 Fax: (773) 294-4444 Email: INFO@PLCS-SURVEY.COM
PLAT OF TOPOGRAPHY



PLAT OF
SURVEY
(2 OF 2)

C9.1

COMMISSION NO: 2014104

REVISIONS

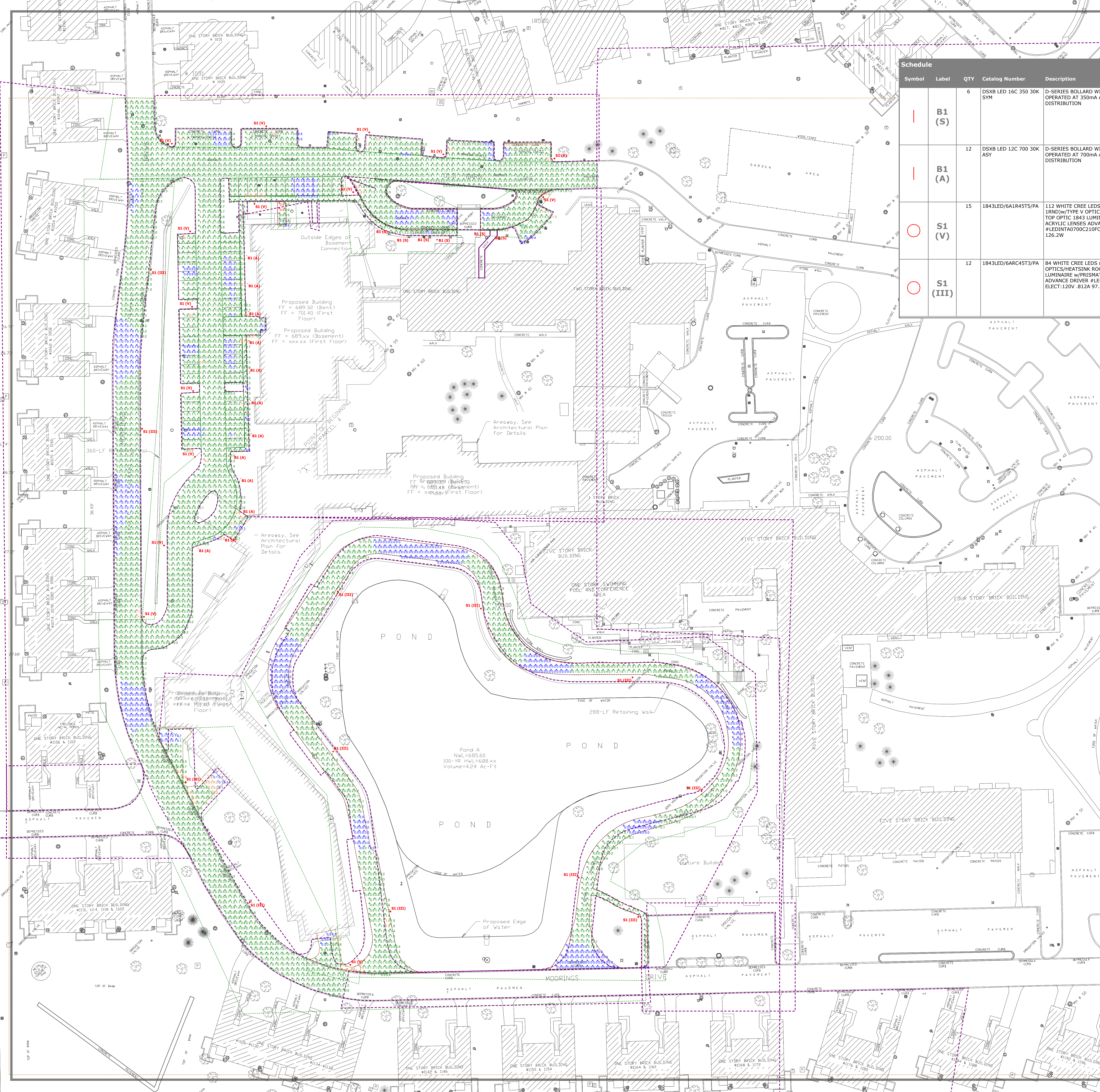
NO.	DATE	DESCRIPTION
1	06/22/2015	PUD Application Submittal

FOR
THE MOORINGS OF ARLINGTON HEIGHTS
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: C.M.F. CHECKED BY: C.S.L. APPROVED BY: M.J.R.

DESIGN PHASE

rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF GREMLEY & BIEDERMANN, P.C. AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION OF GREMLEY & BIEDERMANN, P.C. THE SITE BEFORE PROCEEDING WITH THE WORK.



Farnam Lighting

1843 LED CARSON CITY SERIES

S1 (III) & S1 (V)

IS-793

LUMINAIRE DESIGN

- The 1843 LED Carson City Series is large scale, traditionally styled colonial fixture featuring a tapered four-sided cage and roof.
- The four-punctured roof shall be appointed with a decorative cast aluminum finial.
- The luminaire shall measure 18 1/4" wide and 41 3/4" tall.
- The luminaire shall have a hinged roof for easy inside access.
- The luminaire shall be supplied with line-ground, line-neutral and neutral-ground electrical surge protection in accordance with IEEE/ANSI C62.41.2 guidelines.
- The luminaire shall be U.L. or E.T.L. listed in U.S. and Canada.

POST FITTER

- The fitter or base shall be heavy wall cast aluminum, alloy for high tensile strength.
- The fitter shall have an inside diameter opening to accept a 3" diameter pole or tenon. When ordered with a Sterling aluminum pole, the fitter shall be secured to the pole top or tenon with set screws.

DRIVER HOUSING

- The LED driver housing shall be heavy wall cast aluminum for high tensile strength.
- The LED driver shall be attached to the driver housing to ensure high capacity heat sinking of driver thermals, keeping the driver cooler and ensuring long life.
- The LED driver shall be supplied with a quick-disconnect electrical connector on the power supply, providing an easy power connection.

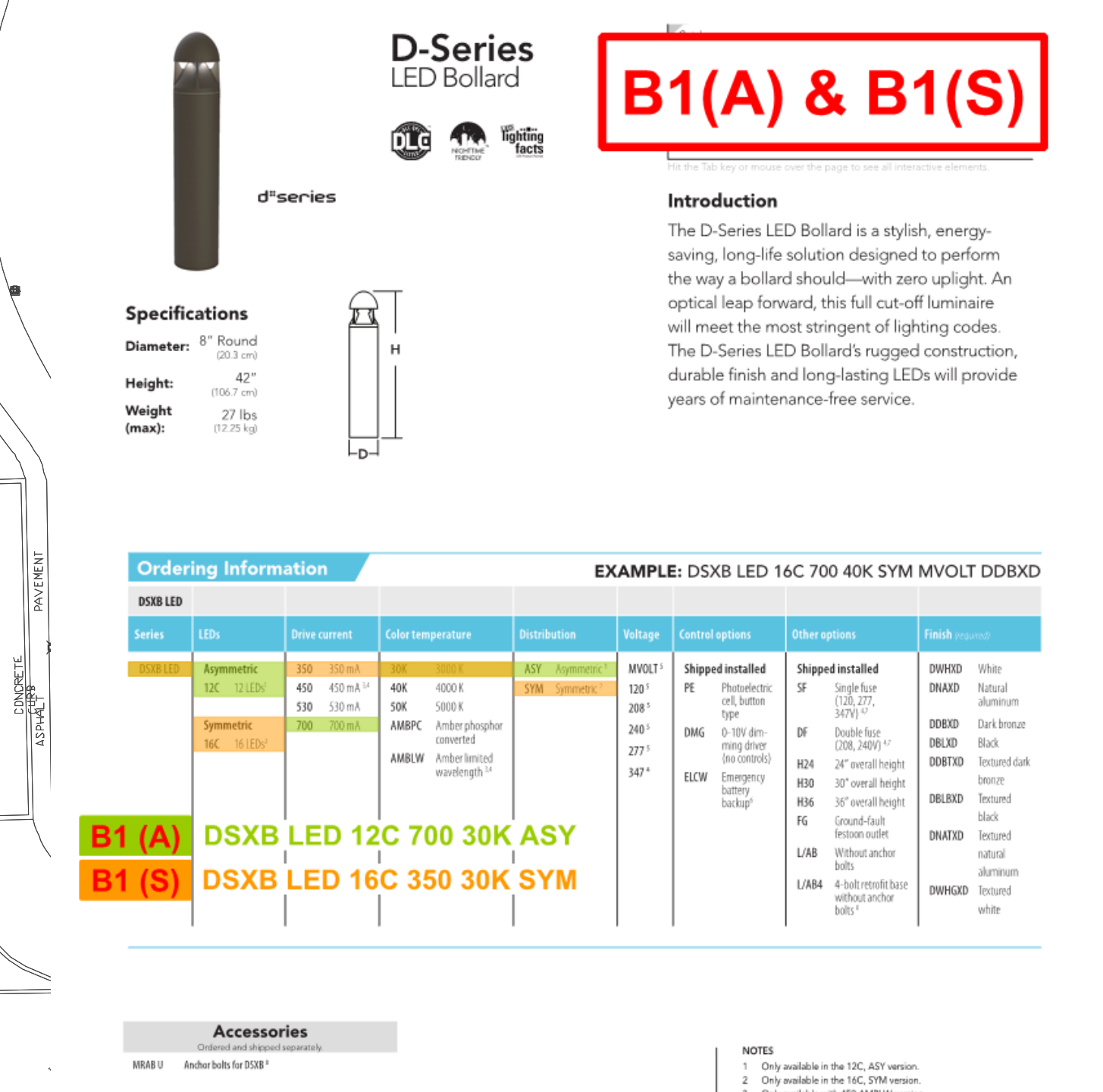
LIGHT SOURCES

- The luminaire shall use high output, high brightness LEDs.
- The LEDs shall be mounted in arrays, on printed circuit boards designed to maximize heat transfer to the heat sink surface.
- The LED arrays shall be mounted to minimize up-light.
- The LEDs shall be attached to the printed circuit board with not less than 90% pure silver to insure optimal electrical and thermal conductivity.
- The LEDs and printed circuit boards shall be protected from moisture and corrosion by a conformal coating of 1 to 3 mils.
- The LEDs and printed circuit board construction shall be environmentally friendly and 100% recyclable. They shall not contain lead, mercury or any other hazardous substances and shall be RoHS compliant.
- The LED life rating shall be determined in accordance with IESNA LM-80.

EPA = 377 (ft)
WEIGHT = 55 LBS

LIST NO.
1843 LED
CARSON CITY
SERIES

1-14



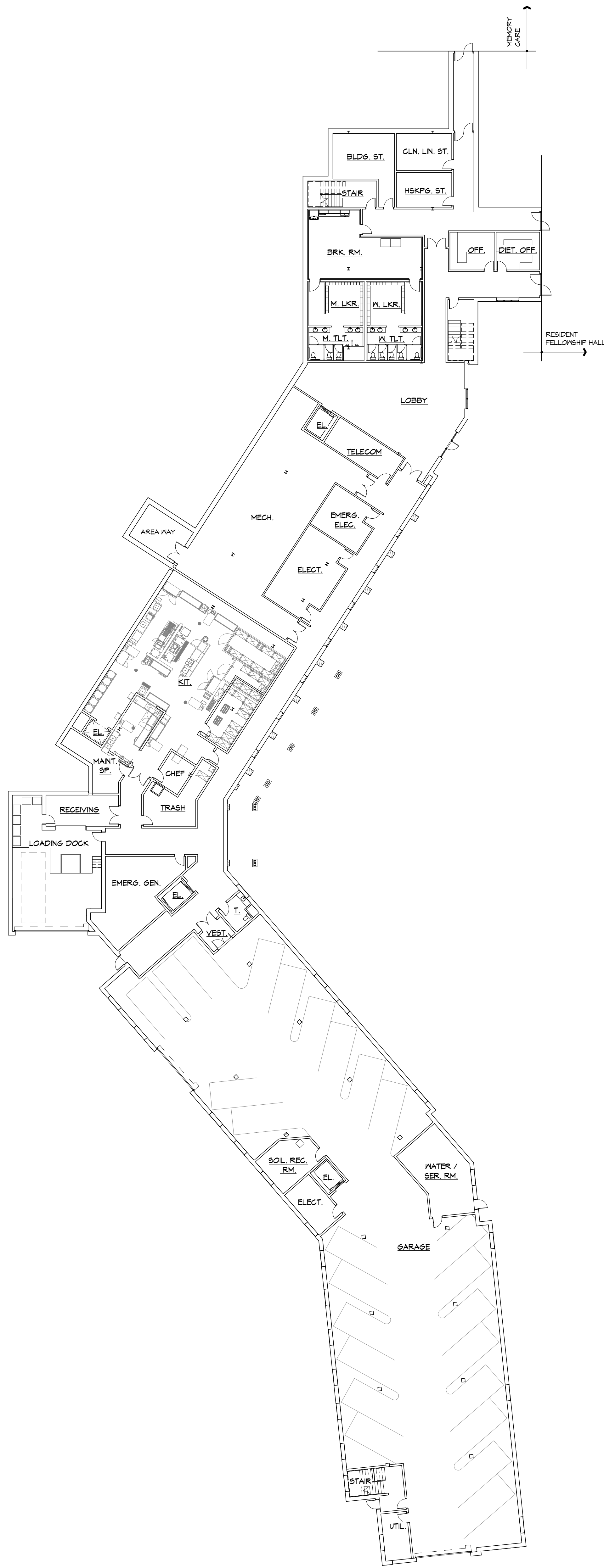
Information									
DSXB LED									
Series	LEDs	Drive current	Color temperature	Description	Package	Control options	Other options	Finish	Color
B1 (A)	Asymmetric	200 mA	5000 K	AS	1600T	Shipped installed	Shipped installed	DSXB0	White
	Standard	150 mA	5000 K	AS	1600T	PC, Photocell, 0-10V dimming, 4-wire DALI	PC, Photocell, 0-10V dimming, 4-wire DALI	DSXB0	White
B1 (S)	Asymmetric	150 mA	5000 K	AS	1600T	Shipped installed	Shipped installed	DSXB0	White
	Standard	150 mA	5000 K	AS	1600T	PC, Photocell, 0-10V dimming, 4-wire DALI	PC, Photocell, 0-10V dimming, 4-wire DALI	DSXB0	White
B1 (A)	Asymmetric	200 mA	3000 K	AS	1600T	Shipped installed	Shipped installed	DSXB0	White
	Standard	150 mA	3000 K	AS	1600T	PC, Photocell, 0-10V dimming, 4-wire DALI	PC, Photocell, 0-10V dimming, 4-wire DALI	DSXB0	White
B1 (S)	Asymmetric	150 mA	3000 K	AS	1600T	Shipped installed	Shipped installed	DSXB0	White
	Standard	150 mA	3000 K	AS	1600T	PC, Photocell, 0-10V dimming, 4-wire DALI	PC, Photocell, 0-10V dimming, 4-wire DALI	DSXB0	White

Accessories	
	
MB83 <i>Indoor high bay</i> 	• Only available in the US, ECU version. • Only available in the US, ECU version. • Only available with 1000 W/800 W output. • Not available with 150 W. • MB83-200 operates on any line voltage from 120-277V (50/60 Hz). • Supply, 0.65, 0.65, 0.65 and 0.65 watts per fixture. • Includes 24" arm, optional 48" arm, or pre-mounted 72" arm. • No ballast required. MB83-200 available with ballast. • No ballast required. MB83-200 available with ballast. • Single-bay MB83 requires 100, 277, or 480 volt system. Double-bay MB83 requires 277 or 480-volt system. • MB83 is not available with LEDB system.
	
One Lithonia Way • Conyers, Georgia 30012 • Phone 800.978.8051 • Fax 770.918.0001 • www.lithonia.com	

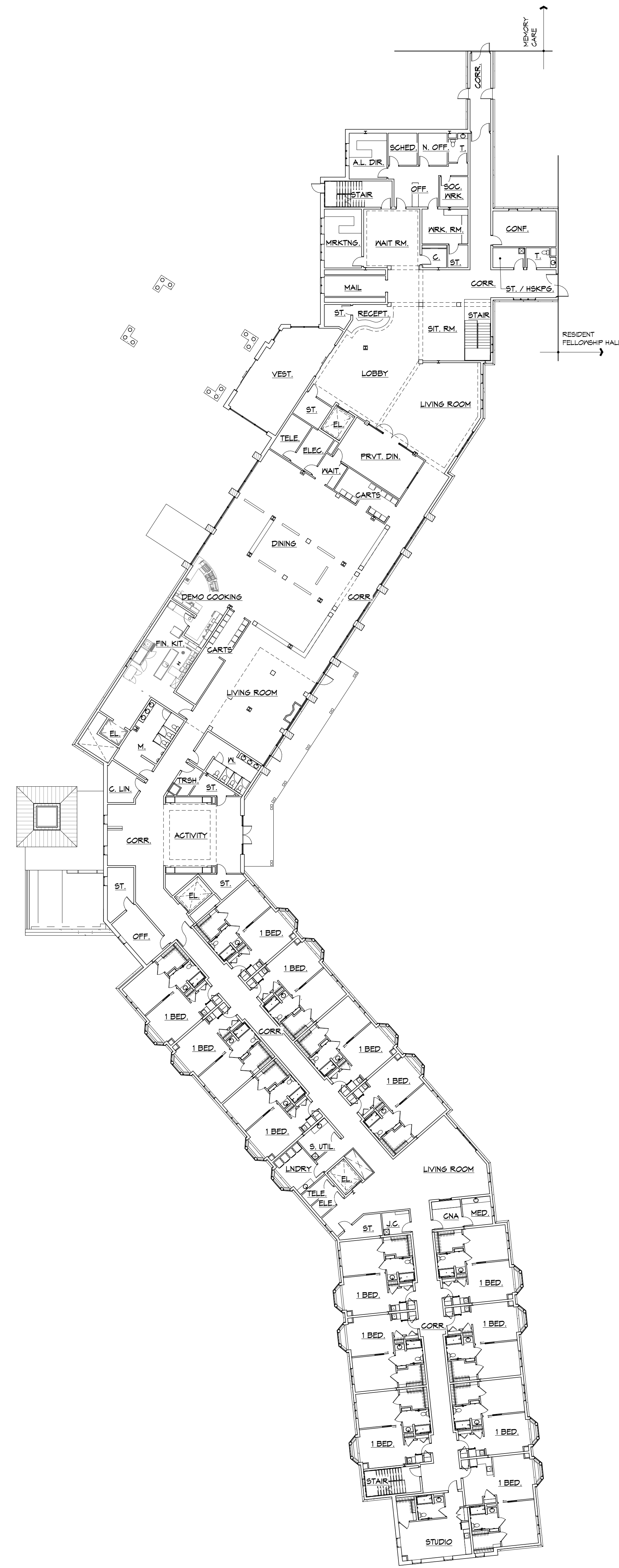


ASSISTED LIVING ENTRY

VOLUME II ASSISTED LIVING DRAWING NO.: 0209N		RENDERING		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: J.S.D. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.				 rlps architects [®] architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION						THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
--	--	-----------	--	-----------	--	--	--	--	--	---	--	--------------------------------------	--	--	--	--	--	--	--



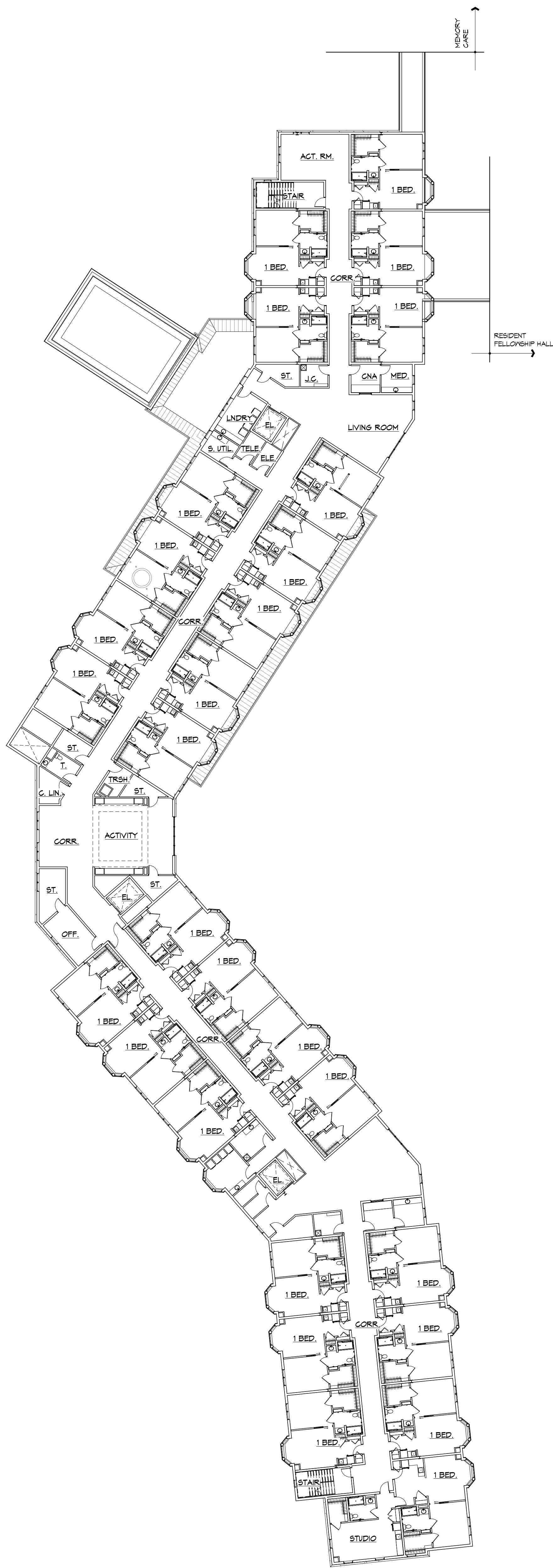
① OVERALL GROUND FLOOR PLAN
1" = 20'-0"
TOTAL AREA: 30,170



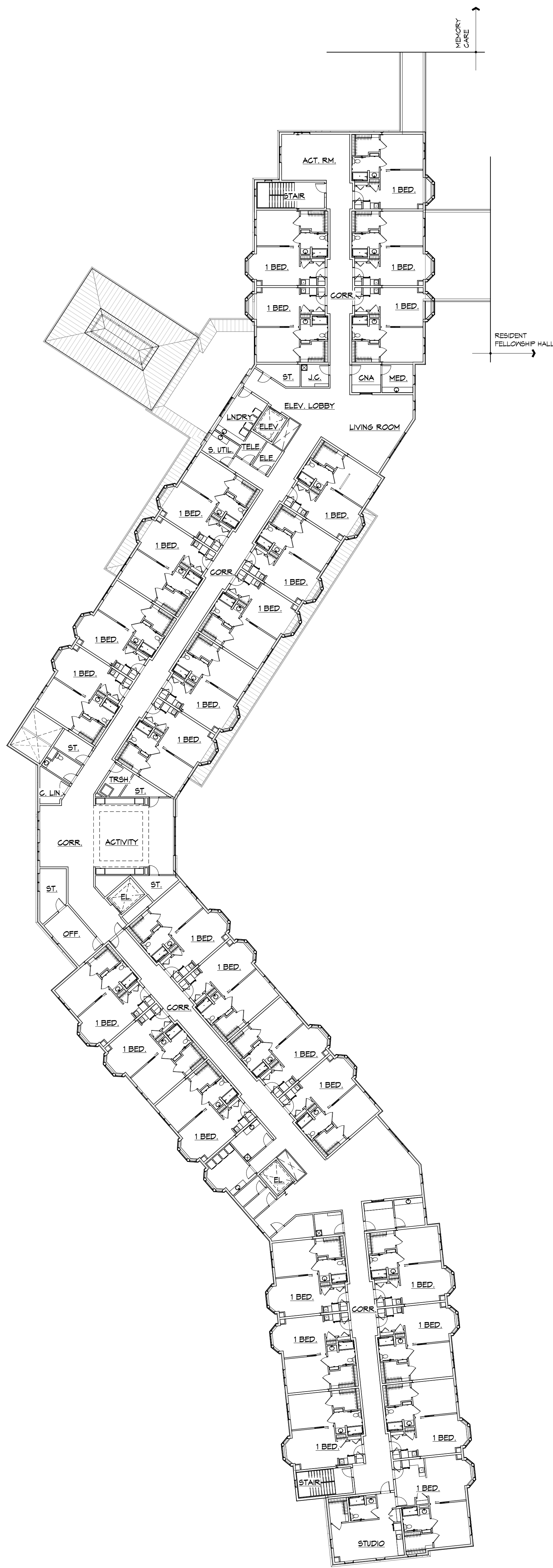
② OVERALL FIRST FLOOR PLAN
1" = 20'-0"
TOTAL AREA: 31,075

VOLUME II: ASSISTED LIVING DRAWING NO: A002 COMMISSION NO: 2014104	OVERALL GROUND & FIRST FLOOR PLANS		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005		 rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION			THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT.	CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
	SCALE: 2014/104	AS NOTED	DATE: 06/26/2015	NO. DATE DESCRIPTION	DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.							

1 OVERALL SECOND FLOOR PLAN
1" = 20'-0"
TOTAL AREA: 23,735



2 OVERALL THIRD FLOOR PLAN
1" = 20'-0"
TOTAL AREA: 23,735



VOLUME II ASSISTED LIVING DRAWING NO: A003 COMMISSION NO: 2014104	OVERALL SECOND & THIRD FLOOR PLANS		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION	THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP.	CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
	SCALE: AS NOTED DATE: 06/26/2015									



1 PARTIAL FIRST FLOOR PLAN - AREA 'A'
1/8" = 1'-0"



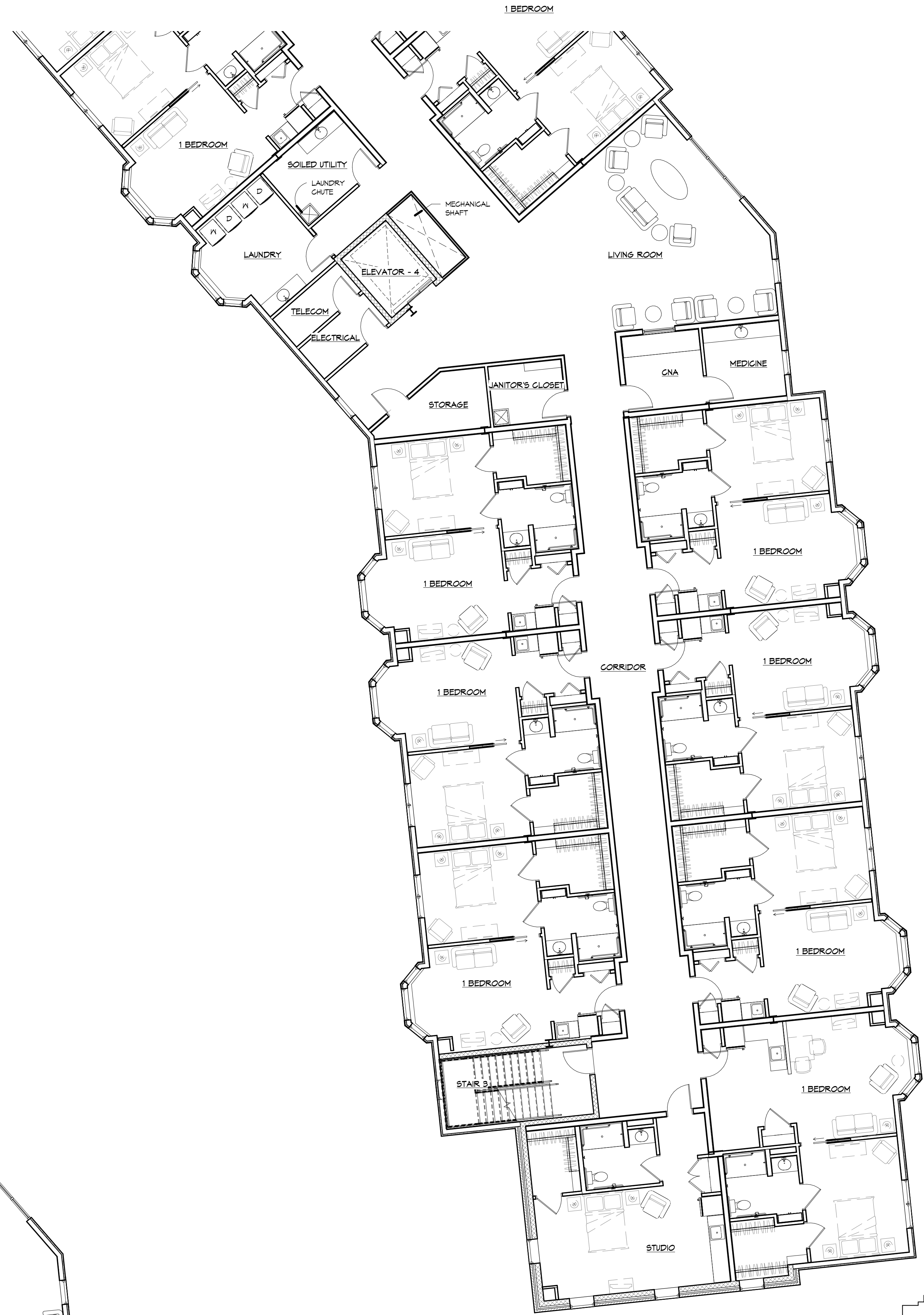
2 PARTIAL FIRST FLOOR PLAN - AREA 'B'
1/8" = 1'-0"



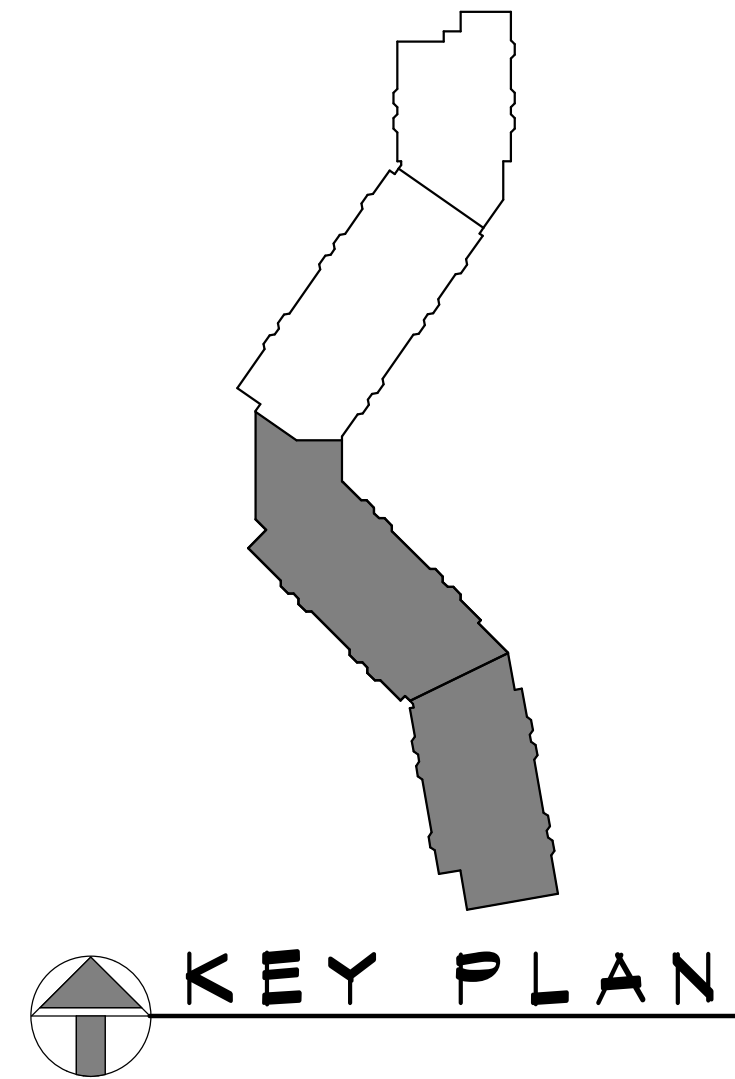
VOLUME II ASSISTING DRAWING NO: A103		PARTIAL FIRST FLOOR PLAN - AREAS 'A' & 'B' SCALE: AS NOTED DATE: 06/26/2015		REVISIONS <table><thead><tr><th>NO.</th><th>DATE</th><th>DESCRIPTION</th></tr></thead><tbody><tr><td> </td><td> </td><td> </td></tr></tbody></table>			NO.	DATE	DESCRIPTION				RENOVATIONS & ADDITIONS TO: THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. CHECKED BY: J.F.H. APPROVED BY: C.P.K.			 rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
NO.	DATE	DESCRIPTION																			
COMMISSION NO: 2014104																					



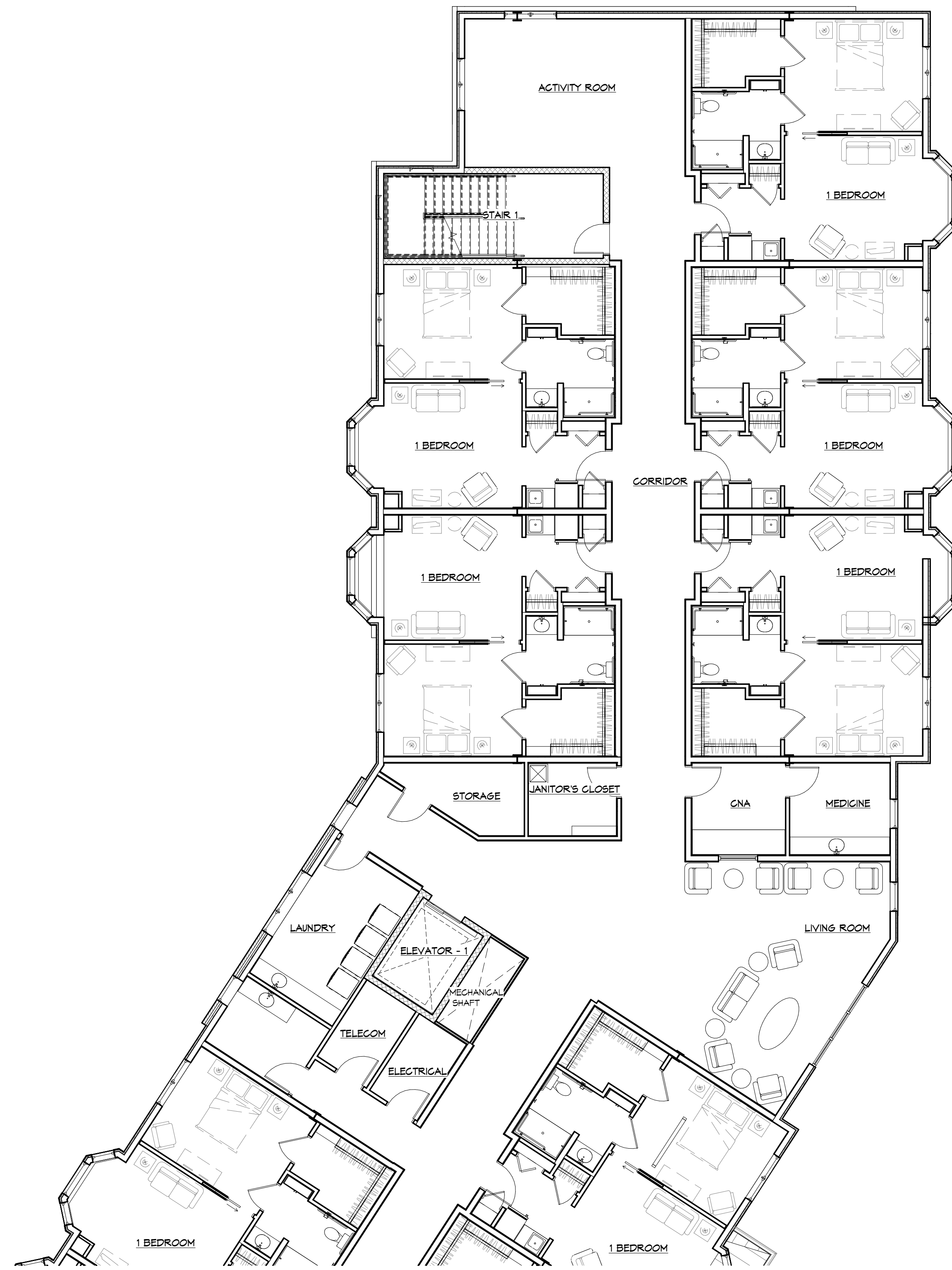
1 PARTIAL FIRST FLOOR PLAN - AREA 'C'
1/8" = 1'-0"



2 PARTIAL FIRST FLOOR PLAN - AREA 'D'
1/8" = 1'-0"



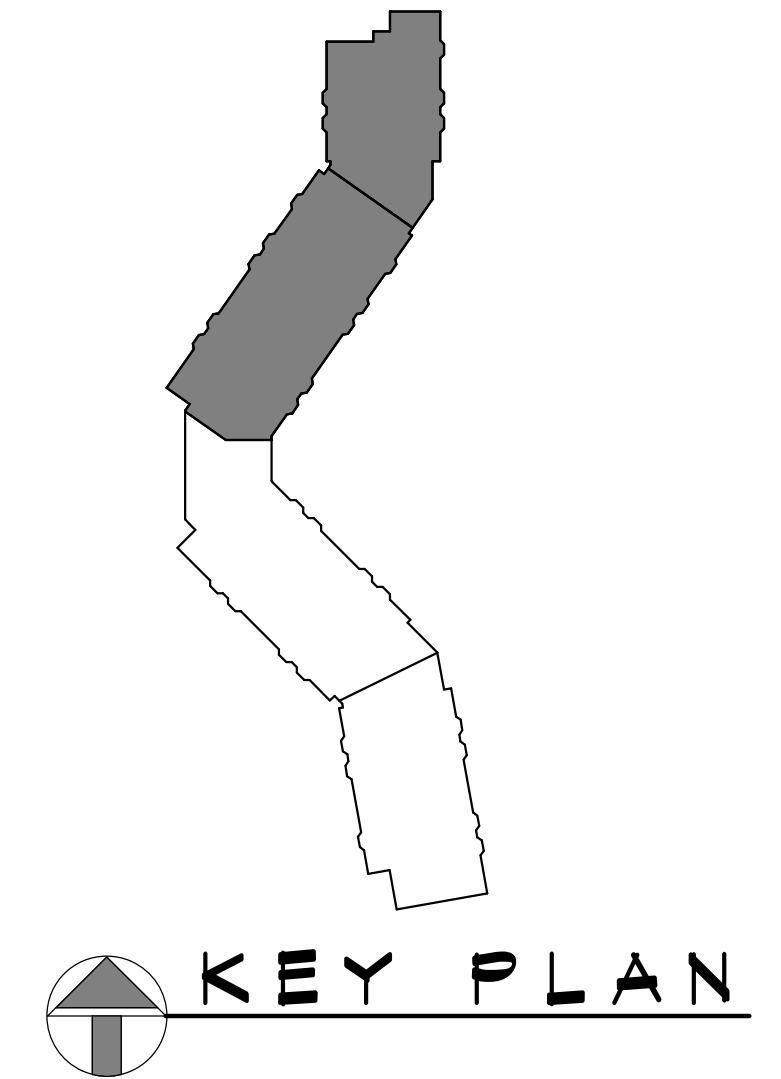
VOLUME II ASSISTED LIVING DRAWING NO: A104 COMMISSION NO: 2014104		PARTIAL FIRST FLOOR PLAN - AREAS 'C' & 'D'		SCALE: AS NOTED	DATE: 06/26/2015	REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: C.S.L. COORDINATED BY: J.F.H. CHECKED BY: J.F.H. APPROVED BY: C.J.K.		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION					
																THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	



1 PARTIAL SECOND FLOOR PLAN - AREA 'A'
1/8" = 1'-0"



2 PARTIAL SECOND FLOOR PLAN - AREA 'B'
1/8" = 1'-0"



THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

PLANNING
COMMISSION
SUBMISSION

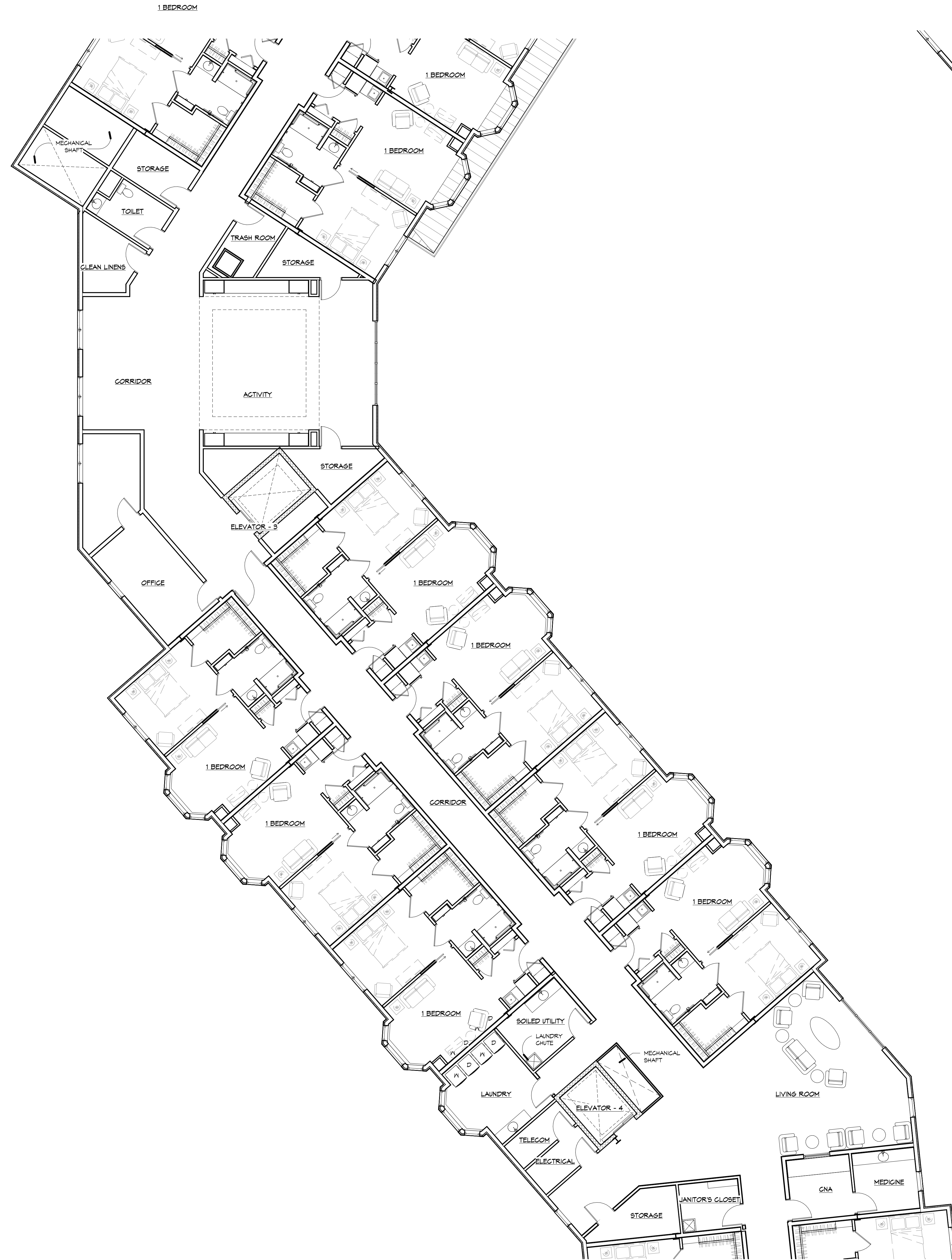
rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

RENOVATIONS & ADDITIONS TO:
THE MOORINGS OF ARLINGTON HEIGHTS
FOR
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.H.H. APPROVED BY: C.P.K.

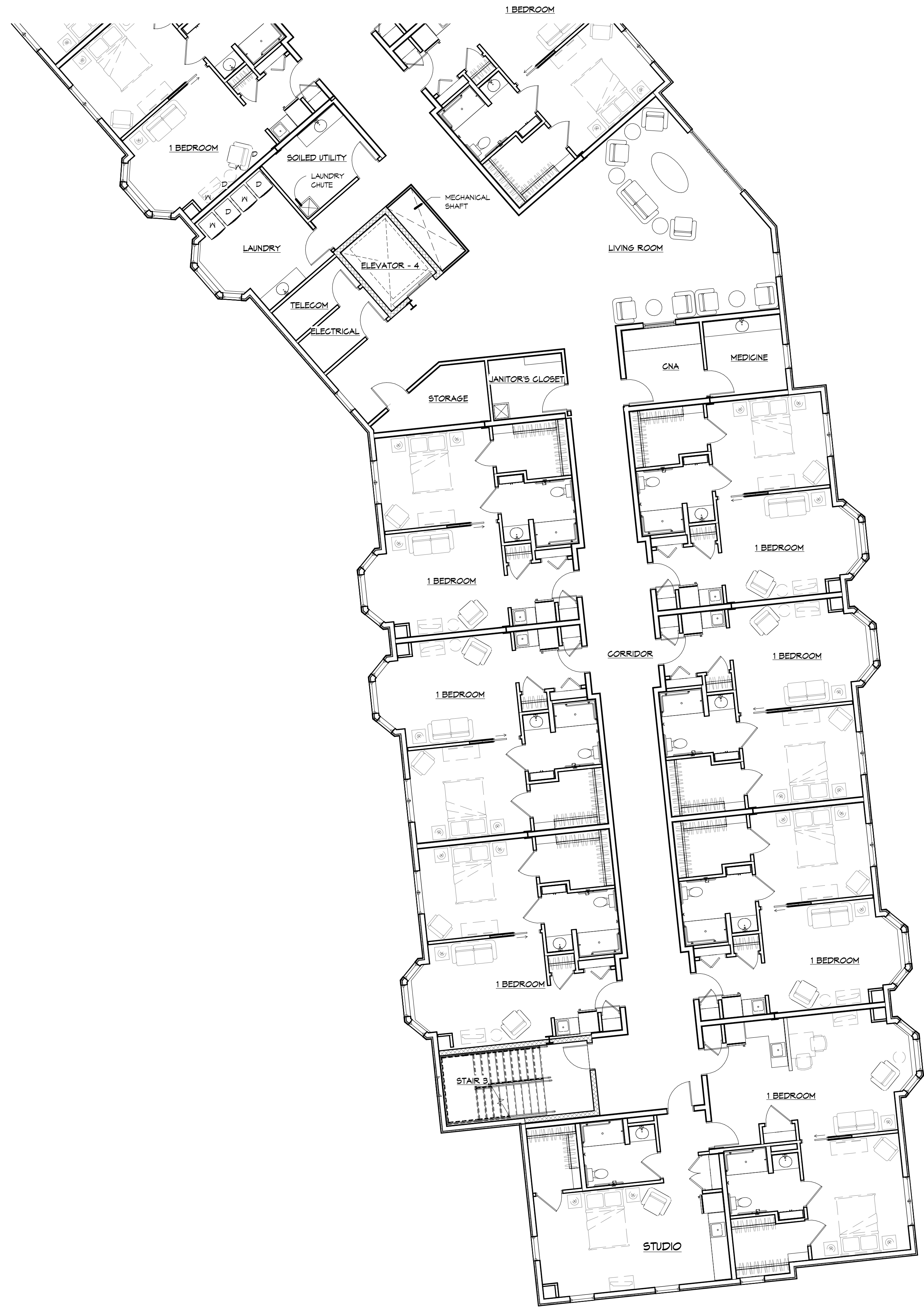
R E V I S I O N S	
NO.	DATE DESCRIPTION

PARTIAL SECOND FLOOR
PLAN - AREAS 'A' & 'B'
DATE: 06/26/2015
SCALE: AS NOTED

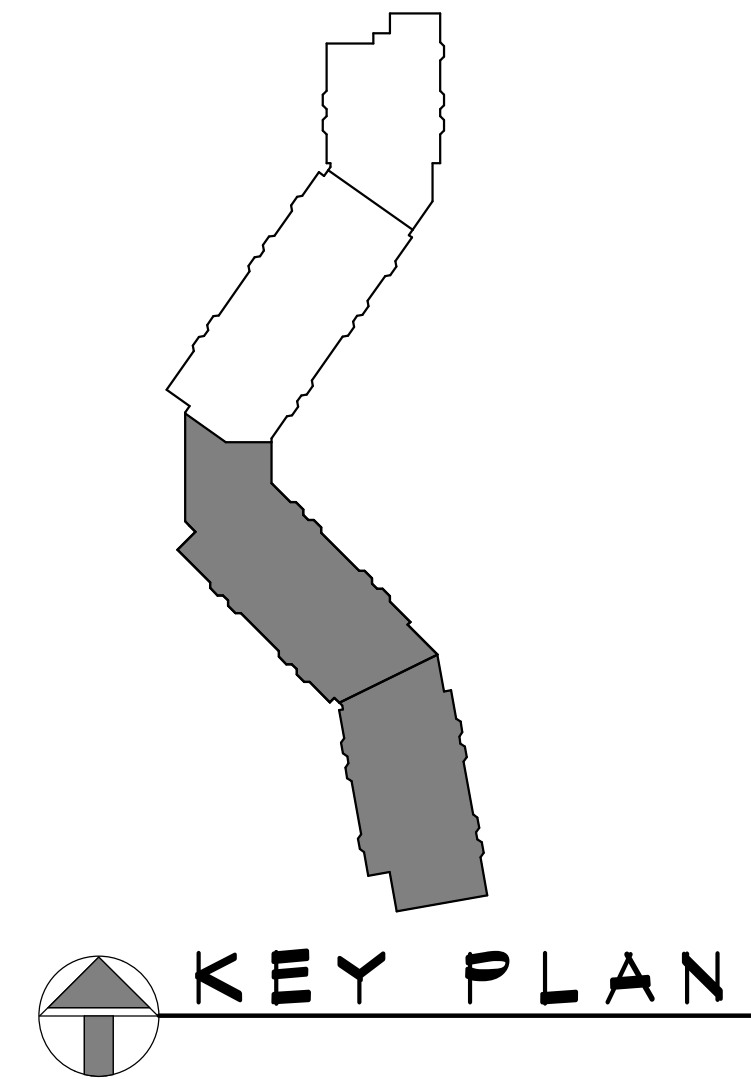
VOLUME II
ASSISTED LIVING
DRAWING NO:
A105
COMMISSION NO:
2014104



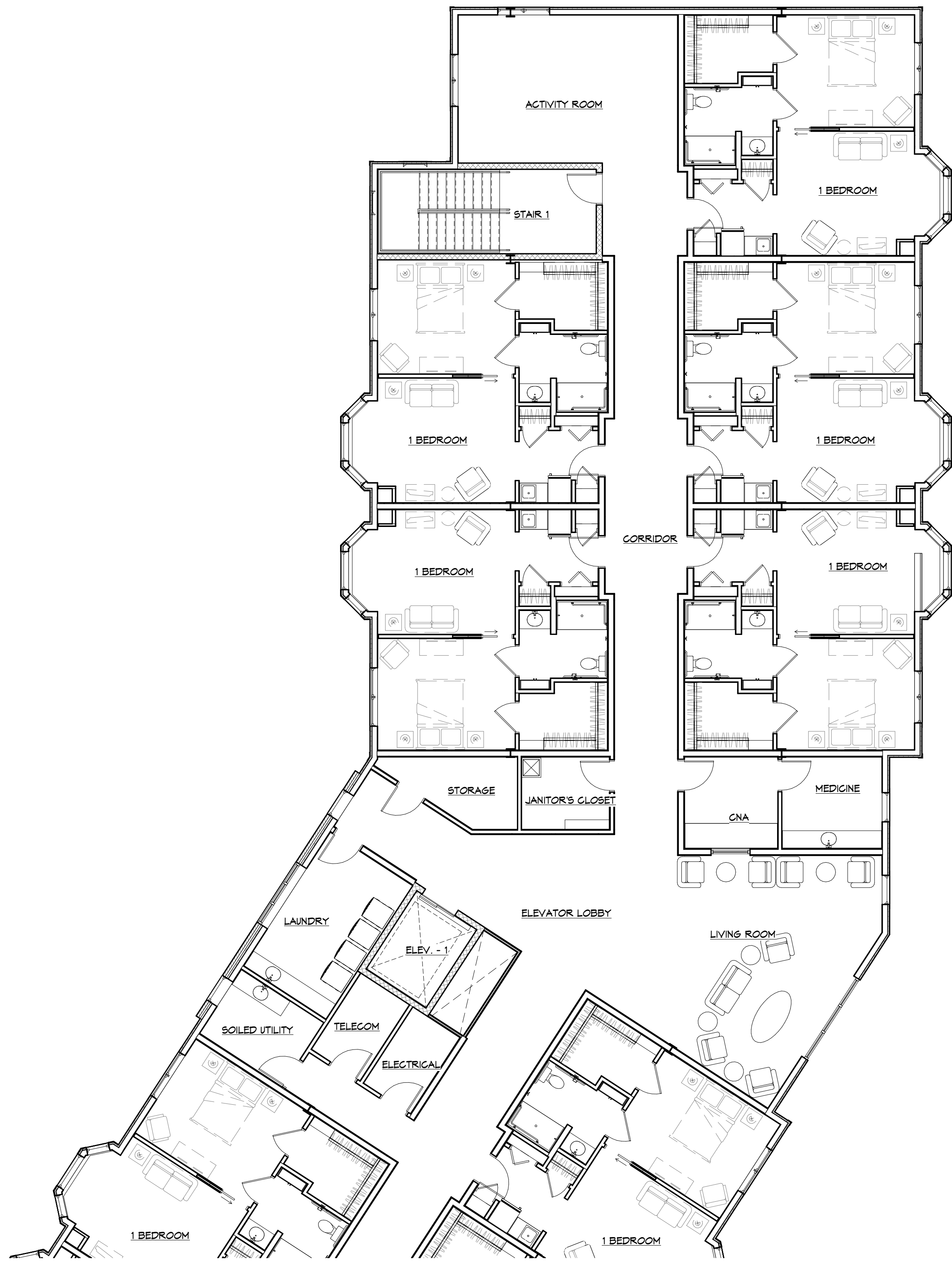
1 PARTIAL SECOND FLOOR PLAN - AREA 'C'
1/8" = 1'-0"



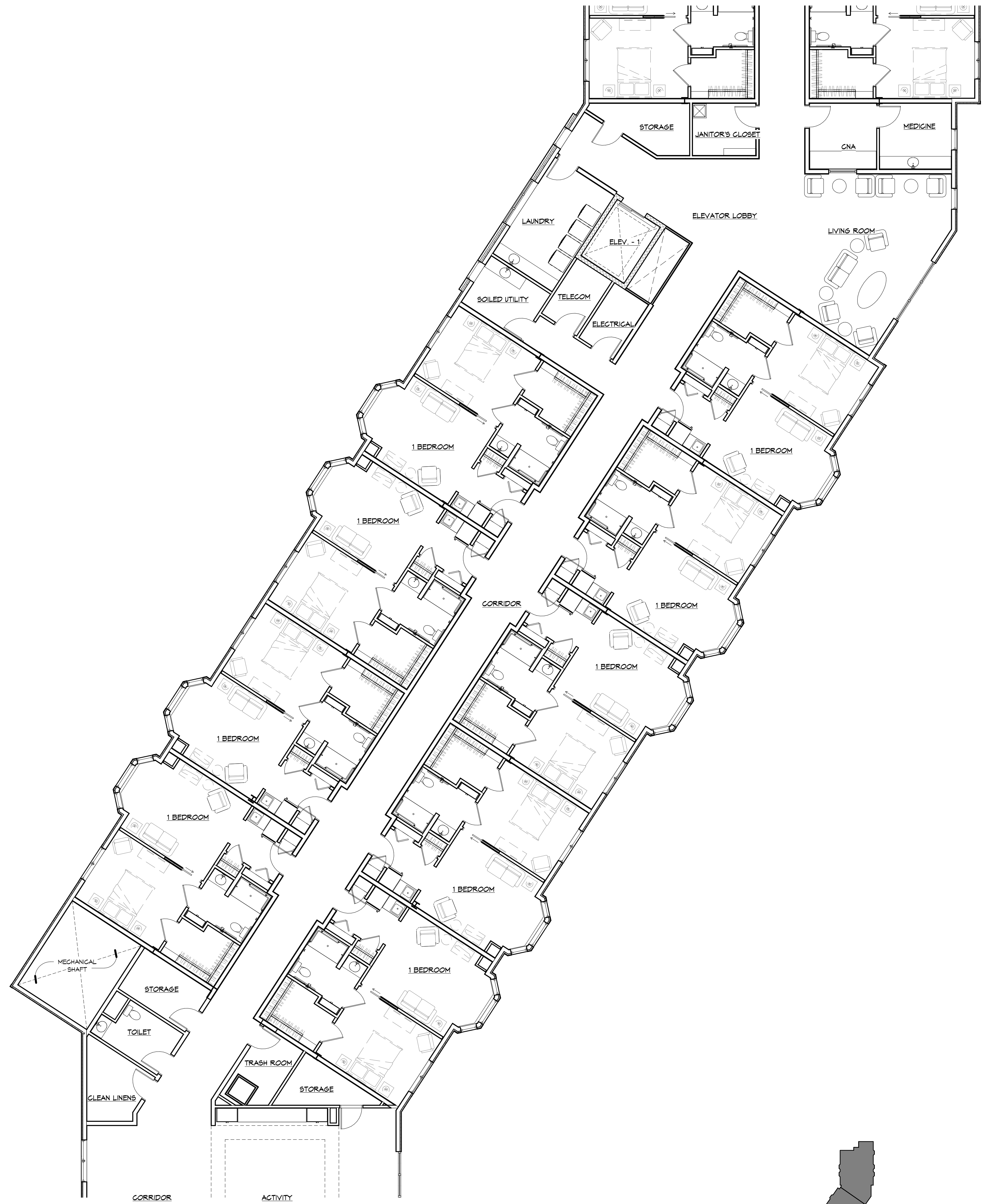
2 PARTIAL SECOND FLOOR PLAN - AREA 'D'
1/8" = 1'-0"



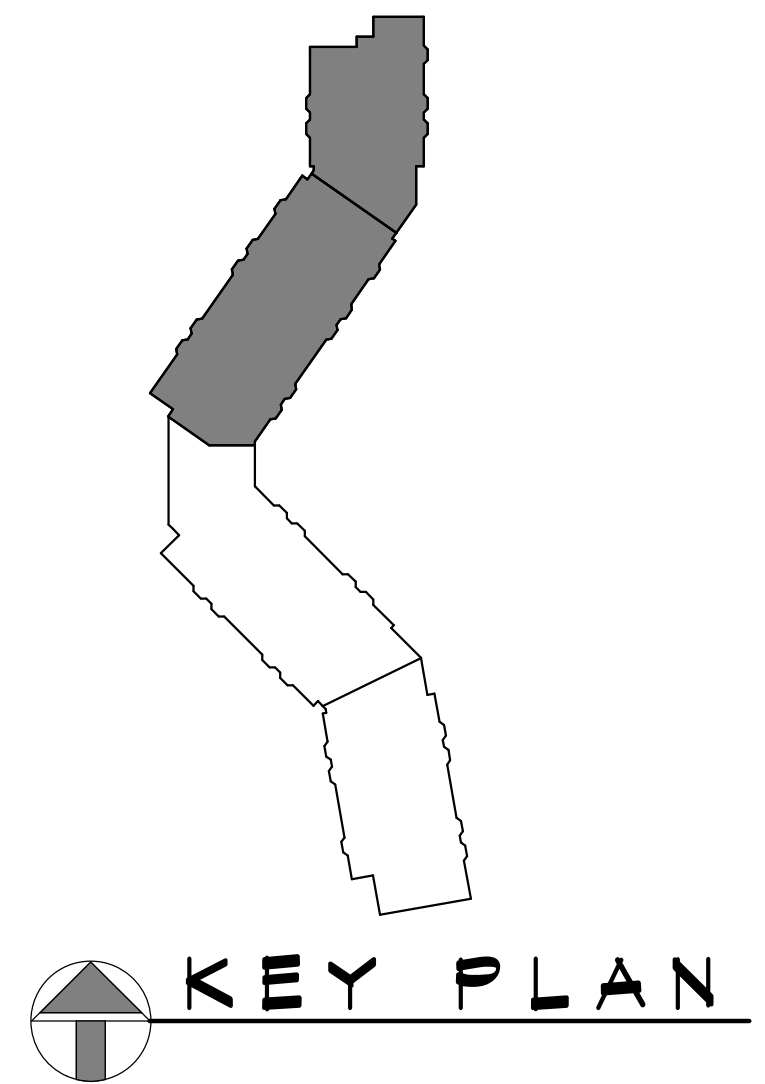
PARTIAL SECOND FLOOR PLAN - AREAS 'C' & 'D'		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: SJM COORDINATED BY: CS.L CHECKED BY: JFH APPROVED BY: CJK		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION	
ANSWERED LIVING DRAWING NO: A106		DATE: 06/26/2015		SCALE: AS NOTED		COMMISSION NO: 2014104		CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK	

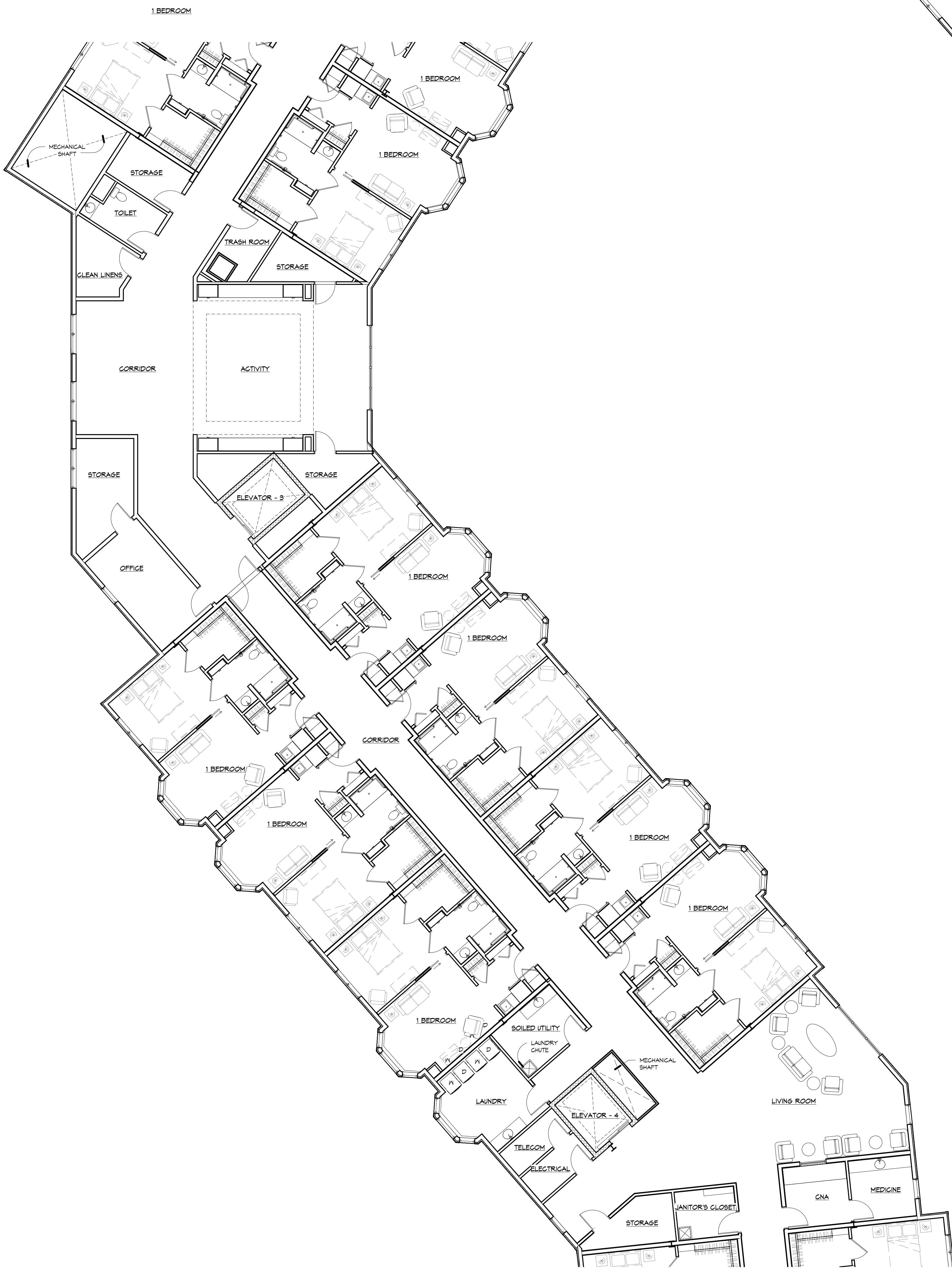


1 PARTIAL THIRD FLOOR PLAN - AREA 'A'
1/8" = 1'-0"

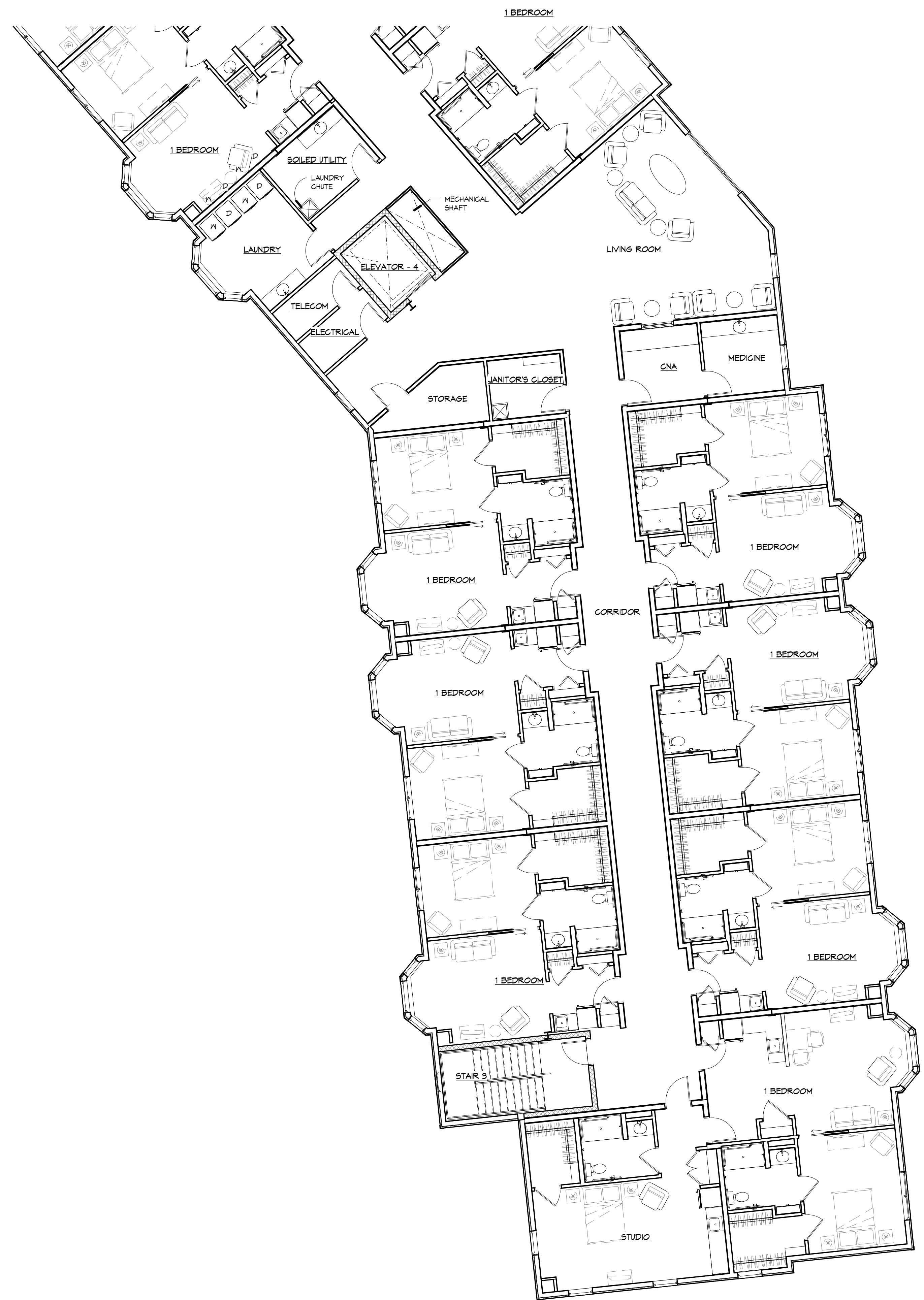


2 PARTIAL THIRD FLOOR PLAN - AREA 'B'
1/8" = 1'-0"

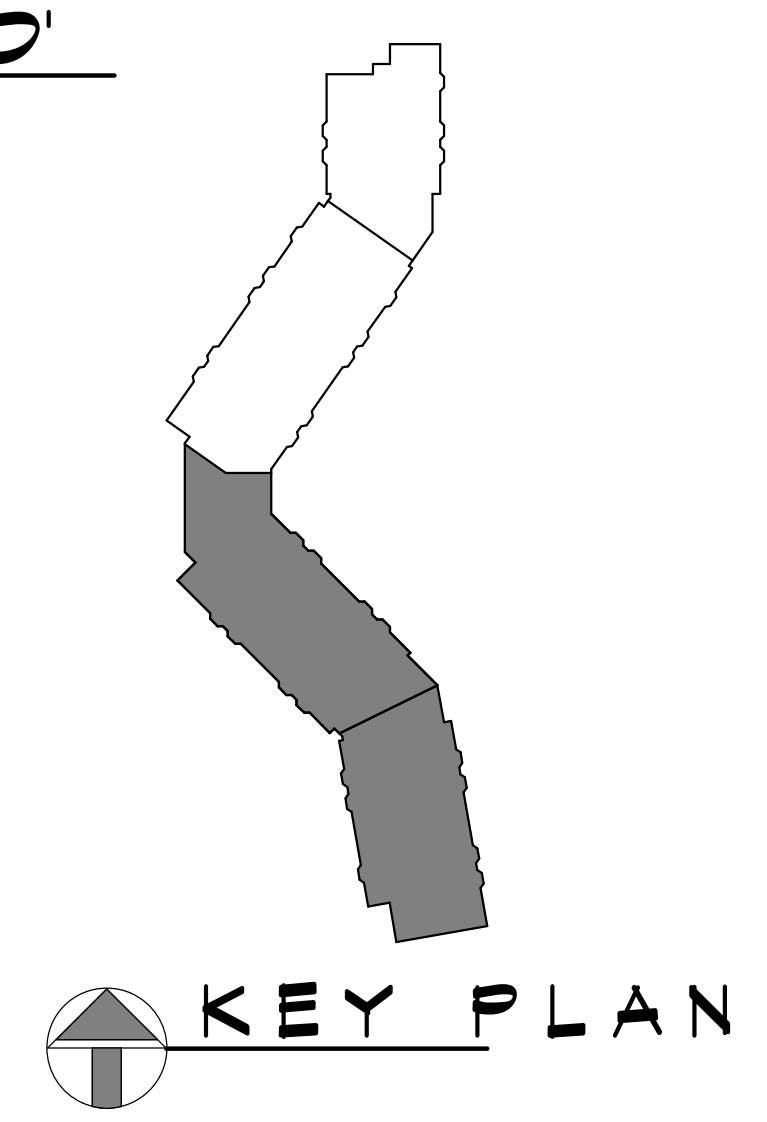




1 PARTIAL THIRD FLOOR PLAN - AREA 'C'
1/8" = 1'-0"



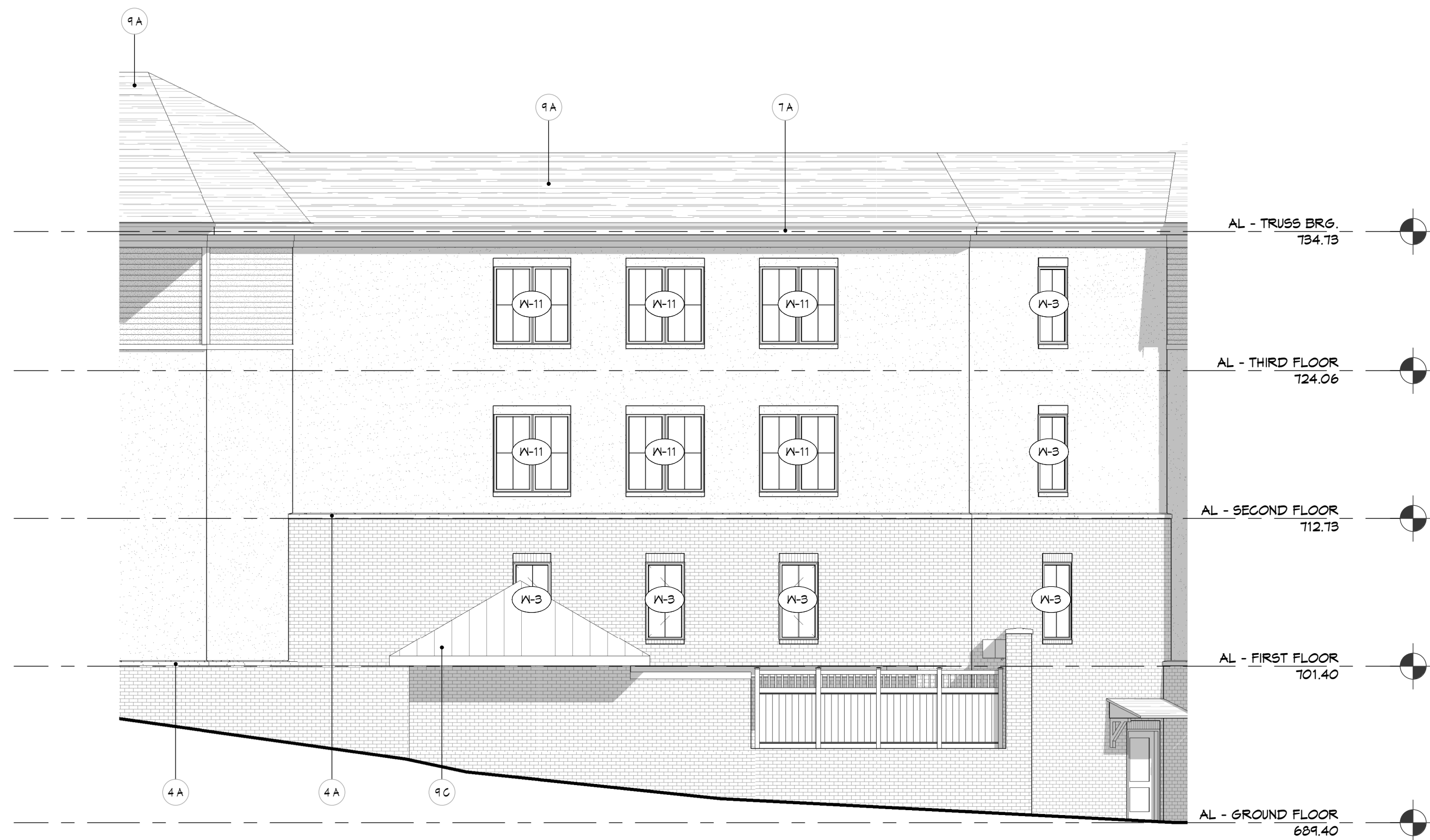
2 PARTIAL THIRD FLOOR PLAN - AREA 'D'
1/8" = 1'-0"



VOLUME II ASSISTED LIVING DRAWING NO: A108 COMMISSION NO: 2014104		PARTIAL THIRD FLOOR PLAN - AREAS 'C' & 'D'		SCALE: AS NOTED		DATE: 06/26/2015	
REVISIONS							
NO.		DATE		DESCRIPTION			
THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.							
 rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP							
PLANNING COMMISSION SUBMISSION							
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT.							
CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.							



A WEST ELEVATION
1/8" = 1'-0"



B WEST ELEVATION
1/8" = 1'-0"

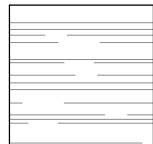
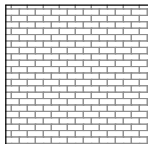
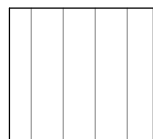
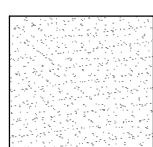


C WEST ELEVATION
1/8" = 1'-0"

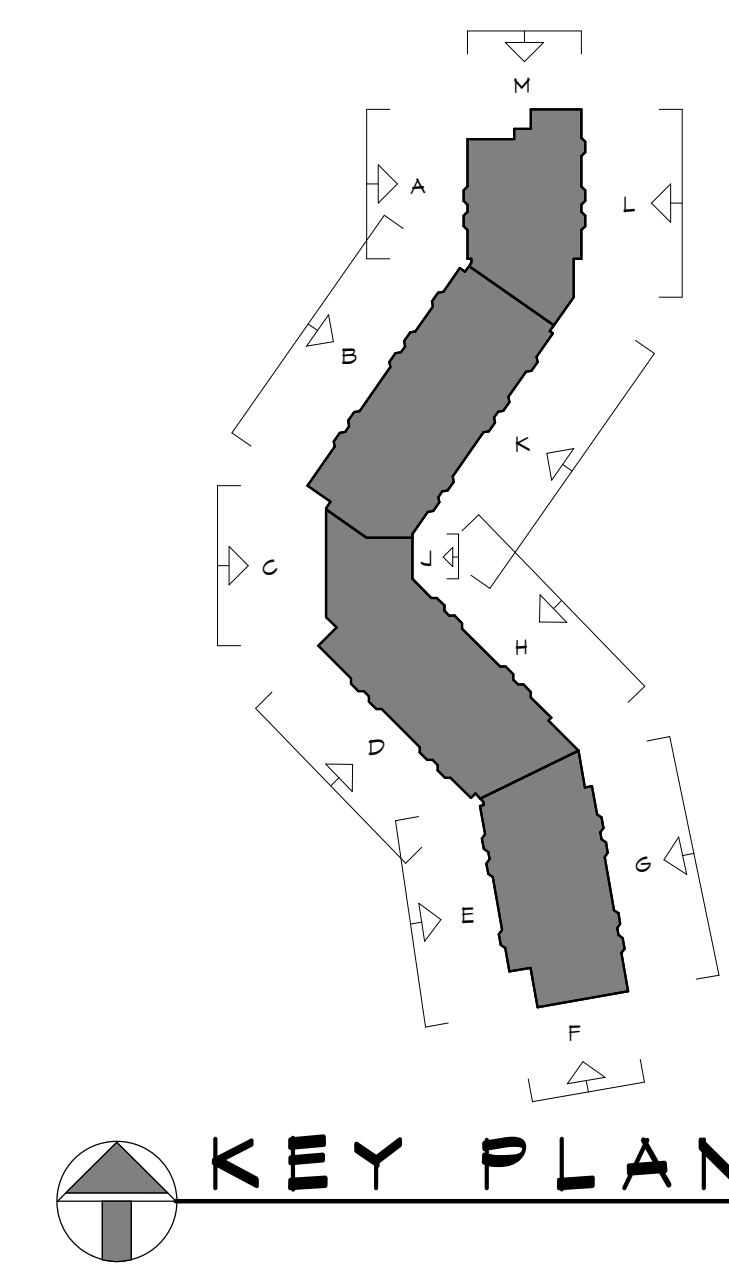


D WEST ELEVATION
1/8" = 1'-0"

E WEST ELEVATION
1/8" = 1'-0"

EXTERIOR MATERIAL LEGEND					
	ASPHALT SHINGLES		BRICK TYPE - 1: STANDARD FACE BRICK		FIBER CEMENT PANELS
	STANDING SEAM ROOF		FIBER CEMENT SIDING - 1: 6\"/>		
	EXTERIOR INSULATION FINISH SYSTEM		FIBER CEMENT SIDING - 2: 6\"/>		

EXTERIOR ELEVATION KEYED NOTES	
— 3B —	STANDARD BRICK VENEER
— 4A —	CAST STONE WATER TABLE
— 1A —	ALUMINUM FASCIA
— 3B —	ALUMINUM STOREFRONT SYSTEM
— 9A —	ASPHALT SHINGLES
— 1B —	RIDGE VENT
— 1C —	STANDING SEAM METAL ROOF



THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF **rlps architects®** AND IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE NAME OF THE ARCHITECT.

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

PLANNING COMMISSION SUBMISSION

rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPs, LLP

RENOVATIONS & ADDITIONS TO:
THE MOORINGS OF ARLINGTON HEIGHTS
FOR
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: SJM CHECKED BY: J.E.H. APPROVED BY: C.P.K.
COORDINATED BY: C.S.L.

REVISIONS	
NO.	DESCRIPTION

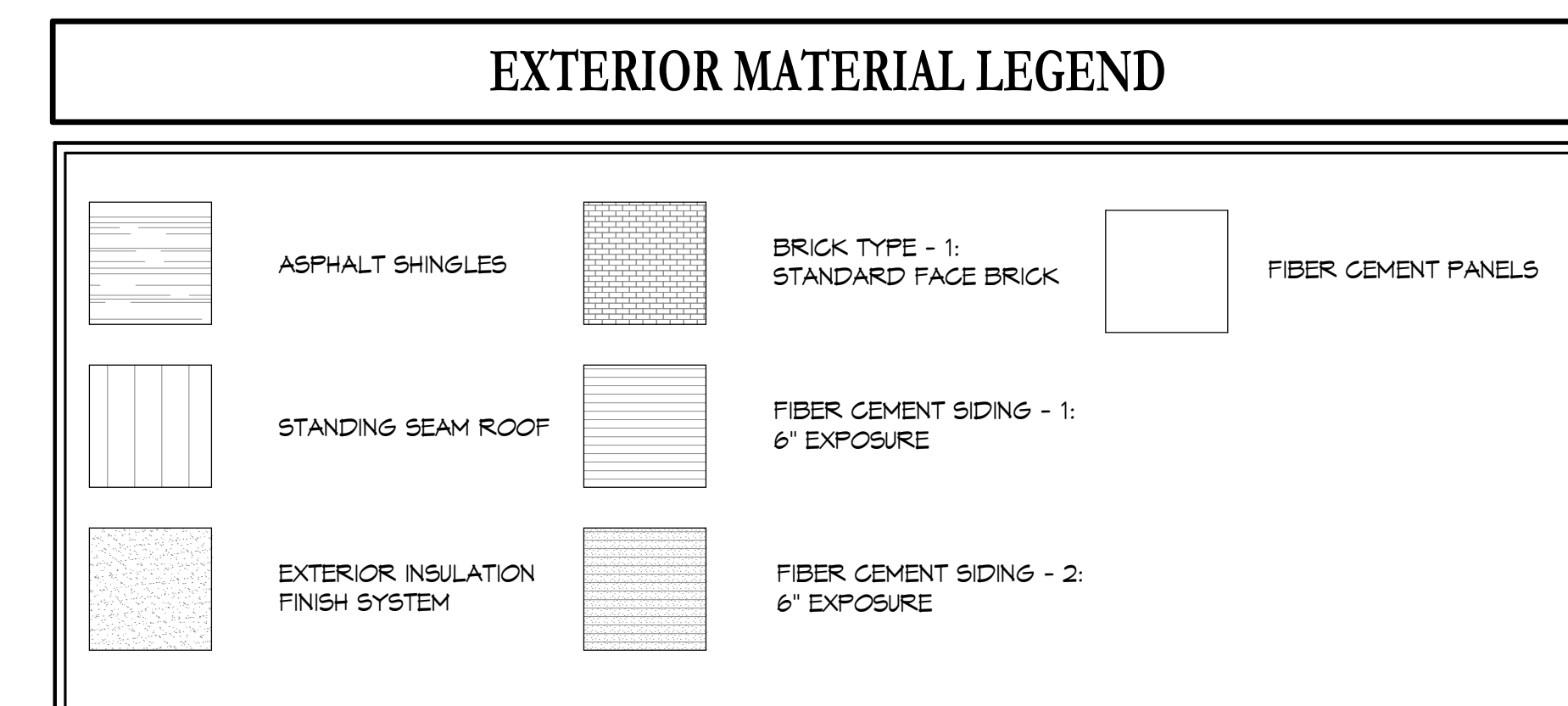
EXTERIOR ELEVATIONS	
VOLUME II ASSISTED LIVING DRAWING NO: A201	DATE: 06/26/2015 SCALE: AS NOTED
COMMISSION NO: 2014104	



EAST ELEVATION
1/8" = 1'-0"

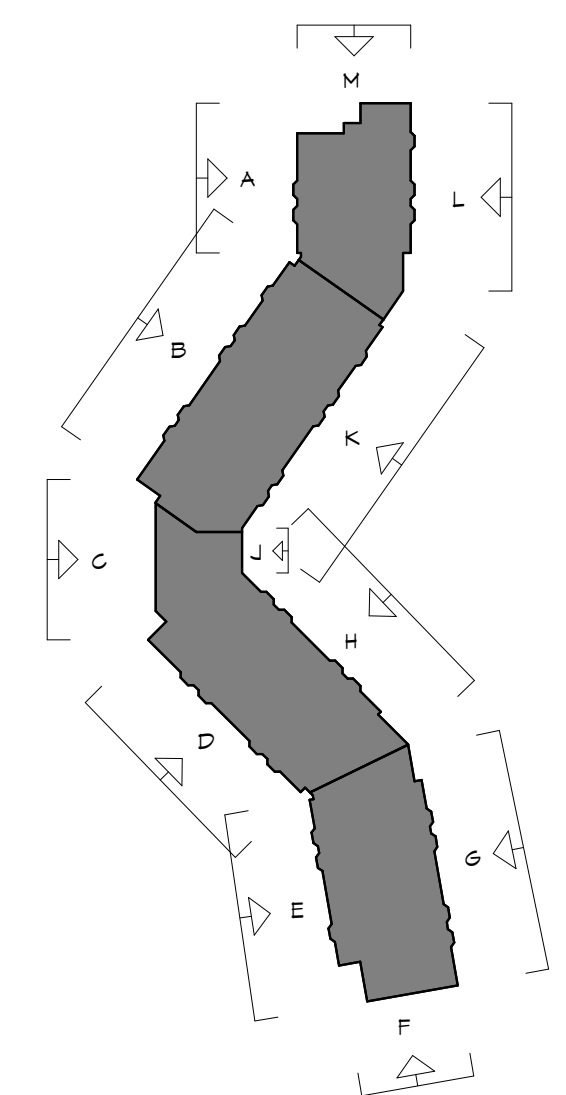


K EAST ELEVATION
1/8" = 1'-0"



EXTERIOR ELEVATION KEYED NOTES

- 3 B STANDARD BRICK VENEER
- 4 A CAST STONE WATER TABLE
- 7 A ALUMINUM FASCIA
- 8 B ALUMINUM STOREFRONT SYSTEM
- 9 A ASPHALT SHINGLES
- 9 B RIDGE VENT
- 9 C STANDING SEAM METAL ROOF



KEY PLAN

THIS DRAWING AS AN INSTRUMENT OF SERVICE, IS THE PROPERTY OF THE ARCHITECT, AND MAY NOT BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS THE REPRODUCTION CARRIES THE NAME OF THE ARCHITECT

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK

PLANNING COMMISSION SUBMISSION

rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

RENOVATIONS & ADDITIONS TO:

THE MOORINGS OF ARLINGTON HEIGHTS

FOR

PRESBYTERIAN HOMES

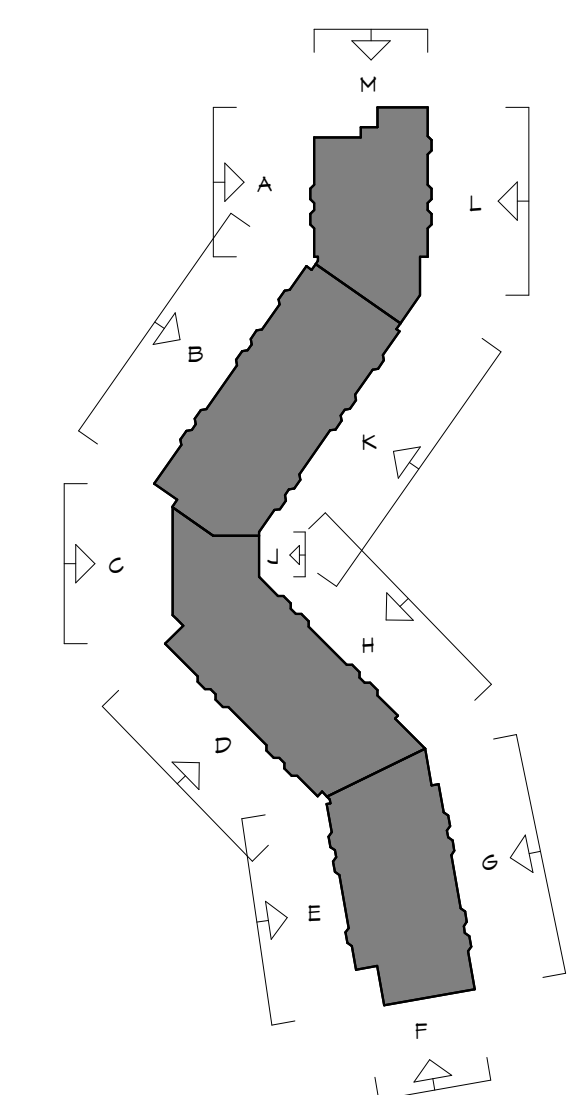
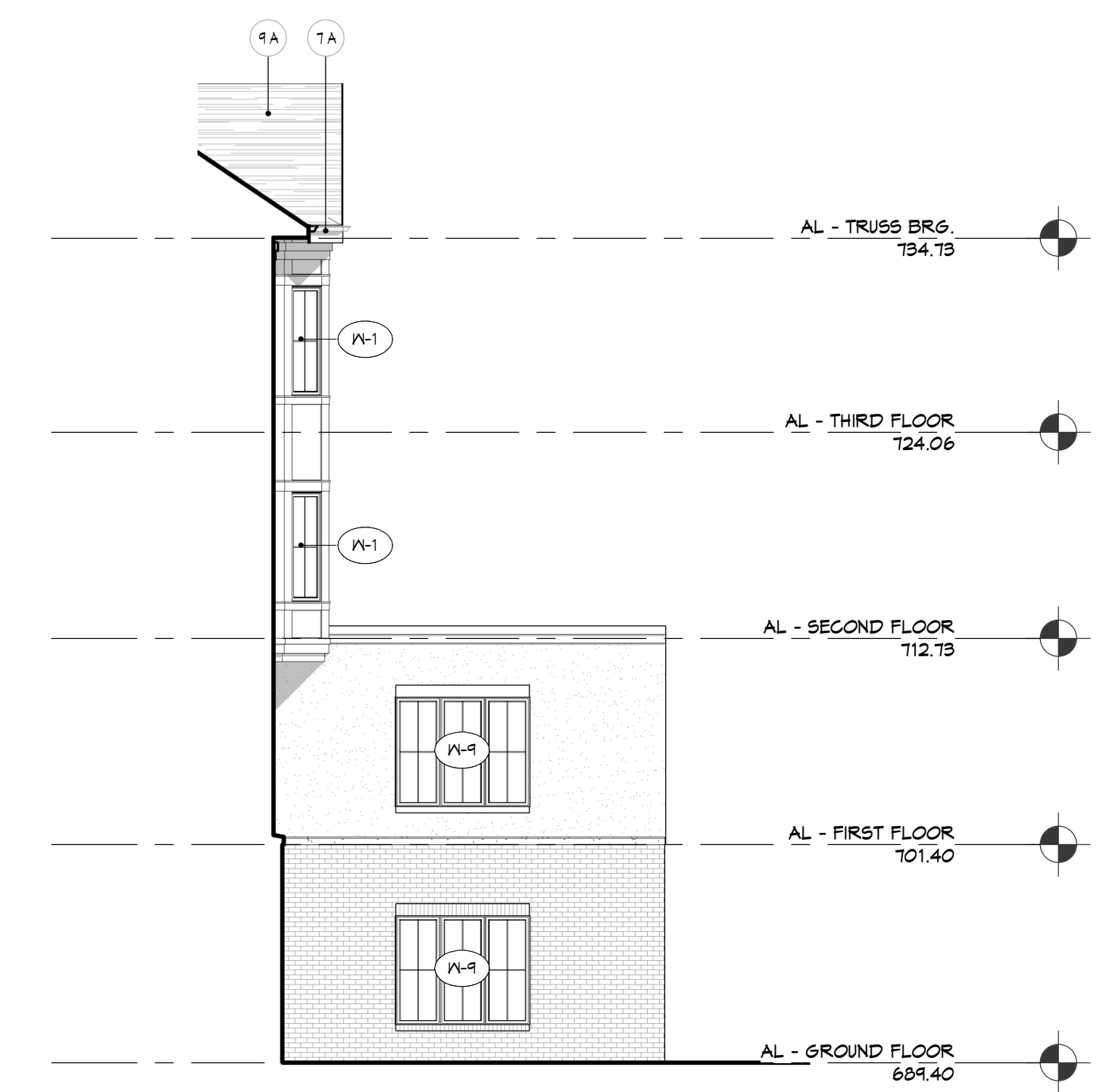
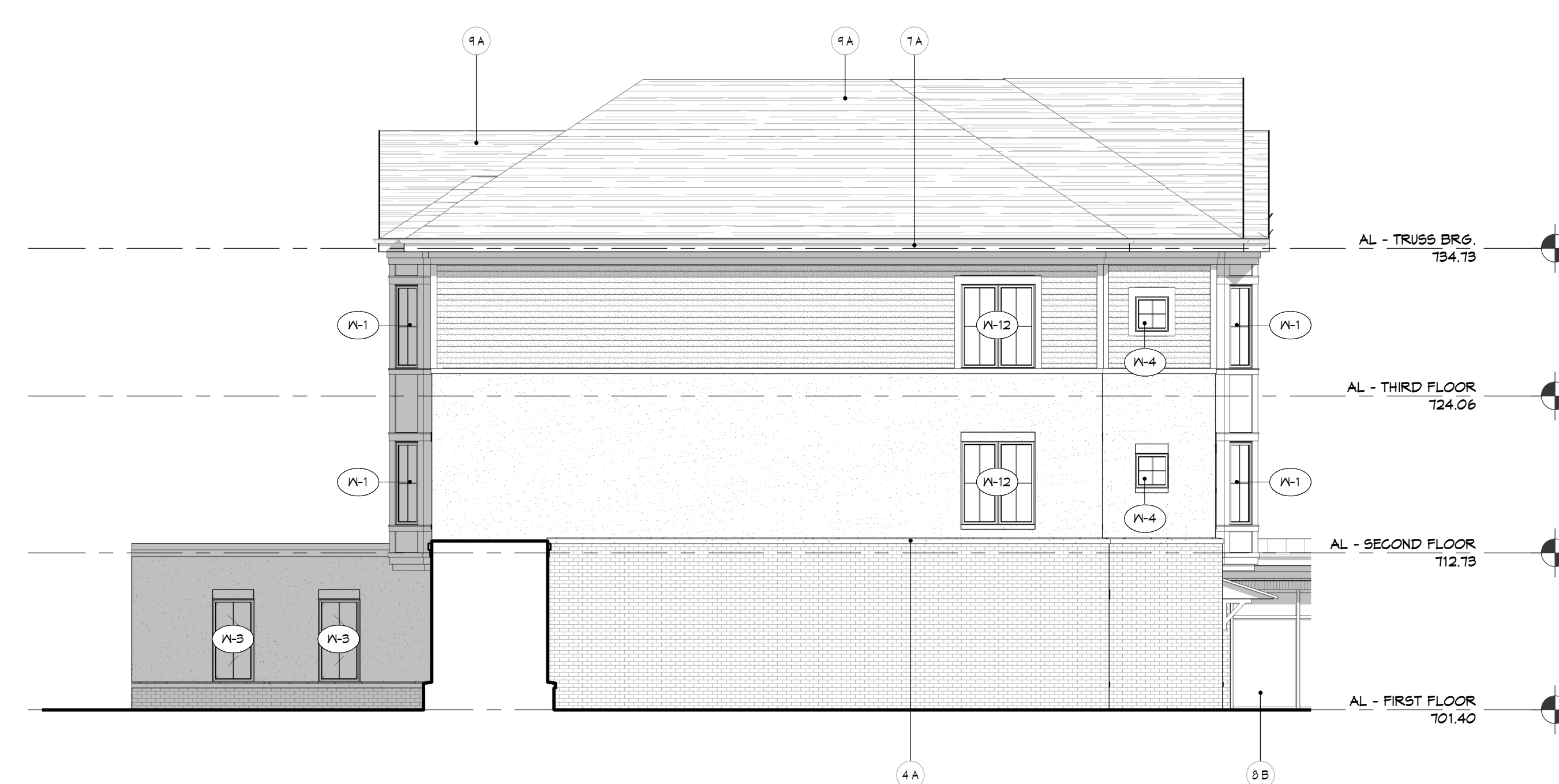
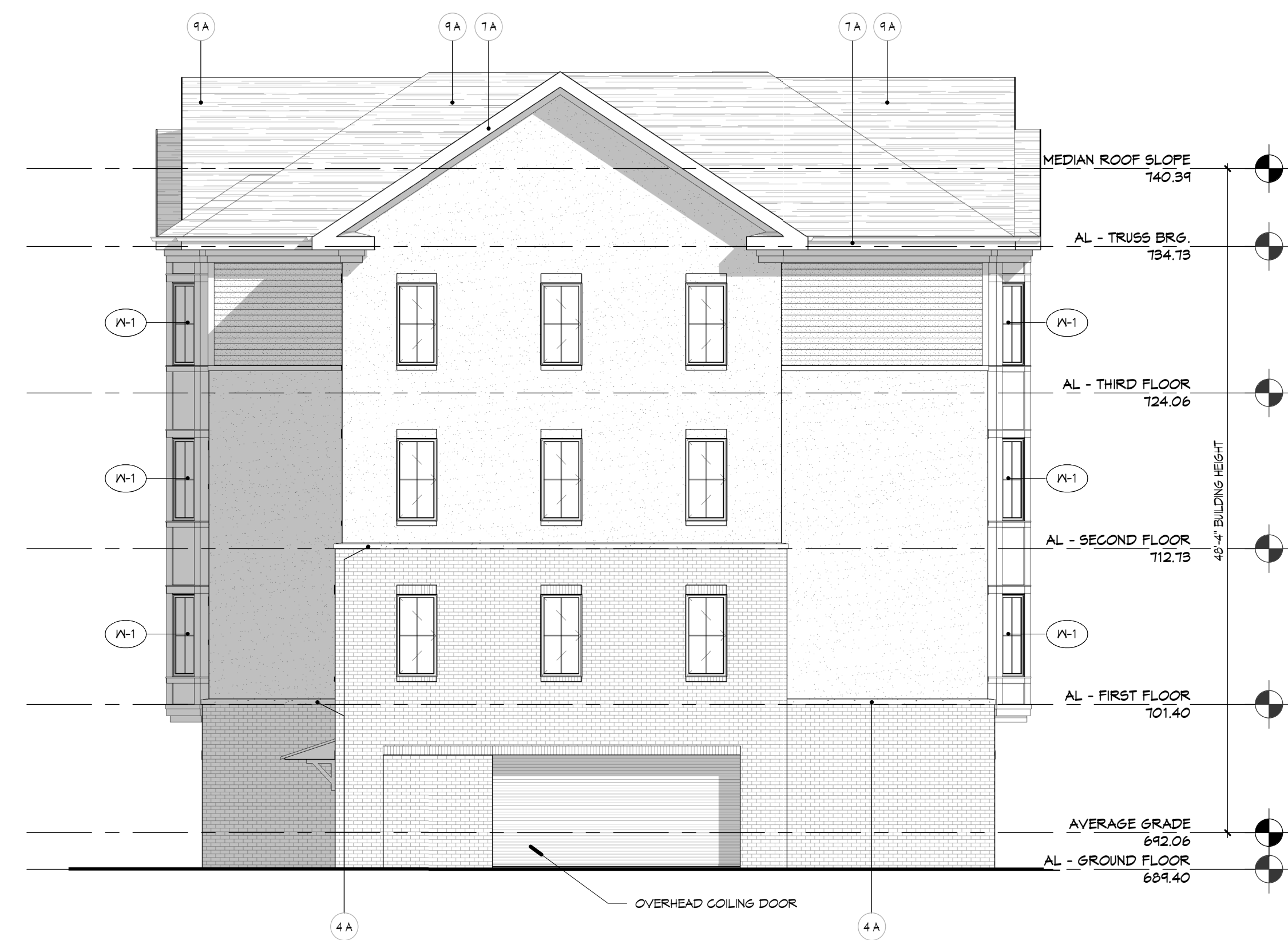
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

DRAWN BY:	COORDINATED BY:	CHECKED BY:	APPROVED BY:
S.J.M.	S.J.M.	C.S.L.	J.F.H.
			C.P.K.

REVISIONS		DESCRIPTION
1		

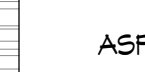
DATE: 06/26/2015
 AS NOTED

VOLUME II ASSISTED LIVING DRAWING NO:	A202	COMMISSION NO: 2014104
---	-------------	---------------------------

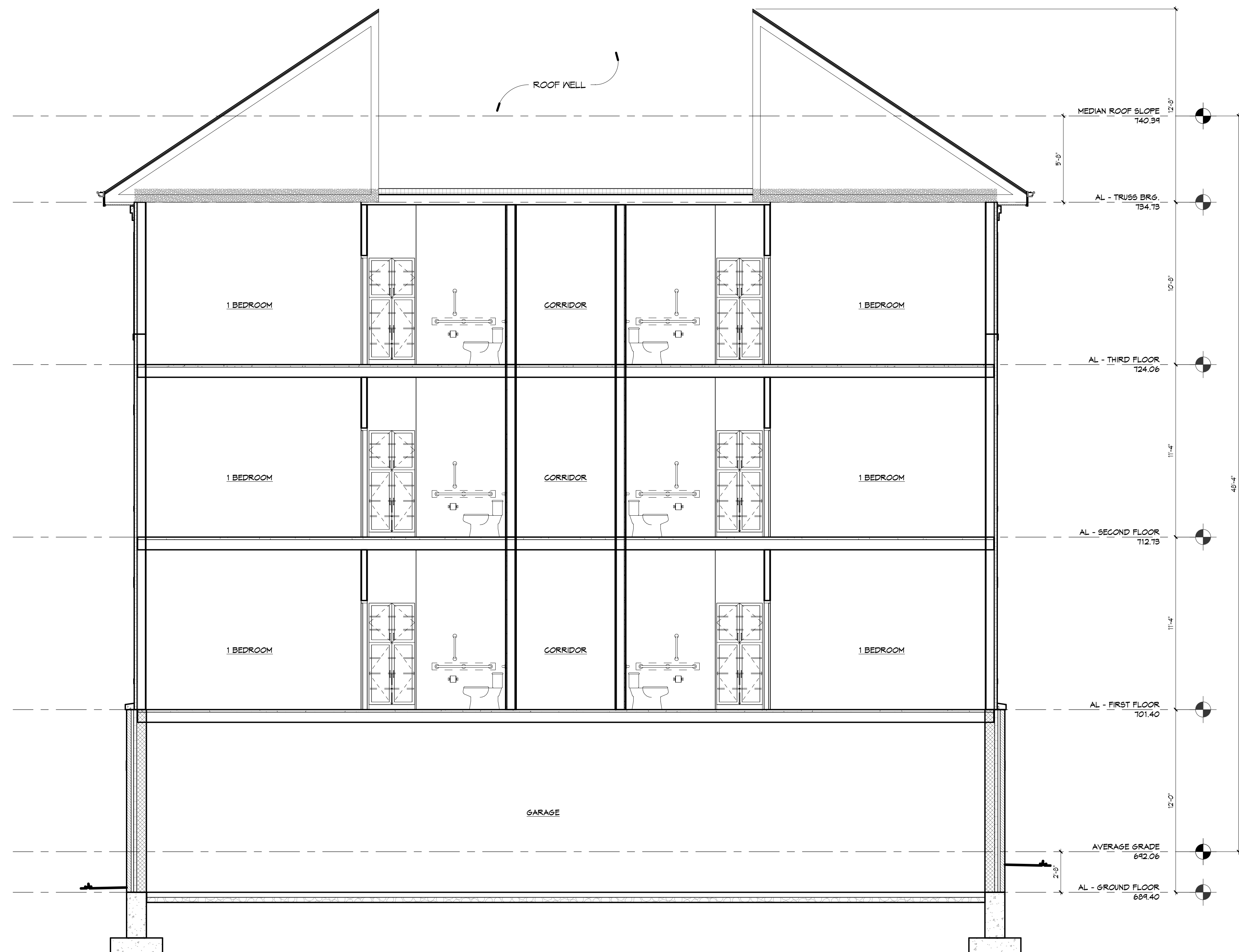


EXTERIOR ELEVATION KEYED NOTES

- 3 B STANDARD BRICK VENEER
- 4 A CAST STONE WATER TABLE
- 7 A ALUMINUM FASCIA
- 8 B ALUMINUM STOREFRONT SYSTEM
- 6 A ASPHALT SHINGLES
- 8 B RIDGE VENT
- 6 C STANDING SEAM METAL ROOF

EXTERIOR MATERIAL LEGEND			
	ASPHALT SHINGLES		BRICK TYPE - 1: STANDARD FACE BRICK
	STANDING SEAM ROOF		FIBER CEMENT SIDING - 1: 6" EXPOSURE
	EXTERIOR INSULATION FINISH SYSTEM		FIBER CEMENT SIDING - 2: 6" EXPOSURE
			FIBER CEMENT PANELS

VOLUME II ANNOTATING DRAWING NO: A203	EXTERIOR ELEVATIONS		R E V I S I O N S		REVOLUTIONS, A DOPTIONS TO: THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: C.S.J.M. COORDINATED BY: C.S.J.M. CHECKED BY: J.P.H. C.P.K. APPROVED BY:			 rlps architects® architecture + interior design 2500 N. ELSTON AVE. SUITE 100 CHICAGO, IL 60647 773-560-9501 FAX: 773-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION			THIS DRAWING IS AN INSTRUMENT OF SERVICE, IS THE PROPERTY OF REVOLUTIONS, AND MAY NOT BE REPRODUCED, COPIED, OR TRANSMITTED IN ANY FORM WITHOUT WRITTEN PERMISSION. THE USER AGREES TO OBTAIN THE NECESSARY PERMITS AND THE NECESSARY PERMITS THE NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND COORDINATES WITH THE WORK
	SCALE: AS NOTED DATE: 06/26/2015 COMMISSION NO: 2014104											



1 BUILDING SECTION
1/4" = 1'-0"

VOLUME I ASSISTED LIVING DRAWING NO.		BUILDING SECTIONS		R E V I S I O N S		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES		PLANNING COMMISSION SUBMISSION		THIS DRAWING AS AN INSTRUMENT OF SERVICE, IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S WRITTEN PERMISSION. ANY REPRODUCTION OR ALTERATION OF THIS DRAWING WITHOUT THE NAME OF THE ARCHITECT	
A401		DATE: 06/26/2015		NO. DATE DESCRIPTION		811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005		rjps architects® architecture • interior planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 • FAX: 717-560-2373 RLPS, LLP		CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS OF THE SITE BEFORE PROCEEDING WITH THE WORK.	
COMMISSION NO: 2014104		SCALE: AS NOTED		S/J/M C.S.L. J/H/L C/P/K		DRAWN BY: COORDINATED BY: CHECKED BY: APPROVED BY:		architectures • interior planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 • FAX: 717-560-2373 RLPS, LLP		CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS OF THE SITE BEFORE PROCEEDING WITH THE WORK.	

RENOVATIONS & ADDITIONS TO:

THE MOORINGS OF ARLINGTON HEIGHTS

FOR

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

PROJECT DIRECTORY		STANDARD ABBREVIATIONS										DRAWING SYMBOLS		SITE LOCATION MAP																																																																																																																																																																																					
ARCHITECT RLPS ARCHITECTS 250 VALLEY BROOK DRIVE LANCASTER, PA 17601 717-560-1801 (FAX) 717-560-2373 CIVIL ENGINEER ERIKSSON ENGINEERING ASSOCIATES, LTD. 145 COMMERCE DRIVE, SUITE A GRAYBLAKE, IL 60050 847-223-4804 (FAX) 847-223-4864 STRUCTURAL ENGINEER MASANTOSH ENGINEERS 1 EAST UPHOLAN AVENUE EXTON, PA 19341 484-479-2102 (FAX) 484-479-2101 MECHANICAL, ELECTRICAL & PLUMBING ENGINEER REESE ENGINEERING INC. 2021 FINE HALL ROAD STATE COLLEGE, PA 16801 814-667-5556 (FAX) 814-234-2844 FOOD SERVICE SCOPOS HOSPITALITY GROUP 300 WEST CHESTNUT STREET PHILADELPHIA, PA 19102 215-582-8910 (FAX) 215-582-8904 OWNER'S CONSULTANTS OWNER CONSULTANT INFORMATION IS INCLUDED FOR CONVENIENCE PURPOSES ONLY AND IS NOT WORK OF RLPS. THE ARCHITECT IS NOT RESPONSIBLE FOR ANY OF THE WORK PROVIDED OR COORDINATION OF ITEMS PROVIDED BY THE OWNER'S CONSULTANTS.		A.F.F. ABOVE FINISHED FLOOR A.D. ACCESS DOOR A.P. ACCESS PANEL A.P.C. ACOUSTICAL PANEL C.E. CEILING A.T.C. ACOUSTICAL TILE CEILING A.V.P. ACOUSTICAL WALL PANEL A.D.J. ADJUSTABLE AIR COND. AIR CONDITIONING ALUM. ALUMINUM A.B. ANCHOR BOLT A.P.T. APARTMENT ARCH. ARCHITECT B. BASEMENT BATH. BATHROOM B.S. BEARING BR. BEDROOM BLK. BLOCK BLDG. BUILDING BLD. BOARD BOT. BOTTOM B.E.J. BRICK EXPANSION JOINT B.S. BRICK SHELF BLDG. BUILDING BLD. BULLETIN BOARD CAB. CABINET CPT. CARPET C.L.S. CEILING C.H. CEILING HEIGHT CTR. CENTER C.L. CENTER LINE C.T. CERAMIC TILE CH.R.L. CHAIR RAIL CH.B.D. CHALKBOARD CLO. CLOSET COL. COLUMN CONG. CONCRETE C.M.U. CONCRETE MASONRY UNIT CONSTR. CONSTRUCTION CONSTR. JOINT CONSTRUCTION JOINT CONT. CONTINUOUS OR CONTINUE CONTR. CONTRACTOR CONTR. JOINT CONTROL JOINT COP. COPPER COPING COPING C.B. CORNER BEAD C.G. CORNER GUARD C.R. CURTAIN ROD DEG. DEGREE DEPT. DEPARTMENT DET. DETAIL DIA. DIAMETER D.R. DINING ROOM D.W. DOUBLE D.S. DOWN D.N. DOWNPOUT D.S.P. DRAIN D.W.S. DRAINING D.F. DRAINING FONTAIN E.F. EACH FACE E.R. EACH RAY ELEG. ELECTRIC OR ELECTRICAL E.V.C. ELECTRIC WATER COOLER EL. ELEVATION ELEV. ELEVATOR EMER. EMERGENCY ENGR. ENGINEER ENT. ENTRANCE EPXY.PNT. EPOXY PAINT EQ. EQUAL EQUIP. EQUIPMENT E.P.D.M. ETHYLENE PROPYLENE DIENE MONOMER EXIST. EXISTING E.T.R. EXISTING TO REMAIN EXP.BT. EXPANSION BOLT EXP.JT. EXPANSION JOINT EXT. EXTERIOR E.I.F.S. EXTERIOR INSULATION & FINISH SYSTEM FAC.FIN. FACTORY FINISH F.C.U. FAN COIL UNIT FT. OR '. FEET OR FOOT FBD.DK. FIBERBOARD DECKING FIN. FINISHED FIN.FL. FINISHED FLOOR F.I.E. FIRE EXTINGUISHER F.E.G. FIRE EXTINGUISHER CABINET F.H. FIRE HYDRANT F.H.G. FIRE HOSE CABINET FLG. FLASHING OR FLOORING (DEPENDS ON CONTEXT) FLR. FLOOR F.R.T.X. FIRE RETARDANT TREATED WOOD F.D. FLOOR DRAIN F.A.R.F. FLUID APPLIED RESINOUS FLOORINGS FTG. FOOTING FDN. FOUNDATION GAL. GALLON G.P.M. GALLONS PER MINUTE G.P.S. GALLONS PER SECOND GALV. GALVANIZED GA. GAUGE G.C. GENERAL CONTRACTOR GL. GLASS GLBL. GLASS BLOCK G.M.F.-G.W.B. GLASS MAT FACED GYPSUM WALL BOARD GOVT. GOVERNMENT GR. GRADE G.L. GRADE LINE G.T. GRANITE TILE GTR. GUTTER GYP. GYPSUM GYP.LTH. GYPSUM LATH GYP.BD.-G. GYPSUM BOARD-TYPE G GYP.BD.-X. GYPSUM BOARD-TYPE X GYP.BD.-F.B. GYPSUM BOARD-TYPE F.B. H.R. HANDRAIL H.B.D. HARDBOARD H.D.N. HARDWARE H.V.A.C. HEATING, VENTILATING & AIR CONDITIONING H.T. HIGH H.P. HIGH POINT H.G.A.D. HOLLOW GORE WOOD H.H. HOLLOW METAL HOR. HORIZONTAL HR. HOUR I. I BEAM N. OR '. INCH INCL. INCLUDE ID. INSIDE DIAMETER INFO. INFORMATION I.P.S. INSIDE PIPE SIZE IRON FN. IRON FIN INS. INSULATE, INSULATED OR INSULATION INT. INTERIOR J. CL. JANITOR'S CLOSET JT. JOINT K.P. KICK PLATE KT. KITCHEN K.D. KNOCK DOWN LAB. LABORATORY LAV. LAVATORY L.C.O.P. LEAD-COATED COPPER L.H. LEFT HAND L.H.R. LEFT HAND REVERSE L. LENGTH L.S.F. LINOLEUM SHEET FLOORING L.T.F. LINOLEUM TILE FLOORING L.R. LIVING ROOM L.P. LIVING POINT P.M.F. PRE-MOLDED FILLER PROT.BD. PROTECTION BOARD P.T. PRESSURE TREATED Q.T. QUANTITY Q.T. QUARRY TILE R. RADIUS R.W.C. RAIN WATER CONDUCTOR R.W.P. RAIN WATER PIPE REF. REFRIGERATOR RENF. REINFORCED REGD. REQUIRED RET. RETURN REV. REVISION R.H. RIGHT HAND R.H.R. RIGHT HAND REVERSE R.D. ROAD R.F.S. ROOFING R.M. ROOM R.O. ROUGH OPENING SCH. SCHEDULE SECT. SECTION SHTHS. SHEATHING SHT. SHEET S.V. SHEET VINYL SM. SIMILAR S.G.A.D. SOLID GORE WOOD S.T.C. SOUND TRANSMISSION COEFFICIENT SPEC. SPECIFICATIONS SQ.FT. SQUARE FOOT SQ.IN. SQUARE INCH STN. STAIN S.S. STAINLESS STEEL STL. STEEL ST.STD. STEEL STUD S.R.D. STYLE AND RAIL WOOD STOR. STORAGE STREET STREET STRUCT. STRUCTURAL SUSP. SUSPENDED TACKBD. TACKBOARD TECH. TECHNICAL TEL. TELEPHONE TEMP. TEMPERATURE TEMP. TEMPERED TER. TERRAZZO THK. THICK OR THICKNESS TH. THRESHOLD T.IG. TONGUE AND GROOVE T.B. TOP AND BOTTOM T.O.S. TOP OF STEEL TRT.XD. TREATED WOOD MACHRM. MACHINE ROOM MATL. MATERIAL MANUF. MANUFACTURER MRKBD. MARKER BOARD M.O. MASONRY OPENING MAXM. MAXIMUM MECH. MECHANICAL MED. MEDIUM M.D.F. MEDIUM DENSITY FIBERBOARD MEMB. MEMBRANE MET. METAL M.T.LTH. METAL LATHING MEZZ. MEZZANINE MIN. MINIMUM MISG. MISCELLANEOUS N.R.G. NOISE REDUCTION COEFFICIENT NOM. NOMINAL N.I.C. NOT IN CONTRACT N.T.S. NOT TO SCALE N.O. OR #. NUMBER OFF. OFFICE O.C. ON CENTER OPNG. OPENING OPP. OPPOSITE O.H. OPPOSITE HAND OZ. OUNCE O.D. OUTSIDE DIAMETER O.T.O. OUT TO OUT PNT. PAINT (PAINTED FINISH) PR. PAPER PNL. PANEL P.H.XD. PANEL, HARDBOARD WOOD PARTITION PARTITION PER. PERCENT PERPENDICULAR PERPENDICULAR PLASTER PLASTER P.LAM. PLASTIC LAMINATE PLATE PLATE PLAT. PLATFORM PLUMB. PLUMBING PLYWOOD PLYWOOD LB. OR #. POUNDS PER CUBIC FOOT P.S.F. POUNDS PER SQUARE FOOT PRECAST PRECAST PREFAB. PREFABRICATED PRF. PRE FINISHED TYP. TYPICAL U.L. UNDERWRITERS LABORATORIES U.D. UNIT DIMENSION U.H. UNIT HEATER U.N.O. UNLESS NOTED OTHERWISE VAC. VACUUM VAP.B. VAPOR BARRIER VENT. VENT VENT. VENTILATE V.T.R. VENT THROUGH ROOF V.I.F. VERIFY IN FIELD VERT. VERTICAL VEST. VESTIBULE V.B. VINYL BASE V.C.T. VINYL COMPOSITION TILE V.A.G. VINYL WALL COVERING VOL. VOLUME WANSOT. WALK-OFF MAT W.O.M. WALL COVERING W.GOV. WATER GLOSET W.P. WATERPROOFING WATERPROOF. WATERPROOF MEMBRANE W.P.M. WEIGHT WELDED WIRE FABRIC WELDED WIRE FABRIC W.F.L. WIDE FLANGE (STEEL) WTH. WIDTH WTH. WIDTH W/O. WITHOUT W.D. WOOD W.D.SH. WOOD SHELVING W.D.PNL. WOOD PANELING YD. YARD										SECTION DETAIL ELEVATION COLUMN GRID LINE MATCH LINE FLOOR LINE PARTITION TYPE 1ST DIGIT = FIRE RATING 2ND & 3RD DIGIT = PARTITION TYPE WINDOW TYPE SPOT ELEVATION ROOM NAME & NUMBER DOOR & NUMBER																																																																																																																																																																																							
												MATERIAL INDICATIONS <table><tr><td></td><td>CONCRETE</td><td></td><td>BATT INSULATION</td></tr><tr><td></td><td>PRECAST CONCRETE</td><td></td><td>BLOWN-IN INSULATION</td></tr><tr><td></td><td>CONCRETE BLOCK (C.M.U.)</td><td></td><td>RIGID INSULATION</td></tr><tr><td></td><td>BRICK</td><td></td><td>SPRAY FOAM INSULATION</td></tr><tr><td></td><td>CRUSHED STONE</td><td></td><td>DRYWALL OR PLASTER</td></tr><tr><td></td><td>COMPACTED EARTH</td><td></td><td>WOOD BLOCKING</td></tr><tr><td></td><td>STEEL</td><td></td><td>PLYWOOD</td></tr><tr><td></td><td>ALUMINUM (STRUCT.)</td><td></td><td>FINISHED WOOD</td></tr><tr><td></td><td>GLAZING SYSTEM</td><td></td><td>CERAMIC OR QUARRY TILE</td></tr><tr><td></td><td>ACOUSTICAL TILE</td><td></td><td>SOLID SURFACE MATL.</td></tr></table>			CONCRETE		BATT INSULATION		PRECAST CONCRETE		BLOWN-IN INSULATION		CONCRETE BLOCK (C.M.U.)		RIGID INSULATION		BRICK		SPRAY FOAM INSULATION		CRUSHED STONE		DRYWALL OR PLASTER		COMPACTED EARTH		WOOD BLOCKING		STEEL		PLYWOOD		ALUMINUM (STRUCT.)		FINISHED WOOD		GLAZING SYSTEM		CERAMIC OR QUARRY TILE		ACOUSTICAL TILE		SOLID SURFACE MATL.																																																																																																																																														
	CONCRETE		BATT INSULATION																																																																																																																																																																																																
	PRECAST CONCRETE		BLOWN-IN INSULATION																																																																																																																																																																																																
	CONCRETE BLOCK (C.M.U.)		RIGID INSULATION																																																																																																																																																																																																
	BRICK		SPRAY FOAM INSULATION																																																																																																																																																																																																
	CRUSHED STONE		DRYWALL OR PLASTER																																																																																																																																																																																																
	COMPACTED EARTH		WOOD BLOCKING																																																																																																																																																																																																
	STEEL		PLYWOOD																																																																																																																																																																																																
	ALUMINUM (STRUCT.)		FINISHED WOOD																																																																																																																																																																																																
	GLAZING SYSTEM		CERAMIC OR QUARRY TILE																																																																																																																																																																																																
	ACOUSTICAL TILE		SOLID SURFACE MATL.																																																																																																																																																																																																
VOLUME III RESIDENT FELLOWSHIP HALL & COMMONS PLANNING COMMISSION SUBMISSION																																																																																																																																																																																																			
DRAWING INDEX - VOLUME III RESIDENT FELLOWSHIP HALL & COMMONS																																																																																																																																																																																																			
<table><tr><td colspan="2">· ARCHITECTURAL DRAWING LIST ·</td><td colspan="2"></td><td colspan="2"></td><td colspan="2"></td><td colspan="2"></td><td colspan="2"></td><td colspan="2"></td></tr><tr><td>OCVR</td><td>COVER SHEET</td><td colspan="12"></td></tr><tr><td>OREN</td><td>RENDERING</td><td colspan="12"></td></tr><tr><td colspan="14"></td></tr><tr><td>A001</td><td>OVERALL FLOOR PLANS</td><td colspan="12"></td></tr><tr><td colspan="14"></td></tr><tr><td>A101</td><td>LOWER LEVEL PLAN</td><td colspan="12"></td></tr><tr><td>A102</td><td>FIRST FLOOR PLAN</td><td colspan="12"></td></tr><tr><td>A103</td><td>ROOF PLAN</td><td colspan="12"></td></tr><tr><td colspan="14"></td></tr><tr><td>A201</td><td>EXTERIOR ELEVATIONS</td><td colspan="12"></td></tr><tr><td colspan="14"></td></tr><tr><td>A401</td><td>BUILDING SECTIONS</td><td colspan="12"></td></tr></table>														· ARCHITECTURAL DRAWING LIST ·														OCVR	COVER SHEET													OREN	RENDERING																											A001	OVERALL FLOOR PLANS																											A101	LOWER LEVEL PLAN													A102	FIRST FLOOR PLAN													A103	ROOF PLAN																											A201	EXTERIOR ELEVATIONS																											A401	BUILDING SECTIONS												
· ARCHITECTURAL DRAWING LIST ·																																																																																																																																																																																																			
OCVR	COVER SHEET																																																																																																																																																																																																		
OREN	RENDERING																																																																																																																																																																																																		
A001	OVERALL FLOOR PLANS																																																																																																																																																																																																		
A101	LOWER LEVEL PLAN																																																																																																																																																																																																		
A102	FIRST FLOOR PLAN																																																																																																																																																																																																		
A103	ROOF PLAN																																																																																																																																																																																																		
A201	EXTERIOR ELEVATIONS																																																																																																																																																																																																		
A401	BUILDING SECTIONS																																																																																																																																																																																																		

VOLUME III
REF. & COMMONS
DRAWING NO:
OCVR

COMMISSION NO:
2014104

COVER SHEET

REVISIONS
NO. DATE DESCRIPTION

DATE: 06/26/2015
AS NOTED

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, THIS DRAWING IS THE PROPERTY OF THE ARCHITECT.

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

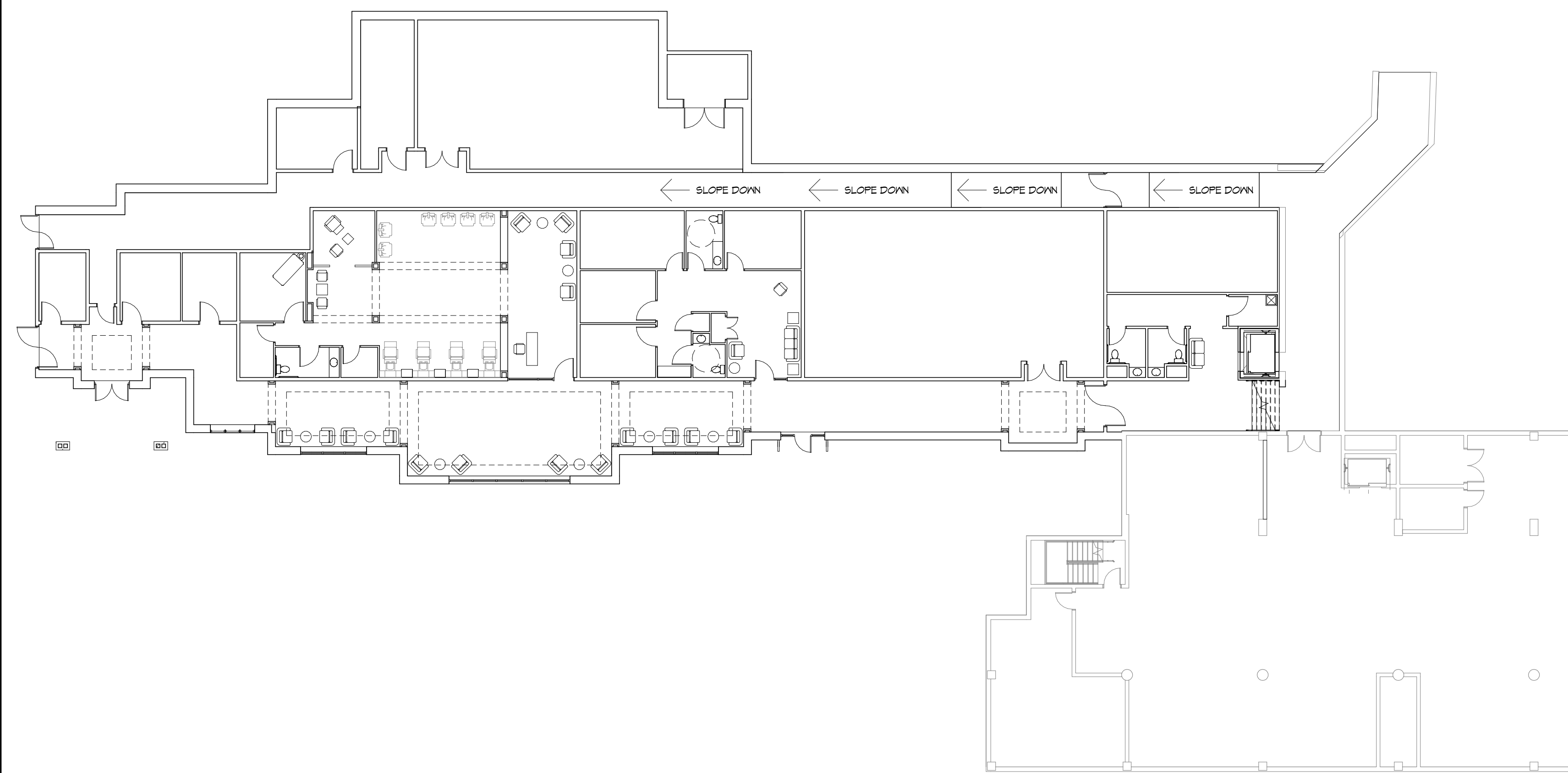
rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

RENOVATIONS & ADDITIONS TO:
THE MOORINGS OF ARLINGTON HEIGHTS
FOR
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: S.J.M. CHECKED BY: J.H.H. APPROVED BY: C.P.K.

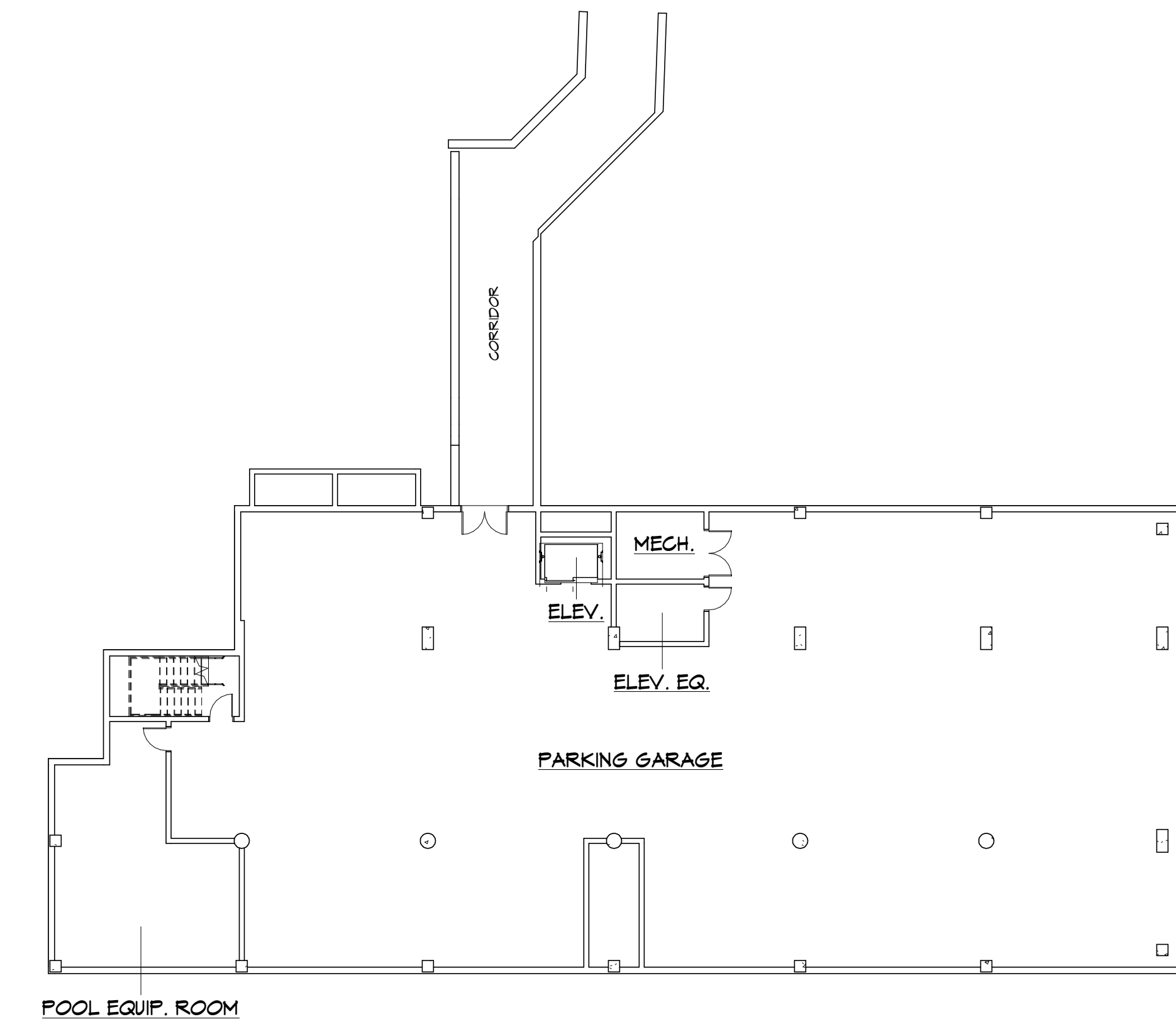


RESIDENT FELLOWSHIP HALL VIEW FROM THE SOUTH

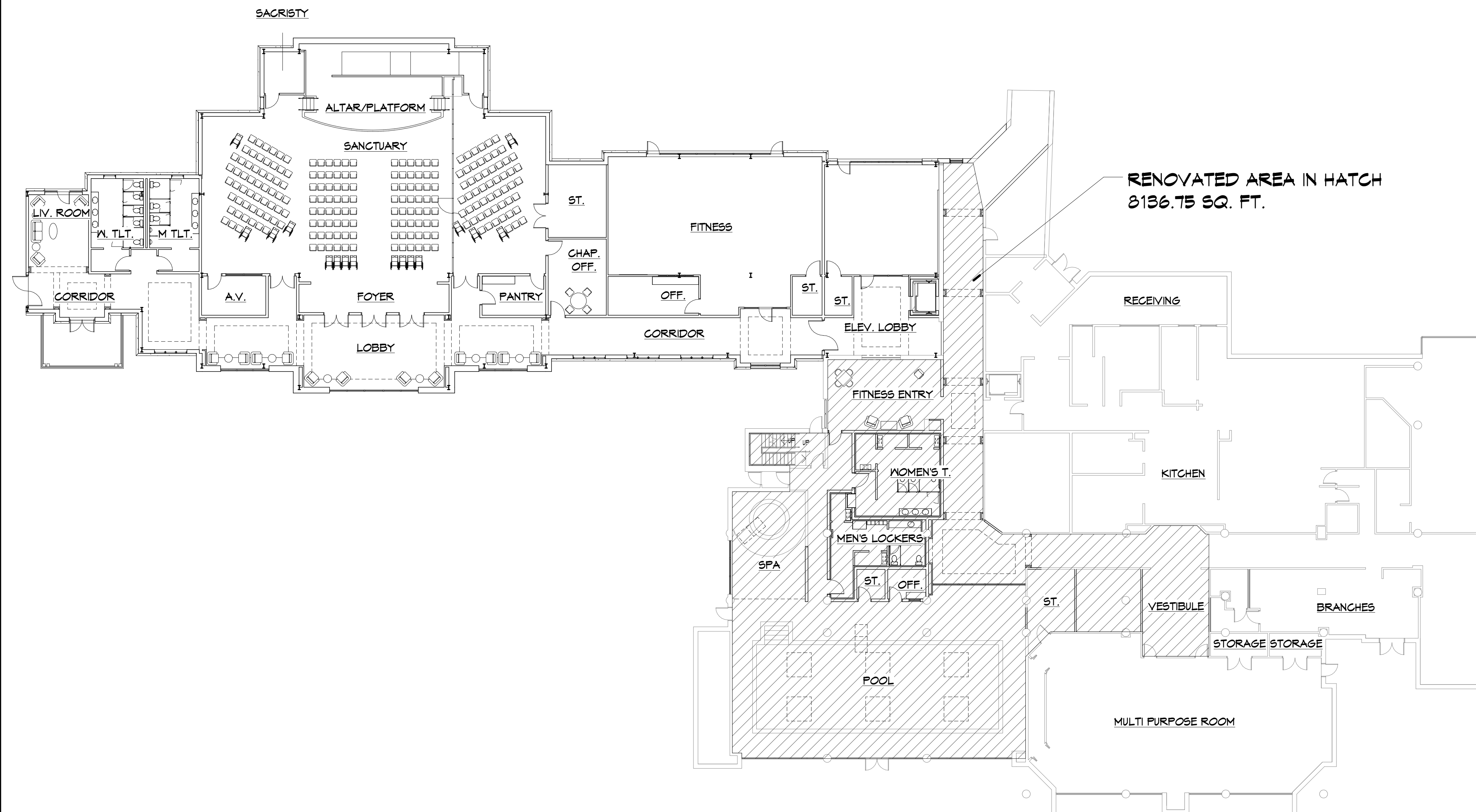
VOLUME III REF. & COMMONS DRAWING NO: OREN		RENDERING		REVISIONS		RENOVATIONS & ADDITIONS TO: FOR THE MOORINGS OF ARLINGTON HEIGHTS PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: SJM COORDINATED BY: CS.L CHECKED BY: JFH APPROVED BY: CJK		 architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION						THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. THE ARCHITECT'S NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
--	--	-----------	--	-----------	--	---	--	---	--	---	--	--	--	--	--	---	--



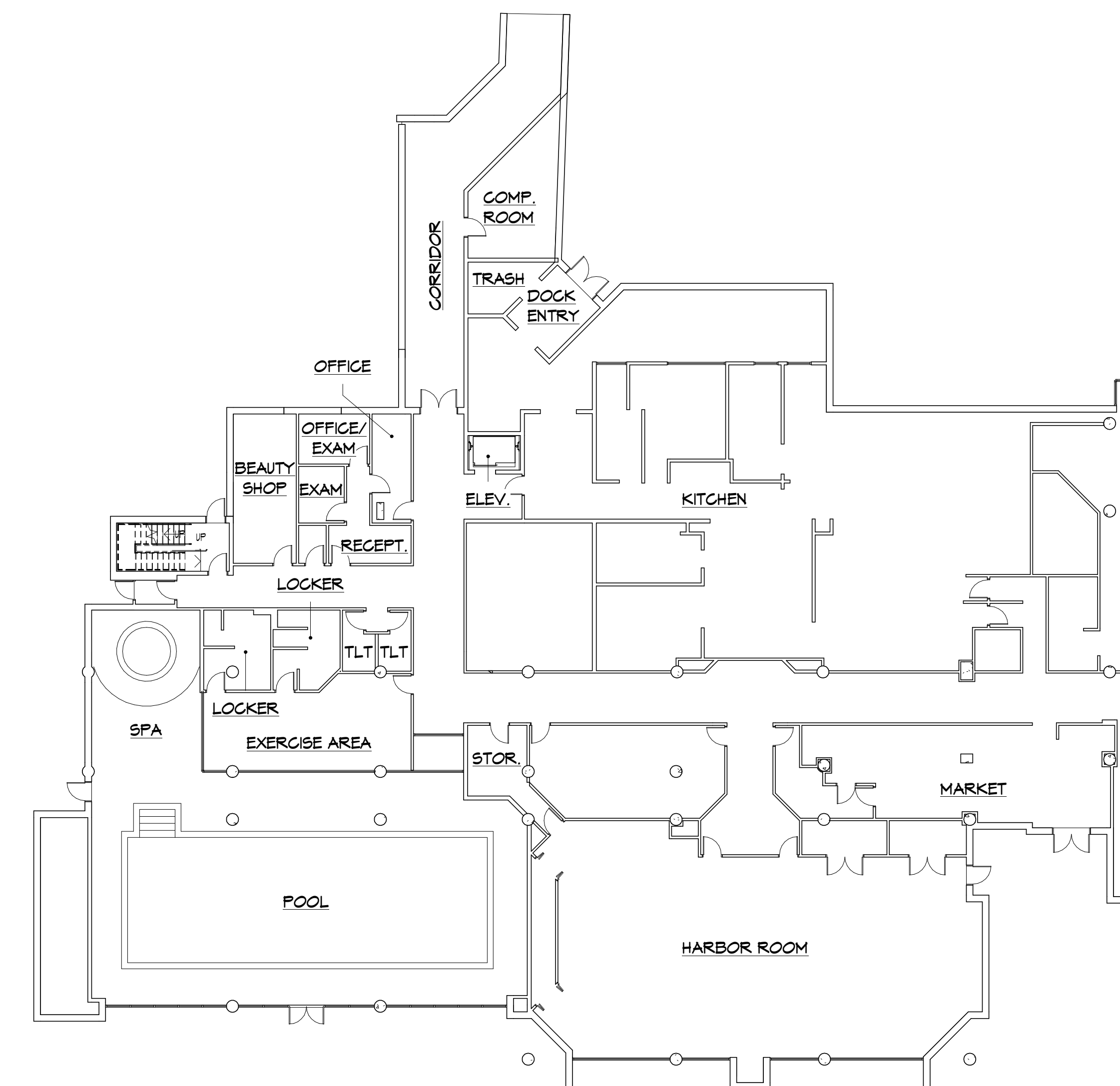
1 OVERALL GROUND FLOOR PLAN
1/16" = 1'-0"
TOTAL AREA: 13,100



4 EXISTING COMMONS GROUND FLOOR PLAN
1/16" = 1'-0"

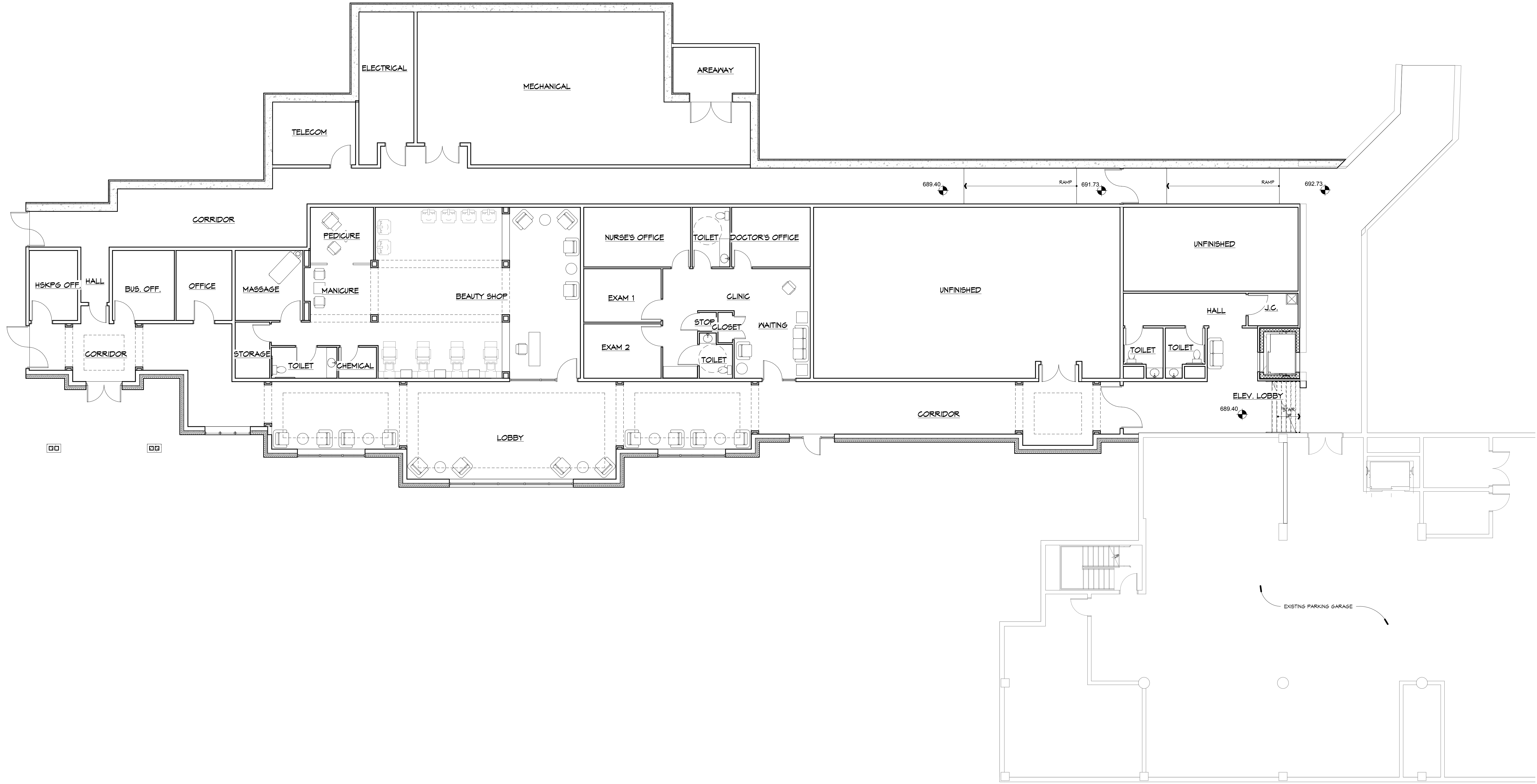


2 OVERALL FIRST FLOOR PLAN
1/16" = 1'-0"
TOTAL AREA: 13,600



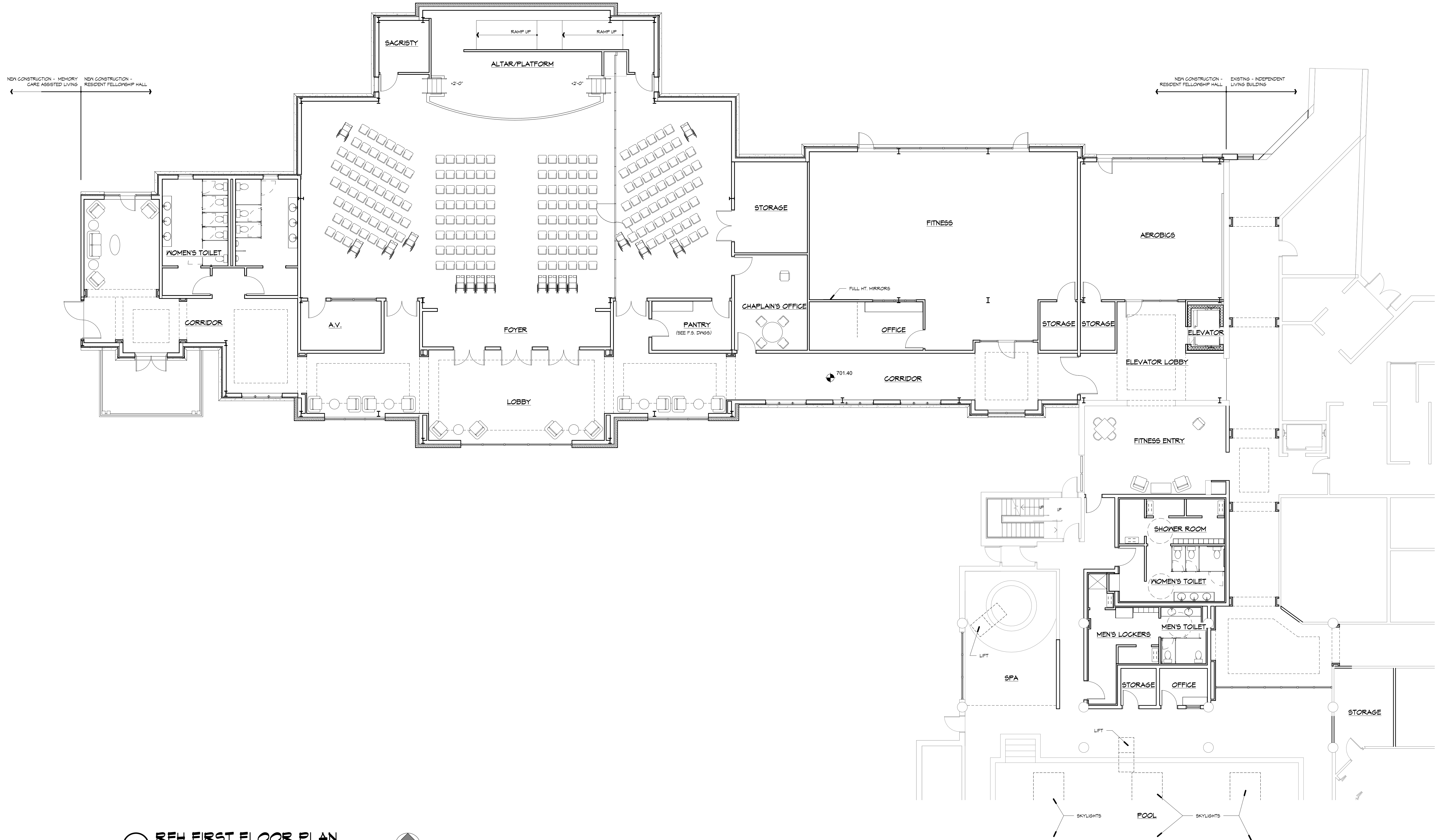
3 EXISTING COMMONS FIRST FLOOR PLAN
1/16" = 1'-0"

VOLUME III REF. & COMMONS DRAWING NO: A001		OVERALL FLOOR PLANS		REVISIONS		RENOVATIONS & ADDITIONS TO: THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. CHECKED BY: J.F.H. APPROVED BY: C.P.K.		 rlps architects® architecture • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION				
COMMISSION NO: 2014104		SCALE: AS NOTED	DATE: 06/26/2015							THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.				



2 RFH GROUND FLOOR PLAN
1/8" = 1'-0"

VOLUME III RFH & COMMONS DRAWING NO: A101 COMMISSION NO: 2014104		LOWER LEVEL PLAN		DATE: 06/26/2015		SCALE: AS NOTED	
R E V I S I O N S							
NO.		DATE		DESCRIPTION			
RENOVATIONS & ADDITIONS TO: THE MOORINGS OF ARLINGTON HEIGHTS PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.							
				rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP			
PLANNING COMMISSION SUBMISSION							
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RPTPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.							

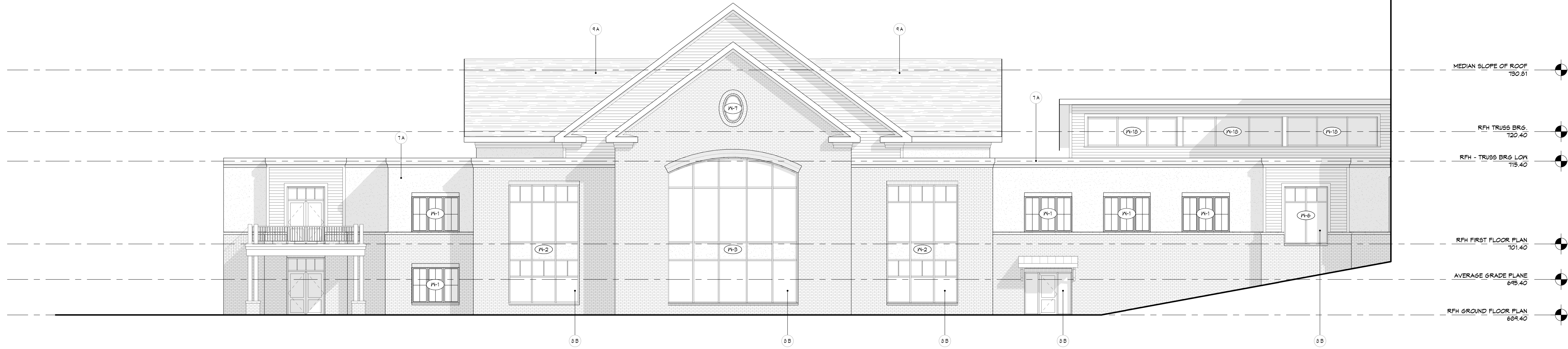


1 RFH FIRST FLOOR PLAN
1/8" = 1'-0"

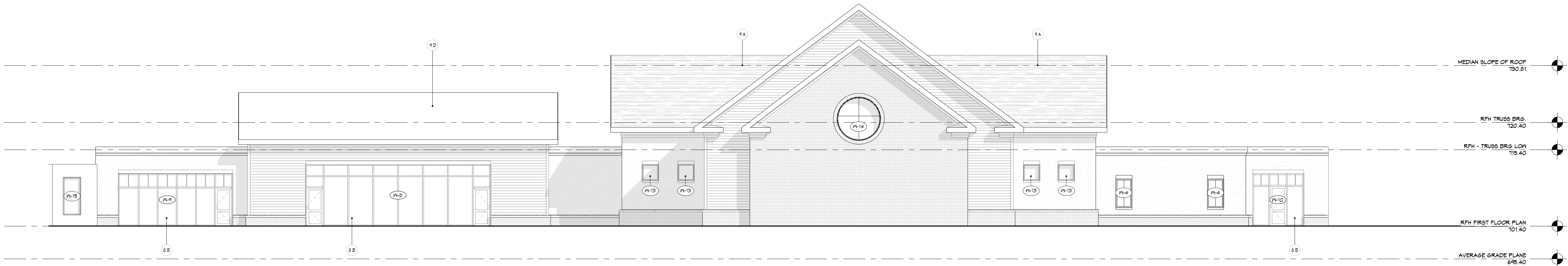
VOLUME III RFH & COMMONS DRAWING NO: A102 COMMISSION NO: 2014104	FIRST FLOOR PLAN		SCALE: AS NOTED	DATE: 06/26/2015									
	REVISIONS												
<table><tr><td>NO.</td><td>DATE</td><td>DESCRIPTION</td></tr><tr><td colspan="3"> </td></tr><tr><td colspan="3"> </td></tr></table>					NO.	DATE	DESCRIPTION						
NO.	DATE	DESCRIPTION											
THE MOORINGS OF ARLINGTON HEIGHTS													
FOR													
PRESBYTERIAN HOMES													
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005													
DRAWN BY: S.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.H.H. APPROVED BY: C.P.K.													
r ps architects®													
architecture • master planning • interior design													
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601													
717-560-9501 FAX: 717-560-2373 RLPS, LLP													
PLANNING COMMISSION SUBMISSION													
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT.													
CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.													



VOLUME III REF & COMMONS	ROOF PLAN										
DRAWING NO: A103	DATE:	06/26/2015									
COMMISSION NO: 2014104	SCALE:	AS NOTED									
REVISIONS <table><thead><tr><th>NO.</th><th>DATE</th><th>DESCRIPTION</th></tr></thead><tbody><tr><td> </td><td> </td><td> </td></tr><tr><td> </td><td> </td><td> </td></tr></tbody></table>			NO.	DATE	DESCRIPTION						
NO.	DATE	DESCRIPTION									
THE MOORINGS OF ARLINGTON HEIGHTS ARLINGTON HEIGHTS, ILL. PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005											
RENOVATIONS & ADDITIONS TO: DRAWN BY: C.J.M. COORDINATED BY: C.S.L. CHECKED BY: J.H.H. APPROVED BY: R.L.P.											
 rlps architects® architects • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 TEL: 717-560-9501 FAX: 717-560-2373 RLPS, LLP											
PLANNING COMMISSION SUBMISSION											
THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, P.C. AND IS TO BE REPRODUCED WITHOUT THE ARCHITECT'S WRITTEN PERMISSION. THE REPRODUCTION CARRIES THE NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS ON SITE BEFORE PROCEEDING WITH THE WORK.											



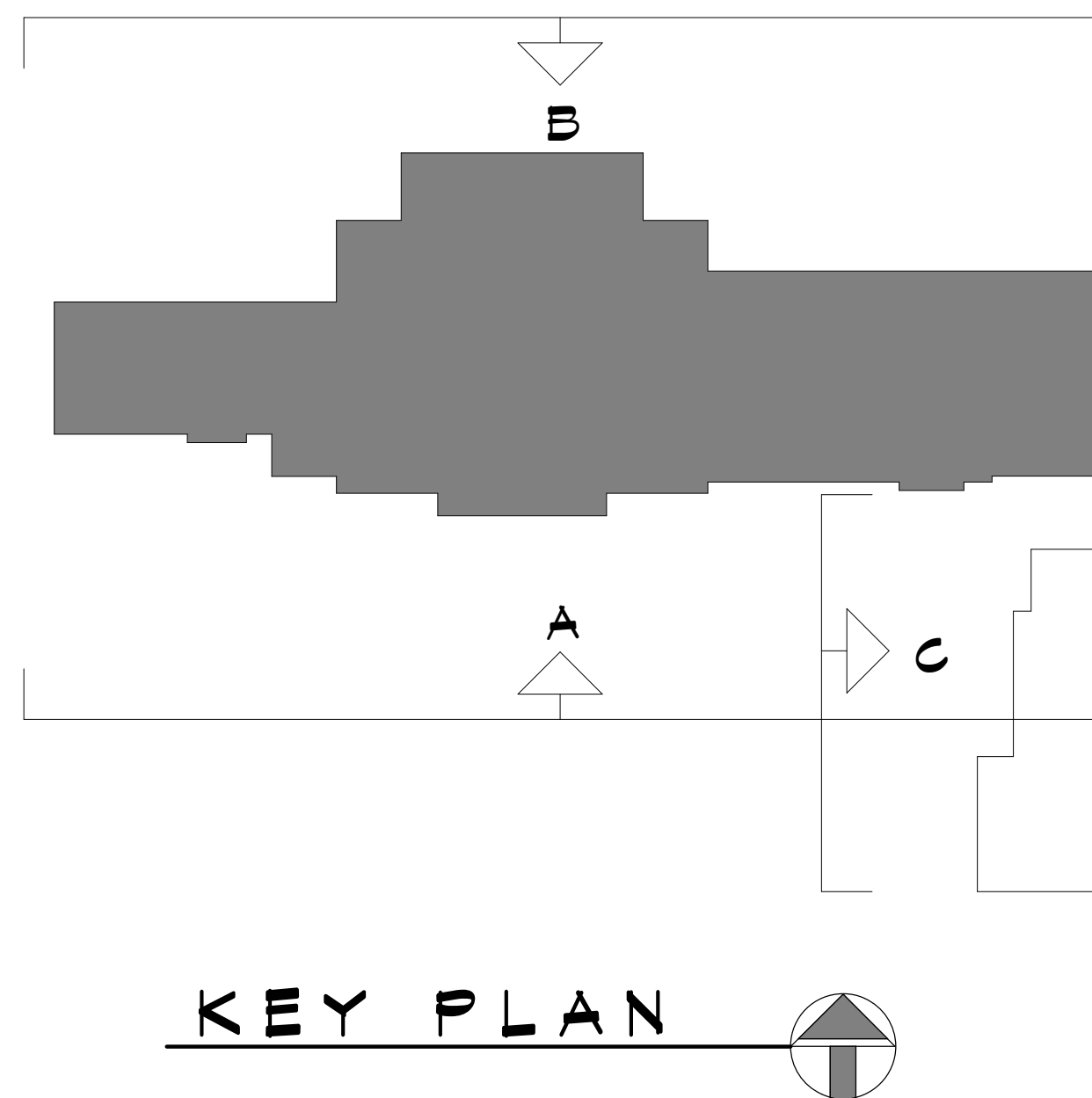
A SOUTH ELEVATION
1/8" = 1'-0"



B NORTH ELEVATION
1/8" = 1'-0"



C WEST - EXIST. COMMONS
1/8" = 1'-0"



KEY PLAN

EXTERIOR MATERIAL LEGEND

	ASPHALT SHINGLES		BRICK TYPE - 1: STANDARD FACE BRICK
	STANDING SEAM ROOF		FIBER CEMENT SIDING - 1: 6" EXPOSURE
	EXTERIOR INSULATION FINISH SYSTEM		FIBER CEMENT SIDING - 2: 6" EXPOSURE

EXTERIOR ELEVATION KEYED NOTES

- 4A CAST STONE WATER TABLE
- 1A ALUMINUM FASCIA
- 2B ALUMINUM STOREFRONT SYSTEM
- 9A ASPHALT SHINGLES
- 8B RIDGE VENT
- 9C STANDING SEAM METAL ROOF
- 10D EPDM ROOFING SYSTEM

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT AND IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED, COPIED, OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION OF THE ARCHITECT. THE ARCHITECT'S NAME SHALL BE THE NAME OF THE ARCHITECT.

CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

**PLANNING
COMMISSION
SUBMISSION**

rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

RENOVATIONS & ADDITIONS TO:
THE MOORINGS OF ARLINGTON HEIGHTS
FOR
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: SJM CHECKED BY: C.S.L. APPROVED BY: J.E.H. C.P.K.

REVISIONS	
NO.	DATE DESCRIPTION

EXTERIOR ELEVATIONS
VOLUME III
REF. & COMMONS
DRAWING NO. **A201**
COMMISSION NO. 2014104
SCALE: AS NOTED
DATE: 06/26/2015



VOLUME III REF. & COMMENTS DRAWING NO.		BUILDING SECTIONS		R E V I S I O N S		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES		REVISIONS & ADDITIONS TO: PLANNING COMMISSION SUBMISSION		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFIY ALL DIMENSIONS AND CONDITIONS WITH THE WORK	
A401		DATE:		NO.		811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005		rllps architects®		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT	
COMMISSION NO:		AS NOTED		DATE:		DRAWN BY: S.J.M.		architects • interior planning • interior design 290 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 • FAX: 717-560-2373 RLPs, LLP		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT	
20141004		06/26/2015		DATE:		COORDINATED BY: C.S.L.		rllps architects®		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT	
				DATE:		CHECKED BY: J.P.H.		architects • interior planning • interior design 290 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 • FAX: 717-560-2373 RLPs, LLP		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT	
				DATE:		C.P.K.		rllps architects®		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE THE NAME OF THE ARCHITECT	

RENOVATIONS & ADDITIONS TO:

THE MOORINGS OF ARLINGTON HEIGHTS

FOR

PRESBYTERIAN HOMES

811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005

[illegible]

DRAWING INDEX - VOLUME IV A.L. MEMORY CARE																								
· ARCHITECTURAL DRAWING LIST · <table><tr><td>OCVR</td><td>COVER SHEET</td></tr><tr><td>OREN</td><td>RENDERING</td></tr></table> <table><tr><td>A001</td><td>OVERALL FLOOR PLANS</td></tr></table> <table><tr><td>A101</td><td>GROUND FLOOR PLAN</td></tr><tr><td>A102</td><td>FIRST FLOOR PLAN</td></tr><tr><td>A104</td><td>ROOF PLAN</td></tr></table> <table><tr><td>A201</td><td>EXTERIOR ELEVATIONS</td></tr><tr><td>A202</td><td>EXTERIOR ELEVATIONS</td></tr></table> <table><tr><td>A401</td><td>BUILDING SECTIONS</td></tr></table>		OCVR	COVER SHEET	OREN	RENDERING	A001	OVERALL FLOOR PLANS	A101	GROUND FLOOR PLAN	A102	FIRST FLOOR PLAN	A104	ROOF PLAN	A201	EXTERIOR ELEVATIONS	A202	EXTERIOR ELEVATIONS	A401	BUILDING SECTIONS					
OCVR	COVER SHEET																							
OREN	RENDERING																							
A001	OVERALL FLOOR PLANS																							
A101	GROUND FLOOR PLAN																							
A102	FIRST FLOOR PLAN																							
A104	ROOF PLAN																							
A201	EXTERIOR ELEVATIONS																							
A202	EXTERIOR ELEVATIONS																							
A401	BUILDING SECTIONS																							
VOLUME IV A.L. MEMORY CARE DRAWING NO:	COVER SHEET		R E V I S I O N S		THE M																			
COMMISSION NO: 2014104	SCALE: AS NOTED	DATE: 06/26/2015	NO.	DESCRIPTION	811 EAST DRAIN BY L.A.C.																			



MEMORY CARE VIEW FROM THE NORTH WEST

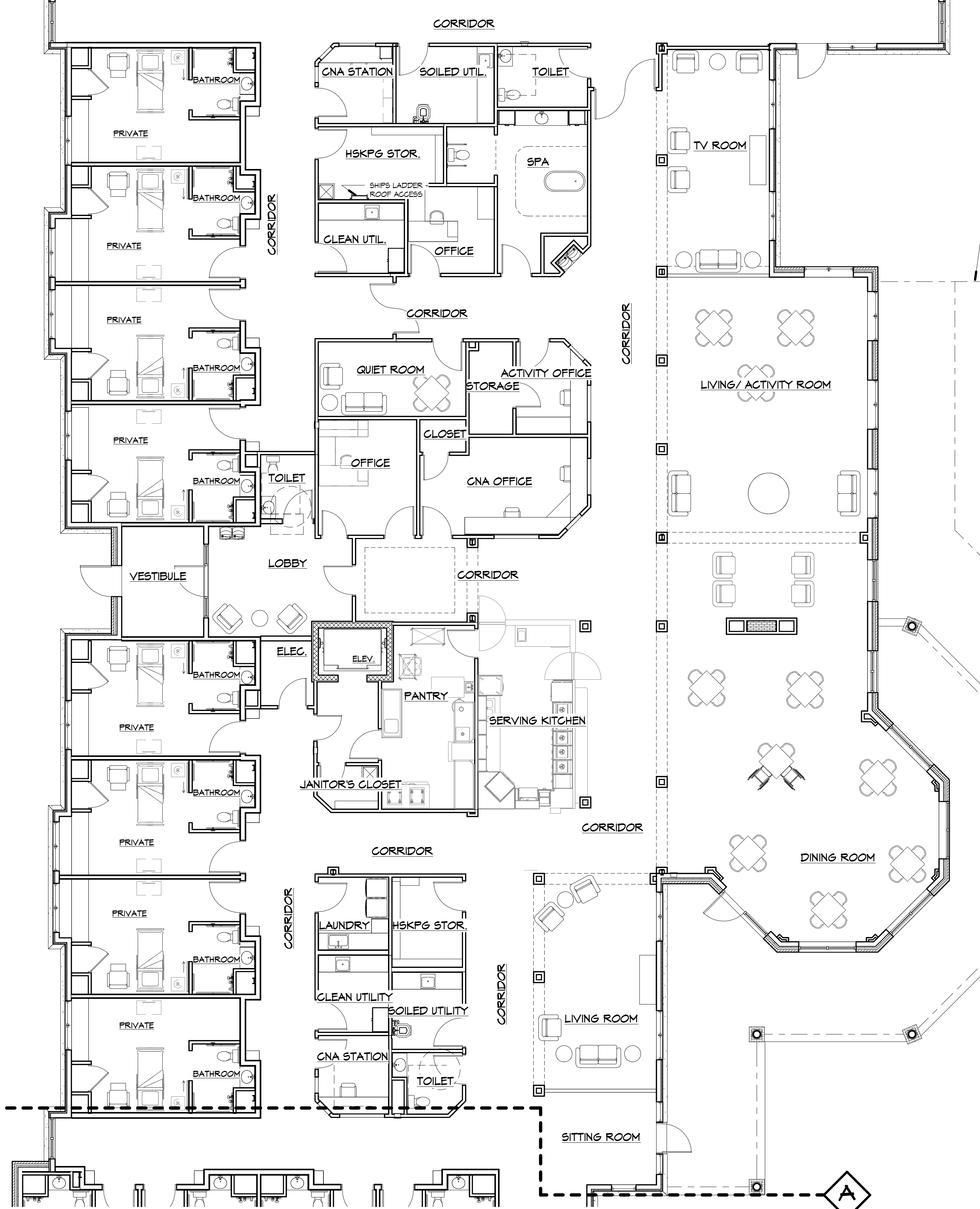
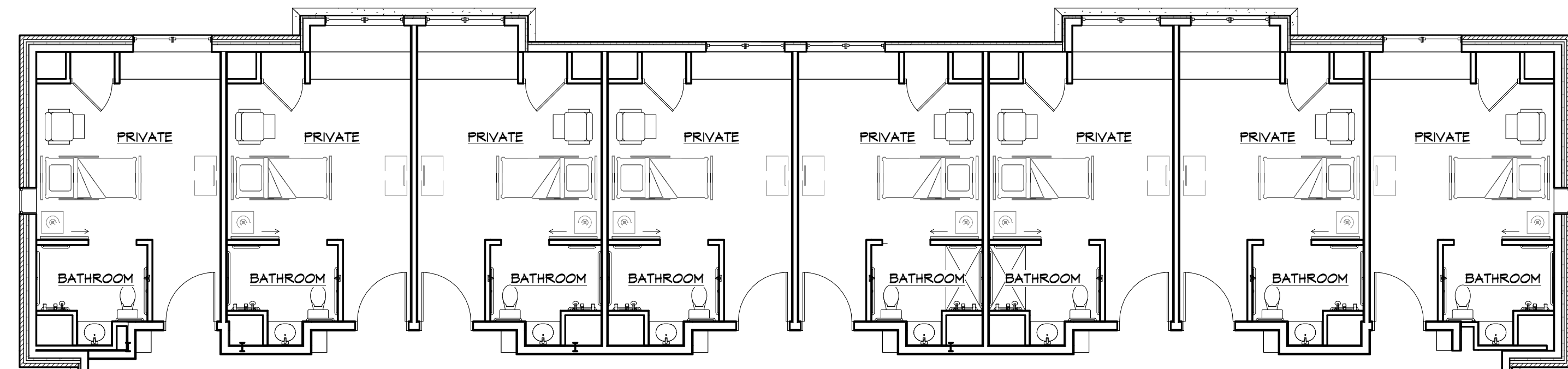
VOLUME IV ALL MEMORY CARE DRAWING NO: COMMISSION NO: 2014104		RENDERING DATE: 06/26/2015 SCALE: AS NOTED		REVISIONS NO. DATE DESCRIPTION		RENOVATIONS & ADDITIONS TO: FOR THE MOORINGS OF ARLINGTON HEIGHTS PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: L.A.C. COORDINATED BY: C.S.L. CHECKED BY: J.F.H. APPROVED BY: C.P.K.		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PLANNING COMMISSION SUBMISSION		THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
---	--	--	--	-----------------------------------	--	---	--	--	--	--------------------------------------	--	--	--



VOLUNTEER ALL INFORMATION DRAWING NO:		OVERALL FLOOR PLANS A001		REVISIONS NO. DATE DESCRIPTION		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 COORDINATED BY: CHECKED BY: APPROVED BY: I.A.C. C.S.L. J.P.H. C.P.K.		 rlps architects® architects • interior planning • interior design 290 VALLEYBROOK DRIVE LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLP		PLANNING COMMISSION SUBMISSION				THIS DRAWING IS THE PROPERTY OF THE ARCHITECT. IT IS TO BE REPRODUCED WITHIN THE ARCHITECT'S PERMISSION AND UNLESS THE NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS BEFORE CONSTRUCTION OF THE WORK WITH THIS WORK.	
SCALE:		DATE:													
COMMISSION NO:		AS NOTED		06/26/2015											
2014104															



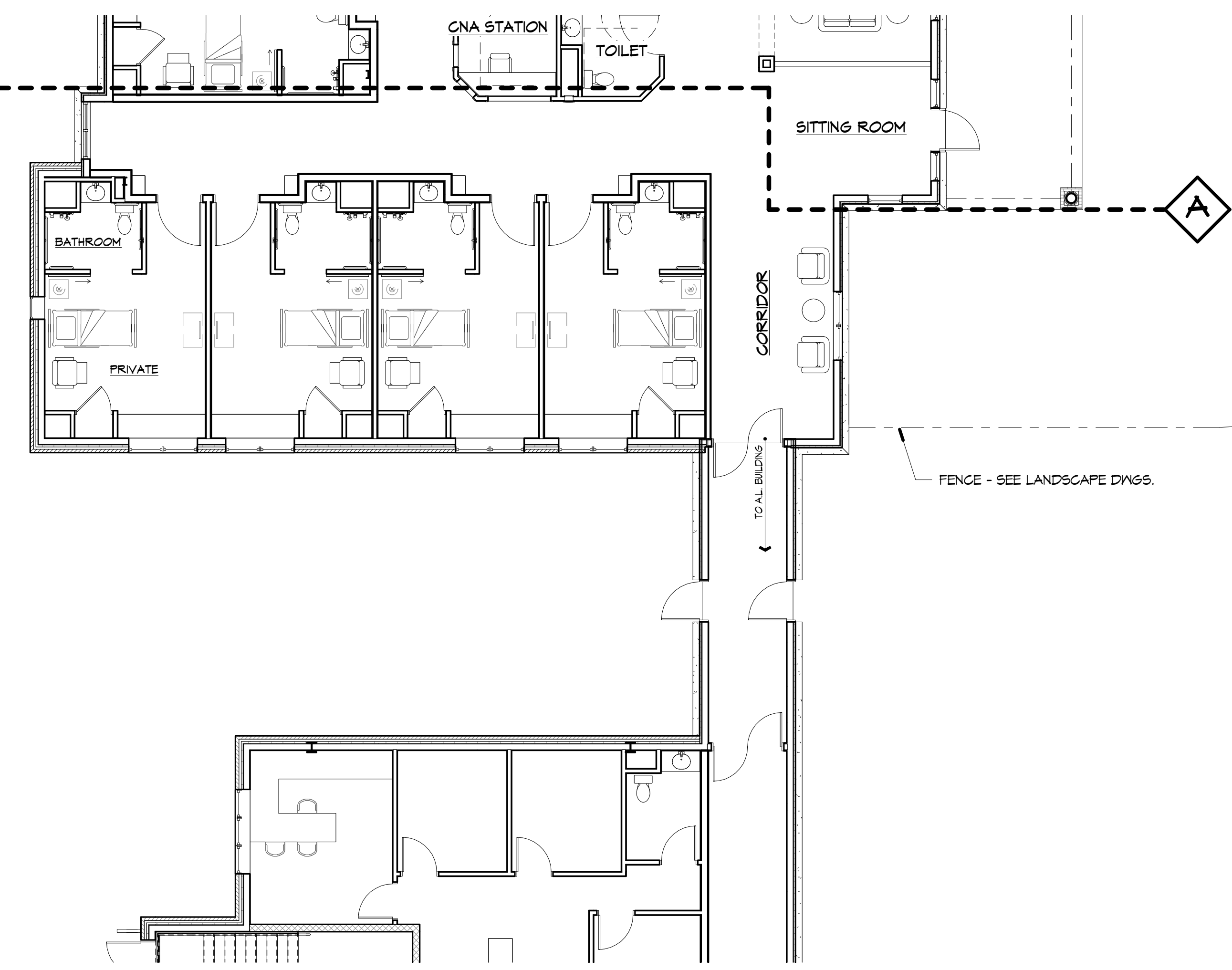
CONTRACT NO. DRAWING NO.		GROUND FLOOR PLAN		REVISIONS		REVISIONS FOR THE MOORINGS OF ARLINGTON HEIGHTS PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: C.S.L. COORDINATED BY: J.H.H. CHECKED BY: J.P.K. APPROVED BY:		rllps architects® master planning • interior design architecture • construction management 2000 W. 12th Street, Suite 200 Arlington Heights, IL 60005 717-560-9501 FAX: 717-560-2373 RLLPS, LLP		PLANNING COMMISSION SUBMISSION						THIS DRAWING IS THE PROPERTY OF RLLPS ARCHITECTS, LLP. IT IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY MANNER WITHOUT THE WRITTEN PER- MIT OF RLLPS ARCHITECTS, LLP. ANY VIOLATION WILL BE PROSECUTED TO THE FULL EXTENT OF THE LAW. IT IS THE NAME OF THE ARCHITECT		CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE PROJECT LOCATION PRIOR TO BEGINNING WORK WITH THE WORK	
SCALE: 1/8" = 1'-0"		DATE: 06/26/2015		AS NOTED															
CONTRACTOR NO. 2014104																			



1 FIRST FLOOR PLAN - AREA A
1/8" = 1'-0"

EXISTING SKILLED CARE BUILDING

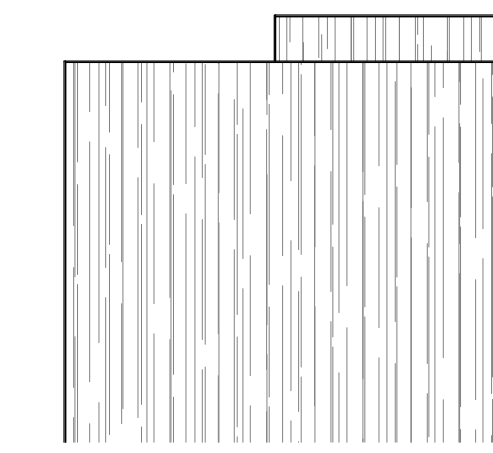
FENCE - SEE LANDSCAPE DWGS.



2 FIRST FLOOR PLAN - AREA B
1/8" = 1'-0"

- FLOOR PLAN GENERAL NOTES**
- WHERE INDICATED, EXTERIOR WALLS OF THE BUILDING SHALL RECEIVE 5/8" GLASS MAT FACED & INS.
 - REFER TO LARGE SCALE PLANS FOR RESIDENT ROOM DOOR NUMBERS.
 - PROVIDE HANDRAIL IV BACKER CHAIRRAIL ON BOTH SIDES OF CORRIDORS. CONTINUE CHAIRRAIL WHERE HANDRAIL TERMINATES.

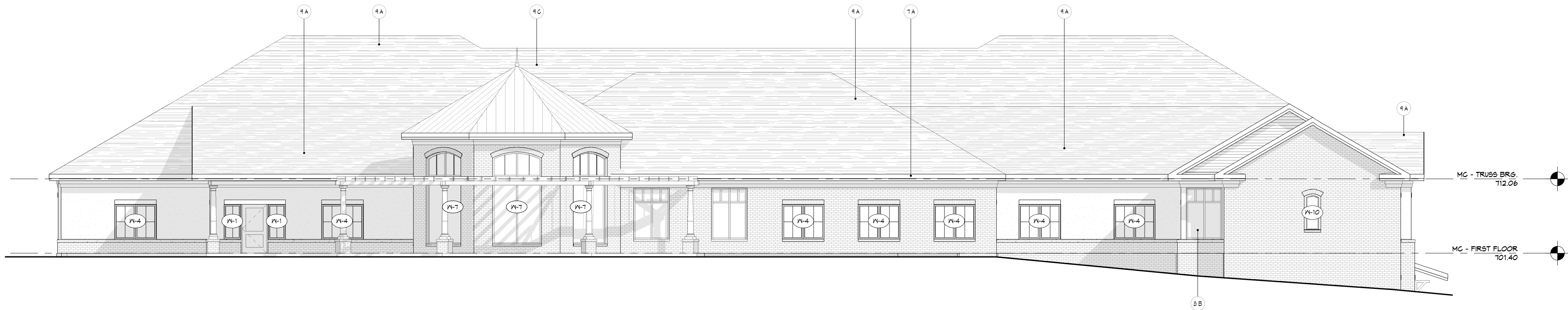
VOLUME IV ALL MEMORY CARE DRAWING NO: A102 COMMISSION NO: 2014104	FIRST FLOOR PLAN	REVISIONS	RENOVATIONS & ADDITIONS TO:			FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: L.A.C. CHECKED BY: J.F.H. APPROVED BY: C.P.K.	rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION	THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, P.C. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
		NO.	DATE	DESCRIPTION	DATE: 06/26/2015 SCALE: AS NOTED				



CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE TIME OF SETTING PILING WITH THE WORK	THIS DRAWING IS THE INSTRUMENT OF SERVICE, IS THE PROPERTY OF THE ARCHITECT, AND SHALL NOT BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE WRITTEN PERMISSION AND/OR SIGNATURE OF THE ARCHITECT	PLANNING COMMISSION SUBMISSION	r ps architects® master planning • interior design architecture • construction 2000 West 10th Street, Suite 111 737-560-9501 FAX: 737-560-2373 RLPs, LLP	THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: J.C.S.L. COORDINATED BY: J.C.S.L. CHECKED BY: J.P.H. APPROVED BY: C.P.K.	R E V I S I O N S		SCALE: 2014/10/20	DATE: 06/26/2015	AS NOTED	SHEET NO. 06/26/2015
					NO.	DESCRIPTION				
ROOF PLAN										
A104										
DRAWING NO. A104										
SHEET NO. 06/26/2015										



WEST ELEVATION
1/8" = 1'-0"



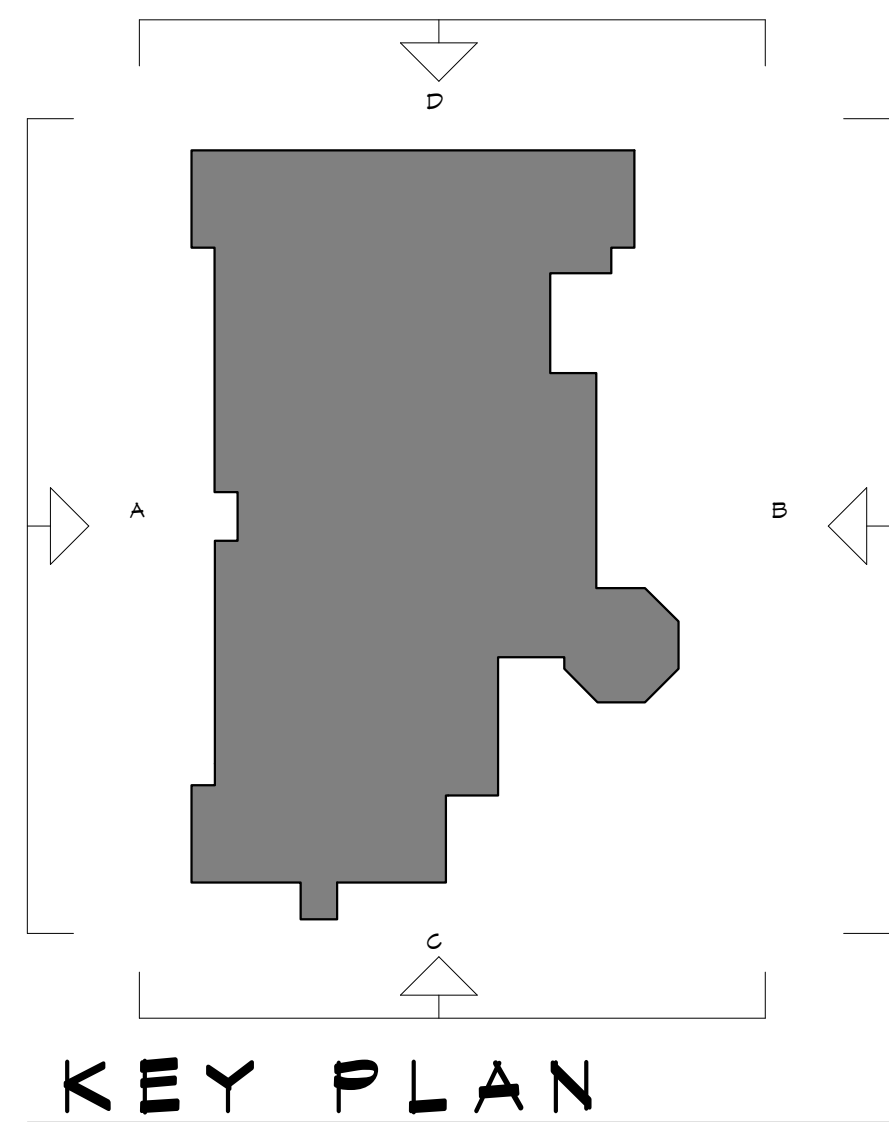
EAST ELEVATION
1/8" = 1'-0"

EXTERIOR ELEVATION KEYED NOTES

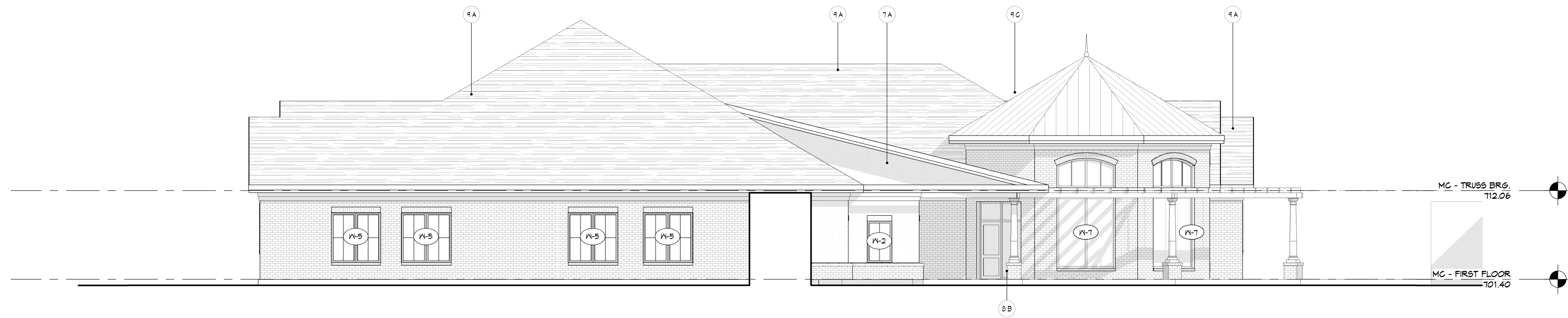
- 4A CAST STONE WATER TABLE
- 7A ALUMINUM FASCIA
- 8B ALUMINUM STOREFRONT SYSTEM
- 9A ASPHALT SHINGLES
- 9B RIDGE VENT
- 9C STANDING SEAM METAL ROOF
- 9D E.P.D.M. ROOFING SYSTEM

EXTERIOR MATERIAL LEGEND

- | | |
|--------------------------------------|---|
| ASPHALT SHINGLES | BRICK TYPE - 1:
STANDARD FACE BRICK |
| STANDING SEAM ROOF | FIBER CEMENT SIDING - 1:
6" EXPOSURE |
| EXTERIOR INSULATION
FINISH SYSTEM | FIBER CEMENT PANELS |



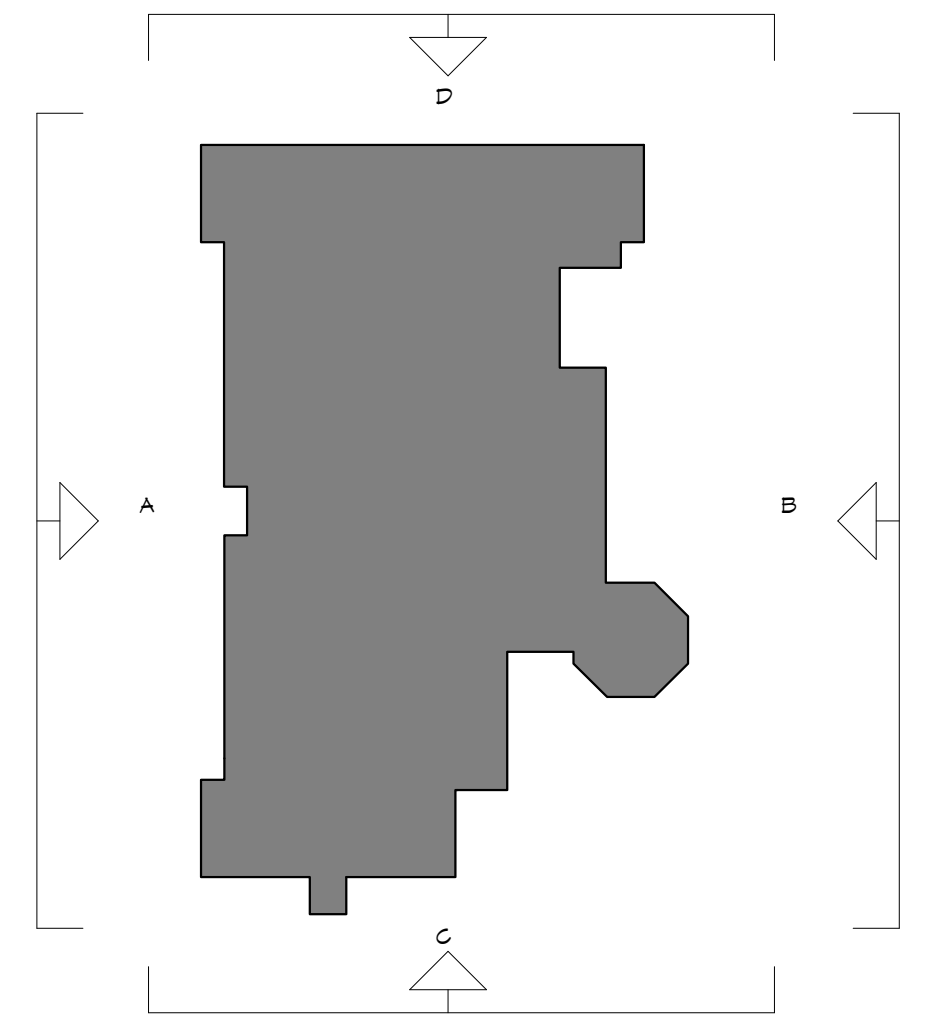
VOLUME IV ALL MEMORY CARE DRAWING NO: A201 COMMISSION NO: 2014104	REVISIONS NO. DATE DESCRIPTION	EXTERIOR ELEVATIONS DATE: 06/26/2015 SCALE: AS NOTED	FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: L.A.C. COORDINATED BY: C.S.L. CHECKED BY: J.H.H. APPROVED BY: C.P.K.		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION				THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, P.C. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS IT IS IDENTIFIED AS SUCH WITH THE NAME OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.



C SOUTH ELEVATION
1/8" = 1'-0"



D NORTH ELEVATION
1/8" = 1'-0"



KEY PLAN

EXTERIOR MATERIAL LEGEND

	ASPHALT SHINGLES		BRICK TYPE - 1: STANDARD FACE BRICK
	STANDING SEAM ROOF		FIBER CEMENT SIDING - 1: 6" EXPOSURE
	EXTERIOR INSULATION FINISH SYSTEM		FIBER CEMENT PANELS

EXTERIOR ELEVATION KEYED NOTES

- 4A CAST STONE WATER TABLE
- 1A ALUMINUM FASCIA
- 8B ALUMINUM STOREFRONT SYSTEM
- 9A ASPHALT SHINGLES
- 8B RIDGE VENT
- 9C STANDING SEAM METAL ROOF
- 9D EPDM ROOFING SYSTEM

THIS DRAWING AS AN INSTRUMENT OF SERVICE IS THE PROPERTY OF RLPS ARCHITECTS. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREIN. IT IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT REFLECTS THE DESIGN INTENT OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

**PLANNING
COMMISSION
SUBMISSION**

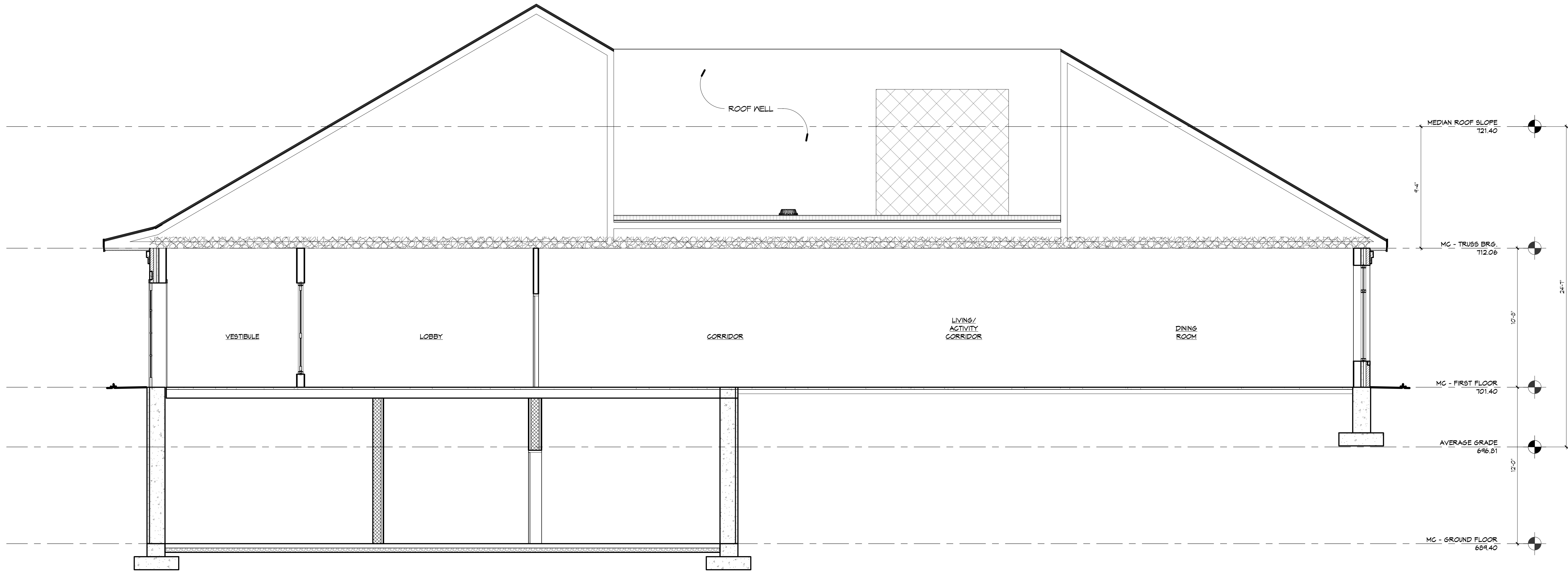
rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

RENOVATIONS & ADDITIONS TO:
THE MOORINGS OF ARLINGTON HEIGHTS
FOR
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: L.A.C. CHECKED BY: J.F.H. APPROVED BY: C.P.K.
COORDINATED BY: C.S.L.

REVISIONS	
NO.	DESCRIPTION

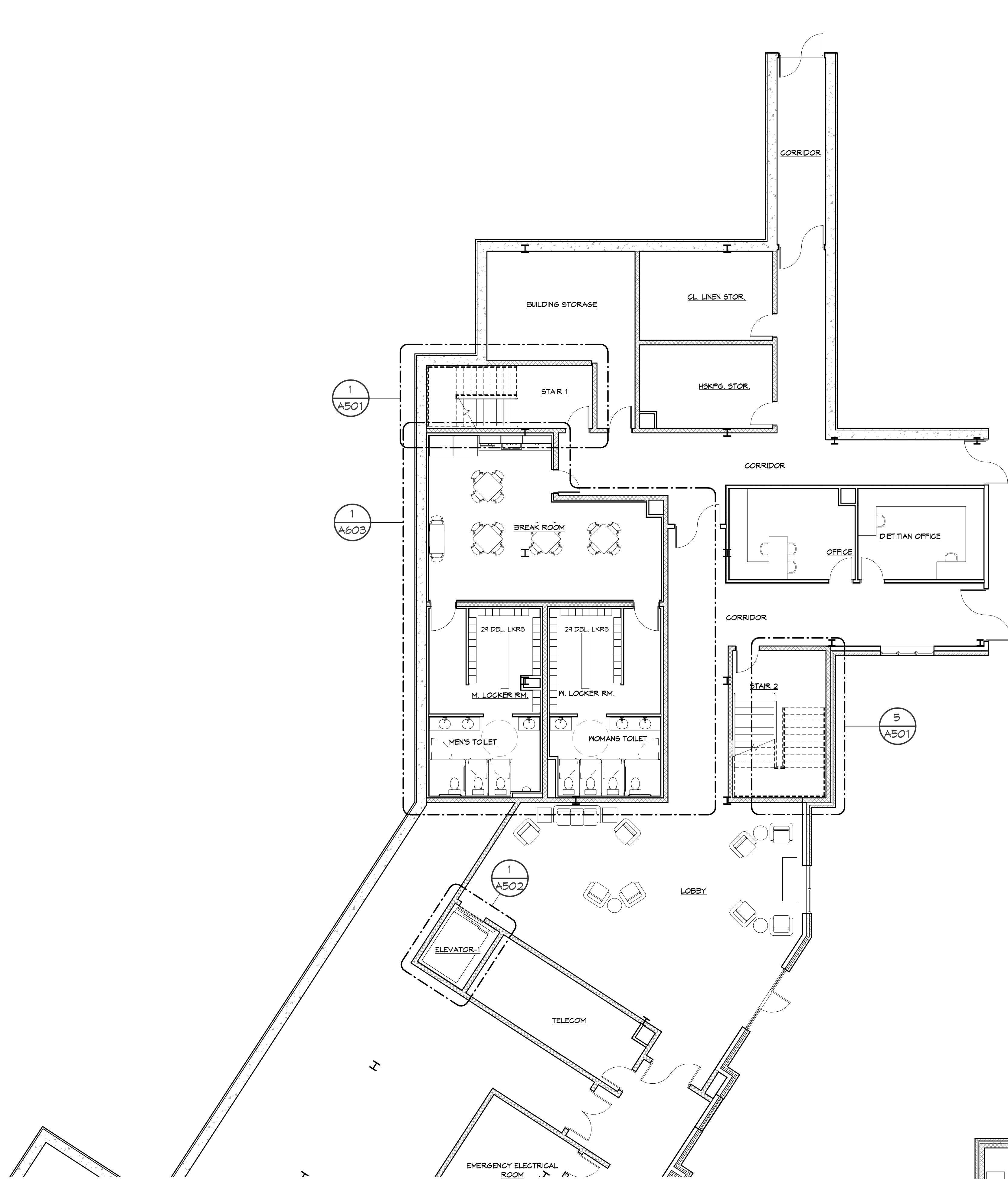
EXTERIOR ELEVATIONS
DATE: 06/26/2015
SCALE: AS NOTED

VOLUME IV
ALL MEMORY CARE
DRAWING NO: **A202**
COMMISSION NO: 2014104



1 BUILDING SECTION
1/4" = 1'-0"

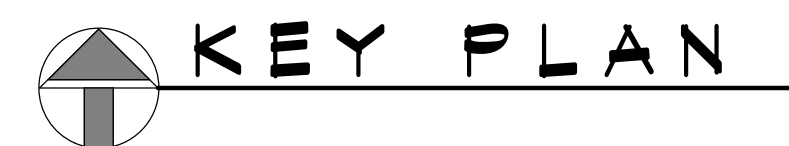
VOLUME IV ALL MEMORY CARE DRAWING NO: A401 COMMISSION NO: 2014104	BUILDING SECTIONS		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: L.A.C. COORDINATED BY: C.S.L. CHECKED BY: J.H.H. APPROVED BY: C.P.K.		rmps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PLANNING COMMISSION SUBMISSION	THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RMP ARCHITECTS, P.C. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE SPECIFIED, IT IS THE PROPERTY OF THE ARCHITECT.	CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
	SCALE: AS NOTED	DATE: 06/26/2015								



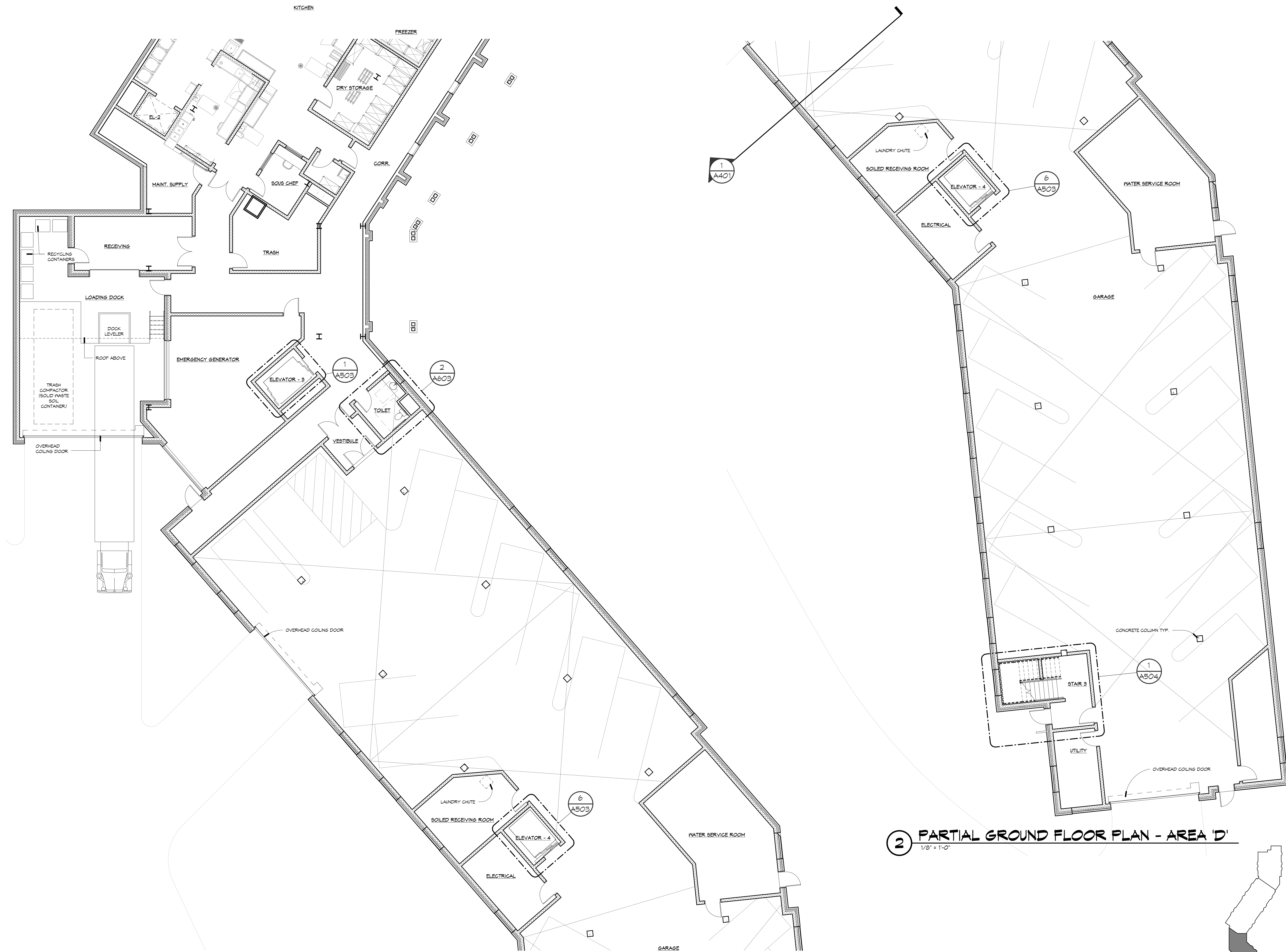
1 PARTIAL GROUND FLOOR PLAN - AREA 'A'
1/8" = 1'-0"



2 PARTIAL GROUND FLOOR PLAN - AREA 'B'
1/8" = 1'-0"



VOLUME II ASSISTED LIVING DRAWING NO. A101 COMMISSION NO. 2014104		PARTIAL GROUND FLOOR PLAN - AREAS 'A' & 'B' SCALE: AS NOTED DATE: 09/01/2015		<table><tr><th colspan="3">R E V I S I O N S</th></tr><tr><th>NO.</th><th>DATE</th><th>DESCRIPTION</th></tr><tr><td> </td><td> </td><td> </td></tr></table>			R E V I S I O N S			NO.	DATE	DESCRIPTION				RENOVATIONS & ADDITIONS TO: THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: S.J.M. CHECKED BY: J.F.H. APPROVED BY: C.P.K.			 rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPs, LLP		PROGRESS SET - NOT FOR CONSTRUCTION				THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS® AND IS NOT TO BE REPRODUCED OR COPIED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE INDICATED, THE NAME OF THE ARCHITECT CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
R E V I S I O N S																										
NO.	DATE	DESCRIPTION																								

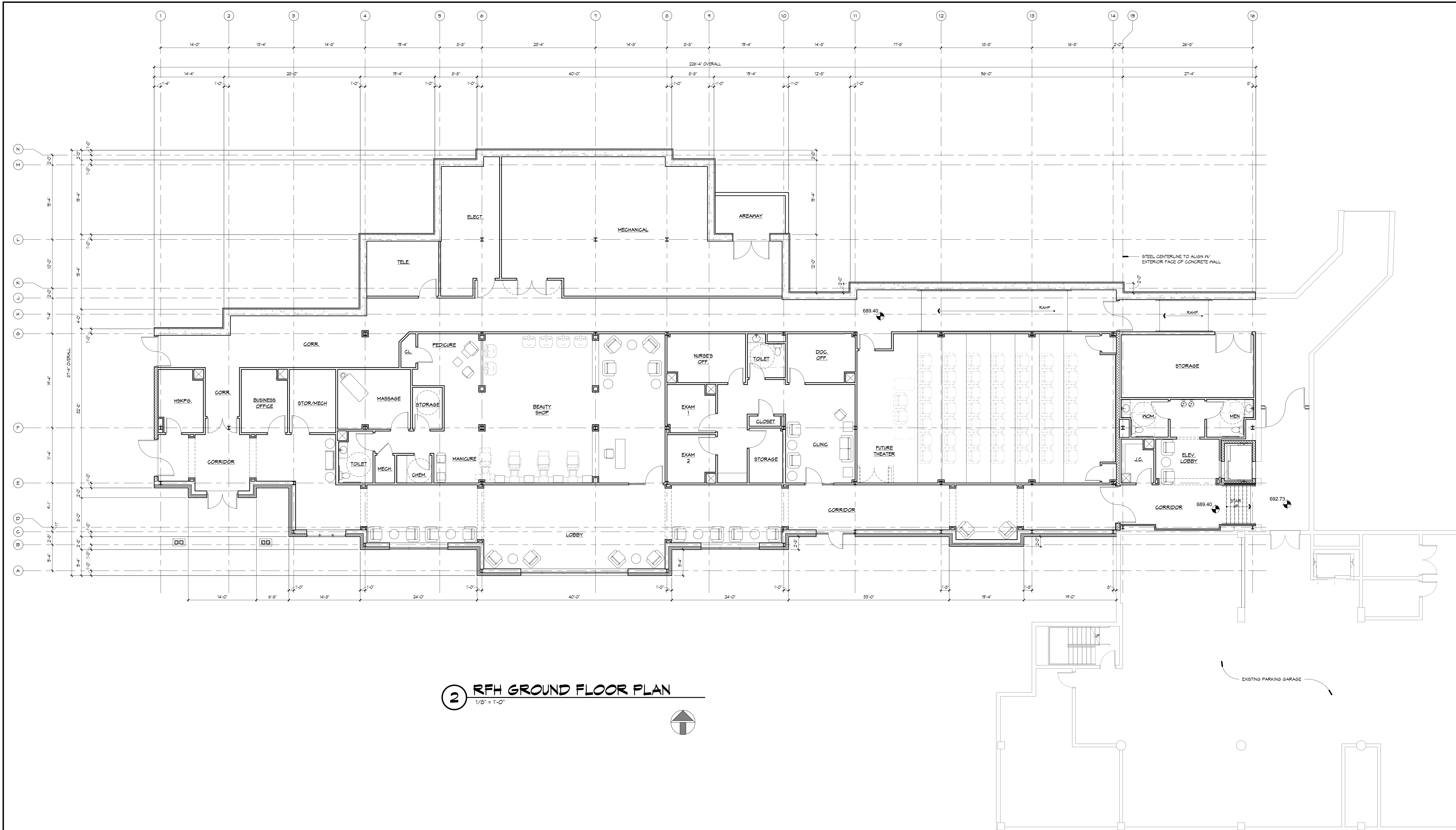


1 PARTIAL GROUND FLOOR PLAN - AREA 'C'
1/8" = 1'-0"

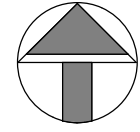
2 PARTIAL GROUND FLOOR PLAN - AREA 'D'
1/8" = 1'-0"



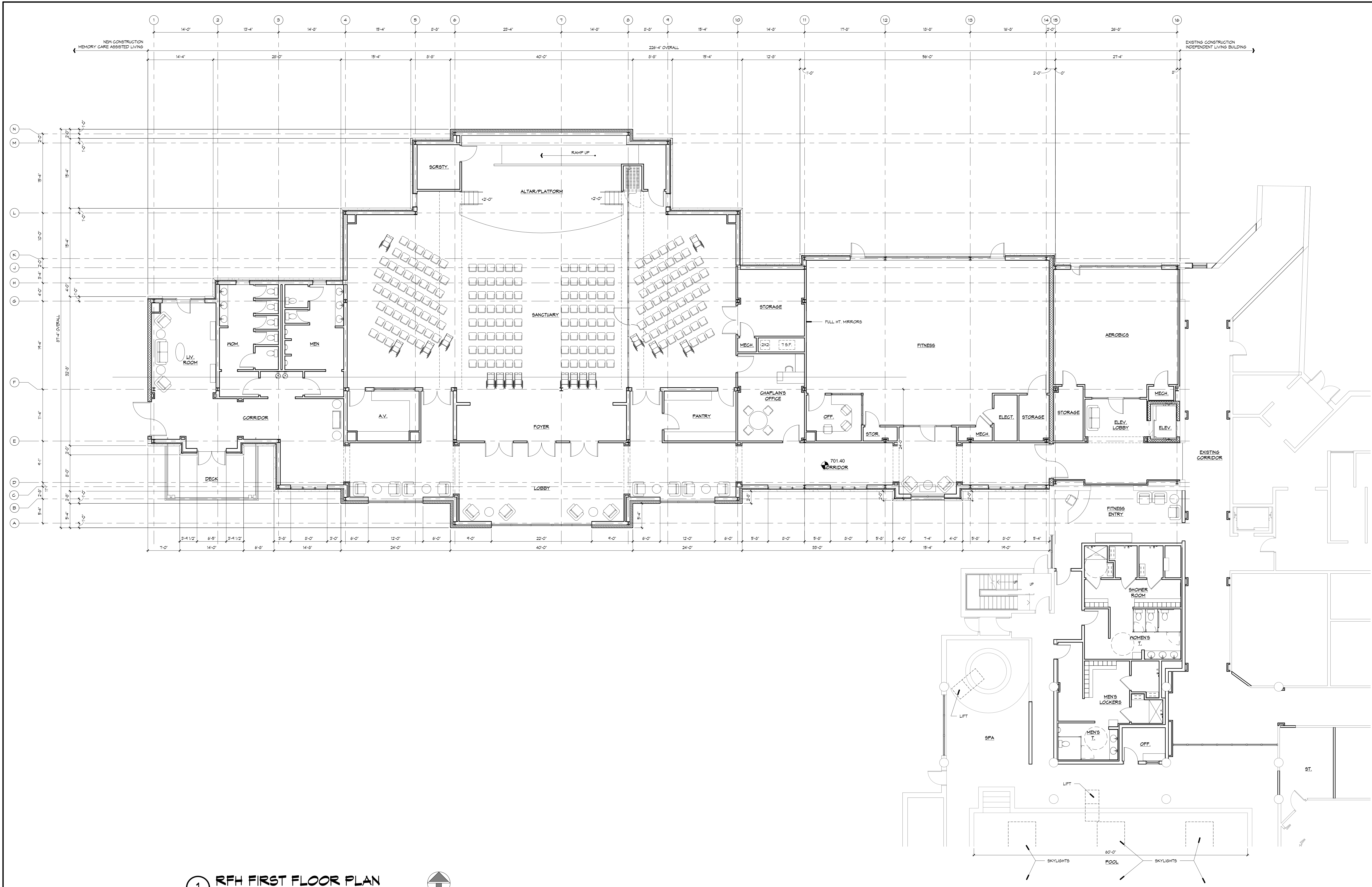
VOLUME II ASSISTED LIVING DRAWING NO: A102 COMMISSION NO: 2014104		PARTIAL GROUND FLOOR PLAN - AREAS 'C' & 'D'		SCALE: AS NOTED	DATE: 09/01/2015	REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: SJM. COORDINATED BY: CS.L. CHECKED BY: JFH.L. APPROVED BY: CJK.		 rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP		PROGRESS SET - NOT FOR CONSTRUCTION				THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF THE ARCHITECT, AND MAY NOT BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, WITHOUT THE ARCHITECT'S PERMISSION. THE ARCHITECT TAKES NO RESPONSIBILITY FOR CONSTRUCTION CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.	
						NO.		DATE		DESCRIPTION							



2 RFH GROUND FLOOR PLAN
1/8" = 1'-0"



VOLUME III RFH & COMMONS DRAWING NO: A101	COMMISSION NO: 2014104	LOWER LEVEL PLAN		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005		rpls architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RPLS, LLP		PROGRESS SET - NOT FOR CONSTRUCTION	THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RPLS ARCHITECTS, P.C. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCHITECT'S PERMISSION AND UNLESS OTHERWISE NOTED, IT IS THE PROPERTY OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
		DATE: 09/01/2015	SCALE: AS NOTED	NO.:	DATE:	NO.:	DATE:	DESIGNER: SJM	CHECKED BY: CSL		



1 RFH FIRST FLOOR PLAN
1/8" = 1'-0"

VOLUME III RFH & COMMONS DRAWING NO: A102	COMMISSION NO: 2014104	SCALE: AS NOTED	DATE: 09/01/2015	FIRST FLOOR PLAN		REVISIONS		THE MOORINGS OF ARLINGTON HEIGHTS FOR PRESBYTERIAN HOMES 811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005 DRAWN BY: SJM COORDINATED BY: CS.L CHECKED BY: JFH APPROVED BY: CJK		rlps architects® architecture • master planning • interior design 250 VALLEYBROOK DRIVE, LANCASTER, PA 17601 717-560-9501 FAX: 717-560-2373 RLPS, LLP	PROGRESS SET - NOT FOR CONSTRUCTION	THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, P.C. AND IS NOT TO BE REPRODUCED WITHOUT THE ARCH- ITECT'S PERMISSION AND UNLESS SPECIFICALLY NOTED OTHERWISE, IT REPRESENTS THE DESIGN INTENT OF THE NAME OF THE ARCHITECT. CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.
				NO.	DATE	DESCRIPTION						



D-Series LED Bollard



d^{series}

Specifications

Diameter: 8" Round
(20.3 cm)

Height: 42"
(106.7 cm)

Weight (max): 27 lbs
(12.25 kg)



SB1(A) & SB1(S)

Notes

Type

Hit the Tab key or mouse over the page to see all interactive elements.

Introduction

The D-Series LED Bollard is a stylish, energy-saving, long-life solution designed to perform the way a bollard should—with zero uplight. An optical leap forward, this full cut-off luminaire will meet the most stringent of lighting codes. The D-Series LED Bollard's rugged construction, durable finish and long-lasting LEDs will provide years of maintenance-free service.

Ordering Information

EXAMPLE: DSXB LED 16C 700 40K SYM MVOLT DDBXD

DSXB LED								
Series	LEDs	Drive current	Color temperature	Distribution	Voltage	Control options	Other options	Finish <i>(required)</i>
DSXB LED	Asymmetric	350 350 mA	30K 3000 K	ASY Asymmetric¹	MVOLT⁵	Shipped installed	Shipped installed	DWHXD White
	12C 12 LEDs¹	450 450 mA^{3,4}	40K 4000 K	SYM Symmetric²	120⁵	PE Photoelectric cell, button type	SF Single fuse (120, 277, 347V)^{4,7}	DNAXD Natural aluminum
		530 530 mA	50K 5000 K		208⁵	DMG 0-10V dimming driver (no controls)	DF Double fuse (208, 240V)^{4,7}	DDBXD Dark bronze
	Symmetric	700 700 mA	AMBPC Amber phosphor converted		240⁵	ELCW Emergency battery backup⁶	H24 24" overall height	DBLXD Black
	16C 16 LEDs²		AMBLW Amber limited wavelength^{3,4}		277⁵		H30 30" overall height	DBTDX Textured dark bronze
					347⁴		H36 36" overall height	DBLBXD Textured black
							FG Ground-fault festoon outlet	DNATXD Textured natural aluminum
							L/AB Without anchor bolts	DWHGXD Textured white
							L/AB4 4-bolt retrofit base without anchor bolts⁸	

SB1 (A) DSXB LED 12C 700 30K ASY

SB1 (S) DSXB LED 16C 350 30K SYM

Accessories

Ordered and shipped separately.

MRAB U Anchor bolts for DSXB⁸

NOTES

- Only available in the 12C, ASY version.
- Only available in the 16C, SYM version.
- Only available with 450 AMBLW version.
- Not available with ELCW.
- MVOLT driver operates on any line voltage from 120-277V (50/60 Hz). Specify 120, 208, 240 or 277 options only when ordering with fusing (SF, DF options), or photocontrol (PE option).
- Not available with 347V. Not available with fusing. Not available with 450 AMBLW.
- Single fuse (SF) requires 120, 277, or 347 voltage option. Double fuse (DF) requires 208 or 240 voltage option.
- MRAB U not available with L/AB4 option.



Performance Data

Lumen values are from photometric tests performed in accordance with IESNA LM-79-08. Data is considered to be representative of the configurations shown, within the tolerances allowed by Lighting Facts. Actual performance may differ as a result of end-user environment and application. Actual wattage may differ by +/- 8% when operating between 120-480V +/- 10%.

Light Engines	Drive Current	System Watts	3000 K					4000 K					5000 K					Limited Wavelength Amber				
			Lumens	LPW	B	U	G	Lumens	LPW	B	U	G	Lumens	LPW	B	U	G	Lumens	LPW	B	U	G
Asymmetric 3 Engines (12 LEDs)	350	16	715	45	1	0	1	889	56	1	0	1	953	60	1	0	1					
	530	22	985	45	1	0	1	1,239	56	1	0	1	1,334	61	1	0	1					
	700	31	1,263	41	1	0	1	1,588	51	1	0	1	1,712	55	1	0	1					
	Amber 450	16																348	22	1	0	1
Symmetric 4 Engines (16 LEDs)	350	20	923	46	1	0	1	1,161	58	1	0	1	1,251	63	1	0	1					
	530	28	1,274	46	1	0	1	1,603	57	1	0	1	1,726	62	1	0	1					
	700	39	1,634	42	1	0	1	2,055	53	1	0	1	2,215	57	1	0	1					
	Amber 450	20																419	21	1	0	1

Note: Available with phosphor-converted amber LED's (nomenclature AMBPC). These LED's produce light with 97+% >530 nm. Output can be calculated by applying a 0.7 factor to 4000 K lumen values and photometric files.

Projected LED Lumen Maintenance

Data references the extrapolated performance projections for the platforms noted in a **25°C ambient**, based on 10,000 hours of LED testing (tested per IESNA LM-80-08 and projected per IESNA TM-21-11).

To calculate LLF, use the lumen maintenance factor that corresponds to the desired number of operating hours below. For other lumen maintenance values, contact factory.

Operating Hours	0	25,000	50,000	100,000
Lumen Maintenance Factor	1.00	0.98	0.97	0.95

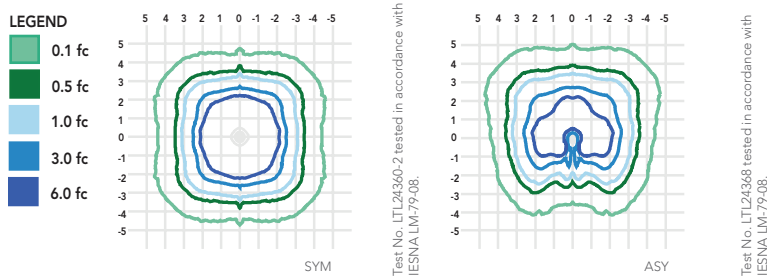
Electrical Load

Light Engines	Drive Current (mA)	System Watts	Current (A)				
			120	208	240	277	347
12C	350	16W	0.158	0.118	0.114	0.109	0.105
	530	22W	0.217	0.146	0.136	0.128	0.118
	700	31W	0.296	0.185	0.168	0.153	0.139
	Amber 450	16W	0.161	0.120	0.115	0.110	0.106
16C	350	20W	0.197	0.137	0.128	0.121	0.114
	530	28W	0.282	0.178	0.162	0.148	0.135
	700	39W	0.385	0.231	0.207	0.185	0.163
	Amber 450	20W	0.199	0.139	0.130	0.123	0.116

Photometric Diagrams

To see complete photometric reports or download .ies files for this product, visit Lithonia Lighting's [D-Series Bollard homepage](#).

Isofootcandle plots for the DSXB LED 700 40K. Distances are in units of mounting height (3').



FEATURES & SPECIFICATIONS

INTENDED USE

The rugged construction and maintenance-free performance of the D-Series LED Bollard is ideal for illuminating building entryways, walking paths and pedestrian plazas, as well as any other location requiring a low-mounting-height light source.

CONSTRUCTION

One-piece 8-inch-round extruded aluminum shaft with thick side walls for extreme durability, and die-cast aluminum reflector and top cap. Die-cast aluminum mounting ring allows for easy leveling even in uneven areas and full 360-degree rotation for precise alignment during installation. Three ½" x 11" anchor bolts with double nuts and washers and 3-5/8" max. bolt circle template ensure stability. Overall height is 42" standard.

FINISH

Exterior parts are protected by a zinc-infused super durable TGIC thermoset powder coat finish that provides superior resistance to corrosion and weathering for maximum retention of gloss and luster. A tightly controlled multi-stage process ensures a minimum 3-mil thickness for a finish that can withstand the elements without cracking or peeling. Available in both textured and non-textured finishes.

OPTICS

Two 0% uplight optical distributions are available: symmetrical and asymmetrical. IP66 sealed LED light engine provides smoothly graduated illumination without uplight. Light engines are available in standard 4000 K (>70 CRI) or optional 3000 K (>80 CRI) or 5000 K (67 CRI). Limited-wavelength amber LEDs are also available.

ELECTRICAL

Light engines consist of high-efficacy LEDs mounted to metal-core circuit boards to maximize heat dissipation and promote long life (L95/100,000 hours at 700mA at 25°C). Class 2 electronic drivers are designed for an expected life of 100,000 hours with < 1% failure rate. Electrical components are mounted on a removable power tray.

LISTINGS

CSA certified to U.S. and Canadian standards. Light engines are IP66 rated. Rated for -40°C minimum ambient. Cold-weather emergency battery backup rated for -20°C minimum ambient.

DesignLights Consortium® (DLC) qualified product. Not all versions of this product may be DLC qualified. Please check the DLC Qualified Products List at www.designlights.org to confirm which versions are qualified.

WARRANTY

Five-year limited warranty. Complete warranty terms located at www.acuitybrands.com/CustomerResources/Terms_and_conditions.aspx.

Note: Specifications subject to change without notice.



APPLICATION

Small aperture medium distribution downlight is suitable for commercial, retail and institutional applications that require an energy saving, long life LED lamp source, high lumen output and excellent color rendering characteristics.

PRODUCT DATA

REFLECTOR: The parabolic reflector redirects spill light from the lamp, and eliminates high angle glare. A one half-inch overlap flange is standard. Supplied standard with Specular Clear Alzak, other reflector finishes are available in order to provide maximum flexibility to the designer.

DECORATIVE ACCESSORY: Round disc is fabricated from soda lime glass (ICE6) or borosilicate glass (ICE6BS) and is suspended from reflector by satin stainless hardware. Glass features a frosted center ring with center opening.

HOUSING: Heavy gauge galvanized steel housing provides a secure mounting platform for the electrical components and protects the optical assembly. Standard plaster flange allows one inch ceiling thickness with custom depth available. LED module is accessible from below.

MOUNTING: Universal Mounting brackets adjust vertically 5.5" and accept C-channel or rigid bars (see optional accessories).

ELECTRICAL: Standard 120 to 277 VAC, 50-60 Hz. Optional 347V (E3).

JUNCTION BOX: Heavy gauge galvanized junction box pre-wired with grounding pigtail. Easy access covers. Multiple conduit knockouts listed for through branch circuit wiring.

LED MODULE & DRIVER: LED Module and Driver are manufactured by Philips Lighting. Remote phosphor technology insures color consistency from fixture to fixture.

DIMMING: Standard product is compatible with 0-10 volt dimming controls. See below for additional options.

HEAT MANAGEMENT: Engineered heat sink provides passive cooling for optimum heat management of the LED engine.

6VLEDSP

Lumens	Wattage	Typical Delivered Lumens	Efficacy (LPW)
1100	16.3	935	57.4
1500	19.8	1275	64.4
2000	27.3	1700	62.3
3000	39	2550	65.4

• Expected lamp life to be 50,000 hours with 70% lumen maintenance when ambient temperatures do not exceed 45°C. Lower ambient temperatures yield longer lamp life.

6VLEDMD

Lumens	Wattage	Typical Delivered Lumens	Efficacy
1100	16.3	1012	62.1
1500	19.8	1380	69.7
2000	27.3	1840	67.4
3000	39	2760	70.8

CRI = 80. Specifications based on Fortimo GEN 4 LED module by Philips Lighting after 100 hours.

Catalog #:

6VLED

Example: 6VLED11004K

Fixture Series	Lumens	Color Temp.	Dimming
6VLED	1100	4K (4000K)	blank 0-10V, 10%
	1500	35K (3500K)	D8 0-10V, 1%
	2000	3K (3000K)	DE4 Lutron EcoSys 4 wire, 1%
	3000	27K (2700K)	D7 Lutron 3 wire, 1%
			D1 120V Trailing Edge, 10%
			DT1 120V Lutron 2 wire, 1%
			ELD Eldo LED 0-10V, 0%
			DAL Dali, 1%
			DMX DMX, 10% [^]
			DMX8 DMX, 1% [^]
			DMXELD DMX, 0% [^]

[^]interfaced through 0-10V driver

Optional Accessories

Hanger Bars (set of 2)

- ☐ 101782 = #520 Caddy Bars
- ☐ 9127 = 27" C-Channel
- ☐ 24CBH = 24" one-piece B-Line C-Channel hanger bar
- ☐ 26UBH = interlocking hanger bars expand to 26"
- ☐ 9152 = 52" C-Channel
- ☐ 27BH = 27" Solid Bar

SD1 - 6VLED 1500 3K - 6VLEDMSCLPF

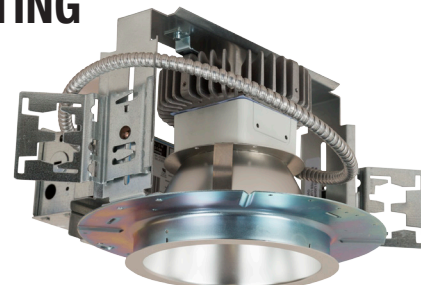
Coven
Architectural Series

SD1

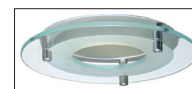
SERIES 6VLED Recessed LED Downlight 1100-3000 Lumen Fortimo DLM

CALIBER[®]
LED LIGHTING

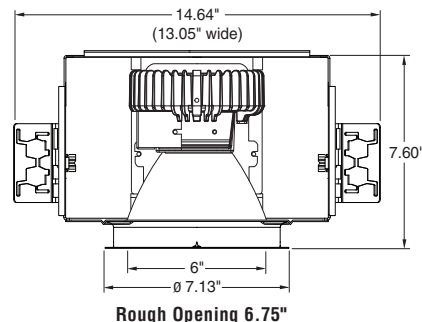
**5 Year
Warranty**



For Wet Location
Under Covered Ceiling



Available with
suspended
decorative
glass disc.



Series 6VLED - Recessed LED Downlight - 1100-3000 Lumen Fortimo DLM

6VLED

Example: 6VLEDMDSCCLPF

Trim	Trim Finish w/polished flange
6VLEDSP	Spot 42° Downlight Reflector
6VLEDMD	Medium 58° Downlight Reflector
	SCLPF - Soft Specular Clear Alzak
	HAZPF - Haze Alzak
	MWH - Matte White
	ICE6 - Decorative Glass Accessory

For white painted flange, drop "PF" from Catalog #.
For other finishes, consult reflector section.

Options

- ☐ EM[^] = Emergency Battery Pack w/remotely located Test Switch
- ☐ IEM[^] = EM Battery Pack w/ Integral Test Switch. (Not Available for Wet Location or Lensed Fixtures)
- ☐ E3[^] = 347V Input
- ☐ X = Provision for Suspended Glass Lens (ICE6)

[^] E3, DMX, DMX8 and DMXELD not compatible with Emergency Battery Option.

Manufactured and tested to UL#1598 and CSA standards.
Fixtures are not designed for direct contact with insulation.

All Pathway[®] products meet or exceed requirements as established by the National Electrical Code. Specifications subject to change without notice.
Alzak[®] is a registered trademark of Alcoa.

PATHWAY[®]
the Lighting Source

Pathway Lighting Products, Inc., P.O. Box 591, Old Saybrook, CT 06475-0591
voice 800.342.0592 • fax 800.207.0090 • www.pathwaylighting.com • e-mail: sales@pathwaylighting.com

LDF28.0
CAUEUR

PHOTOMETRIC DOWNLIGHT DISTRIBUTION

Catalog No. - 6VLED30003K/6VLEDSPSCLPF
Lumens - 3000 (2550 delivered)
Spacing Criteria - .72
Efficacy - 65.4 (delivered LPW)

Catalog No. - 6VLED30003K/6VLEDMDSCCLPF
Lumens - 3000 (2760 delivered)
Spacing Criteria - 1.00
Efficacy - 70.8 (delivered LPW)

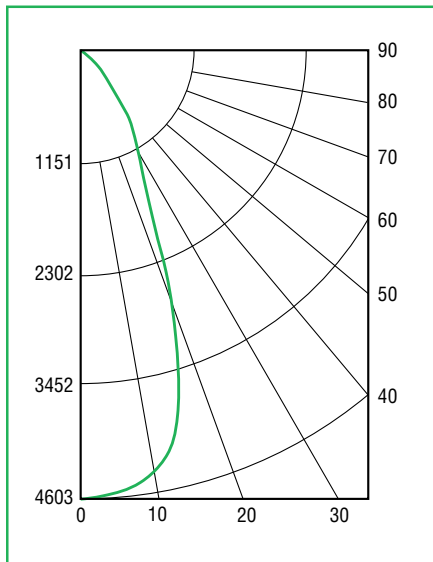
ZONAL LUMENS SUMMARY

ZONE	LUMENS	% OF LUMINAIRE
0-30	2011.15	80.70
0-40	2404.37	96.50
0-60	2492.23	100.00
0-80	2492.23	100.00
0-90	2492.23	100.00
90-180	0.05	0.00
0-180	2492.28	100.00

CANDELA

VERTICAL ANGLE	0
0	4603.068
5	4540.512
15	3832.232
25	1568.994
35	818.463
45	176.771
55	.597
65	0
75	0
85	0
90	0

CANDELA DISTRIBUTION



AVERAGE LUMINANCE

ANGLE	CD/M ²
45	13692
55	57
65	0
75	0
85	0

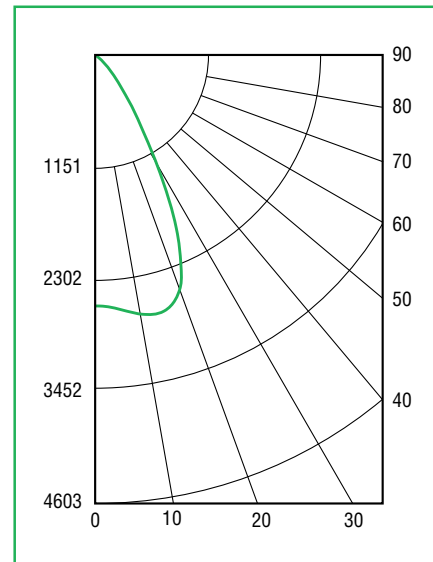
ZONAL LUMENS SUMMARY

ZONE	LUMENS	% OF LUMINAIRE
0-30	1904.22	78.30
0-40	2333.67	95.90
0-60	2430.95	99.90
0-80	2433.12	100.00
0-90	2433.26	100.00
90-180	0.00	0.00
0-180	2433.26	100.00

CANDELA

VERTICAL ANGLE	0
0	2576.276
5	2617.257
15	2719.308
25	2046.142
35	628.795
45	94.589
55	2.596
65	1.667
75	.506
85	.068
90	0

CANDELA DISTRIBUTION



AVERAGE LUMINANCE

ANGLE	CD/M ²
45	7326
55	248
65	216
75	107
85	43

1843 LED CARSON CITY SERIES

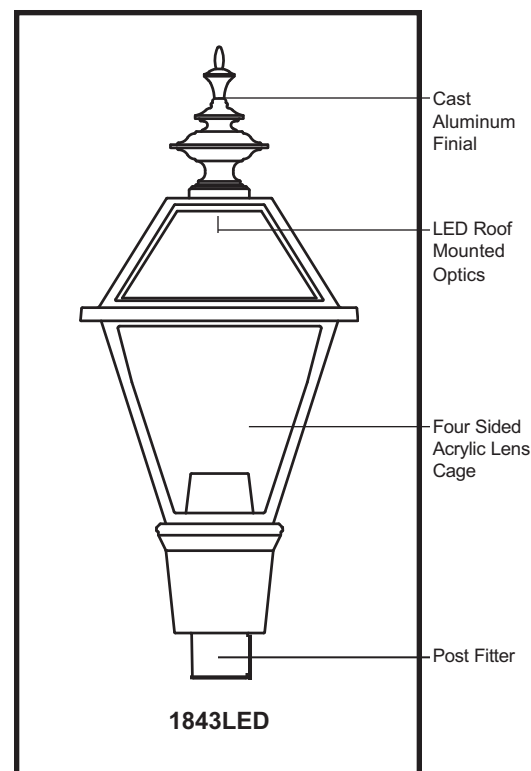
SP1 (III) & SP1 (V)

LUMINAIRE DESIGN

- The 1843 LED Carson City series is large scale, traditionally styled colonial fixture featuring a tapered four-sided cage and roof.
- The four-paneled roof shall be appointed with a decorative cast aluminum finial.
- The luminaire shall measure 18¹/₄" wide and 41³/₄" tall.
- The luminaire shall have a hinged roof for easy inside access.
- The luminaire shall be supplied with line-ground, line-neutral and neutral-ground electrical surge protection in accordance with IEEE/ANSI C62.41.2 guidelines.
- The luminaire shall be U.L. or E.T.L. listed in U.S. and Canada.

POST FITTER

- The fitter or base shall be heavy wall cast aluminum, alloy for high tensile strength.
- The fitter shall have an inside diameter opening to accept a 3" diameter pole or tenon. When ordered with a Sternberg aluminum pole, the fitter shall be secured to the pole top or tenon with set screws.



EPA = 3.77 (ft²)
WEIGHT = 55 LBS

DRIVER HOUSING

- The LED driver housing shall be heavy wall cast aluminum for high tensile strength.
- The LED driver shall be attached to the driver housing to ensure high capacity heat sinking of driver thermals, keeping the driver cooler and ensuring long life.
- The LED driver shall be supplied with a quick-disconnect electrical connector on the power supply, providing an easy power connection.

LIGHT SOURCES

- The luminaire shall use high output, high brightness LEDs.
- The LEDs shall be mounted in arrays, on printed circuit boards designed to maximize heat transfer to the heat sink surface.
- The LED arrays shall be mounted to minimize up-light.
- The LEDs shall be attached to the printed circuit board with not less than 90% pure silver to insure optimal electrical and thermal conductivity.
- The LEDs and printed circuit boards shall be protected from moisture and corrosion by a conformal coating of 1 to 3 mils.
- The LEDs and printed circuit board construction shall be environmentally friendly and 100% recyclable. They shall not contain lead, mercury or any other hazardous substances and shall be RoHS compliant.
- The LED life rating shall be determined in accordance with IESNA LM-80.

1843 LED CARSON CITY SERIES

SPECIFICATIONS

**LIST NO.
1843 LED
CARSON CITY
SERIES**

OPTICS

- The luminaire shall be provided with individual, acrylic, refractor type optics applied to each LED.
- The luminaire shall provide Type ____ (II, **III** or **V**) light distribution per the IESNA classifications. Testing shall be done in accordance with IESNA LM-79.

PERFORMANCE

- The LED arrays are built in series-parallel circuits which maintain overall light output in the event of single LED failures.
- The LEDs and LED driver shall operate over a -40°C (-40°F) to +50°C (122°F) ambient air temperature range.
- The High Performance white LEDs will have a life expectancy of approximately 70,000 hours with not less than 70% of original brightness (lumen maintenance), rated at 25°C.
- The High Brightness, High Output LED's shall be 4500K (3500K or 6000K option) color temperature with a minimum of 75 CRI.
- The luminaire shall have a minimum _____ (see table) initial delivered lumen rating when operated at steady state with an average ambient temperature of 25°C (77°F).

SP1 (V)

112 White Cree LEDs (6ARCS & 1RND) w/ Type V Optics/Heatsink roof top optic 1843 Luminaire w/prismatic acrylic lenses Advance driver #LEDINTA0700C21 0FO Elect: 120V 1.054A 126.2W

Light Source	Initial Delivered Lumens	Fixture Watts	Light Source	Initial Delivered Lumens	Fixture Watts
10A1R60T5	12500	189	10A1R60T3	11475	189
10A1R45T5	10325	189	10A1R45T3	9300	189
10A1R35T5	9180	189	10A1R35T3	8155	189
6A1R60T5	8800	125	6A1R60T3	7580	125
6A1R45T5	7360	125	6A1R45T3	6140	125
6A1R35T5	6600	125	6A1R35T3	5380	125
6ARC60T5	6715	97	6ARC60T3	5850	97
6ARC45T5	5615	97	6ARC45T3	4750	97
6ARC35T5	5035	97	6ARC35T3	4170	97
4ARC60T5	4170	66	4ARC60T3	3750	66
4ARC45T5	3660	66	4ARC45T3	3290	66
4ARC35T5	3430	66	4ARC35T3	3050	66
3ARC60T5	3470	52	3ARC60T3	2970	52
3ARC45T5	2920	52	3ARC45T3	2420	52
3ARC35T5	2630	52	3ARC35T3	2130	52

SP1 (III)

84 White Cree LEDs (6ARCS) w/ Type III Optics/Heatsink roof top optic 1843 Luminaire w/prismatic acrylic lenses Advance driver #LEDINTA0700C 210FO Elect: 120V 0.812A 97.2W

1843 LED CARSON CITY SERIES

SPECIFICATIONS

**LIST NO.
1843 LED
CARSON CITY
SERIES**

ELECTRONIC DRIVER

- The driver shall be U.L. or E.T.L. Recognized
- The driver shall have overload as well as short circuit protection.
- The driver shall be a DC voltage output, constant current design, 50/60HZ.
- The driver shall have a minimum efficiency of 90%.
- The driver shall be rated at full load with THD<20% and a power factor of greater than 0.90.
- The driver shall contain over-heat protection which reduces output to less than half rating if the case temperature reaches 85°C.

LUMINAIRIE HOUSING

- The luminaire shall be made of heavy wall cast aluminum alloy.
- The luminaire shall be provided with a cast aluminum roof with optimized heat sinks to provide maximum life and performance for the LED light sources.
- The lens panels shall be made of vandal resistant, clear seeded acrylic (CSA). Available in optional clear textured acrylic (CTA), prismatic acrylic (PA) or white acrylic (WA).

ARMS

- The arms shall be cast aluminum and/or extruded aluminum.
- Arms with decorative filigree shall have meticulously detailed scroll work and gracefully curved brackets.
- The arms shall be pre-wired for ease of installation.
- The arms shall be bolted to a post mount adaptor which is welded to the pole to ensure proper alignment to the base.
- (Twin TA and Twin 579 arms) The arms shall be attached to a decorative center hub which will fit the center tenon of the pole (not shown).

PHOTOCELL OPTIONS

Electronic Button Cell Option

- Photocells shall electronic button type.
- On single or multi-fixture poles, the photocell shall be mounted in the pole shaft on an access plate.

The photocell is not pre-wired since driver are mounted in the fitters and packaged separately.

- The photocell shall turn on at 1.5 foot-candle and turn off 5-10 seconds at no more than 2-3 foot-candles.
- The photocell is 120-277 volt.



1843 LED CARSON CITY SERIES

SPECIFICATIONS

**LIST NO.
1843 LED
CARSON CITY
SERIES**

FINISH

- Prior to coating, the luminaire shall be chemically cleaned and etched in a 5-stage washing system which includes alkaline cleaning, rinsing, phosphoric etching, reverse-osmosis water rinsing and non-chrome sealing to ensure corrosion resistance and excellent adhesion for the finish coat.
- The finish coat shall be an electrostatically applied semi-gloss, super durable polyester powder coat, baked on at 400°F, to provide a durable, color retentive finish.
- *The optional _____ (Verde Green or Swedish Iron) finish shall be hand-brushed using a 3-step process. * (OPTION)

WARRANTY

- The luminaire shall be free from all defects in materials and workmanship for a period of seven (7) years from the date of manufacture.
- The luminaire manufacturer shall warrant the LED boards/system, during the stated warranty period, against failure defined as more than three (3) simultaneous non-operating LEDs.
- The driver shall be warranted for seven (7) years.

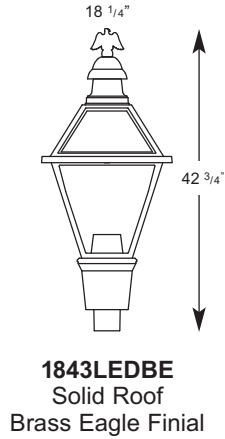
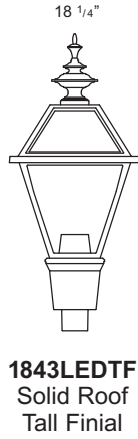
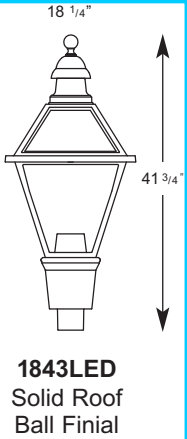


1843 LED CARSON CITY

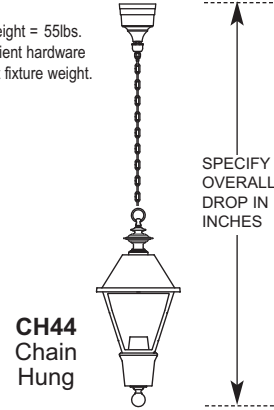
FIXTURES / FITTERS / ARMS PM - WB

FIXTURES

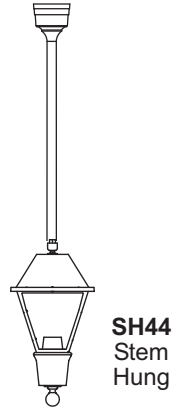
HANGING BRACKETS*



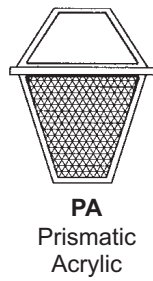
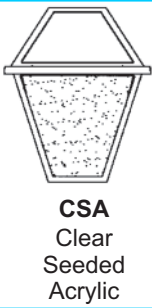
***NOTE:**
Fixture weight = 55lbs.
Use sufficient hardware
to support fixture weight.



SPECIFY
OVERALL
DROP IN
INCHES

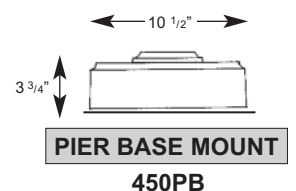
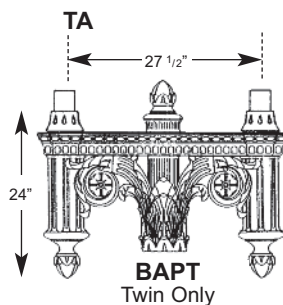
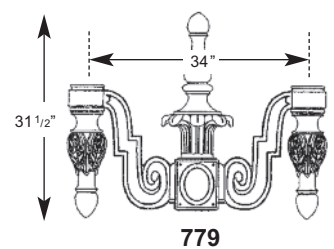
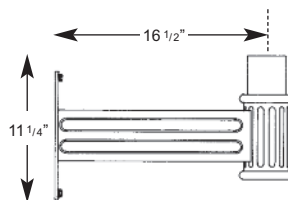
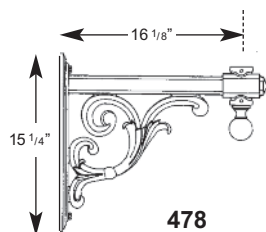
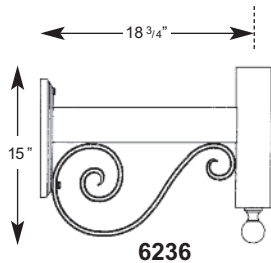
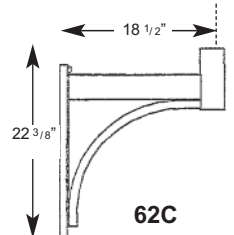
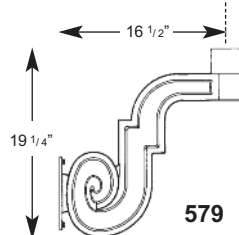
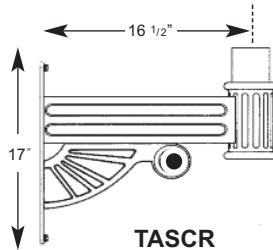
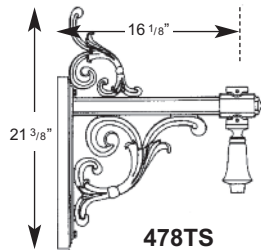
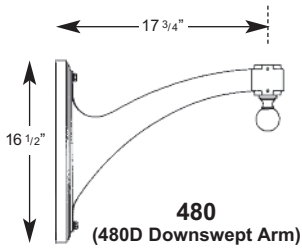


LENSES



ARMS - POST MOUNT (PM) or WALL BRACKETS (WB)

See Arms Section for more information



BUILDING A PART NUMBER

POST & ARM FIXTURES

ARM MOUNTED FIXTURE CENTER
POST TOP FIXTURE (PT) POST POST CAP LIGHT SOURCE DRIVER LENS OPTIONS FINISH

NO. OF ARMS FIXTURE/POSTARM ACORN/FITTER (See Post Section)

— / 1843LED PT / 3610FP4 / / 16A1R45T5 / ML / CSA / PEC / BKT

WALL FIXTURES

FIXTURE/WALLBRACKET LIGHT SOURCE DRIVER LENS OPTIONS FINISH

1843LEDTF/480WB / 6A1R45T5 / ML / CSA / PEC / BKT

PIER BASE
Uses same information boxes as wall fixture

1843LEDBE/450PB

FIXTURE / PIER MOUNT

PART NUMBER SELECTIONS

FIXTURES

- 1843LED
- 1843LEDBE
- 1843LEDTF

LENSES

- CSA
- CTA
- PA
- WA

DRIVERS

- ML - 120-277
- MH - 347-480
- MDL - Dimming 120-277
- MDH - Dimming 347-480

POST ARMS

- 478PM
- 478TSPM
- 480PM
- 480DPM
- 62CPM
- 6236PM
- 579PT
- TAPT
- TASCRPT
- 779PT
- BAPT
- Twin Only

HANGING TYPE

- CH44
- SH44

WALL BRACKET ARMS

- 478WB
- 478TSWB
- 480WB
- 480DWB
- 62CWB
- 6236WB
- 579WB
- TAWB
- TASCRWB

PIER BASE

- 450PB

LIGHT SOURCES T5

- 10A1R60T5 189W, 6000K Type V Optics
- 10A1R45T5 189W, 4500K Type V Optics
- 10A1R35T5 189W, 3500K Type V Optics

- 6A1R60T5 125W, 6000K Type V Optics

- 6A1R45T5 125W, 4500K Type V Optics

- 6A1R35T5 125W, 3500K Type V Optics

- 6ARC60T5 97W, 6000K Type V Optics
- 6ARC45T5 97W, 4500K Type V Optics
- 6ARC35T5 97W, 3500K Type V Optics

- 4ARC60T5 66W, 6000K Type V Optics
- 4ARC45T5 66W, 4500K Type V Optics
- 4ARC35T5 66W, 3500K Type V Optics

- 3ARC60T5 52W, 6000K Type V Optics
- 3ARC45T5 52W, 4500K Type V Optics
- 3ARC35T5 52W, 3500K Type V Optics

LIGHT SOURCES T3

- 10A1R60T3 189W, 6000K Type III Optics
- 10A1R45T3 189W, 4500K Type III Optics
- 10A1R35T3 189W, 3500K Type III Optics

- 6A1R60T3 125W, 6000K Type III Optics

- 6A1R45T3 125W, 4500K Type III Optics

- 6A1R35T3 125W, 3500K Type III Optics

- 6ARC60T3 97W, 6000K Type III Optics

- 6ARC45T3 97W, 4500K Type III Optics

- 6ARC35T3 97W, 3500K Type III Optics

- 4ARC60T3 66W, 6000K Type III Optics
- 4ARC45T3 66W, 4500K Type III Optics
- 4ARC35T3 66W, 3500K Type III Optics

- 3ARC60T3 52W, 6000K Type III Optics
- 3ARC45T3 52W, 4500K Type III Optics
- 3ARC35T3 52W, 3500K Type III Optics

STANDARD FINISHES*

- BKT Black Textured
- WHT White Textured
- PGT Park Green Textured
- ABZT Architectural Medium Bronze Textured
- DBT Dark Bronze Textured

*Smooth Finishes are available upon request

CUSTOM FINISHES

- OI Old Iron
- RT Rust
- WBR Weathered Brown
- CD Cedar
- WBK Weathered Black
- TT Two Tone

STERNBERG SELECT FINISHES

- VG Verde Green
- SI Swedish Iron
- OWGT Old World Gray Textured

OPTIONS

- PEC Photocell-Electronic 120-277 Volt
- FHC Frosted Chimney (Not Lighted)
- FHD Dual Fuse and Holder-208, 240, 480 Volt
- BE Brass Eagle Finial
- BF Ball Finial or Font (TA, TASCRT)
- TF Tall Finial
- HL Hi-Low operation*

*Not available on 3ARC

WST LED

Architectural Wall Sconce



Inverted available with
WLU option only.



SW1

Catalog
Number

Notes

Type

Hit the Tab key or mouse over the page to see all interactive elements.

Specifications

Luminaire

Height: 7-1/4"
(18.4 cm)

Width: 16-1/4"
(41.3 cm)

Depth: 9-1/8"
(23.2 cm)

Weight: 17 lbs
(7.7 kg)

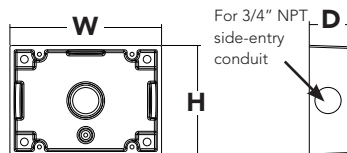


Optional Back Box (BBW)

Height: 4"
(10.2 cm)

Width: 5-1/2"
(14.0 cm)

Depth: 1-1/2"
(3.8 cm)



Introduction

The classic Architectural Wall Sconce is now available with the latest in LED technology. The result is a long-life, maintenance-free product with typical energy savings of 75% compared to metal halide versions. The integral battery backup option provides emergency egress lighting, without the use of a back-box or remote gear, so installations maintain their aesthetic integrity.

The WST LED is ideal for replacing existing 50 – 175W metal halide wall-mounted products. The expected service life is 20+ years of nighttime use.

Ordering Information

EXAMPLE: WST LED 2 10A700/40K SR3 MVOLT DDBTXD

SW1 WST LED 1 10A700/30K SR4 MVOLT

Series	Light Engines	Performance Package	Distribution	Voltage	Mounting	Options ³	Finish (required)
WST LED	1 One engine (10 LEDs)	700 mA options: 10A700/30K 3000K	SR2 Type II	MVOLT ¹	Shipped included	Shipped installed	DDBXD Dark bronze
	2 Two engines (20 LEDs)	10A700/40K 4000K 10A700/50K 5000K	SR3 Type III SR4 Type IV	120 ¹ 208 ¹ 240 ¹ 277 ¹ 347 480	(blank) Surface mount Shipped separately² BBW Surface-mounted back box UT5 Uptilt 5 degrees	PE Photoelectric cell, button type ^{4,5} SF Single fuse (120, 277, 347V) ⁴ DF Double fuse (208, 240, 480V) ⁴ DMG 0-10V dimming driver (no controls) ELCW Emergency battery backup ⁶ WLU Wet location door for up orientation ⁷ PIR Motion/ambient light sensor ⁸ DS Dual switching ⁹ Shipped separately VG Vandal guard WG Wire guard	DBLXD Black DNAXD Natural aluminum DWHXD White DSSXD Sandstone DDBTXD Textured dark bronze DBLBXD Textured black DNATXD Textured natural aluminum DWHGXD Textured white DSSTXD Textured sandstone

Emergency Battery Operation

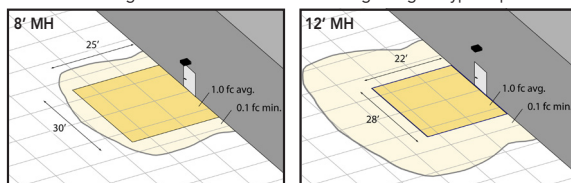
The emergency battery backup (ELCW option) is integral to the luminaire - no external housing required! This design provides reliable emergency operation while maintaining the aesthetics of the product.

All ELCW configurations include an independent secondary driver with an integral relay to immediately detect AC power loss. Dual light engines are wired in parallel so both engines operate in emergency mode and provide additional component redundancy. These design features meet various interpretations of NFPA 70/NEC 2008 - 700.16

The emergency battery will power the luminaire for a minimum duration of 90 minutes (maximum duration of three hours) from the time supply power is lost, per International Building Code Section 1006 and NFPA 101 Life Safety Code Section 7.9, provided luminaires are mounted at an appropriate height and illuminate an open space with no major obstructions.

The examples below show illuminance of 1 fc average and 0.1 fc minimum of the single-engine Type IV product in emergency mode.

WST LED 1 10A700/40K SR4
MVOLT ELCW
10' x 10' Gridlines
8' and 12' Mounting Height



NOTES

- MVOLT driver operates on any line voltage from 120-277V (50/60 Hz). Specify 120, 208, 240 or 277 options only when ordering with photocell (PE), fusing (SF, DF), or dual switching (DS).
- May also be ordered separately as an accessory. Ex: WSBW DDBXD U. Must specify finish.
- Must be ordered with fixture; cannot be field installed.
- Not available with MVOLT option. Button photocell (PE) can be ordered with a dedicated voltage option. Single fuse (SF) requires 120, 277 or 347 voltage option. Double fuse (DF) requires 208, 240 or 480 voltage option.
- Not available with 480V option. Not available with motion/ambient light sensor (PIR).
- Integral battery pack is rated for -20° to 60°C operating temperature. ELCW warranty is 3-year period. Not available with 347V or 480V. Not available with WLU.
- WLU not available with PIR or ELCW.
- Specifies the SensorSwitch SFOD-7-ODP control (photocell included); see Motion Sensor Guide for details. Includes ambient light sensor. Not available with "PE" option (button type photocell). Dimming driver standard. Not available with WLU, VG or WG.
- Provides 50/50 luminaire operation via two independent drivers and light engines on two separate circuits. Not available with one engine, MVOLT, ELCW, WLU, SF, or DF. Must specify voltage; voltage must be the same for both drivers. When ordered with photocell (PE) or motion sensor (PIR), only the primary power source leads will be controlled.



One Lithonia Way • Conyers, Georgia 30012 • Phone: 800.279.8041 • Fax: 770.918.1209 • www.lithonia.com
© 2011-2015 Acuity Brands Lighting, Inc. All rights reserved.

WST-LED
Rev. 08/11/15

Performance Data

Lumen Output

Lumen values are from photometric tests performed in accordance with IESNA LM-79-08. Data is considered to be representative of the configurations shown, within the tolerances allowed by Lighting Facts.

Light Engines	Drive Current (mA)	Performance Package	System Watts (MVOLT ¹)	Dist. Type	40K (4000K, 70 CRI)				
					Nominal Lumens	B	U	G	LPW
1 (10 LEDs)	700	10A700/-K	24W	SR2	2,005	1	0	1	84
				SR3	2,029	1	0	1	84
				SR4	1,959	1	0	1	82
2 (20 LEDs)	700	10A700/-K	47W	SR2	3,944	1	0	1	84
				SR3	4,028	1	0	1	86
				SR4	3,851	1	0	1	82

1 See electrical load chart for 347/480V system watts.

Lumen Ambient Temperature (LAT) Multipliers

Use these factors to determine relative lumen output for average ambient temperatures from 0-40°C (32-104°F).

Ambient		Lumen Multiplier
0°C	32°F	1.10
10°C	50°F	1.06
20°C	68°F	1.02
25°C	77°F	1.00
30°C	86°F	0.98
40°C	104°F	0.92

Projected LED Lumen Maintenance

Data references the extrapolated performance projections for the **WST LED 2 10A700** platform in a **25°C ambient**, based on 10,000 hours of LED testing (tested per IESNA LM-80-08 and projected per IESNA TM-21-11).

To calculate LLF, use the lumen maintenance factor that corresponds to the desired number of operating hours below. For other lumen maintenance values, contact factory.

Operating Hours	0	25,000	50,000	100,000
Lumen Maintenance Factor	1.0	0.94	0.88	0.77

Electrical Load

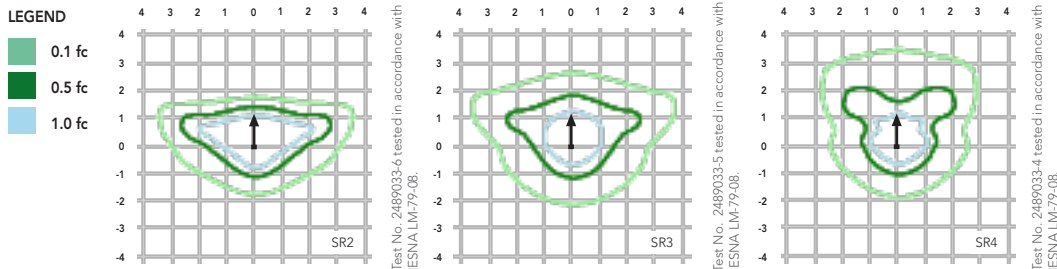
Light Engines	Drive Current (mA)	System Watts	Current (A)					
			120	208	240	277	347	480
1	700	24W	0.24	0.14	0.12	0.1	-	-
		29W ¹	-	-	-	-	0.09	0.07
2	700	47W	0.44	0.27	0.23	0.20	-	-
		53W ¹	-	-	-	-	0.17	0.12

1 Higher wattage is due to electrical losses from step-down transformer.

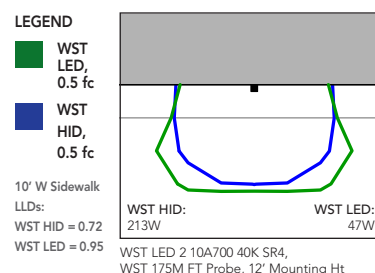
Photometric Diagrams

To see complete photometric reports or download .ies files for this product, visit Lithonia Lighting's [WST LED homepage](#).

Isfootcandle plots for the WST LED 2 10A700/40K SR2, SR3, and SR4. Distances are in units of mounting height (12').



Distribution overlay comparison to 175W metal halide.



FEATURES & SPECIFICATIONS

INTENDED USE

The classic architectural shape of the WST LED was designed for applications such as hospitals, schools, malls, restaurants, and commercial buildings. The long life LEDs and driver make this luminaire nearly maintenance-free.

CONSTRUCTION

The single-piece die-cast aluminum housing integrates secondary heat sinks to optimize thermal transfer from the internal light engine heat sinks and promote long life. The driver is mounted in direct contact with the casting for a low operating temperature and long life. The die-cast door frame is fully gasketed with a one-piece solid silicone gasket to keep out moisture and dust, providing an IP65 rating for the luminaire.

FINISH

Exterior parts are protected by a zinc-infused Super Durable TGIC thermoset powder coat finish that provides superior resistance to corrosion and weathering. A tightly controlled multi-stage process ensures a minimum 3 mils thickness for a finish that can withstand extreme climate changes without cracking or peeling. Standard Super Durable colors include dark bronze, black, natural aluminum, sandstone and white. Available in textured and non-textured finishes.

OPTICS

Precision-molded acrylic lenses are engineered for superior distribution, uniformity, and spacing in wall-mount applications. Light engines are 4000K (70 CRI). The WST LED has zero uplight and qualifies as a Nighttime Friendly™ product, meaning it is consistent with the LEED® and Green Globes™ criteria for eliminating wasteful uplight.

ELECTRICAL

Light engine(s) consist of 10 high-efficacy LEDs mounted to a metal core circuit board and integral aluminum heat sinks to maximize heat dissipation and promote long life (100,000 hrs at 25°C, L77). Class 2 electronic driver has a power factor >90%, THD <20%. Easily-serviceable surge protection device meets a minimum Category B (per ANSI/IEEE C62.41.2).

INSTALLATION

A universal mounting plate with integral mounting support arms allows the fixture to hinge down for easy access while making wiring connections.

LISTINGS

CSA certified to U.S. and Canadian standards. Light engines are IP66 rated; luminaire is IP65 rated and suitable for wet locations when mounted with the lenses down. WLU option offers wet location listing in "up" orientation. Rated for -30°C minimum ambient.

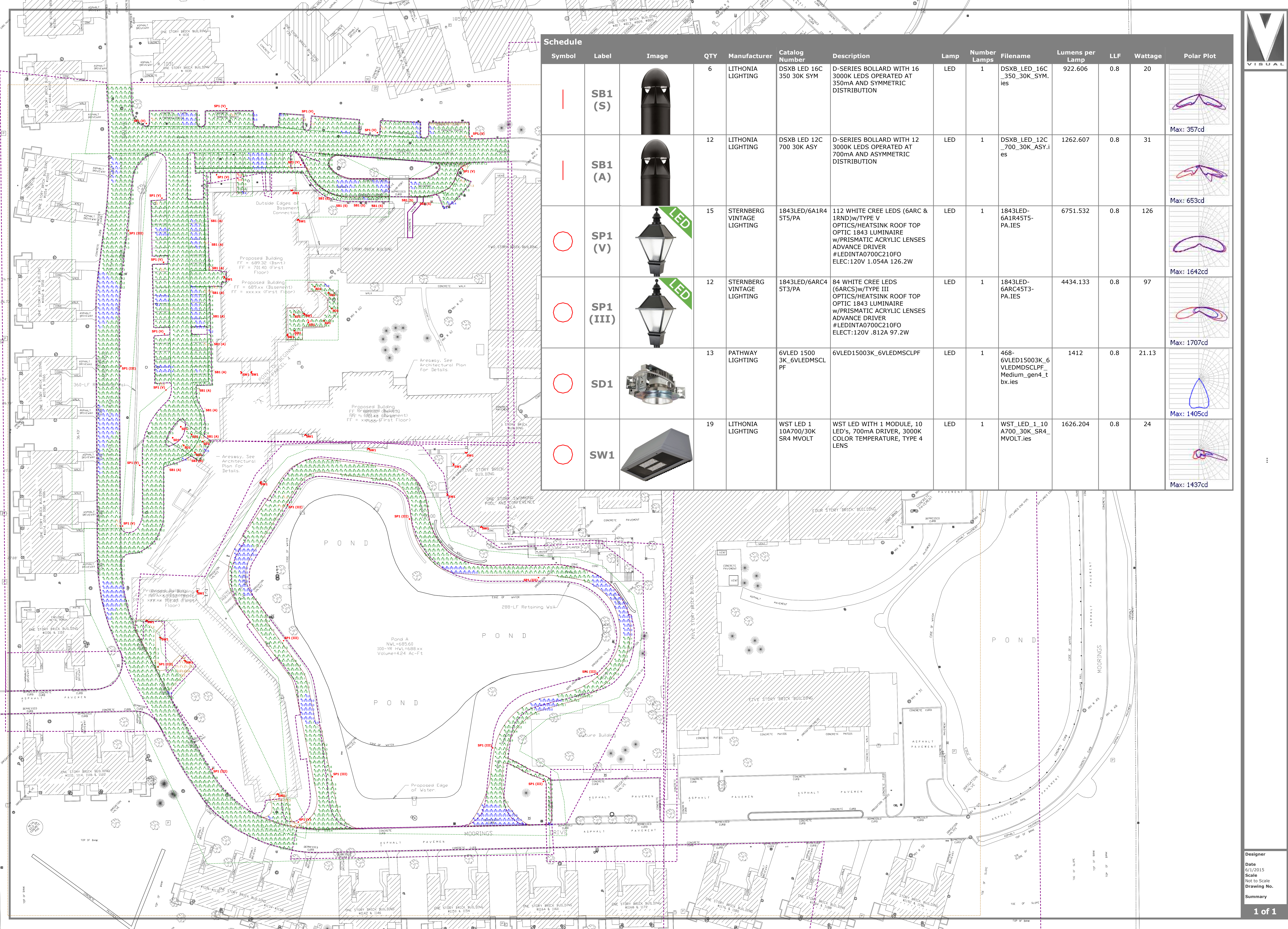
DesignLights Consortium® (DLC) qualified product. Not all versions of this product may be DLC qualified. Please check the DLC Qualified Products List at www.designlights.org to confirm which versions are qualified.

WARRANTY

Five year limited warranty. Full warranty terms located at www.acuitybrands.com/CustomerResources/Terms_and_conditions.aspx.

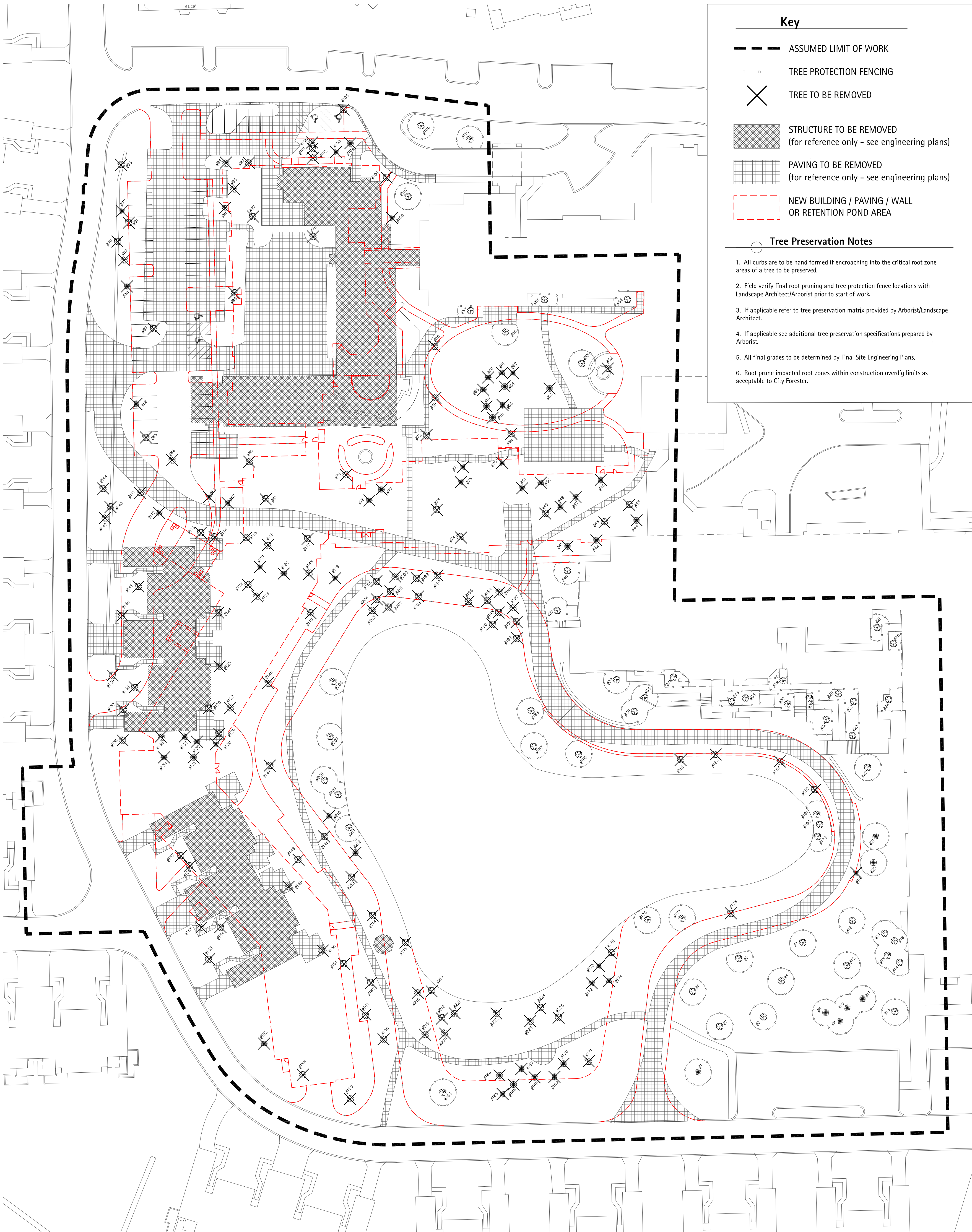
Note: Actual performance may differ as a result of end-user environment and application. All values are design or typical values, measured under laboratory conditions at 25 °C. Specifications subject to change without notice.





Schedule													
Symbol	Label	Image	QTY	Manufacturer	Catalog Number	Description	Lamp	Number Lamps	Filename	Lumens per Lamp	LLF	Wattage	Polar Plot
	SB1 (S)		6	LITHONIA LIGHTING	DSXB LED 16C 350 30K SYM	D-SERIES BOLLARD WITH 16 3000K LEDS OPERATED AT 350mA AND SYMMETRIC DISTRIBUTION	LED	1	DSXB_LED_16C_350_30K_SYM.ies	922.606	0.8	20	 Max: 357cd
	SB1 (A)		12	LITHONIA LIGHTING	DSXB LED 12C 700 30K ASY	D-SERIES BOLLARD WITH 12 3000K LEDS OPERATED AT 700mA AND ASYMMETRIC DISTRIBUTION	LED	1	DSXB_LED_12C_700_30K_ASY.ies	1262.607	0.8	31	 Max: 653cd
○	SP1 (V)		15	STERNBERG VINTAGE LIGHTING	1843LED/6A1R4 5T5/PA	112 WHITE CREE LEDS (6ARC & 1RND)w/TYPE V OPTICS/HEATSINK ROOF TOP OPTIC 1843 LUMINAIRE w/PRISMATIC ACRYLIC LENSES ADVANCE DRIVER #LEDINTA0700C210FO ELEC:120V 1.054A 126.2W	LED	1	1843LED-6A1R45T5-PA.IES	6751.532	0.8	126	 Max: 1642cd
○	SP1 (III)		12	STERNBERG VINTAGE LIGHTING	1843LED/6ARC4 5T3/PA	84 WHITE CREE LEDS (6ARCS)w/TYPE III OPTICS/HEATSINK ROOF TOP OPTIC 1843 LUMINAIRE w/PRISMATIC ACRYLIC LENSES ADVANCE DRIVER #LEDINTA0700C210FO ELEC:120V .812A 97.2W	LED	1	1843LED-6ARC45T3-PA.IES	4434.133	0.8	97	 Max: 1707cd
○	SD1		13	PATHWAY LIGHTING	6VLED 1500 3K_6VLEDMSCL PF	6VLED15003K_6VLEDMSCLPF	LED	1	468-6VLED15003K_6VLEDMSCLPF_Medium_gen4_tbx.ies	1412	0.8	21.13	 Max: 1405cd
○	SW1		19	LITHONIA LIGHTING	WST LED 1 10A700/30K SR4 MVOLT	WST LED WITH 1 MODULE, 10 LED's, 700mA DRIVER, 3000K COLOR TEMPERATURE, TYPE 4 LENS	LED	1	WST_LED_1_10A700_30K_SR4_MVOLT.ies	1626.204	0.8	24	 Max: 1437cd





Key

ASSUMED LIMIT OF WORK

TREE PROTECTION FENCING

TREE TO BE REMOVED

STRUCTURE TO BE REMOVED
(for reference only - see engineering plans)

PAVING TO BE REMOVED
(for reference only - see engineering plans)

NEW BUILDING / PAVING / WALL
OR RETENTION POND AREA

Tree Preservation Notes

1. All curbs are to be hand formed if encroaching into the critical root zone areas of a tree to be preserved.

2. Field verify final root pruning and tree protection fence locations with Landscape Architect/Arborist prior to start of work.

3. If applicable refer to tree preservation matrix provided by Arborist/Landscape Architect.

4. If applicable see additional tree preservation specifications prepared by Arborist.

5. All final grades to be determined by Final Site Engineering Plans.

6. Root prune impacted root zones within construction overdig limits as acceptable to City Forester.

TREE INVENTORY

Client: The Lakota Group
Location: The Moorings, 811 E. Central, Arlington Heights, IL
Date: March 27, 2015

Condition: 5 = Excellent 4 = Good 3 = Fair 2 = Poor 1 = Dead

Tag No.	Size (dbh)	Species	Condition	Location	Status
1	11"	Austrian Pine	5	SE at Green Canopy	Preserved
2	7"	Red Maple	5	SE at Green Canopy	Preserved
3	12"	Green Ash	3	SE at Green Canopy	Preserved
4	6"	Hybrid Maple	5	SE at Green Canopy	Preserved
5	3"	Norway Maple	5	SE at Green Canopy	Preserved
6	3"	Burr Oak	5	SE at Green Canopy	Preserved
7	6.0	Amur Maple	5	SE at Green Canopy	Preserved
8	12"	Scots Pine	5	SE at Green Canopy	Preserved
9	14"	Scots Pine	5	SE at Green Canopy	Preserved
10	12"	Austrian Pine	5	SE at Green Canopy	Preserved
11	13"	Scots Pine	5	SE at Green Canopy	Preserved
12	16"	Honey Locust	5	SE at Green Canopy	Preserved
13	17"	Elm	5	SE at Green Canopy	Preserved
14	6", 5", 6"	Amur Maple	5	SE at Green Canopy	Preserved
15	7", 7"	Amur Maple	5	SE at Green Canopy	Preserved
16	7", 7"	Amur Maple	5	SE at Green Canopy	Preserved
17	6", 5", 5"	Amur Maple	5	SE at Green Canopy	Preserved
18	10"	Maple	5	SE at Green Canopy	Preserved
19	13"	Scots Pine	5	SE at Green Canopy	Removed
20	10"	Scots Pine	5	SE at Green Canopy	Preserved
21	12"	Scots Pine	5	SE at Green Canopy	Preserved
22	7", 6", 8", 7"	Magnolia	5	Terrace	Preserved
23	6"	Bradford Pear	5	Terrace	Preserved
24	10", 5", 10"	Amur Maple	4	Terrace	Preserved
25	10"	Norway Maple	4	Terrace	Preserved
26	3", 3", 3", 3", 3"	Serviceberry	4	Terrace	Preserved
27	4"	Bradford Pear	5	Terrace	Preserved
28	6"	Bradford Pear	5	Terrace	Preserved
29	3", 3", 3", 3", 3"	Serviceberry	5	Terrace	Preserved
30	3", 3", 3", 3"	Japanese Tree Lilac	5	Terrace	Preserved
31	6" Multi-Stem	Magnolia	5	Terrace	Preserved
32	11"	Norway Maple	5	Terrace	Preserved
33	17" Multi-Stem	Amur Maple	5	Terrace	Preserved
34	3"	Weeping Cherry	5	Terrace	Preserved
35	12"	Crabapple	5	Terrace	Preserved
36	3", 3"	Magnolia	5	Terrace	Preserved
37	8"	Crabapple	4	Terrace	Preserved
38	16"	Norway Maple	5	Terrace	Preserved
39	18"	Norway Maple	5	West of Building - East of Lake	Preserved
40	14"	Norway Maple	4	West of Building - East of Lake	Preserved
41	11"	Scots Pine	5	West of Building - East of Lake	Removed
42	12"	Scots Pine	5	West of Building - East of Lake	Removed
43	15"	Norway Maple	5	West of Building - East of Lake	Removed
44	10"	Scots Pine	5	West of Building - East of Lake	Removed
45	13"	Norway Maple	5	West of Building - East of Lake	Removed
46	14"	Douglas Fir	5	West of Building - East of Lake	Removed
47	14"	Scots Pine	5	West of Building - East of Lake	Removed
48	11"	Scots Pine	5	West of Building - East of Lake	Removed
49	16"	Norway Maple	5	West of Building - East of Lake	Removed
50	17"	Douglas Fir	5	West of Building - East of Lake	Removed
51	11", 10"	Douglas Fir	5	West of Building - East of Lake	Removed
52	17"	Concolor Fir	5	West Patio - inside fenced area	Removed
53	31"	Norway Maple	4	West Patio - inside fenced area	Preserved
54	6", 4"	Crabapple	4	West Patio - inside fenced area	Preserved
55	6"	Crabapple	4	West Patio - inside fenced area	Preserved
56	7", 5", 6", 5"	Amur Maple	5	West Patio - inside fenced area	Preserved
57	4", 4", 4", 4"	Japanese Tree Lilac	5	West Patio - inside fenced area	Preserved
58	28"	Honey Locust	5	West Patio - inside fenced area	Removed
59	4", 3", 3", 4"	Japanese Tree Lilac	5	West Patio - inside fenced area	Removed
60	10"	Blue Spruce	4	West Patio - inside fenced area	Removed
61	10"	Blue Spruce	4	West Patio - inside fenced area	Removed
62	15"	Blue Spruce	4	West Patio - inside fenced area	Removed
63	13"	Blue Spruce	4	West Patio - inside fenced area	Removed
64	9"	Blue Spruce	4	West Patio - inside fenced area	Removed
65	11"	Blue Spruce	4	West Patio - inside fenced area	Removed
66	10"	Blue Spruce	4	West Patio - inside fenced area	Removed
67	10"	Blue Spruce	4	West Patio - inside fenced area	Removed
68	14"	Blue Spruce	4	West Patio - inside fenced area	Removed
69	25"	Sugar Maple	3	West Patio - inside fenced area	Removed
70	15"	Douglas Fir	4	West Patio - inside fenced area	Removed
71	10"	Douglas Fir	5	West Patio - inside fenced area	Removed
72	28"	Norway Maple	4	West Patio - inside fenced area	Removed
73	14"	Ginkgo	5	West of Building & Steel Shed	Removed
74	18"	Norway Maple	5	West of Building & Steel Shed	Removed
75	11"	Blue Spruce	5	West of Building & Steel Shed	Removed
76	18"	Norway Maple	5	West of Building & Steel Shed	Removed
77	14"	White Spruce	4	West of Building & Steel Shed	Removed
78	12", 10"	Austrian Pine	5	West of Building & Steel Shed	Removed
79	21"	Norway Maple	3	West of Building & Steel Shed	Removed
80	30"	Ash	4	West of Building & Steel Shed	Removed
81	22"	Silver Maple	4	West of Building & Steel Shed	Removed
82	8"	White Spruce	4	West of Building & Steel Shed	Removed
83	12"	White Spruce	4	West of Building & Steel Shed	Removed
84	20"	Elm	4	West of Building & Steel Shed	Removed
85	37"	Silver Maple	5	West of Building & Steel Shed	Removed
86	13"	Blue Spruce	5	West of Building & Steel Shed	Removed
87	11"	Norway Maple	5	West of Building & Steel Shed	Removed
88	12"	Austrian Pine	5	West of Building & Steel Shed	Removed
89	5", 5", 5"	Amur Maple	4	West of Building & Steel Shed	Removed
90	5", 5", 5", 5", 6"	Amur Maple	4	West of Building & Steel Shed	Removed
91	5", 5", 5"	Amur Maple	4	West of Building & Steel Shed	Removed
92	15"	Austrian Pine	5	West of Building & Steel Shed	Removed
93	16"	Norway Maple	5	West of Building & Steel Shed	Removed
94	29"	Honey Locust	5	West of Building & Steel Shed	Removed
95	6"	Japanese Tree Lilac	5	West of Building & Steel Shed	Removed
96	3"	Magnolia	4	West of Building & Steel Shed	Removed
97	7"	Red Maple	3	West of Building & Steel Shed	Removed
98	4"	Bradford Pear	5	West of Building & Steel Shed	Removed
99	3"	Crabapple	5	West of Building & Steel Shed	Removed
100	6", 4", 5"	Japanese Tree Lilac	5	North of Rehabilitation Services	Removed
101	4"	Japanese Tree Lilac	5	North of Rehabilitation Services	Removed
102	6", 5", 4"	Japanese Tree Lilac	5	North of Rehabilitation Services	Removed
103	20"	Austrian Pine	5	North of Rehabilitation Services	Removed
104	21"	Austrian Pine	5	North of Rehabilitation Services	Removed

LAKOTA
THE LAKOTA GROUP INC

116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS
OF ARLINGTON
HEIGHTS

Arlington Heights,
Illinois

Presbyterian
Homes

PLAN
COMMISSION
8/21/2015
NOT FOR
CONSTRUCTION

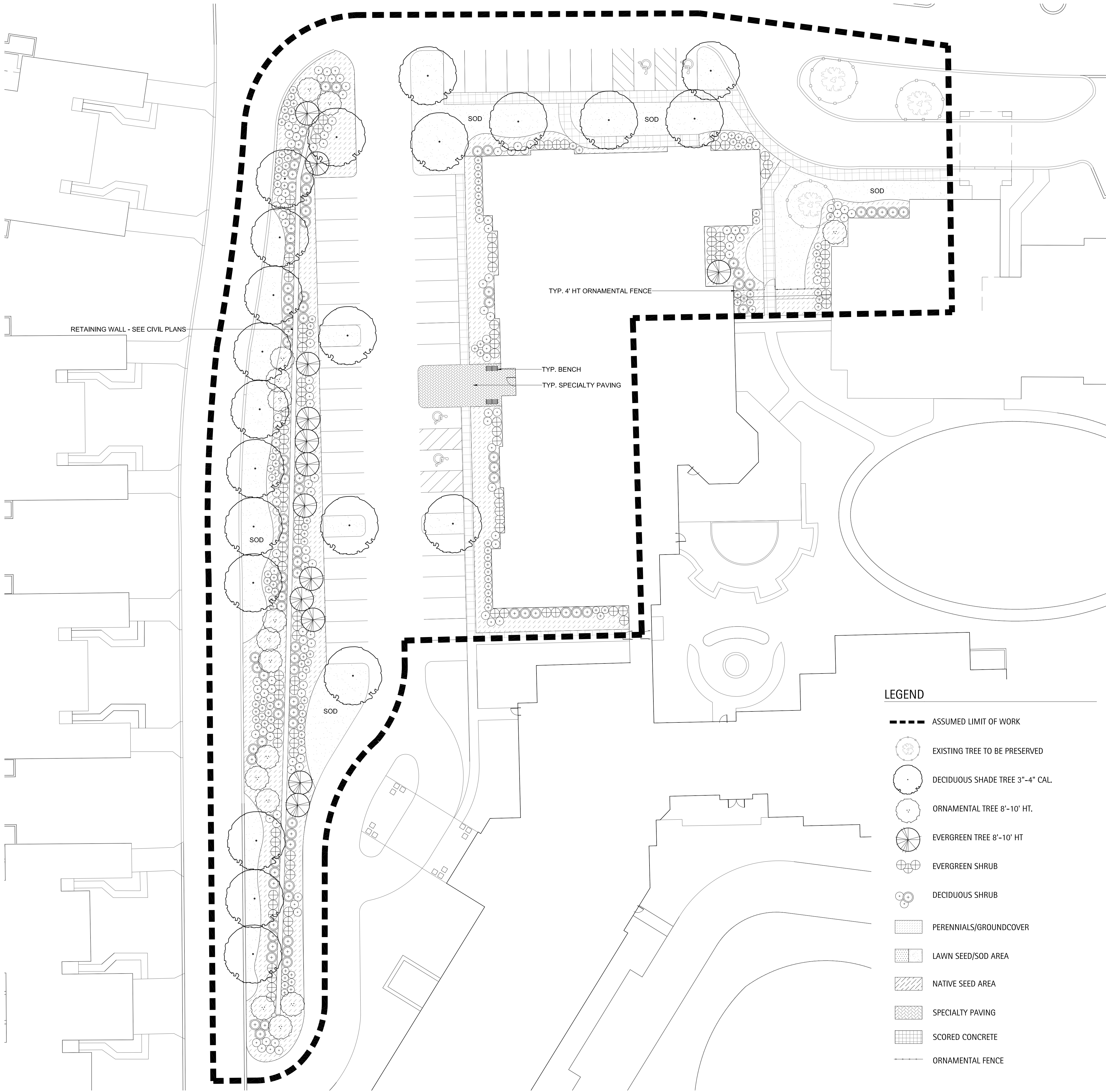
TREE SURVEY /
PRESERVATION
PLAN

Revisions
PLAN COMMISSION 06/22/15
PLAN COMMISSION 08/21/15

Date: 08/18/15
Drawn By: JW/MK
Checked By: SF

0' 40' 80'

L-01



ZONE A: AL MEMORY CARE LANDSCAPE PLAN						
ELEMENT	QUANTITY	UNIT	SIZE	REMARKS	SPACING	
SITE PREPARATION	2,482	SY				
FINE GRADING	2,482	SY				
SOD	850	SY				
LANDSCAPE LAWN AND BED TOPSOIL COMPOST MIX	540	CY		12" Depth		
DECIDUOUS SHADE TREES						
	20	units				
Acer rubrum 'Red Sunset'		Red Sunset Red Maple	10' ht.	B&B, Multi-Stem	See Plans	
Acer x freemanii 'Autumn Blaze'		Freemanii Maple	4" caliper	B&B	See Plans	
Ginkgo biloba		Ginkgo (Male)	4" caliper	B&B	See Plans	
Gleditsia triacanthos inermis 'Skyline'		Skyline Thornless Honeylocust	4" caliper	B&B	See Plans	
Gleditsia triacanthos inermis 'Skyline'		Skyline Thornless Honeylocust	5" caliper	B&B	See Plans	
Gymnocladus dioica		Kentucky Coffee Tree	4" caliper	B&B	See Plans	
Pyrus calleryana 'Aristocrat'		Aristocrat Pear	3" caliper	B&B	See Plans	
Quercus rubra		Red Oak	3" caliper	B&B	See Plans	
Tilia cordata 'Greenspire'		Littledale Linden	14' ht.	B&B, Multi-Stem	See Plans	
Ulmus 'Accolade'		Accolade Elm	3" caliper	B&B	See Plans	
EVERGREEN TREES						
	13	units				
Abies concolor		Concolor Fir	10' ht.	B&B	See Plans	
Picea abies		Norway Spruce	10' ht.	B&B	See Plans	
Picea glauca 'Densata'		Black Hills Spruce	8' ht.	B&B	See Plans	
Picea glauca 'Densata'		Black Hills Spruce	10' ht.	B&B	See Plans	
Picea pungens		Green Colorado Spruce	10' ht.	B&B	See Plans	
Picea pungens 'Glaucia'		Colorado Blue Spruce	12' ht.	B&B	See Plans	
Pseudotsuga menziesii		Douglas Fir	8' ht.	B&B	See Plans	
Pseudotsuga menziesii		Douglas Fir	10' ht.	B&B	See Plans	
ORNAMENTAL TREES						
	15	units				
Ametanchier canadensis		Shadblow Serviceberry	8' ht.	B&B, Multi-Stem	See Plans	
Betula nigra 'Heritage'		Heritage River Birch	8' ht.	B&B, Clump	See Plans	
Betula nigra 'Heritage'		Heritage River Birch	10' ht.	B&B, Clump	See Plans	
Carpinus caroliniana		American Hornbeam	6' ht.	B&B, Clump	See Plans	
Cercis canadensis		Red Bud	8' ht.	B&B, Single Stem	See Plans	
Cornus mas		Cornelian Cherry Dogwood	5' ht.	B&B or CG	See Plans	
Cornus mas		Cornelian Cherry Dogwood	6' ht.	B&B	See Plans	
Crataegus crusgalli 'Inermis'		Thornless Cockspur Hawthorn	8' ht.	B&B, Multi-Stem	See Plans	
Magnolia stellata 'Royal Star'		Royal Star Magnolia	4' ht.	B&B, Multi-Stem	See Plans	
Magnolia stellata 'Royal Star'		Royal Star Magnolia	5' ht.	B&B, Multi-Stem	See Plans	
Magnolia x loebneri 'Merill'		Dr. Merrill Magnolia	5' ht.	B&B, Multi-Stem	See Plans	
Magnolia x loebneri 'Merill'		Dr. Merrill Magnolia	8' ht.	B&B, Multi-Stem	See Plans	
Malus sargentii x 'Tina'		Tina Sargent Crab 'Dwarf'	2" caliper	B&B, Single Stem	See Plans	
Malus sargentii x 'Tina'		Tina Sargent Crab 'Dwarf'	5' ht.	B&B, Clump	See Plans	
Malus x 'Snowdrift'		White Crabapple	8' ht.	B&B, Clump	See Plans	
Malus x 'Snowdrift'		White Crabapple	10' ht.	B&B, Clump	See Plans	
Syringa reticulata 'Invy Silk'		Japanese Tree Lilac	10' ht.	B&B, Multi-Stem	See Plans	
EVERGREEN SHRUBS						
	106	units				
Buxus microphylla 'Wintergreen'		Wintergreen Boxwood	3 gal.	B&B or CG	See Plans	
Juniperus chinensis 'Sea Green'		Sea Green Juniper	5 gal.	B&B or CG	See Plans	
Juniperus horizontalis 'Plumosa Compacta'		Youngstown Andorra Juniper	15-18" ht.	CG	See Plans	
Pinus mugo 'Taco'		End Magic Pine	18-24" spr.	B&B or CG	See Plans	
Taxus media 'Densiformis'		Dense Yew	36" spr.	B&B or CG	See Plans	
Taxus media 'Hicks'		Hicks Yew	30" ht.	B&B or CG	See Plans	
Thuja occidentalis 'Mission'		Mission Arborvitae	6' ht.	B&B	See Plans	
DECIDUOUS SHRUBS						
	343	units				
Aronia melanocarpa		Glossy Black Chokeberry	24-30" ht.	B&B or CG or BR	See Plans	
Berberis thunbergii 'Atropurpurea Nana'		Crimson Pygmy Barberry	5 gal.	B&B or CG	See Plans	
Cornus alba 'marginala'		Variegated Tartarian Dogwood	36-42" ht.	B&B or CG	See Plans	
Cornus sericea 'Kelsey'		Redtwig Dogwood 'Dwarf'	24-30" ht.	B&B or CG or BR	See Plans	
Cotoneaster horizontalis 'Hesse'		Hess Rockspire Cotoneaster	5 gal.	B&B or CG	See Plans	
Euonymus alata 'Compactus'		Dwarf Winged Euonymus	24-30" ht.	B&B or CG	See Plans	
Euonymus alata 'Compactus'		Dwarf Winged Euonymus	30-36" ht.	B&B or CG	See Plans	
Euonymus fortunei 'Emerald Gaiety'		Emerald Gaiety Euonymus	15-18" spr.	B&B	See Plans	
Euonymus fortunei 'Emerald 'N Gold'		Emerald 'N Gold Euonymus	15-18" spr.	B&B	See Plans	
Euonymus fortunei 'Sarcocoe'		Sarcocoe Euonymus	3 gal.	B&B or CG	See Plans	
Fothergilla gardenii 'Beaver Creek'		Beaver Creek Dwarf Bottlebrush	5 gal.	B&B or CG	See Plans	
Hamamelis virginiana		Common Witch Hazel	42" ht.	B&B or CG	See Plans	
Hamamelis virginiana		Common Witch Hazel	42-48" ht.	B&B or CG	See Plans	
Hamamelis virginiana		Common Witch Hazel	42-48" ht.	B&B or CG	See Plans	
Hydrangea arborescens 'Annabelle'		Annabelle Smooth Hydrangea	5 gal.	B&B or CG	See Plans	
Hydrangea paniculata 'Tardiva'		Tardiva Hydrangea	5 gal.	B&B or CG	See Plans	
Kerria japonica 'Variegata'		Variegated Japanese Kerria	18-24" ht.	B&B or CG	See Plans	
Prunus x cistena		Purple Sand Cherry	48"	B&B or CG	See Plans	
Rhus aromatica 'Gro-Low'		Fragrant Sumac	5 gal.	B&B or CG	See Plans	
Rhus typhina 'Laciniata'		Staghorn Sumac	5-6' ht.	B&B or CG	See Plans	
Ribes alpinum 'Greenmound'		Greenmound Alpine Currant	15-18" spr.	B&B or CG	See Plans	
Rosa 'Flower Carpet Pink'		Flower Carpet Pink Shrub Rose	5 gal.	CG	See Plans	
Rosa 'Knockout'		Knockout Rose	5 gal.	CG	See Plans	
Spiraea japonica 'Lemon Princess'		Lemon Princess Spirea	15-24" spr.	B&B or CG	See Plans	
Syringa meyeri		Dwarf Korean Lilac	5 gal.	B&B or CG	See Plans	
Syringa patula 'Ms. Kim'		Ms. Kim Lilac	18-24" ht.	B&B	See Plans	
Viburnum carlesii		Korean Spice Viburnum	36" ht.	B&B or CG	See Plans	
Viburnum dentatum		Arrowwood Viburnum	30-36" ht.	B&B	See Plans	
Viburnum lentago		Nannyberry Viburnum	3' ht.	B&B	See Plans	
Viburnum prunifolium		Blackhaw Viburnum	4' ht.	B&B	See Plans	
Viburnum trilobum 'Hahs'		Hahs American Cranberrybush Viburnum	24-30" ht.	B&B or CG	See Plans	
Viburnum trilobum 'Wentworth'		Wentworth American Cranberrybush	24-30" ht.	B&B or CG	See Plans	
Weigela Florida 'Wine and Roses'		Wine and Roses Weigela	24-30" ht.	B&B or CG	See Plans	
Weigela 'Java Red'		Red Java Weigela	24-30" ht.	B&B or CG	See Plans	
PERENNIALS/GROUNDCOVERS						
	1,545	SF				
Achillea millefolium		Lady's Mantle	1 gal.	CG	18" o.c. spacing	
Anemone dioica		Gior's Beard	1 gal.	CG	36" o.c. spacing	
Aster novae-angliae		Purple Dome New England Aster	1 gal.	CG	18" o.c. spacing	
Astilbe 'Peach Blossom'		Peach Blossom Astilbe	1 gal.	CG	18" o.c. spacing	
Bergenia robtium		Rotblum Bergenia	1 gal.	CG	16" o.c. spacing	
Brunnera macrophylla		Siberian Bugloss	1 gal.	CG	16" o.c. spacing	
Calamagrostis x acutiflora 'Karl Foerster'		Feather Reed Grass	1 gal.	CG	24" o.c. spacing	
Careopsis verticillata 'Moonbeam'		Moonbeam Coreopsis	1 gal.	CG	18" o.c. spacing	
Dianthus 'Helen'		Helein Dianthus	1 gal.	CG	18" o.c. spacing	
Echinacea purpurea 'Magnus Pink'		Purple Coneflower	1 gal.	CG	18" o.c. spacing	
Eupatorium maculatum 'Gateway'		Joe Pye Weed	1 gal.	CG	36" o.c. spacing	
Geranium sanguineum		Bloody Red Cranesbill	1 gal.	CG	18" o.c. spacing	
Hemerocallis 'Happy Returns'		Happy Returns Daylily	1 gal.	CG	18" o.c. spacing	
Hemerocallis 'Stella de Oro'		Yellow Daylily	1 gal.	CG	18" o.c. spacing	
Heuchera micrantha 'Purple Palace'		Purple Palace Coral Bells	1 gal.	CG	18" o.c. spacing	
Hosta 'Patriot'		Patriot Hosta	1 gal.	CG	36" o.c. spacing	
Hosta sieboldiana 'Elegans'		Elegans Hosta	1 gal.	CG	50" o.c. spacing	
Hosta sieboldiana 'Frances William'		Frances William Hosta	1 gal.	CG	50" o.c. spacing	
Hosta Sum and Substance		Sum and Substance Hosta	1 gal.	CG	60" o.c. spacing	
Iris siberica 'Caesar's Brother'		Caesar's Brother Iris	1 gal.	CG	18" o.c. spacing	
Liatris spicata 'Kobold'		Purple Gayfeather	1 gal.	CG	24" o.c. spacing	
Ligularia dentata 'Desdemona'		Leopard Plant	1 gal.	CG	24" o.c. spacing	
Ligularia stenocephala 'The Rocket'		Rocket Ligularia	1 gal.	CG	24" o.c. spacing	
Miscanthus sinensis 'Purpureascens'		Purple Maiden Grass	1 gal.	CG	24" o.c. spacing	
Nepeta x faassenii 'Walkers Low'		Walkers Low Catmint	1 gal.	CG	24" o.c. spacing	
Pennisetum amplexicaule 'Hamen'		Dwarf Fountain Grass	1 gal.	CG	24" o.c. spacing	
Pennisetum atriplicifolia		Russian Sage	1 gal.	CG	24" o.c. spacing	
Rudbeckia fulgida 'Goldstrum'		Black-eyed Susan	1 gal.	CG	18" o.c. spacing	
Salvia nemorosa 'East Friesland'		East Friesland Salvia	1 gal.	CG	18" o.c. spacing	
Sedum 'Autumn Joy'		Autumn Joy Sedum	1 gal.	CG	18" o.c. spacing	
Sporobolus heterolepis		Prairie Dropseed	1 gal.	CG	24" o.c. spacing	
Stachys byzantina 'Silver Carpet'		Lambear Silver Carpet	1 gal.	CG	18" o.c. spacing	
Euonymus fortunei 'Colorata'		Purpleleaf Wintercreeper	3" pot	CG	10" o.c. spacing	
Psychandra terminalis		Japanese Flowering Spurge	3" pot	CG	6" o.c. spacing	
Vinca minor 'Bowles'		Bowles Periwinkle	3" pot	CG	8" o.c. spacing	
Waldsteinia temata		Barren Strawberry	quart	CG	16" o.c. spacing	
MULCH						
	135	CY		3" Depth		
BENCHES						
	2	units				
UPLIGHTS						
	2	units				
SPECIALTY PAVING						
	705	SF				
CONCRETE PAVING						
	560	SF				
DECORATIVE FENCING						
	42	LF				
GATE						
	1	unit				
STONE OUTCROPPING						
	10	TONS				
IRRIGATION						
	1	LUMP SUM				

LAKOTA

THE LAKOTA GROUP INC

116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS
OF ARLINGTON
HEIGHTS

Arlington Heights,
Illinois

Presbyterian
Homes

PLAN
COMMISSION
8/21/2015
NOT FOR
CONSTRUCTION

Joint
Utility
Locating
Information
for
Excavators

Call 48 hours before you dig
(including Sat. Sun. & holidays)

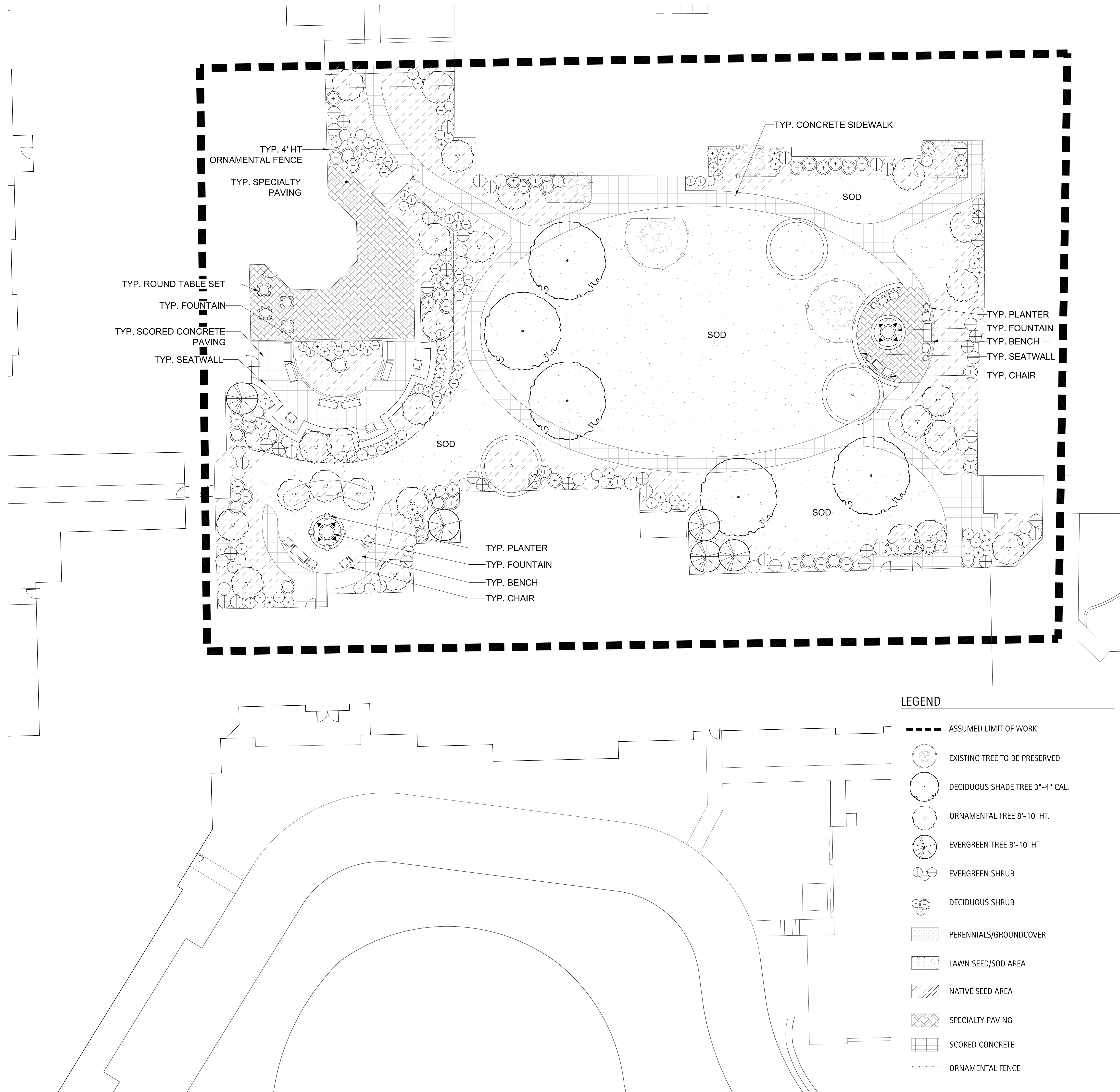
ZONE A -
AL MEMORY CARE
LANDSCAPE PLAN

Revisions	
PLAN COMMISSION	06/22/15
PLAN COMMISSION	08/21/15

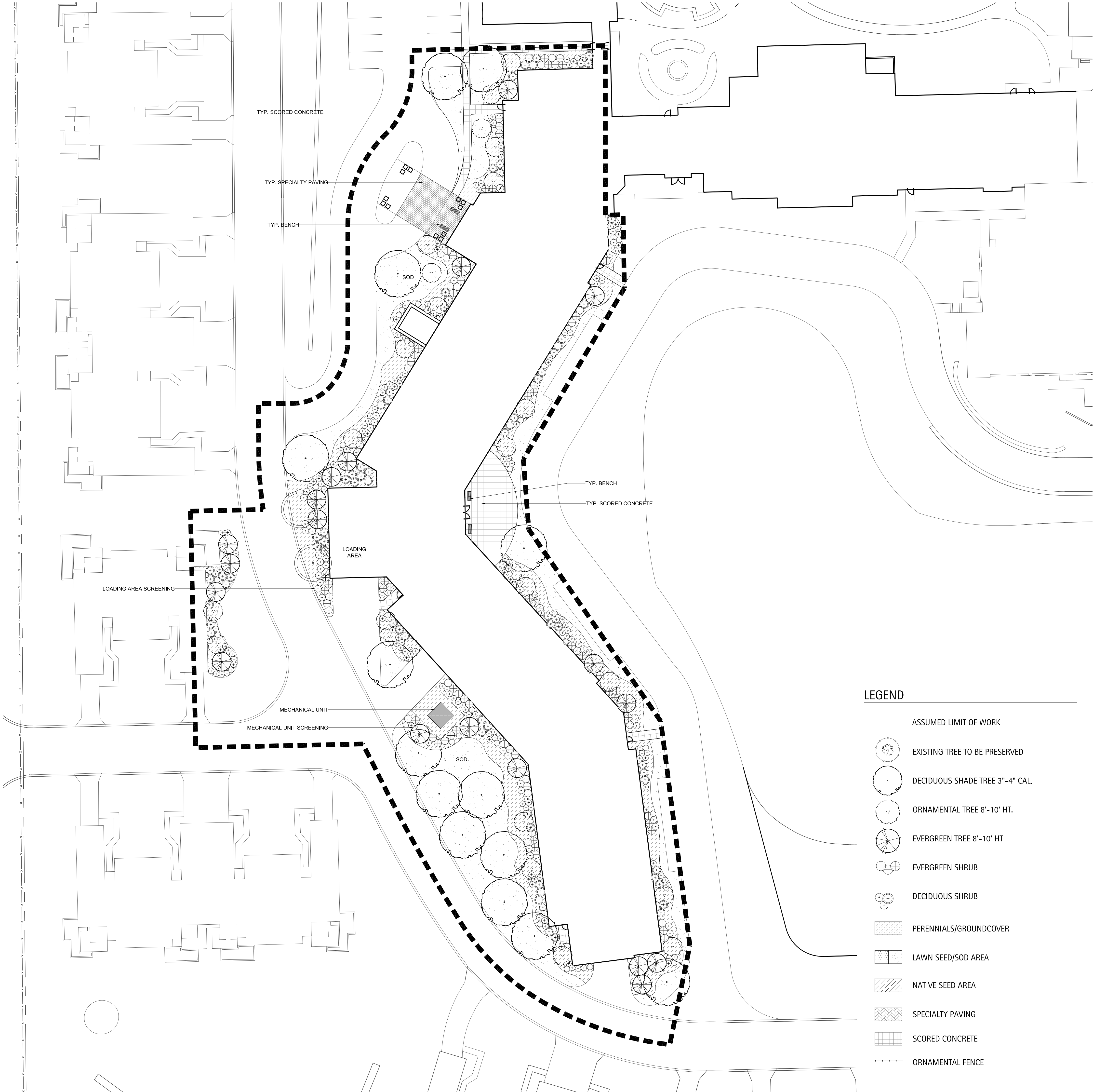
Date:	08/18/15
Drawn By:	JW/MK
Checked By:	SF

0' 20' 40'

L-02



ZONE B: FELLOWSHIP HALL LANDSCAPE PLAN									
ELEMENT		QUANTITY	UNIT						
LANDSCAPE LAWN AND BED TOPSOIL COMPOST MIX	SITE PREPARATION	2,640	SY						
	FINE GRADING	2,640	SY						
	SOD	1,451	SY						
		379	CY					12" Depth	
DECIDUOUS SHADE TREES		5	units						
Acer rubrum 'Red Sunset'			Red Sunset Red Maple	10' ht.	B&B, Multi-Stem	See Plans			
Acer x freemanii 'Autumn Blaze'			Freemanii Maple	4' caliper	B&B	See Plans			
Ginkgo biloba			Ginkgo (Male)	4' caliper	B&B	See Plans			
Gleditsia triacanthos inermis 'Skyline'			Skyline Thornless Honeylocust	4' caliper	B&B	See Plans			
Gleditsia triacanthos inermis 'Skyline'			Skyline Thornless Honeylocust	5' caliper	B&B	See Plans			
Gymnocladus dioica			Kentucky Coffee Tree	4' caliper	B&B	See Plans			
Pyrus callidus 'Aristocrat'			Aristocrat Pear	3' caliper	B&B	See Plans			
Quercus rubra			Red Oak	3' caliper	B&B	See Plans			
Tilia cordata 'Greenspire'			Littleleaf Linden	14' ht.	B&B, Multi-Stem	See Plans			
Ulmus 'Accolade'			Accolade Elm	3' caliper	B&B	See Plans			
EVERGREEN TREES		5	units						
Abies concolor			Concolor Fir	10' ht.	B&B	See Plans			
Picea abies			Norway Spruce	10' ht.	B&B	See Plans			
Picea glauca 'Densata'			Black Hills Spruce	8' ht.	B&B	See Plans			
Picea glauca 'Densata'			Black Hills Spruce	10' ht.	B&B	See Plans			
Picea pungens			Green Colorado Spruce	10' ht.	B&B	See Plans			
Picea pungens 'Glauca'			Colorado Blue Spruce	12' ht.	B&B	See Plans			
Pseudotsuga menziesii			Douglas Fir	8' ht.	B&B	See Plans			
Pseudotsuga menziesii			Douglas Fir	10' ht.	B&B	See Plans			
ORNAMENTAL TREES		30	units						
Amelanchier canadensis			Shadblow Serviceberry	8' ht.	B&B, Multi-Stem	See Plans			
Betula nigra 'Heritage'			Heritage River Birch	8' ht.	B&B, Clump	See Plans			
Betula nigra 'Heritage'			Heritage River Birch	10' ht.	B&B, Clump	See Plans			
Carpinus caroliniana			American Hornbeam	6' ht.	B&B, Clump	See Plans			
Cercis canadensis			Red Bud	8' ht.	B&B, Single Stem	See Plans			
Cornus mas			Cornelian Cherry Dogwood	5' ht.	B&B or CG	See Plans			
Cornus mas			Cornelian Cherry Dogwood	6' ht.	B&B	See Plans			
Crataegus crusgalli 'Inermis'			Thornless Cockspur Hawthorn	8' ht.	B&B, Multi-Stem	See Plans			
Magnolia stellata 'Royal Star'			Royal Star Magnolia	4' ht.	B&B, Multi-Stem	See Plans			
Magnolia stellata 'Royal Star'			Royal Star Magnolia	5' ht.	B&B, Multi-Stem	See Plans			
Magnolia x boehmii 'Merill'			Dr. Merrill Magnolia	5' ht.	B&B, Multi-Stem	See Plans			
Magnolia x boehmii 'Merill'			Dr. Merrill Magnolia	8' ht.	B&B, Multi-Stem	See Plans			
Malus sargentii x 'Tina'			Tina Sargent Crab 'Dwarf'	2' caliper	B&B, Single Stem	See Plans			
Malus sargentii x 'Tina'			Tina Sargent Crab 'Dwarf'	5' ht.	B&B, Clump	See Plans			
Malus x 'Snowdrift'			White Crabapple	8' ht.	B&B, Clump	See Plans			
Malus x 'Snowdrift'			White Crabapple	10' ht.	B&B	See Plans			
Syringa reticulata 'Ivory Silk'			Japanese Tree Lilac	10' ht.	B&B, Multi-Stem	See Plans			
EVERGREEN SHRUBS		65	units						
Buxus microphylla 'Wintergreen'			Wintergreen Boxwood	3 gal.	B&B or CG	See Plans			
Juniperus chinensis 'Sea Green'			Sea Green Juniper	5 gal.	B&B or CG	See Plans			
Juniperus horizontalis 'Plumosa Compacta'			Youngstown Andorra Juniper	15-18" ht.	CG	See Plans			
Pyrus nancy 'Icey'			Icey Mugo Pear	18-24" sp.	B&B	See Plans			
Taxus media 'Densiformis'			Dense Yew	36" sp.	B&B or CG	See Plans			
Taxus media 'Hicks'			Hicks Yew	30" ht.	B&B or CG	See Plans			
Thuja occidentalis 'Mission'			Mission Arborvitae	6' ht.	B&B	See Plans			
DECIDUOUS SHRUBS		169	units						
Aronia melanocarpa			Glossy Black Chokeberry	24-30" ht.	B&B or CG or BR	See Plans			
Berberis thunbergii 'Atropurpurea Nana'			Crimson Pinyon Berberry	5 gal.	B&B or CG	See Plans			
Cornus alba 'marginata'			Variiegated Tatarian Dogwood	36-42"	B&B or CG	See Plans			
Cornus sericea 'Kelsley'			Redwing Dogwood 'Dwarf'	24-30" ht.	B&B or CG or BR	See Plans			
Cotoneaster horizontalis 'Hesse'			Hess Rocksparg Cotoneaster	5 gal.	B&B or CG	See Plans			
Euonymus alata 'Compactus'			Dwarf Winged Euonymus	24-30" ht.	B&B or CG	See Plans			
Euonymus alata 'Compactus'			Dwarf Winged Euonymus	30-36" ht.	B&B or CG	See Plans			
Euonymus fortunei 'Emerald Gaiety'			Emerald Gaiety Euonymus	15-18" sp.	B&B	See Plans			
Euonymus fortunei 'Emerald 'N Gold'			Emerald 'N Gold Euonymus	15-18" sp.	B&B	See Plans			
Euonymus fortunei 'Sarcocoe'			Sarcocoe Euonymus	3 gal.	B&B or CG	See Plans			
Fothergilla gardenii 'Beaver Creek'			Beaver Creek Dwarf Bottlebrush Fothergilla	5 gal.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42" ht.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42-48" ht.	B&B or CG	See Plans			
Hamamelis virginiana			Common Witch Hazel	42-48" ht.	B&B or CG	See Plans			
Hydrangea arborescens 'Annabelle'			Annabelle Smooth Hydrangea	5 gal.	B&B or CG	See Plans			
Hydrangea paniculata 'Tardiva'			Late Hydrangea	5 gal.	B&B or CG	See Plans			
Kerria japonica 'Variegata'			Variegated Japanese Kerria	18-24" ht.	B&B or CG	See Plans			
Prunus x cistena			Purple Sand Cherry	48"	B&B or CG	See Plans			
Rhus aromatica 'Gro-Low'			Fragrant Sumac	5 gal.	B&B or CG	See Plans			
Rhus typhina 'Lanitalia'			Staghorn Sumac	5-6" ht.	B&B or CG	See Plans			
Ribes alpinum 'Greenmount'			Greenmount Alpine Currant	15-18" sp.	B&B or CG	See Plans			
Rosa 'Flower Carpet Pink'			Flower Carpet Pink Shrub Rose	5 gal.	CG	See Plans			
Rosa 'Knockout'			Knockout Rose	5 gal.	CG	See Plans			
Spiraea japonica 'Lemon Princess'			Lemon Princess Spiraea	15-24" sp.	B&B or CG	See Plans			
Syringa meyeri			Dwarf Korean Lilac	5 gal.	B&B or CG	See Plans			
Syringa palmeri 'Mr. Kim'			Mr. Kim Lilac	18-24" ht.	B&B	See Plans			
Viburnum carlesii			Korean Spice Viburnum	36" ht.	B&B or CG	See Plans			
Viburnum dentatum			Aronwood Viburnum	30-36" ht.	B&B	See Plans			
Viburnum lentago			Nannyberry Viburnum	3' ht.	B&B	See Plans			
Viburnum prunifolium			Blackhaw Viburnum	4' ht.	B&B	See Plans			
Viburnum trilobum 'Hahn'			Hahn American Cranberrybush Viburnum	24-30" ht.	B&B or CG	See Plans			
Viburnum trilobum 'Wentworth'			Wentworth American Cranberrybush	24-30" ht.	B&B or CG	See Plans			
Weigela Florida 'Wine and Roses'			Wine and Roses Weigela	24-30" ht.	B&B or CG	See Plans			
Weigela 'Java Red'			Red Java Weigela	24-30" ht.	B&B or CG	See Plans			
PERENNIALS/GROUNDCOVERS		3,070	SF						
Alchemilla mollis			Lady's Mantle	1 gal.	CG	18" o.c. spacing			
Aruncus dioicus			Giant's Beard	1 gal.	CG	36" o.c. spacing			
Aster novae-angliae			Purple Dome New England Aster	1 gal.	CG	18" o.c. spacing			
Astrilbe 'Peach Blossom'			Peach Blossom Astrilbe	1 gal.	CG	18" o.c. spacing			
Rothlum bergenia			Rothlum Bergenia	1 gal.	CG	16" o.c. spacing			
Siberian bugloss			Siberian Bugloss	1 gal.	CG	16" o.c. spacing			
Calamagrostis x acutiflora 'Karl Foerster'			Feather Reed Grass	1 gal.	CG	24" o.c. spacing			
Coreopsis verticillata 'Moonbeam'			Moonbeam Coreopsis	1 gal.	CG	18" o.c. spacing			
Dianthus 'Helen'			Helen Dianthus	1 gal.	CG	18" o.c. spacing			
Echinacea purpurea 'Magnus Pink'			Purple Coneflower	1 gal.	CG	18" o.c. spacing			
Eupatorium maculatum 'Gateway'			Joe Pye Weed	1 gal.	CG	36" o.c. spacing			
Geranium sanguineum			Bloody Red Cranesbill	1 gal.	CG	18" o.c. spacing			
Hemerocallis 'Happy Returns'			Happy Returns Daylily	1 gal.	CG	18" o.c. spacing			
Hemerocallis 'Stella de Oro'			Yellow Daylily	1 gal.	CG	18" o.c. spacing			
Huechera micrantha 'Purple Palace'			Purple Palace Coral Bells	1 gal.	CG	18" o.c. spacing			
Hosta 'Patio'			Patios Hosta	1 gal.	CG	36" o.c. spacing			
Hosta sieboldiana 'Elegans'			Elegans Hosta	1 gal.	CG	50" o.c. spacing			
Hosta sieboldiana 'Frances William'			Frances William Hosta	1 gal.	CG	50" o.c. spacing			
Hosta Sum and Substance			Sum and Substance Hosta	1 gal.	CG	60" o.c. spacing			
Iris siberica 'Caesar's Brother'			Caesar's Brother Iris	1 gal.	CG	18" o.c. spacing			
Liatris spicata 'Kobold'			Purple Gay Feather	1 gal.	CG	24" o.c. spacing			
Ligularia dentata 'Desdemona'			Leopard Plant	1 gal.	CG	18" o.c. spacing			
Ligularia stenocephala 'The Rocket'			Rocket Ligularia	1 gal.	CG	24" o.c. spacing			
Miscanthus sinensis 'Purpureusceps'			Purple Maiden Grass	1 gal.	CG	24" o.c. spacing			
Nepeta x faassenii 'Walkers Low'			Walkers Low Catmint	1 gal.	CG	24" o.c. spacing			
Pennisetum apiculundens 'Hamel'			Dwarf Fountain Grass	1 gal.	CG	24" o.c. spacing			
Persovkia atriplicifolia			Russian Sage	1 gal.	CG	24" o.c. spacing			
Rudbeckia hultia 'Goldrum'			Black-eyed Susan	1 gal.	CG	18" o.c. spacing			
Salvia nemorosa 'East Friesland'			East Friesland Salvia	1 gal.	CG	18" o.c. spacing			
Sedum 'Autumn Joy'			Autumn Joy Sedum	1 gal.	CG	18" o.c. spacing			
Sporobolus heterolepis			Prairie Dropseed	1 gal.	CG	24" o.c. spacing			
Stachys byzantina 'Silver Carpet'			Lamb's Ear Silver Carpet	1 gal.	CG	18" o.c. spacing			
Euonymus fortunei 'Colorata'			Purpleleaf Wintercreeper	3" pot	CG	18" o.c. spacing			
Pachysandra terminalis			Japanese Flowering Spurge	3" pot	CG	6" o.c. spacing			
Vinca minor 'Bowles'			Bowles Periwinkle	3" pot	CG	8" o.c. spacing			
Waldsteinia ternata			Barren Strawberry	3" pot	CG	18" o.c. spacing			
MULCH		95	CY						
BENCHES		9	units						
ROUND TABLE SETS		4	units						
CHAIRS		13	units						
UPLIGHTS		8	units						
FOUNTAINS		3	units						
ELEVATED ROLLING PLANTER		4	units						
PATH LIGHTS		8	units						
SPECIALTY PAVING		2,056	SF						
CONCRETE PAVING		7,793	SF						
DECORATIVE FENCING		177	LF						
GATE		1	unit						
CURBS		155	LF						
STONE SEAT WALLS		185	LF						
STONE OUTCROPPING		1	TONS						
IRRIGATION		1	LUMP SUM						
UNDERDRAINAGE		1	LUMP SUM						



LEGEND

ASSUMED LIMIT OF WORK



EXISTING TREE TO BE PRESERVED



DECIDUOUS SHADE TREE 3"-4" CAL



ORNAMENTAL TREE 8'-10' HT.



EVERGREEN TREE 8'-10' HT



EVERGREEN SHRUB



DECIDUOUS SHRUB



PERENNIALS/GROUNDCOVER



LAWN SEED/SOD AREA



NATIVE SEED AREA



SPECIALTY PAVING



SCORED CONCRETE



ORNAMENTAL FENCE

ZONE C: ASSISTED LIVING LANDSCAPE PLAN

ELEMENT	QUANTITY	UNIT
SITE PREPARATION	2,348	SY
FINE GRADING	2,348	SY
SOD	1,119	SY
LANDSCAPE LAWN AND BED TOPSOIL COMPOST MIX	432	CY
12" Depth		
DECIDUOUS SHADE TREES	13	units
Acer rubrum 'Red Sunset'		Red Sunset Red Maple
Acer x freemanii 'Autumn Blaze'		Freemanii Maple
Ginkgo biloba		Ginkgo (Male)
Gleditsia triacanthos inermis 'Skyline'		Skyline Thornless Honeylocust
Gleditsia triacanthos inermis 'Skyline'		Skyline Thornless Honeylocust
Gymnocladus dioica		Kentucky Coffee Tree
Pyrus calleryana 'Aristocrat'		Aristocrat Pear
Quercus rubra		Red Oak
Tilia cordata 'Greenspire'		Littleleaf Linden
Ulmus 'Accolade'		Accolade Elm
EVERGREEN TREES	19	units
Abies Concolor		Corcolor Fir
Picea abies		Norway Spruce
Picea glauca 'Densata'		Black Hills Spruce
Picea glauca 'Densata'		Black Hills Spruce
Picea pungens		Green Colorado Spruce
Picea pungens 'Glaucia'		Colorado Blue Spruce
Pseudotsuga menziesii		Douglas Fir
Pseudotsuga menziesii		Douglas Fir
ORNAMENTAL TREES	27	units
Amelanchier canadensis		Shadblow Serviceberry
Betula nigra 'Heritage'		Heritage River Birch
Betula nigra 'Heritage'		Heritage River Birch
Carpinus caroliniana		American Hornbeam
Cercis canadensis		Red Bud
Cornus mas		Cornelian Cherry Dogwood
Cornus mas		Cornelian Cherry Dogwood
Crataegus crusgalli 'Inermis'		Thornless Cockspur Hawthorn
Magnolia stellata 'Royal Star'		Royal Star Magnolia
Magnolia stellata 'Royal Star'		Royal Star Magnolia
Magnolia x loebneri 'Merill'		Dr. Merrill Magnolia
Magnolia x loebneri 'Merill'		Dr. Merrill Magnolia
Malus sargentii x 'Tina'		Tina Sargent Crab Dwarf
Malus sargentii x 'Tina'		Tina Sargent Crab Dwarf
Malus x 'Snowdrift'		White Crabapple
Malus x 'Snowdrift'		White Crabapple
Syringa reticulata 'Vivory Sil'		Japanese Tree Lilac
EVERGREEN SHRUBS	79	units
Buxus microphylla 'Wintergreen'		Wintergreen Boxwood
Juniperus chinensis 'Sea Green'		Sea Green Juniper
Juniperus horizontalis 'Plumosa Compacta'		Youngstown Andorra Juniper
Pinus mugo 'Eric'		Eric Mugo Pine
Taxus media 'Densiformis'		Dense Yew
Taxus media 'Hicks'		Hicks Yew
Thuja occidentalis 'Mission'		Mission Arborvitae
DECIDUOUS SHRUBS	325	units
Aronia melanocarpa		Glossy Black Chokeberry
Berberis thunbergii 'Atropurpurea Nana'		Crimson Pygmy Barberry
Cornus alba 'marginata'		Variegated Tatarian Dogwood
Cornus sericea 'Kelsey'		Redtwig Dogwood Dwarf
Cotoneaster horizontalis 'Hesse'		Hess Rockspray Cotoneaster
Euonymus alata 'Compactus'		Dwarf Winged Euonymus
Euonymus alata 'Compactus'		Dwarf Winged Euonymus
Euonymus fortunei 'Emerald Gaiety'		Emerald Gaiety Euonymus
Euonymus fortunei 'Emerald Gaiety'		Emerald Gaiety Euonymus
Euonymus fortunei 'Emerald 'N Gold'		Emerald 'N Gold Euonymus
Euonymus fortunei 'Sarcoxie'		Sarcoxie Euonymus
Fothergilla gardenii 'Beaver Creek'		Beaver Creek Dwarf Bottlebrush Fothergilla
Hamamelis virginiana		Common Witch Hazel
Hamamelis virginiana		Common Witch Hazel
Hamamelis virginiana		Common Witch Hazel
Hydrangea arborescens 'Annabelle'		Anrabelle Smooth Hydrangea
Hydrangea paniculata 'Tardiva'		Tardiva Hydrangea
Kerria japonica 'Variegata'		Variegated Japanese Kerria
Prunus x cistena		Purple Sand Cherry
Rhus aromatica 'Gro-Low'		Fragrant Sumac
Rhus typhina 'Laciniata'		Staghorn Sumac
Ribes alpinum 'Greenmound'		Greenmound Alpine Currant
Rosa 'Flower Carpet Pink'		Flower Carpet Pink Shrub Rose
Rosa 'Knockout'		Knockout Rose
Spiraea japonica 'Lemon Princess'		Lemon Princess Spirea
Syringa meyeri		Dwarf Korean Lilac
Syringa patula 'Ms. Kim'		Ms. Kim Lilac
Viburnum carlesii		Korean Spice Viburnum
Viburnum dentatum		Arrowwood Viburnum
Viburnum lentago		Nannyberry Viburnum
Viburnum prunifolium		Blackhaw Viburnum
Viburnum trilobum 'Hahn'		Hahn American Cranberrybush Viburnum
Viburnum trilobum 'Wentworth'		Wentworth American Cranberrybush
Weigela Florida 'Wine and Roses'		Wine and Roses Weigela
Weigela 'Java Red'		Red Java Weigela
PERENNIALS/GROUNDCOVERS	3,500	SF
Alchemilla mollis		Lady's Mantle
Aruncus dioicus		Giant's Beard
Aster novae-angliae		Purple Dome New England Aster
Astilbe 'Peach Blossom'		Peach Blossom Astilbe
Bergenia rotblum		Rotblum Bergenia
Brunneria macrophylla		Siberian Bugloss
Calamagrostis x acutiflora 'Karl Foerster'		Feather Reed Grass
Coreopsis verticillata 'Moonbeam'		Moonbeam Coreopsis
Dianthus 'Helen'		Helen Dianthus
Echinacea purpurea 'Magnus Pink'		Purple Coneflower
Eupatorium maculatum 'Gateway'		Joe Pye Weed
Geranium sanguineum		Bloody Red Cranesbill
Hemerocallis 'Happy Returns'		Happy Returns Daylily
Hemerocallis 'Stella de Oro'		Yellow Daylily
Heuchera micrantha 'Purple Palace'		Purple Palace Coral Bells
Hosta 'Patriot'		Patriot Hosta
Hosta sieboldiana 'Elegans'		Elegans Hosta
Hosta sieboldiana 'Frances William'		Frances William Hosta
Hosta Sum and Substance		Sum and Substance Hosta
Iris siberica 'Caesar's Brother'		Caesar's Brother Iris
Liatis spicata 'Kobold'		Purple Gayfeather
Ligularia dentata 'Desdemona'		Leopard Plant
Ligularia stenocephala 'The Rocket'		Rocket Ligularia
Miscanthus sinensis 'Purpurescens'		Purple Maiden Grass
Nepeta x faassenii 'Walkers Low'		Walkers Low Catmint
Pennisetum alopecuroides 'Hamel'		Dwarf Fountain Grass
Perovskia atriplicifolia		Russian Sage
Rudbeckia fulgida 'Goldstrum'		Black-eyed Susan
Salvia nemorosa 'East Friesland'		East Friesland Salvia
Sedum 'Autumn Joy'		Autumn Joy Sedum
Sporobolus heterolepis		Prairie Dropseed
Stachys byzantina 'Silver Carpet'		Lambsear Silver Carpet
Euonymus fortunei 'Colorata'		Purpleleaf Wintercreeper
Pachysandra terminalis		Japanese Flowering Spurge
Vinca minor 'Bowles'		Bowles Periwinkle
Waldsteinia tenata		Barren Strawberry
MULCH	108	CY
BENCHES	4	units
URLIGHTS	2	units
SPECIALTY PAVING	786	SF
CONCRETE PAVING	2,155	SF
STONE OUTCROPPING	60	TONS
IRRIGATION	1	LUMP SUM

LAKOTA
THE LAKOTA GROUP INC

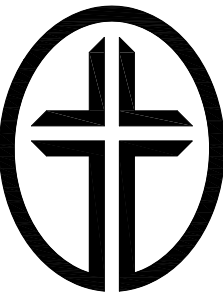
116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS
OF ARLINGTON
HEIGHTS

Arlington Heights,
Illinois

Presbyterian
Homes



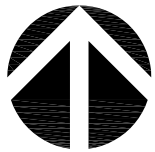
PLAN
COMMISSION
8/21/2015
NOT FOR
CONSTRUCTION



ZONE C -
ASSISTED LIVING
LANDSCAPE PLAN

Revisions
PLAN COMMISSION 06/22/15
PLAN COMMISSION 08/21/15

Date: 08/18/15
Drawn By: JW/MK
Checked By: SF



0' 25' 50'

L-04

LEGEND

■ ■ ■ ■ ASSUMED LIMIT OF WORK



EXISTING TREE TO BE PRESERVED



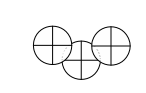
DECIDUOUS SHADE TREE 3"-4" CAL



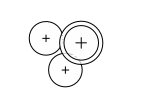
ORNAMENTAL TREE 8'-10' HT.



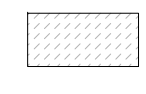
EVERGREEN TREE 8'-10' HT



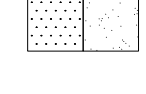
EVERGREEN SHRUB



DECIDUOUS STROBE

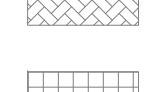


PERENNIALS/GROUNDCOVER

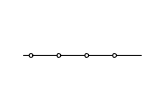




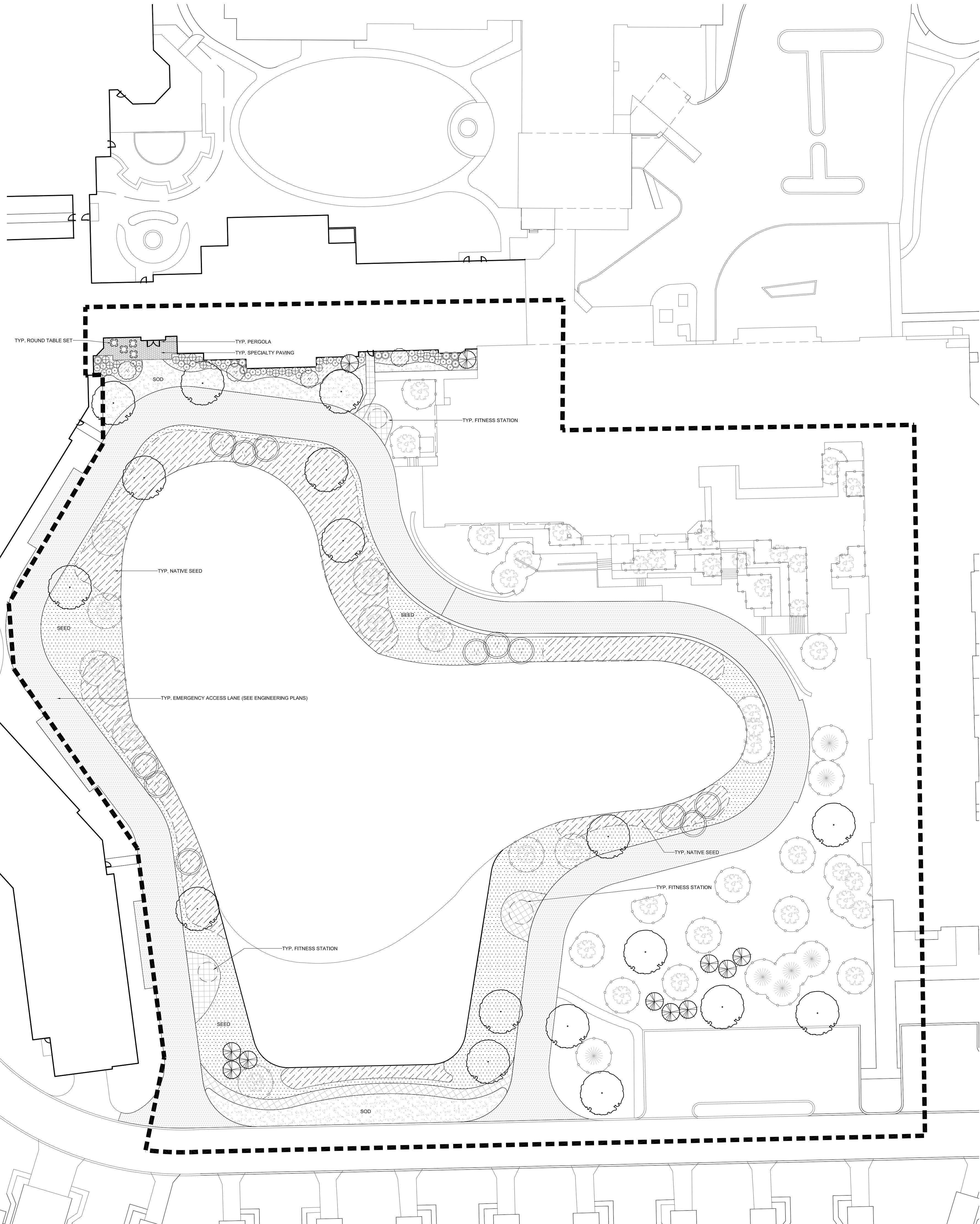
NATIVE SEED AREA



SPECIALTY PAVING



|| | |



ZONE D: RETENTION POND LANDSCAPE PLAN

ELEMENT	QUANTITY	UNIT	
SITE PREPARATION	1,773	SY	
FINE GRADING	1,773	SY	
SOD	498	SY	
WINDSCAPING LAWN AND BED TOPSOIL COMPOST MIX	63	CY	12" Depth
NATIVE SEED	1,393	CY	
LAWN SEED	1,542	SY	
DECIDUOUS SHADE TREES	17	units	
Acer rubrum 'Red Sunset'		Red Sunset Red Maple	10' ht. BB#, Multi-Stem See Plans
Acer x freemanii 'Autumn Blaze'		Freemanii Maple	4" caliper BB# See Plans
Ginkgo biloba		Ginkgo (Maie)	4" caliper BB# See Plans
Gleditsia triacanthos 'Inermis 'Skyline'		Skyline Thornless Honeylocust	4" caliper BB# See Plans
Gleditsia triacanthos 'Inermis 'Skyline'		Skyline Thornless Honeylocust	5" caliper BB# See Plans
Gymnocladus dioica		Kentucky Coffee Tree	4" caliper BB# See Plans
Pyrus calleryana 'Aristocrat'		Aristocrat Pear	3" caliper BB# See Plans
Quercus rubra		Red Oak	3" caliper BB# See Plans
Tilia cordata 'Greenspire'		Littletleaf Linden	14" ht. BB#, Multi-Stem See Plans
Ulmus 'Accolade'		Accolade Elm	3" caliper BB# See Plans
EVERGREEN TREES	11	units	
Abies Concolor		Concolor Fir	10' ht. BB# See Plans
Picea abies		Norway Spruce	10' ht. BB# See Plans
Picea glauca 'Densata'		Black Hills Spruce	8' ht. BB# See Plans
Picea glauca 'Densata'		Black Hills Spruce	10' ht. BB# See Plans
Picea pungens		Green Colorado Spruce	10' ht. BB# See Plans
Picea pungens 'Glaucia'		Colorado Blue Spruce	12' ht. BB# See Plans
Pseudotsuga menziesii		Douglas Fir	8' ht. BB# See Plans
Pseudotsuga menziesii		Douglas Fir	10' ht. BB# See Plans
ORNAMENTAL TREES	16	units	
Amelanchier canadensis		Shadblow Serviceberry	8' ht. BB#, Multi-Stem See Plans
Betula nigra 'Heritage'		Heritage River Birch	8' ht. BB#, Clump See Plans
Betula nigra 'Heritage'		Heritage River Birch	10' ht. BB#, Clump See Plans
Carpinus caroliniana		American Hornbeam	6' ht. BB#, Clump See Plans
Cercis canadensis		Red Bud	8' ht. BB#, Single Stem See Plans
Cornus mas		Cornelian Cherry Dogwood	5' ht. BB# or CG See Plans
Cornus mas		Cornelian Cherry Dogwood	6' ht. BB# See Plans
Crataegus crusgalli 'Inermis'		Thornless Cockspur Hawthorn	8' ht. BB#, Multi-Stem See Plans
Magnolia stellata 'Royal Star'		Royal Star Magnolia	4" ht. BB#, Multi-Stem See Plans
Magnolia stellata 'Royal Star'		Royal Star Magnolia	5' ht. BB#, Multi-Stem See Plans
Magnolia x loderi 'Merill'		Dr. Merrill Magnolia	5' ht. BB#, Multi-Stem See Plans
Magnolia x loderi 'Merill'		Dr. Merrill Magnolia	8' ht. BB#, Multi-Stem See Plans
Malus sargentii x 'Tina'		Tina Sargent Crab 'Dwarf'	2" caliper BB#, Single Stem See Plans
Malus sargentii x 'Tina'		Tina Sargent Crab 'Dwarf'	5' ht. BB#, Clump See Plans
Malus x 'Snowdrift'		White Crabapple	8' ht. BB#, Clump See Plans
Malus x 'Snowdrift'		White Crabapple	10' ht. BB#, Clump See Plans
Syringa reticulata 'Vony Silk'		Japanese Tree Lilac	10' ht. BB#, Multi-Stem See Plans
EVERGREEN SHRUBS	74	units	
Buxus microphylla 'Wintergreen'		Wintergreen Boxwood	3 gal. BB# or CG See Plans
Juniperus chinensis 'Sea Green'		Sea Green Juniper	5 gal. BB# or CG See Plans
Juniperus horizontalis 'Plumosa Compacta'		Youngstown Andorra Juniper	15-18" ht. CG See Plans
Pinus mugo 'Erecta'		Eric Mugo Pine	18-24" spr. BB# or CG See Plans
Taxus media 'Densiformis'		Dense Yew	36" spr. BB# or CG See Plans
Taxus media 'Hicks'		Hicks Yew	30" ht. BB# or CG See Plans
Thuja occidentalis 'Mission'		Mission Arborvitae	6" ht. BB# See Plans
DECIDUOUS SHRUBS	45	units	
Aronia melanocarpa		Glossy Black Chokeberry	24-30" ht. BB# or CG or BR See Plans
Berberis thunbergii 'Atropurpurea Nana'		Crimson Pinyon Barberry	5 gal. BB# or CG See Plans
Cornus alba 'marginalia'		Variiegated Tatarian Dogwood	36-42" BB# or CG See Plans
Cornus sericea 'Kelsey'		Redtwig Dogwood 'Dwarf'	24-30" ht. BB# or CG or BR See Plans
Cotoneaster horizontalis 'Hesse'		Hess Rockspray Cotoneaster	5 gal. BB# or CG See Plans
Eunomys alata 'Compactus'		Dwarf Winged Eunomys	24-30" ht. BB# or CG See Plans
Eunomys alata 'Compactus'		Dwarf Winged Eunomys	30-36" ht. BB# or CG See Plans
Eunomys fortunei 'Emerald Galety'		Emerald Galety Eunomys	15-18" spr. BB# See Plans
Eunomys fortunei 'Emerald 'N Gold'		Emerald 'N Gold Eunomys	15-18" spr. BB# See Plans
Eunomys fortunei 'Sarcelle'		Sarcelle Eunomys	3 gal. BB# or CG See Plans
Fothergilla gardenii 'Beaver Creek'		Beaver Creek Dwarf Bottebrush Fothergilla	5 gal. BB# or CG See Plans
Hamelis virginiana		Common Witch Hazel	42" ht. BB# or CG See Plans
Hamelis virginiana		Common Witch Hazel	42-48" ht. BB# or CG See Plans
Hamelis virginiana		Common Witch Hazel	42-48" ht. BB# or CG See Plans
Hydrangea arborescens 'Annabelle'		Annabelle Smooth Hydrangea	5 gal. BB# or CG See Plans
Hydrangea paniculata 'Tardiva'		Tardiva Hydrangea	5 gal. BB# or CG See Plans
Kerria japonica 'Variegata'		Variegated Japanese Kerria	18-24" ht. BB# or CG See Plans
Pinus x cesteria		Purple Sand Cherry	48" BB# or CG See Plans
Rhus aromatica 'Gro-Low'		Fragrant Sumac	5 gal. BB# or CG See Plans
Rhus typhina 'Laciniata'		Staghorn Sumac	5-6" ht. BB# or CG See Plans
Ribes alpinum 'Greenmound'		alpineum Alpine Currant	15-18" spr. BB# or CG See Plans
Rosa 'Flower Carpet Pink'		Flower Carpet Pink Shrub Rose	5 gal. CG See Plans
Rosa 'Knockout'		Knockout Rose	5 gal. CG See Plans
Spiraea japonica 'Lemon Princess'		Lemon Princess Spirea	15-24" spr. BB# or CG See Plans
Syringa meyeri		Dwarf Korean Lilac	5 gal. BB# or CG See Plans
Syringa patula 'Ms. Kim'		Ms. Kim Lilac	18-24" ht. BB# See Plans
Viburnum carlesii		Korean Spice Viburnum	36" ht. BB# or CG See Plans
Viburnum dentatum		Aronwood Viburnum	20-36" ht. BB# See Plans
Viburnum lentago		Nannyberry Viburnum	3" ht. BB# See Plans
Viburnum prunifolium		Blackhaw Viburnum	4" ht. BB# See Plans
Viburnum trilobum 'Hahs'		Hahs American Cranberrybush Viburnum	24-30" ht. BB# or CG See Plans
Viburnum trilobum 'Wentworth'		Wentworth American Cranberrybush	24-30" ht. BB# or CG See Plans
Weigela Florida 'Wine and Roses'		Wine and Roses Weigela	24-30" ht. BB# or CG See Plans
Weigela 'Java Red'		Red Java Weigela	24-30" ht. BB# or CG See Plans
PERENNIALS/GROUNDCOVERS	511	SF	
Alchemilla mollis		Lady's Mantle	1 gal. CG 18" o.c. spacing
Anemone fransosus		Goat's Beard	1 gal. CG 36" o.c. spacing
Aster novae-angliae		Purple Dome New England Aster	1 gal. CG 18" o.c. spacing
Astilbe 'Peach Blossom'		Peach Blossom Astilbe	1 gal. CG 18"

LAKOTA
THE LAKOTA GROUP INC

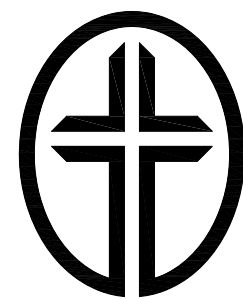
116 West Illinois Street, 7th Floor
Chicago, Illinois 60654
p 312.467.5445
f 312.467.5484
info@thelakotagroup.com

Planning
Urban Design
Landscape Architecture
Community Engagement

THE MOORINGS OF ARLINGTON HEIGHTS

Arlington Heights,
Illinois

Presbyterian Homes



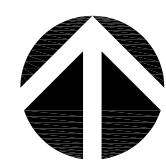
**PLAN
COMMISSION
8/21/2015
NOT FOR
CONSTRUCTION**



ZONE D - RETENTION POND LANDSCAPE PLAN

Revisions	
PLAN COMMISSION	06/22/15
PLAN COMMISSION	08/21/15

Date:	08/18/15
Drawn By:	JW/MK
Checked By:	SF



0' 30' 60'

L-05

June 2015

The Moorings of Arlington Heights

Traffic and Parking Study



Prepared for:

**Presbyterian
Homes**

Eriksson Engineering Associates, Ltd.

145 Commerce Drive, Suite A

Grayslake, IL 60030

(847) 223-4804

601 W. Randolph St., Suite 500

Chicago, IL 60661

(312) 463-0551

1 - INTRODUCTION

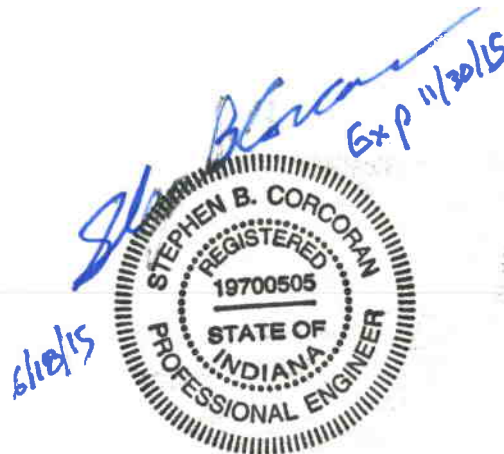
Eriksson Engineering Associates, Ltd. was retained by Presbyterian Homes to conduct a traffic and parking study for proposed changes at The Moorings of Arlington Heights, a congregate care retirement community. The proposed plan calls for construction of an assisted living and memory care facility along with a resident fellowship hall on the campus. Several resident cottages and the skilled care building will be removed to make way for the new buildings.

The purpose of the study was to observe the existing traffic patterns around the site, determine the traffic characteristics of the proposed development, review the parking needs, and develop roadway and parking recommendations.

Findings

The results of traffic and parking study found the following:

- The volume of traffic generated by the development is minimal (8 to 12 vehicles per hour) due to the nature of the use.
- The net change in area traffic volumes is nominal.
- The Mooring's driveway does not require any additional roadway improvements for the additional traffic volumes. Crash data does not support the need for traffic improvements.
- A traffic signal is not currently warranted at the Mooring's driveway and Dryden Place and will not be warranted with the development. When additional development occurs at the campus, the need for a traffic signal will be revisited.
- There is adequate parking at the campus.



2 - EXISTING CONDITIONS

Site Location and Area Land-Use

The subject site is located on the south side of Central Road in Arlington Heights, Illinois. It is occupied by the congregate care retirement community known as The Moorings of Arlington Heights. The campus is surrounded by single-family homes and a church to the north. **Figure 1** illustrates the site location and the surrounding land-uses and roads.

Bicycle, Pedestrian, and Public Transportation

Public sidewalks are located on both sides of Central Road and Dryden Place. The Moorings has an internal walking path system for their residents. PACE does not have bus service on Central Road. Elk Grove Township has a dial-a-ride bus service available to senior citizens. The Moorings provides shuttle services for their residents. No bike routes are located adjacent to the site.

Roadway Characteristics

A description of the area roadways providing access to the site is provided below:

Central Road is an east-west major arterial roadway extending through the southern portion of Arlington Heights, Illinois. It is under the jurisdiction of the Illinois Department of Transportation (IDOT) and has a speed limit of 40 miles per hour. In front of the site, it has two travel lanes in each direction with a painted left-turn median. The access drive to The Moorings is under stop sign control with one inbound lane and two outbound lanes (right and left-turn lanes)

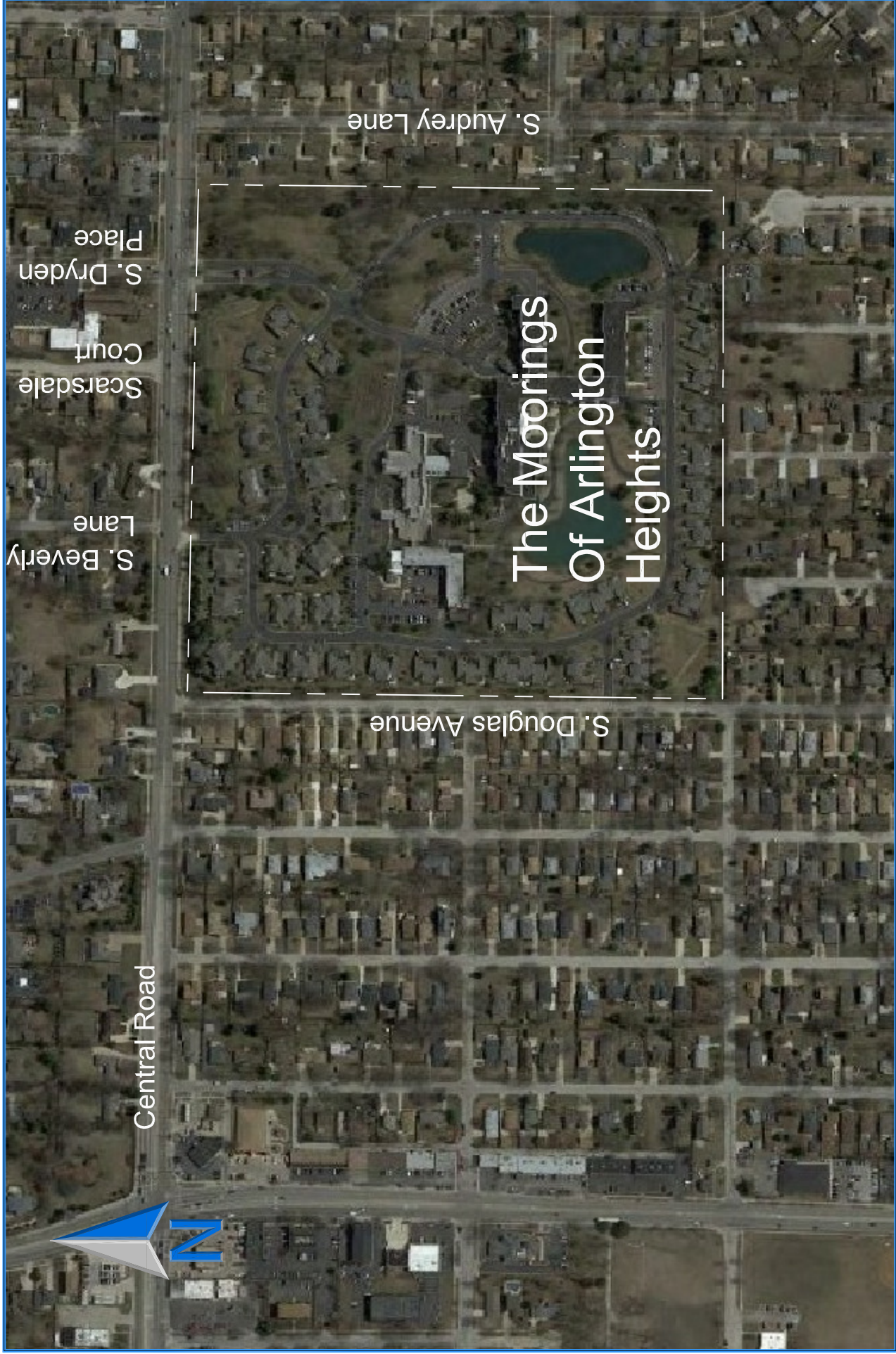
Dryden Place is a residential road that extends north from Central Road and provides access to single-family homes, a church, and an elementary school. At its intersection with Central Road, it has one lane in each direction and under stop sign control. On-street parking is prohibited near Central Road. It has a speed limit is 25 miles per hour and is under the jurisdiction of the Village of Arlington Heights.

Existing Traffic Volumes

Weekday morning (7:00 to 9:00 AM) and afternoon (4:00 to 6:00 PM) manual traffic counts were conducted in November, 2014 at the intersection of Central Road at Dryden Place and The Moorings' entrance. These counts showed the peak-hours of Central Road traffic occurring from 7:15 to 8:15 AM and 4:45 to 5:45 PM on a weekday. Peak-hour traffic going into and out of The Moorings occurred from 7:15-8:15 AM and 4:00-5:00 PM. The existing traffic volumes are shown in **Figure 2** and included in the **Appendix**.

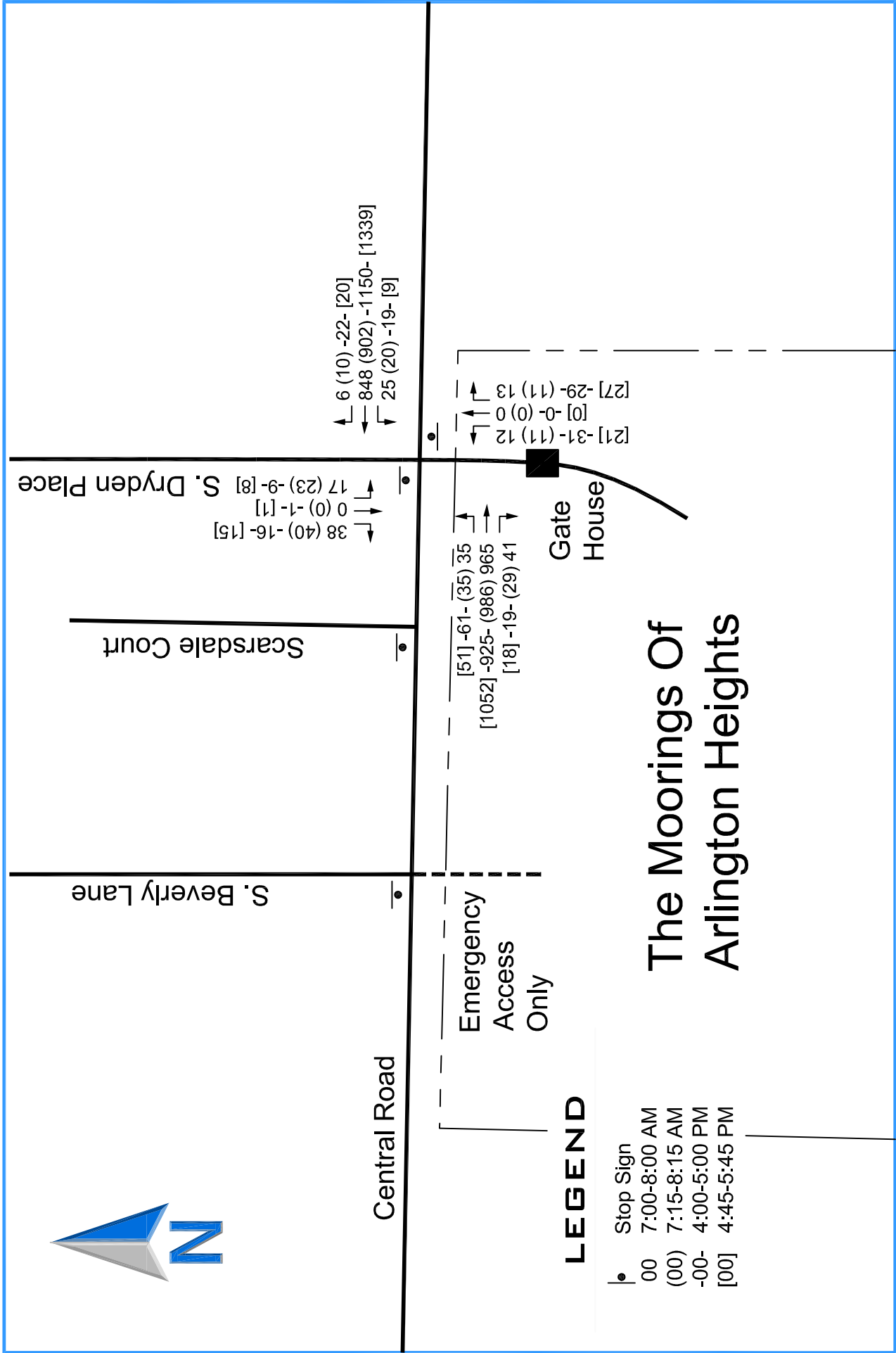
Existing Crash Data

Crash data was obtained for the intersection covering the last four years of available data (2009-2012). There were a total of five crashes over the four years (1.25 crashes/year). Only one crash in the four years involved a vehicle turning left out of The Moorings campus. One crash resulted in an injury and four others had property damage.



Site Location And Area Roadways

Figure 1



3 - SITE TRAFFIC CHARACTERISTICS

Site Plan

The plan calls for construction of an assisted living and memory care facility along with a resident fellowship hall on the campus. Several resident cottages and a skilled care building will be removed to make way for the buildings. Please note that The Moorings has an ongoing program to renovate and combine their independent living apartments to better meet their resident's needs. Over time, the total number of residential units on the campus has been decreasing. **Table 1** summarizes the campus residential units and skilled nursing beds in 2006, when the last traffic study was completed, the current 2014 unit count and occupancy levels, and the total units when completed.

Table 1
The Moorings of Arlington Heights
Existing and Proposed Unit Counts

Unit Type	Existing			Total Proposed	Change From 2006
	May 2006 ⁽¹⁾	November 2014			
		Units	Occupied		
Skilled Care	105	105	49	105	-
Sheltered Care	45	45	37	-	-45
Assisted Living	-	-	-	70	+70
Assisted Living Memory Care	-	-	-	20	+20
High Care Total	150	150	86	195	+45
Apartments	232	212	193	202	-30
Cottages	81	81	74	73	-8
Independent Living Total	313	293	267	275	-38
Total of All Units Types	463	443	353	470	+7

(1) Date of counts from prior traffic study

Trip Generation

Assisted-living/memory care facilities provide their residents with supervision and assistance with activities of daily living, coordination of their health care services; and monitoring of resident activities to help to ensure their health, safety, and well-being. Assistance may include the administration or supervision of medication, or personal care services provided by a trained staff person. No residents own or are able to drive a vehicle. Vehicle trips to and from these facilities consist of employee trips (56%), service or vendor trips (15%), and visitors (29%) according to the American Senior Housing Association.

Traffic estimates were based on the existing traffic volumes and trip rates for the occupied units on campus. These trip rates were then compared to senior housing and care data provided by the Institute of Transportation Engineer's Trip Generation 9th Ed. manual and found to be higher. The existing facility's trip rates were then applied to the vacant and

proposed units on the campus. The results are shown in **Tables 2 and 3**. The additional traffic generated by the net increase in units on the campus is minimal with 5 to 8 new trips an hour.

Table 2
The Moorings of Arlington Heights
Existing and Projected Morning Traffic Volumes

The Moorings	Number of Units	Morning Peak Periods					
		Mooring's Peak (7:00-8:00 AM)			Central Road Peak (7:15-8:15 AM)		
		In	Out	Total	In	Out	Total
Existing Occupied	353	66	25	91	49	22	71
Existing Vacant	90	17	6	23	12	6	18
Existing Subtotal	443	83	31	114	61	28	89
Net Units ⁽¹⁾	27	5	2	7	4	2	5
Total	470	88	33	121	65	30	95

(1) Net increase in units – See Table 1

Table 3
The Moorings of Arlington Heights
Existing and Projected Evening Traffic Volumes

The Moorings	Number of Units	Evening Peak Periods					
		Mooring's Peak (4:00-5:00 PM)			Central Road Peak (4:45-5:45 AM)		
		In	Out	Total	In	Out	Total
Existing Occupied Units	353	39	60	99	28	48	76
Existing Vacant Units	90	10	15	25	7	12	19
Existing Subtotal	443	49	75	124	35	60	95
Net Units ⁽¹⁾	27	3	5	8	2	4	6
Total	470	52	80	132	37	64	101

(2) Net increase in units – See Table 1

The proposed fellowship hall is for the use of the residents of the campus and would not generate additional trips on Central Road. It will be used by the residents for religious and other purposes that currently occur at The Moorings. The fellowship hall spaces will provide additional elbow room to simplify scheduling of activities.

Trip Distribution

The trip distribution for the development is based on the distribution of employees in the area, location of retail, restaurant, and entertainment venues, and the road network. The trip distribution for the site is shown on **Table 4** and **Figure 3** which was based on existing traffic pattern at the Moorings entrance.

Table 4
Directional Distribution

Direction	Inbound Percentage	Outbound Percentage
East on Central Road	40%	50%
West on Central Road	60%	50%
Total	100%	100%

Trip Assignment

The future vehicular trips that are generated by the development were distributed to the area roadways based on the directional distribution analysis and the proposed site plan. **Figure 4** displays the trip assignment for the projected site traffic volumes. **Figure 5** illustrates the existing traffic volumes with the existing development at full occupancy. **Figure 6** shows the Total Traffic volumes, which are the sum of the existing traffic volumes and the site traffic volumes.

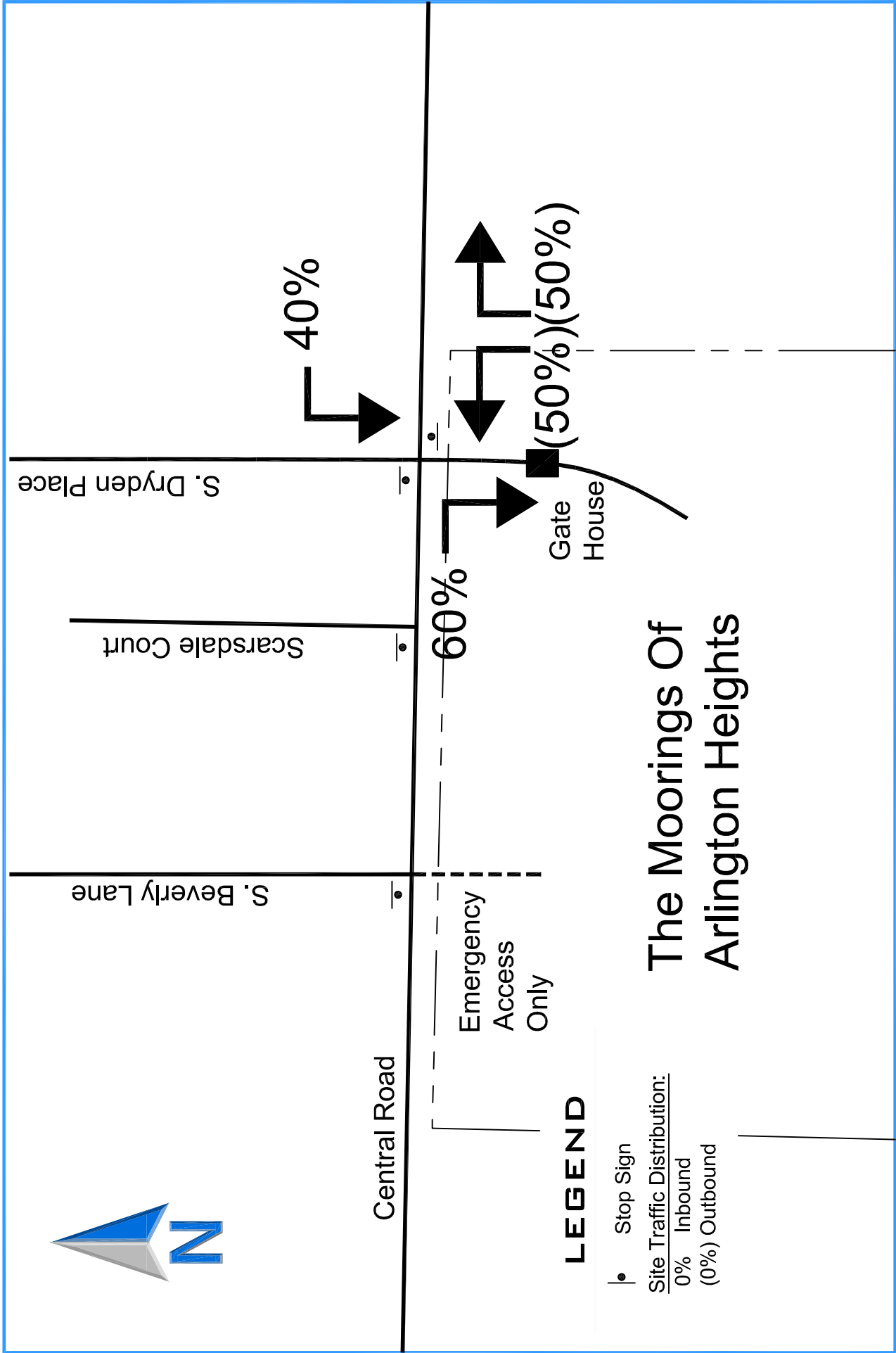
Intersection Capacity Analyses

An intersection's ability to accommodate traffic flow is based on the average control delay experienced by vehicles passing through the intersection. The intersection and individual traffic movements are assigned a level of service (LOS), ranging from A to F based on the control delay created by a traffic signal or stop sign. Control delay consists of the initial deceleration delay, queue move-up time, stopped delay, and final acceleration delay. LOS A has the best traffic flow and least delay. LOS E represents saturated or at capacity conditions. LOS F experiences oversaturated conditions and extensive delays. The Highway Capacity Manual definitions for levels of service and the corresponding control delay for both signalized and unsignalized intersections are shown in **Table 5**.

Table 5
Level of Service Criteria for Intersections

Level of Service	Description	Control Delay (seconds/vehicle)	
		Signals	Stop Signs
A	Minimal delay and few stops	<10	<10
B	Low delay with more stops	>10-20	>10-15
C	Light congestion	>20-35	>15-25
D	Congestion is more noticeable with longer delays	>35-55	>25-35
E	High delays and number of stops	>55-80	>35-50
F	Unacceptable delays and over capacity	>80	>50

Source: Highway Capacity Manual 2010





Central Road

S. Beverly Lane

Scarsdale Court

S. Dryden Place

2 (2) -1- [1]

Emergency
Access
Only

[1] -2- (2) 3

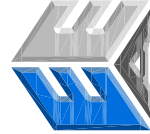
Gate
House

[2] -2- (1) 1
[2] -3- (1) 1

The Moorings Of Arlington Heights

LEGEND

- Stop Sign
- 00 7:00-8:00 AM
- (00) 7:15-8:15 AM
- 00- 4:00-5:00 PM
- [00] 4:45-5:45 PM



ERIKSSON
ENGINEERING
ASSOCIATES, LTD.



Central Road

S. Beverly Lane

Scarsdale Court

S. Dryden Place

38 (40) -16- [15]

0 (0) -1- [1]

17 (23) -9- [8]

6 (10) -22- [20]

848 (902) -1150- [1339]

32 (25) -23- [12]

Emergency
Access
Only

[51] -61- (35) 35
[1052] -925- (986) 965
[22] -25- (36) 51

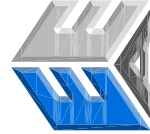
Gate
House

[27] -38- (14) 15
[0] -0- (0) 0
[33] -37- (14) 16

LEGEND

- Stop Sign
- 00 7:00-8:00 AM
- (00) 7:15-8:15 AM
- 00- 4:00-5:00 PM
- [00] 4:45-5:45 PM

The Moorings Of Arlington Heights



ERIKSSON
ENGINEERING
ASSOCIATES, LTD.

Existing Traffic Volumes At Full Occupancy

Figure 5



Central Road

S. Beverly Lane

Scarsdale Court

S. Dryden Place

38 (40) -16- [15]

0 (0) -1- [1]

17 (23) -9- [8]

6 (10) -22- [20]

848 (902) -1150- [1339]

34 (25) -27- [13]

Emergency
Access
Only

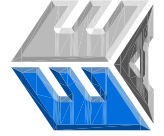
[51] -61- (35) 35
[1052] -925- (986) 965
[23] -27- (38) 54

Gate
House

LEGEND

- Stop Sign
- 00 7:00-8:00 AM
- (00) 7:15-8:15 AM
- 00- 4:00-5:00 PM
- [00] 4:45-5:45 PM

The Moorings Of Arlington Heights



ERIKSSON
ENGINEERING
ASSOCIATES, LTD.

Total Traffic Volumes

Figure 6

Capacity analyses were conducted for the intersection using the computer program SYNCHRO to determine the existing operating conditions of the access system. These analyses were performed for the weekday peak-hours. Copies of the capacity analysis summaries are included in the **Appendix. Table 6 and 7** shows the existing and projected level of service results for each of the movements at the intersection. The movements are working well except for the northbound through/left-turn lane which works at Level of Service F in the evening peak-hours. This will not change with the proposed changes. Although this movement works poorly, the volume of traffic and queuing is low.

Based on the capacity analyses and the minimal amount of additional site traffic, no additional improvements are recommended for the intersection of Central Road at Dryden Place/the Moorings Access.

Table 6
Central Road/ Dryden Place/ Moorings Entrance
Morning Movement Level of Service and Delay

Movement	Mooring's Peak (7:00-8:00 AM)		Central Road Peak (7:15-8:15 AM)	
	Existing Volumes	Total Volumes	Existing Volumes	Total Volumes
Eastbound Left	LOS A – 3.6 sec	LOS A – 3.8 sec	LOS A – 4.3 sec	LOS A – 4.3 sec
Westbound Left	LOS A – 5.5 sec	LOS A – 6.0 sec	LOS A – 5.1 sec	LOS A – 5.2 sec
Northbound Thru/Left	LOS D – 29.9 sec	LOS D – 29.5 sec	LOS D – 34.4 sec	LOS D – 34.4 sec
Northbound Right	LOS A – 1.0 sec	LOS A – 1.0 sec	LOS A – 1.0 sec	LOS A – 1.0 sec
Southbound Dryden	LOS C – 18.1 sec	LOS C – 17.9 sec	LOS D – 31.4 sec	LOS D – 31.5 sec

Table 7
Central Road/ Dryden Place/ Moorings Entrance
Evening Movement Level of Service and Delay

Movement	Mooring's Peak (4:00-5:00 PM)		Central Road Peak (4:45-5:45 AM)	
	Existing Volumes	Total Volumes	Existing Volumes	Total Volumes
Eastbound Left	LOS A – 8.0 sec	LOS A – 8.2 sec	LOS A – 8.9 sec	LOS A – 8.8 sec
Westbound Left	LOS A – 5.6 sec	LOS A – 6.0 sec	LOS A – 5.6 sec	LOS A – 5.9 sec
Northbound Thru/Left	LOS F – 67.6 sec	LOS F – 63.1 sec	LOS F – 85.7 sec	LOS F – 125.2 sec
Northbound Right	LOS A – 1.8 sec	LOS A – 1.8 sec	LOS A – 1.8sec	LOS A – 5.0 sec
Southbound Dryden	LOS D – 32.1 sec	LOS D – 33.9 sec	LOS D – 28.8 sec	LOS D – 17.3 sec

4 - PARKING

Parking Requirements

The parking requirements for the existing development and addition were calculated based on the Village of Arlington Heights' Zoning Ordinance. Parking at assisted living and memory care facilities is primarily generated by employees and visitors. Residents of the facility do not drive. National parking data is available from the Institute of Transportation Engineers (ITE) in their publication *Parking Generation*, 4th Edition, for assisted living facilities (Land Use Code 254). **Tables 8** and **9** summarize the zoning code and ITE parking requirements for The Moorings campus.

Table 8
Zoning Code and ITE Requirements for
The Existing Mooring's Development

Unit Type	Units	Zoning Code Requirement	Total	ITE Parking Demand	Total
Senior Apartments	212	One Space per Unit	212.0	0.59 spaces per unit	125.1
Senior Villas	81	Two Spaces per Unit	162.0	0.59 spaces per unit	47.8
Skilled Care	105	One Space per Two Beds	52.5	0.35 spaces per bed	36.8
Sheltered Care	45	One Space per Two Beds	22.5	0.35 spaces per bed	15.8
Totals	443		449.0		225.5

Table 9
Zoning Code and ITE Requirements
Proposed Plan

Unit Type	Units	Zoning Code Requirement	Total	ITE Parking Demand	Total
Senior Apartments	202	One Space per Unit	202.0	0.59 spaces per unit	119.2
Senior Villas	73	Two Spaces per Unit	146.0	0.59 spaces per unit	43.1
Skilled Care	105	One Space per Two Beds	52.5	0.35 spaces per bed	36.8
Assisted Living	70	One Space per Two Beds	35.0	0.41 spaces per unit	28.7
Assisted Living: Memory Care	20	One Space per Two Beds	10.0	0.41 spaces per bed	8.2
Resident Fellowship hall	486 ⁽¹⁾ seats	One Space for each 5 Seats	97.2	0.20 spaces per seat ⁽²⁾	97.2
	470		542.7 (445.5)⁽³⁾		333.2 (236.0)⁽³⁾

(1) Approximately 3,400 sq. ft. at 7 sq. ft. per person = 486 seats

(2) Peak demand on a Sunday

(3) Requirement without Resident Fellowship hall

The zoning requirement calculations assume that the resident fellowship hall is used by off-campus visitors. However, this space will primarily serve and support only our on-site residents for various activities and programs which will not generate any significant traffic or parking need from off-campus visitors. The hall will, on occasion, be used for memorial services. The

Moorings's religious services team reports that most attendees of memorial services are from within the campus. In addition to on-site residents, memorial services typically draw 10-25 outside guests with a maximum of 20 vehicles. On very rare occasions (once every year or two) they see a few more visitors. The Moorings has an internal parking management team that oversees and manages parking during these types of events and does not believe that there is or will be a lack of available parking for these type of events. In conclusion our calculation of the number of seats shown for the resident fellowship hall (486 seats) is based on the building code capacity (1 seat per seven square feet) and does not reflect the proposed usage of the space.

Parking Inventory

The existing parking spaces on the campus are summarized below in **Table 10** along with the zoning requirements. The existing campus currently exceeds the zoning code parking requirements. Please note that the parking areas for the apartments are shared with the skilled care and assisted-living units.

Table 10
Moorings Existing Parking Inventory

Unit Type	Units	Location	Regular	Accessible	Total	Code Requirement	Diff.
Senior Apartments	212	Underground Garage Spaces	79		79		
		By Guard House	4		4		
		Surface Spaces South of Building	41	3	44		
		Surface Spaces by Entrance	70	3	73		
		subtotal	194	6	200	212	-12
Senior Villas	81	54 - One Car Garages	54		54		
		27 - Two Car Garages	54		54		
		Driveway Spaces	108		108		
		Off-Street Parking	12		12		
		subtotal	228		228	162	+66
Skilled Care Asstd. Living Memory Care	150	East of Building	18	1	19		
		Along Old Barn Road	31	2	33		
		West of Building	36	2	38		
		subtotal	85	5	90	75	+15
Totals	443		507	11	518	449	+69

The proposed parking supply is shown in **Table 11** along with the zoning requirements. Thirty eight existing surface parking spaces near the sheltered care building and the parking associated with 10 residential villas will be demolished for a total of 58 spaces. Those spaces will be replaced by 25 spaces under the south end of the new building, a new 40 space surface lot west of the building, and 13 additional spaces along the south side of Old Barn Road for a total of 78 new spaces. There will be a net gain of 20 spaces on-site. Without the resident fellowship hall parking requirement, the development will exceed the zoning requirement (538 vs 446).

Table 11
Proposed Parking Inventory

Unit Type	Units	Location	Regular	Accessible	Total	Code Requirement	Diff.
Senior Apartments	202	Underground Garage Spaces	79		79		
		By Guard House	4		4		
		Surface Spaces South of Building	41	3	44		
		Surface Spaces by Entrance	70	3	73		
		subtotal	194	6	200	202	-2
Senior Villas	73	48 - One Car Garages	48		48		
		25 - Two Car Garages	50		50		
		Driveway Spaces	98		98		
		Off-Street Parking	12		12		
		subtotal	208		208	146	+62
Skilled and Sheltered Care	195	East of Building	18	1	19		
		West of the Building	38	2	40		
		Along Old Barn Road	44	2	46		
		Under the Building	25		25		
		subtotal	125	5	130	98	+32
Totals	470		527	11	538	446	+92

Residential Auto Ownership

The Moorings of Arlington Heights provided resident vehicle ownership data for the apartments and villas on existing campus and is summarized in **Table 12**. As previously noted, residents in the skilled care and assisted living/memory care are not able to drive. Forty three percent of the residential units do not have a vehicle.

Table 12
Moorings Resident's Auto Ownership

Unit Type	Occupied Units ⁽¹⁾	Number of Units with			Total Vehicles	Average Vehicles per Unit
		0 veh.	1 veh.	2 veh.		
Senior Apartments	190	97	90	3	93	.49
Senior Villas	73	13	52	8	68	.85
Totals	263	110	142	11	161	.61

(1) March 2015 Data

Parking Demand Survey

Parking counts were conducted at the campus on Thursday November 13, 2014 and are summarized below in **Table 13**. The surveyed numbers were then adjusted to represent full occupancy.

Table 13
Existing Parking Survey

Unit Type	Spaces Available	Surveyed		Adjusted for Full Occupancy	
		Vehicles	%	Vehicles	%
Senior Apartments	200	161	71%	176	88%
Senior Villas	228	68	30%	74	33%
Skilled and Sheltered Care	90	66	73%	90	100%
Total	518	295	57%	340	67%

Table 14 shows the total parking demand based on the surveys which can be accommodated on the site. Please note that the employee parking can be shifted from the west of the new building to west of the existing building to balance out the total demand.

Table 14
Total Parking Demand
Based on Parking Surveys

Unit Type	Spaces Available	Demand	
		Vehicles	%
Senior Apartments	200	168	88%
Senior Villas	208	67	33%
Skilled and Sheltered Care	130	117	90%
Total	538	352	65%

5 - TRAFFIC SIGNAL WARRANT ANALYSIS

A traffic signal warrant study was conducted to determine if the intersection of The Mooring's entrance or Dryden Place with Central Road met the minimum requirements for a traffic signal. The investigation of the need for a traffic control signal shall include an analysis of factors related to the existing operation and safety at the study location and the potential to improve these conditions, and the applicable factors contained in the following traffic signal warrants:

- Warrant 1** - Eight-Hour Vehicular Volume
- Warrant 2** - Four-Hour Vehicular Volume
- Warrant 3** - Peak Hour Vehicular Volume
- Warrant 4** - Pedestrian Volume
- Warrant 5** - School Crossing
- Warrant 6** - Coordinated Signal System
- Warrant 7** - Crash Experience
- Warrant 8** - Roadway Network
- Warrant 9** - Intersection Near a Grade Crossing

The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal.

Warrant 1 – Eight-Hour Vehicular Volume (Condition A – Eight Hour Vehicular Volume)

This warrant is intended for application at locations where a large volume of intersecting traffic is the principal reason to consider installing a new traffic signal. Warrant 1A is satisfied if the following conditions are met for any eight hours of an average day, for a major street with a speed limit of 40 mph and two lanes at each major street approach and minor street approach with one or two lanes:

- 600 vehicles per hour on major street (total of both approaches)
- 150 vehicles per hour on minor street (Dryden Place – 1 lane)
- 200 vehicles per hour on minor street (The Moorings – 2 lanes)

For the major street approach, Central Road, there were at least eight hours that satisfy the conditions of Warrant 1A. However, there are no time periods in which the conditions of Warrant 1A are satisfied for either minor street approach. The highest hourly minor street volume found during the analysis period was vehicles between 84 vph on Dryden Place and 60 vph at the Moorings entrance, which is significantly below the volume threshold (150-200 vph) required for Warrant 1A. As a result, **Warrant 1A is NOT SATISFIED.**

Warrant 1 – Eight-Hour Vehicular Volume (Condition B – Interruption of Continuous Traffic)

This warrant is intended for application at locations where Condition A is not satisfied and where the traffic volume on the major street is so heavy that traffic on a minor intersection street suffers excessive delay or conflict in entering or crossing the major street. Warrant 1B is satisfied if the following conditions are met for any eight hours of an average day, for a major street with a speed limit of 40 mph and two lanes at each approach and minor street approach with one or two lanes:

- 900 vehicles per hour on major street (total of both approaches)
- 75 vehicles per hour on minor street (Dryden Place – 1 lane)
- 150 vehicles per hour on minor street (The Moorings – 2 lanes)

For the major street approach, there are eight hours that would satisfy the conditions of Warrant 1B. However, there is only one hour in which the conditions of Warrant 1B are satisfied for the minor street approach. The highest hourly volume found during the analysis period was 84 vehicles on Dryden Place which exceeds the 75 vph threshold for only one of the eight hours of the day. As a result, **Warrant 1B is NOT SATISFIED.**

Warrant 2 – Four-Hour Vehicular Volume

This warrant is intended to be applied where the volume of intersecting traffic is the principal reason to consider installing a traffic control signal. Warrant 2 is satisfied if an engineering study finds that, for each of any four hours of an average day, the plotted points representing the vehicles per hour on the major street (total of both approaches) and the corresponding vehicles per hour on the higher-volume minor street approach (one direction only) all fall above the applicable curve in Figure 4C-1 of the MUTCD, which is found in the Appendix. On the minor street, the higher volume is not required to be on the same approach during each of these four hours. The minor street approach volumes must exceed 80 vph, which is the lower threshold volume, which only occurs for one hour and not the four hours required. As a result, **Warrant 2 is NOT SATISFIED.**

Warrant 3 – Peak Hour

This warrant is intended for use at a location where traffic conditions are such that for a minimum of one hour of an average day, the minor-street traffic suffers undue delay when entering or crossing the major street. This warrant is only to be applied in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time. This warrant is satisfied if the following two categories are met:

- A. If all three of the following conditions exist for the same one hour (any four consecutive 15-minute periods) of an average day:
 - a. The total stopped time delay experienced by the traffic on one minor-street approach (one direction only) controlled by a STOP sign equals or exceeds 5 vehicle-hours for a two-lane approach; and
 - b. The volume on the same minor street approach (one direction only) equals and exceeds 150 vehicles per hour for two moving lanes; and
 - c. The total entering volume serviced during the hour exceeds 650 vehicles per hour for intersections with three approaches.
- B. The plotted point representing the vehicles per hour on the major street (total of both approaches) and the corresponding vehicles per hour on the higher-volume minor-street approach (one direction only) for 1 hour (any four consecutive 15-minute periods) of an average day falls above the applicable curve on Figure 4C-3.

The minor street approach volume never exceeds 100 vehicles per hour minimum volume, thus this warrant is not satisfied. Thus, **Warrant 3 is NOT SATISFIED.**

Warrant 4 – Pedestrian Volume

This warrant is intended for application where the traffic volume on a major street is so heavy that pedestrians experience excessive delay in crossing the major street. The need for a traffic control signal at an intersection shall be considered if an engineering study finds that one of the following criteria is met:

- A. For each of any four hours of an average day, the plotted points representing the vehicles per hour on the major street (total of both approaches) and the corresponding pedestrians per hour crossing the major street (total of all crossings) all fall above the curve in Figure 4C-6; or
- B. For one hour (any four consecutive 15-minute periods) of an average day, the plotted points representing the vehicles per hour on the major street (total of both approaches) and the corresponding pedestrians per hour crossing the major street (total of all crossings) falls above the curve in Figure 4C-8.

The volume of pedestrians crossing at this intersection was zero during the traffic counts. Thus, **Warrant 4 is NOT SATISFIED.**

Warrant 5 – School Crossing

This warrant is intended for application where school children crossing the major street are the principal reason to consider installing a traffic control signal. For the purposes of this warrant, the word “schoolchildren” includes elementary through high school students.

Dryden Elementary School is located 1,300 feet to the north but no school children were observed crossing Central Road, thus **Warrant 5 is NOT SATISFIED.**

Warrant 6 – Coordinated Signal System

Progressive movement in a coordinated signal system sometimes necessitates installing traffic control signals at intersections where they would not otherwise be needed in order to maintain proper platooning of vehicles. The need for a traffic control signal in terms of this warrant should be considered if one of the following is met:

- A. On a one-way street or a street that has traffic predominately in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.
- B. On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will provide a progressive operation.

Existing traffic signals are located 2,450 feet to the west at Arlington Heights Road and 1,300 feet to the east at Arthur Avenue. A traffic signal at this location would not improve traffic flow or platooning on Central Road. This warrant is not applicable, and thus **Warrant 6 is NOT SATISFIED.**

Warrant 7 – Crash Experience

The crash experience signal warrant conditions are intended for application where the severity and frequency of crashes are the principal reasons to consider installing a traffic control signal. The need for traffic control signal shall be considered if an engineering study finds that all of the following criteria are met:

- A. Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency; and
- B. Five or more reported crashes, of types susceptible to correction by a traffic control signal, have occurred within a 12-month period, each crash involving personal injury or property damage apparently exceeding the applicable requirements for a reportable crash; and
- C. For each of any 8 hours of an average day, the vehicles per hour (vph) given in both of the 80 percent columns of Condition A in Table 4C-1 (see Section 4C.02), or the vph in both of the 80 percent columns of Condition B in Table 4C-1 exists on the major-street and the higher-volume minor-street approach, respectively, to the intersection, or the volume of pedestrian traffic is not less than 80 percent of the requirements specified in the Pedestrian Volume warrant. These major-street and minor-street volumes shall be for the same 8 hours. On the minor street, the higher volume shall not be required to be on the same approach during each of the 8 hours.

There have only been five crashes in the last four years at the intersection. Thus, as there are not enough crashes to meet the minimum threshold for this warrant, **Warrant 7 is NOT SATISFIED**. Please note that only one crash involving a vehicle exiting the Moorings development occurred in those four years.

Warrant 8 – Roadway Network

This warrant is intended to determine if installing a traffic control signal will encourage concentration and organization of traffic flow on a roadway network. The need for a traffic control signal shall be considered if an engineering study finds that the common intersection of two or more major routes meets one or both of the following criteria:

- A. The intersection has a total existing, or immediately projected entering volume of at least 1,000 vehicles per hour during the peak hour of a typical weekday and has 5-year projected traffic volumes, based on an engineering study, that meet one or more of Warrants 1, 2, and 3 during an average weekday; or
- B. The intersection has a total existing or immediately projected entering volume of at least 1,000 vehicles per hour for each of any 5 hours of a non-normal business day (Saturday or Sunday).

A major route as used in this signal warrant shall have at least one of the following characteristics:

- A. It is part of the street or highway system that serves as the principal roadway network for through traffic flow.
- B. It includes rural or suburban highways outside, entering, or traversing a city.
- C. It appears as a major route on an official plan, such as a major street plan in an urban area traffic and transportation study.

As was seen within the traffic volumes presented for the previous warrants, the traffic volumes both existing and what can reasonably be expected in the future are inadequate to meet the requirements of this warrant, thus **Warrant 8 is NOT SATISFIED.**

Warrant 9 – Intersection Near a Grade Crossing

This warrant is intended for use at a location where none of the conditions described in the other eight traffic signal warrants are met, but the proximity of the intersection to a grade crossing on an intersection approach controlled by a STOP or YIELD sign is the principal reason to consider installing a traffic signal control.

The nearest grade crossing is approximately 1.4 miles east of the intersection. As a result, this warrant is not applicable and thus **Warrant 9 is NOT SATISFIED.**

Conclusion

This traffic signal warrant study reveals that a signal at the intersection of Central Road at Dryden Place and The Moorings Entrance is not currently warranted. When additional development occurs at the campus, the need for a traffic signal will be revisited.

Copies of the crash data and HCS Warrant analysis are included in the **Appendix.**

6 - SUMMARY

This report summarizes the results of traffic and parking study for the expansion of the Moorings of Arlington Heights in Arlington Heights, Illinois. The findings of the study area:

- The volume of traffic generated by the development is minimal (8 to 12 vehicles per hour) due to the nature of the use.
- The net change in area traffic volumes is nominal.
- The Mooring's driveway does not require any additional roadway improvements for the additional traffic volumes. Crash data does not support the need for traffic improvements.
- A traffic signal is not currently warranted at the Mooring's driveway and Dryden Place and will not be warranted with the development. When additional development occurs at the campus, the need for a traffic signal will be revisited.
- There is adequate parking at the campus.
- The zoning requirement calculations assume that the resident fellowship hall is used by off-campus visitors. However, this space will primarily serve and support only our on-site residents for various activities and programs which will not generate any significant traffic or parking need from off-campus visitors.

Traffic and Parking Study Appendix

- **2014 Existing Traffic Counts**
- **2009-2012 Crash Data**
- **Capacity Analyses**
- **MUTCD Signal Warrants**



Intersection Traffic Counts

Central Road at Dryden Place and The Moorings Access

Arlington Heights, Illinois

Begin Time		Dryden Place Southbound				Central Road Westbound				Moorings Access Northbound				Central Road Eastbound				Peak Hour Factor	Mooring's Volumes		15 Minute Totals	60 Minute Totals		
		Right Turn	Through	Left Turn	Turn	Right Turn	Through	Left Turn	Turn	Right Turn	Through	Left Turn	Turn	Right Turn	Through	Left Turn	Turn		IN	OUT				
Thursday, November 13, 2014																								
7:00 AM		11	0	1		0	170	10		3	0	1		21	209	7		433		0.88	31	4	2000	91
7:15 AM		12	0	5		2	208	9		4	0	6		8	248	8		510		0.91	17	10	2067	71
7:30 AM		7	0	5		0	232	1		3	0	3		3	223	10		487		0.90	4	6	2052	58
7:45 AM		8	0	6		4	238	5		3	0	2		9	285	10		570		0.88	14	5	2017	64
8:00 AM		13	0	7		4	224	5		1	0	0		9	230	7		500		0.95	14	1	1961	65
8:15 AM		7	0	5		7	225	6		1	0	2		5	232	5		495			11	3		
8:30 AM		9	0	0		11	213	2		1	0	2		11	194	9		452			13	3		
8:45 AM		34	0	9		12	218	10		3	0	2		5	199	22		514			15	5		
Total		101	0	38		40	1728	48		19	0	18		71	1820	78								
7:15-8:15 AM		40	0	23		10	902	20		11	0	11		29	986	35		2067			49	22		71
7:00-8:00 AM		38	0	17		6	848	25		13	0	12		41	965	35		2000			66	25		91
Thursday, November 13, 2014																								
4:00 PM		7	0	3		5	264	3		8	0	12		5	205	11		523		0.93	8	20	2272	99
4:15 PM		1	0	2		3	302	7		8	0	4		4	216	19		566		0.91	11	12	2409	92
4:30 PM		5	0	2		3	276	5		6	0	8		6	247	12		570		0.95	11	14	2498	86
4:45 PM		3	1	2		11	308	4		7	0	7		4	257	9		613		0.97	9	14	2571	76
5:00 PM		5	0	3		4	345	3		5	0	7		6	266	16		660		0.95	9	12	2515	67
5:15 PM		3	0	2		2	353	2		8	0	2		5	255	23		655			7	10		
5:30 PM		4	0	1		3	333	0		7	0	5		3	274	13		643			3	12		
5:45 PM		9	0	4		7	291	6		3	0	5		0	224	8		557			6	8		
Total		37	1	19		38	2472	30		52	0	50		33	1944	111								
4:45-5:45 PM		15	1	8		20	1339	9		27	0	21		18	1052	61		2571			28	48		76
4:00-5:00 PM		16	1	9		22	1150	19		29	0	31		19	925	51		2272			39	60		99

7:15-8:15 AM Central Road Street Morning Peak-Hour

7:00-8:00 AM Moorings Traffic Morning Peak-Hour

4:45-5:45 PM Central Road Street Evening Peak-Hour

4:00-5:00 PM Moorings Traffic Evening Peak-Hour

Illinois DOT

016 3751 Weekly Volume Report - Mon 06/21/2010 - Sun 06/27/2010

Location ID:	016 3751
Located On:	CENTRAL RD
From Road:	
Direction:	-
Community:	ARLINGTON HEIGHTS
AADT:	21200

Type:	LINK
To Road:	MP PW ENT
Period:	Mon 06/21/2010 - Sun 06/27/2010

Start Time	Mon	Tue	Wed	Thu	Fri	Sat	Sun	Avg
12:00 AM				157				157
1:00 AM				88				88
2:00 AM				59				59
3:00 AM				37				37
4:00 AM				100				100
5:00 AM			358					358
6:00 AM			1183					1183
7:00 AM			1783					1783
8:00 AM			1709					1709
9:00 AM			1329					1329
10:00 AM			1134					1134
11:00 AM			1362					1362
12:00 PM			1507					1507
1:00 PM			1486					1486
2:00 PM			1556					1556
3:00 PM			1875					1875
4:00 PM			2124					2124
5:00 PM			2489					2489
6:00 PM			1596					1596
7:00 PM			1041					1041
8:00 PM			780					780
9:00 PM			650					650
10:00 PM			467					467
11:00 PM			291					291
Total	0	0	24720	441	0	0	0	
24HrTotal				25161				25161
AM Pk Hr								
AM Peak								0
PM Pk Hr								
PM Peak								0
% Peak Hr								
% Peak Hr				9.89%				9.89%



Illinois Department of Transportation
Division of Traffic Safety

Report No : SDM-RC

Sorted by : Mile / Date / ICN

Report Produced : 10/21/2014 2:16 PM

By: CENTRALADAMSCH

Page : 1 of 3

Coordinate Collision Diagram Report

1/1/2009 to 12/31/2012

For XCoordinate 2892791.562147 : YCoordinate 1974398.01617376 | Foot Tolerance : 30 | County : Cook | Intersection Related: Intersections | *See Notes at End of Report.

Date	Weather	Roadway	----- A	Injuries B	----- C	Killed	Type of Crash	Light Condition	Mile	XCoordinate YCoordinate	Vehicle Type	DIRP	Maneuver	Event 1	Loc 1	Event 2	Loc 2	Event 3	Loc 3	Unit
201101325661																				
8/26/2011 7:05 AM	Clear	Dry	0	0	0	0	Sideswipe Same Direction	Daylight	0.00	2892791.562147 1974398.01617376	Passenger	East	Straight Ahead	Motor Vehicle In Traffic	On Pavement (Roadway)	(UNK)	(UNK)	(UNK)	(UNK)	1
201001364660																				
10/12/2010 2:19 PM	Clear	Dry	0	0	0	0	Angle	Daylight	0.49	2892791.562147 1974398.01617376	Passenger	South	Straight Ahead	Motor Vehicle In Traffic	Intersectio n	(UNK)	(UNK)	(UNK)	(UNK)	1
201001363430																				
10/17/2010 5:42 PM	Clear	Dry	0	1	0	0	Turning	Daylight	0.49	2892791.0201856 1974397.90507906	Passenger	North	Turning Left	Motor Vehicle In Traffic	On Pavement (Roadway)	(UNK)	(UNK)	(UNK)	(UNK)	1
201001441743																				
12/3/2009 7:38 AM	Clear	Dry	0	0	0	0	Turning	Daylight	0.49	2892791.55671393 1974398.26486406	SUV	East	Straight Ahead	Motor Vehicle In Traffic	On Pavement (Roadway)	(UNK)	(UNK)	(UNK)	(UNK)	2
200901073311																				
1/30/2009 8:15 AM	Clear	Dry	0	0	0	0	Turning	Daylight	0.58	2892791.562147 1974398.01617376	Passenger	South	Turning Left	Motor Vehicle In Traffic	On Pavement (Roadway)	(UNK)	(UNK)	(UNK)	(UNK)	1
200901073311																				
1/30/2009 8:15 AM	Clear	Dry	0	0	0	0	Turning	Daylight	0.58	2892791.562147 1974398.01617376	Passenger	West	Slow/Stop In Traffic	Motor Vehicle In Traffic	Intersectio n	(UNK)	(UNK)	(UNK)	(UNK)	2
200901073311																				
1/30/2009 8:15 AM	Clear	Dry	0	0	0	0	Turning	Daylight	0.58	2892791.562147 1974398.01617376	Passenger	South	Turning Left	Motor Vehicle In Traffic	Intersectio n	(UNK)	(UNK)	(UNK)	(UNK)	1

Coordinate Collision Diagram Report

1/1/2009 to 12/31/2012

For XCoordinate	2892791.562147	YCoordinate	1974398.01617376	Foot Tolerance	30	County	Cook	Intersection Related:	Intersections	*See Notes at End of Report.
-----------------	----------------	-------------	------------------	----------------	----	--------	------	-----------------------	---------------	------------------------------

TOTAL CRASHES	FATAL CRASHES	A INJURY CRASHES	B INJURY CRASHES	C INJURY CRASHES	PROPERTY DAMAGE CRASHES	TOTAL KILLED	TOTAL INJURED	A INJURIES	B INJURIES	C INJURIES
5	0	0	1	0	4	0	1	0	1	0

Type of Crash	Total	%	Day of Wk	Total	%	Hour of Day	Total	%	Vehicle Type	Total	%
Angle	1	20.0%	Tuesday	1	20.0%	07 AM	2	40.0%	Passenger	9	90.0%
Sideswipe Same Direction	1	20.0%	Friday	3	60.0%	08 AM	1	20.0%	SUV	1	10.0%
Turning	3	60.0%	Sunday	1	20.0%	2 PM	1	20.0%	TOTAL:	10	
TOTAL:	5		TOTAL:	5		5 PM	1	20.0%			
						TOTAL:	5				

Weather Cond		Total	%	Light Cond		Total	%	Road Surface		Total	%	DIRP		Total	%
Clear		5	100.0%	Daylight		5	100.0%	Dry		5	100.0%	East		3	30.0%
TOTAL:		5		TOTAL:		5		TOTAL:		5		North		1	10.0%
												South		3	30.0%
												West		3	30.0%
												TOTAL:		10	



Coordinate Collision Diagram Report

1/1/2009 to 12/31/2012

For XCoordinate 2892791.562147 : YCoordinate 1974398.01617376 | Foot Tolerance : 30 | County : Cook | Intersection Related: Intersections | *See Notes at End of Report.

Notes

Current year and previous year data are not yet complete and are subject to change as more information becomes available. Calendar date selections include data based on the date of the crash. Year selections include data based on the statistical year in which the crash was processed.

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	35	965	51	32	848	10	15	0	16	17	0	38
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.992			0.998				0.850		0.906	
Flt Protected	0.950			0.950				0.950			0.985	
Satd. Flow (prot)	1770	3511	0	1770	3532	0	0	1770	1583	0	1662	0
Flt Permitted	0.950			0.950				0.950			0.985	
Satd. Flow (perm)	1770	3511	0	1770	3532	0	0	1770	1583	0	1662	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.88	0.88	0.88	0.89	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Adj. Flow (vph)	40	1097	58	36	964	11	17	0	18	19	0	43
Shared Lane Traffic (%)												
Lane Group Flow (vph)	40	1155	0	36	975	0	0	17	18	0	62	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 45.7% ICU Level of Service A

Analysis Period (min) 15

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBR	All
Denied Del/Veh (s)	2.4	0.2	0.5	2.8	0.2	0.3	0.1	4.1	0.1	0.1	0.3
Total Del/Veh (s)	3.6	1.2	2.0	5.5	0.9	1.2	29.9	1.0	18.1	1.6	1.5

Queuing and Blocking Report
Existing Moorings AM Peak Hour (Full Occupancy)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	SB
Directions Served	L	L	TR	LT	LTR
Maximum Queue (ft)	28	47	44	53	53
Average Queue (ft)	16	12	1	13	17
95th Queue (ft)	36	34	14	40	48
Link Distance (ft)			570	319	377
Upstream Blk Time (%)					
Queuing Penalty (veh)					
Storage Bay Dist (ft)	265	150			
Storage Blk Time (%)					
Queuing Penalty (veh)					

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	35	965	54	34	848	10	16	0	17	17	0	38
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.992			0.998				0.850		0.906	
Flt Protected	0.950			0.950				0.950			0.985	
Satd. Flow (prot)	1770	3511	0	1770	3532	0	0	1770	1583	0	1662	0
Flt Permitted	0.950			0.950				0.950			0.985	
Satd. Flow (perm)	1770	3511	0	1770	3532	0	0	1770	1583	0	1662	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.88	0.88	0.88	0.89	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Adj. Flow (vph)	40	1097	61	38	964	11	18	0	19	19	0	43
Shared Lane Traffic (%)												
Lane Group Flow (vph)	40	1158	0	38	975	0	0	18	19	0	62	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 45.7% ICU Level of Service A

Analysis Period (min) 15

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBR	All
Denied Del/Veh (s)	2.4	0.2	0.5	2.7	0.2	0.3	0.1	4.1	0.1	0.1	0.3
Total Del/Veh (s)	3.8	1.2	2.1	6.0	0.9	1.2	29.5	1.0	17.9	2.1	1.6

Queuing and Blocking Report
Total Moorings AM Peak Hour (with Phase 1)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	SB
Directions Served	L	L	TR	LT	LTR
Maximum Queue (ft)	28	47	44	53	54
Average Queue (ft)	17	11	1	15	18
95th Queue (ft)	36	33	14	42	49
Link Distance (ft)			570	319	377
Upstream Blk Time (%)					
Queuing Penalty (veh)					
Storage Bay Dist (ft)	265	150			
Storage Blk Time (%)					
Queuing Penalty (veh)					

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	35	986	36	25	902	10	14	0	14	23	0	40
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.995			0.998				0.850		0.914	
Flt Protected	0.950			0.950				0.950			0.982	
Satd. Flow (prot)	1770	3522	0	1770	3532	0	0	1770	1583	0	1672	0
Flt Permitted	0.950			0.950				0.950			0.982	
Satd. Flow (perm)	1770	3522	0	1770	3532	0	0	1770	1583	0	1672	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Adj. Flow (vph)	38	1084	40	27	991	11	15	0	15	25	0	44
Shared Lane Traffic (%)												
Lane Group Flow (vph)	38	1124	0	27	1002	0	0	15	15	0	69	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 46.2%

ICU Level of Service A

Analysis Period (min) 15

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBR	All
Denied Del/Veh (s)	2.4	0.2	0.4	2.9	0.2	0.3	0.1	4.1	0.2	0.1	0.3
Total Del/Veh (s)	4.3	1.1	1.7	5.1	0.9	1.2	34.4	1.0	31.4	8.0	1.8

Queuing and Blocking Report
Central Existing AM Peak Hour (Full Occupancy)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	SB
Directions Served	L	L	TR	LT	LTR
Maximum Queue (ft)	49	28	44	53	72
Average Queue (ft)	17	6	1	15	26
95th Queue (ft)	38	24	14	41	61
Link Distance (ft)			570	319	377
Upstream Blk Time (%)					
Queuing Penalty (veh)					
Storage Bay Dist (ft)	265	150			
Storage Blk Time (%)					
Queuing Penalty (veh)					

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	35	986	38	27	902	10	15	0	15	23	0	40
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.994			0.998				0.850		0.914	
Flt Protected	0.950			0.950				0.950			0.982	
Satd. Flow (prot)	1770	3518	0	1770	3532	0	0	1770	1583	0	1672	0
Flt Permitted	0.950			0.950				0.950			0.982	
Satd. Flow (perm)	1770	3518	0	1770	3532	0	0	1770	1583	0	1672	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Adj. Flow (vph)	38	1084	42	30	991	11	16	0	16	25	0	44
Shared Lane Traffic (%)												
Lane Group Flow (vph)	38	1126	0	30	1002	0	0	16	16	0	69	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 46.2% ICU Level of Service A

Analysis Period (min) 15

SimTraffic Performance Report
Central Total AM Peak Hour (with Phase 1)

3/14/2015

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBR	All
Denied Del/Veh (s)	2.4	0.2	0.4	3.0	0.2	0.3	0.1	4.1	0.2	0.1	0.3
Total Del/Veh (s)	4.3	1.1	1.7	5.2	0.9	1.2	34.4	1.0	31.5	8.0	1.8

Queuing and Blocking Report
Central Total AM Peak Hour (with Phase 1)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	SB
Directions Served	L	L	TR	LT	LTR
Maximum Queue (ft)	49	28	44	53	72
Average Queue (ft)	17	8	1	15	26
95th Queue (ft)	38	26	14	41	61
Link Distance (ft)			570	319	377
Upstream Blk Time (%)					
Queuing Penalty (veh)					
Storage Bay Dist (ft)	265	150			
Storage Blk Time (%)					
Queuing Penalty (veh)					

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	61	925	25	23	1150	22	38	0	37	9	1	16
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.996			0.997				0.850		0.918	
Flt Protected	0.950			0.950				0.950			0.982	
Satd. Flow (prot)	1770	3525	0	1770	3529	0	0	1770	1583	0	1679	0
Flt Permitted	0.950			0.950				0.950			0.982	
Satd. Flow (perm)	1770	3525	0	1770	3529	0	0	1770	1583	0	1679	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Adj. Flow (vph)	66	995	27	25	1237	24	41	0	40	10	1	17
Shared Lane Traffic (%)												
Lane Group Flow (vph)	66	1022	0	25	1261	0	0	41	40	0	28	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 54.1% ICU Level of Service A

Analysis Period (min) 15

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBT	SBR	All
Denied Del/Veh (s)	2.6	0.2	0.2	2.5	0.2	0.3	0.2	4.2	0.2	0.1	0.1	0.3
Total Del/Veh (s)	8.0	1.0	1.8	5.6	1.2	1.2	67.6	1.8	32.1	18.0	5.4	2.3

Queuing and Blocking Report
Moorings Existing Peak Hour (Full Occupancy)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	NB	SB
Directions Served	L	L	TR	LT	R	LTR
Maximum Queue (ft)	54	26	47	75	95	54
Average Queue (ft)	27	5	2	31	6	14
95th Queue (ft)	47	21	16	69	42	41
Link Distance (ft)			570	319		377
Upstream Blk Time (%)						
Queuing Penalty (veh)						
Storage Bay Dist (ft)	265	150			75	
Storage Blk Time (%)				1	0	
Queuing Penalty (veh)				0	0	

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	61	925	27	24	1150	22	40	0	40	9	1	16
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.996			0.997				0.850		0.918	
Flt Protected	0.950			0.950				0.950			0.982	
Satd. Flow (prot)	1770	3525	0	1770	3529	0	0	1770	1583	0	1679	0
Flt Permitted	0.950			0.950				0.950			0.982	
Satd. Flow (perm)	1770	3525	0	1770	3529	0	0	1770	1583	0	1679	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Adj. Flow (vph)	66	995	29	26	1237	24	43	0	43	10	1	17
Shared Lane Traffic (%)												
Lane Group Flow (vph)	66	1024	0	26	1261	0	0	43	43	0	28	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 54.1% ICU Level of Service A

Analysis Period (min) 15

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBT	SBR	All
Denied Del/Veh (s)	2.5	0.2	0.2	2.0	0.2	0.2	0.2	4.2	0.2	0.1	0.1	0.3
Total Del/Veh (s)	8.2	1.0	2.1	6.0	1.2	1.2	63.1	1.8	33.9	18.0	5.1	2.3

Queuing and Blocking Report
Moorings Total PM Peak Hour (with Phase 1)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	WB	NB	NB	SB
Directions Served	L	L	TR	LT	R	LTR
Maximum Queue (ft)	54	27	47	73	79	54
Average Queue (ft)	26	5	2	33	3	14
95th Queue (ft)	47	21	16	68	26	42
Link Distance (ft)			570	319		377
Upstream Blk Time (%)						
Queuing Penalty (veh)						
Storage Bay Dist (ft)	265	150			75	
Storage Blk Time (%)				4	0	
Queuing Penalty (veh)				2	0	

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	51	1052	22	12	1339	20	27	0	33	8	1	15
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.997			0.998				0.850		0.916	
Flt Protected	0.950			0.950				0.950			0.984	
Satd. Flow (prot)	1770	3529	0	1770	3532	0	0	1770	1583	0	1679	0
Flt Permitted	0.950			0.950				0.950			0.984	
Satd. Flow (perm)	1770	3529	0	1770	3532	0	0	1770	1583	0	1679	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97
Adj. Flow (vph)	53	1085	23	12	1380	21	28	0	34	8	1	15
Shared Lane Traffic (%)												
Lane Group Flow (vph)	53	1108	0	12	1401	0	0	28	34	0	24	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 57.1% ICU Level of Service B

Analysis Period (min) 15

SimTraffic Performance Report
Central Existing PM Peak Hour (Full Occupancy)

3/14/2015

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBT	SBR	All
Denied Del/Veh (s)	2.3	0.2	0.3	2.6	0.3	0.3	0.4	4.0	0.1	0.1	0.1	0.3
Total Del/Veh (s)	8.9	1.0	1.9	5.6	1.3	1.3	85.7	1.8	28.8	17.3	0.5	2.3

Queuing and Blocking Report
Central Existing PM Peak Hour (Full Occupancy)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	NB	SB
Directions Served	L	L	LT	LTR
Maximum Queue (ft)	93	27	83	31
Average Queue (ft)	21	5	32	8
95th Queue (ft)	53	20	74	31
Link Distance (ft)			319	377
Upstream Blk Time (%)				
Queuing Penalty (veh)				
Storage Bay Dist (ft)	265	150		
Storage Blk Time (%)			4	
Queuing Penalty (veh)			1	

Lanes, Volumes, Timings

1: The Moorings/Dryden Place & Central Road

3/14/2015

												
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	51	1052	23	13	1339	20	29	0	35	8	1	15
Ideal Flow (vphpl)	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900	1900
Storage Length (ft)	265		0	150		0	75		75	0		0
Storage Lanes	1		0	1		0	0		1	0		0
Taper Length (ft)	175			125			25			25		
Lane Util. Factor	1.00	0.95	0.95	1.00	0.95	0.95	1.00	1.00	1.00	1.00	1.00	1.00
Frt		0.997			0.998				0.850		0.916	
Flt Protected	0.950			0.950				0.950			0.984	
Satd. Flow (prot)	1770	3529	0	1770	3532	0	0	1770	1583	0	1679	0
Flt Permitted	0.950			0.950				0.950			0.984	
Satd. Flow (perm)	1770	3529	0	1770	3532	0	0	1770	1583	0	1679	0
Link Speed (mph)		40			40			25			25	
Link Distance (ft)		663			590			372			430	
Travel Time (s)		11.3			10.1			10.1			11.7	
Peak Hour Factor	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97	0.97
Adj. Flow (vph)	53	1085	24	13	1380	21	30	0	36	8	1	15
Shared Lane Traffic (%)												
Lane Group Flow (vph)	53	1109	0	13	1401	0	0	30	36	0	24	0
Enter Blocked Intersection	No	No	No	No	No	No	No	No	No	No	No	No
Lane Alignment	Left	Left	Right	Left	Left	Right	Left	Left	Right	Left	Left	Right
Median Width(ft)		12			12			15			0	
Link Offset(ft)		0			0			0			0	
Crosswalk Width(ft)		0			0			23			23	
Two way Left Turn Lane												
Headway Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00
Turning Speed (mph)	15		9	15		9	15		9	15		9
Sign Control		Free			Free			Stop			Stop	

Intersection Summary

Area Type: Other

Control Type: Unsignalized

Intersection Capacity Utilization 57.1% ICU Level of Service B

Analysis Period (min) 15

SimTraffic Performance Report
Central Total PM Peak Hour (with Phase 1)

3/14/2015

1: The Moorings/Dryden Place & Central Road Performance by movement

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBR	SBL	SBT	SBR	All
Denied Del/Veh (s)	2.3	0.2	0.2	2.6	0.3	0.3	0.4	4.0	0.1	0.1	0.1	0.3
Total Del/Veh (s)	8.8	1.1	1.9	5.9	1.3	1.3	125.2	5.0	70.5	17.3	10.2	3.0

Queuing and Blocking Report
Central Total PM Peak Hour (with Phase 1)

3/14/2015

Intersection: 1: The Moorings/Dryden Place & Central Road

Movement	EB	WB	NB	NB	SB
Directions Served	L	L	LT	R	LTR
Maximum Queue (ft)	93	27	118	100	74
Average Queue (ft)	21	5	39	13	13
95th Queue (ft)	53	20	96	67	45
Link Distance (ft)			319		377
Upstream Blk Time (%)					
Queuing Penalty (veh)					
Storage Bay Dist (ft)	265	150		75	
Storage Blk Time (%)			16	0	
Queuing Penalty (veh)			5	0	

CHAPTER 4C. TRAFFIC CONTROL SIGNAL NEEDS STUDIES

Section 4C.01 Studies and Factors for Justifying Traffic Control Signals

Standard:

- 01 An engineering study of traffic conditions, pedestrian characteristics, and physical characteristics of the location shall be performed to determine whether installation of a traffic control signal is justified at a particular location.
- 02 The investigation of the need for a traffic control signal shall include an analysis of factors related to the existing operation and safety at the study location and the potential to improve these conditions, and the applicable factors contained in the following traffic signal warrants:
- Warrant 1, Eight-Hour Vehicular Volume
 - Warrant 2, Four-Hour Vehicular Volume
 - Warrant 3, Peak Hour
 - Warrant 4, Pedestrian Volume
 - Warrant 5, School Crossing
 - Warrant 6, Coordinated Signal System
 - Warrant 7, Crash Experience
 - Warrant 8, Roadway Network
 - Warrant 9, Intersection Near a Grade Crossing

- 03 The satisfaction of a traffic signal warrant or warrants shall not in itself require the installation of a traffic control signal.

Support:

- 04 Sections 8C.09 and 8C.10 contain information regarding the use of traffic control signals instead of gates and/or flashing-light signals at highway-rail grade crossings and highway-light rail transit grade crossings, respectively.
- Guidance:*
- 05 A traffic control signal should not be installed unless one or more of the factors described in this Chapter are met.
- 06 A traffic control signal should not be installed unless an engineering study indicates that installing a traffic control signal will improve the overall safety and/or operation of the intersection.
- 07 A traffic control signal should not be installed if it will seriously disrupt progressive traffic flow.
- 08 The study should consider the effects of the right-turn vehicles from the minor-street approaches. Engineering judgment should be used to determine what, if any, portion of the right-turn traffic is subtracted from the minor-street traffic count when evaluating the count against the signal warrants listed in Paragraph 2.
- 09 Engineering judgment should also be used in applying various traffic signal warrants to cases where approaches consist of one lane plus one left-turn or right-turn lane. The site-specific traffic characteristics should dictate whether an approach is considered as one lane or two lanes. For example, for an approach with one lane for through and right-turning traffic plus a left-turn lane, if engineering judgment indicates that it should be considered a one-lane approach because the traffic using the left-turn lane is minor, the total traffic volume approaching the intersection should be applied against the signal warrants as a one-lane approach. The approach should be considered two lanes if approximately half of the traffic on the approach turns left and the left-turn lane is of sufficient length to accommodate all left-turn vehicles.
- 10 Similar engineering judgment and rationale should be applied to a street approach with one through/left-turn lane plus a right-turn lane. In this case, the degree of conflict of minor-street right-turn traffic with traffic on the major street should be considered. Thus, right-turn traffic should not be included in the minor-street volume if the movement enters the major street with minimal conflict. The approach should be evaluated as a one-lane approach with only the traffic volume in the through/left-turn lane considered.
- 11 At a location that is under development or construction and where it is not possible to obtain a traffic count that would represent future traffic conditions, hourly volumes should be estimated as part of an engineering study for comparison with traffic signal warrants. Except for locations where the engineering study uses the satisfaction of Warrant 8 to justify a signal, a traffic control signal installed under projected conditions should have an engineering study done within 1 year of putting the signal into stop-and-go operation to determine if the signal is justified. If not justified, the signal should be taken out of stop-and-go operation or removed.
- 12 For signal warrant analysis, a location with a wide median, even if the median width is greater than 30 feet, should be considered as one intersection.

Option:

- 13 At an intersection with a high volume of left-turn traffic from the major street, the signal warrant analysis may be performed in a manner that considers the higher of the major-street left-turn volumes as the “minor-street” volume and the corresponding single direction of opposing traffic on the major street as the “major-street” volume.
- 14 For signal warrants requiring conditions to be present for a certain number of hours in order to be satisfied, any four sequential 15-minute periods may be considered as 1 hour if the separate 1-hour periods used in the warrant analysis do not overlap each other and both the major-street volume and the minor-street volume are for the same specific one-hour periods.
- 15 For signal warrant analysis, bicyclists may be counted as either vehicles or pedestrians.

Support:

- 16 When performing a signal warrant analysis, bicyclists riding in the street with other vehicular traffic are usually counted as vehicles and bicyclists who are clearly using pedestrian facilities are usually counted as pedestrians.

Option:

- 17 Engineering study data may include the following:
 - A. The number of vehicles entering the intersection in each hour from each approach during 12 hours of an average day. It is desirable that the hours selected contain the greatest percentage of the 24-hour traffic volume.
 - B. Vehicular volumes for each traffic movement from each approach, classified by vehicle type (heavy trucks, passenger cars and light trucks, public-transit vehicles, and, in some locations, bicycles), during each 15-minute period of the 2 hours in the morning and 2 hours in the afternoon during which total traffic entering the intersection is greatest.
 - C. Pedestrian volume counts on each crosswalk during the same periods as the vehicular counts in Item B and during hours of highest pedestrian volume. Where young, elderly, and/or persons with physical or visual disabilities need special consideration, the pedestrians and their crossing times may be classified by general observation.
 - D. Information about nearby facilities and activity centers that serve the young, elderly, and/or persons with disabilities, including requests from persons with disabilities for accessible crossing improvements at the location under study. These persons might not be adequately reflected in the pedestrian volume count if the absence of a signal restrains their mobility.
 - E. The posted or statutory speed limit or the 85th-percentile speed on the uncontrolled approaches to the location.
 - F. A condition diagram showing details of the physical layout, including such features as intersection geometrics, channelization, grades, sight-distance restrictions, transit stops and routes, parking conditions, pavement markings, roadway lighting, driveways, nearby railroad crossings, distance to nearest traffic control signals, utility poles and fixtures, and adjacent land use.
 - G. A collision diagram showing crash experience by type, location, direction of movement, severity, weather, time of day, date, and day of week for at least 1 year.
- 18 The following data, which are desirable for a more precise understanding of the operation of the intersection, may be obtained during the periods described in Item B of Paragraph 17:
 - A. Vehicle-hours of stopped time delay determined separately for each approach.
 - B. The number and distribution of acceptable gaps in vehicular traffic on the major street for entrance from the minor street.
 - C. The posted or statutory speed limit or the 85th-percentile speed on controlled approaches at a point near to the intersection but unaffected by the control.
 - D. Pedestrian delay time for at least two 30-minute peak pedestrian delay periods of an average weekday or like periods of a Saturday or Sunday.
 - E. Queue length on stop-controlled approaches.

Section 4C.02 Warrant 1, Eight-Hour Vehicular Volume

Support:

- 01 The Minimum Vehicular Volume, Condition A, is intended for application at locations where a large volume of intersecting traffic is the principal reason to consider installing a traffic control signal.
- 02 The Interruption of Continuous Traffic, Condition B, is intended for application at locations where Condition A is not satisfied and where the traffic volume on a major street is so heavy that traffic on a minor intersecting street suffers excessive delay or conflict in entering or crossing the major street.
- 03 It is intended that Warrant 1 be treated as a single warrant. If Condition A is satisfied, then Warrant 1 is satisfied and analyses of Condition B and the combination of Conditions A and B are not needed. Similarly, if Condition B is satisfied, then Warrant 1 is satisfied and an analysis of the combination of Conditions A and B is not needed.

Standard:

04 The need for a traffic control signal shall be considered if an engineering study finds that one of the following conditions exist for each of any 8 hours of an average day:

- A. The vehicles per hour given in both of the 100 percent columns of Condition A in Table 4C-1 exist on the major-street and the higher-volume minor-street approaches, respectively, to the intersection; or
- B. The vehicles per hour given in both of the 100 percent columns of Condition B in Table 4C-1 exist on the major-street and the higher-volume minor-street approaches, respectively, to the intersection.

In applying each condition the major-street and minor-street volumes shall be for the same 8 hours. On the minor street, the higher volume shall not be required to be on the same approach during each of these 8 hours.

Option:

05 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 40 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, the traffic volumes in the 70 percent columns in Table 4C-1 may be used in place of the 100 percent columns.

Guidance:

06 The combination of Conditions A and B is intended for application at locations where Condition A is not satisfied and Condition B is not satisfied and should be applied only after an adequate trial of other alternatives that could cause less delay and inconvenience to traffic has failed to solve the traffic problems.

Standard:

07 The need for a traffic control signal shall be considered if an engineering study finds that both of the following conditions exist for each of any 8 hours of an average day:

- A. The vehicles per hour given in both of the 80 percent columns of Condition A in Table 4C-1 exist on the major-street and the higher-volume minor-street approaches, respectively, to the intersection; and
- B. The vehicles per hour given in both of the 80 percent columns of Condition B in Table 4C-1 exist on the major-street and the higher-volume minor-street approaches, respectively, to the intersection.

These major-street and minor-street volumes shall be for the same 8 hours for each condition; however, the 8 hours satisfied in Condition A shall not be required to be the same 8 hours satisfied in Condition B. On the minor street, the higher volume shall not be required to be on the same approach during each of the 8 hours.

Table 4C-1. Warrant 1, Eight-Hour Vehicular Volume

Condition A—Minimum Vehicular Volume

Number of lanes for moving traffic on each approach		Vehicles per hour on major street (total of both approaches)				Vehicles per hour on higher-volume minor-street approach (one direction only)			
Major Street	Minor Street	100% ^a	80% ^b	70% ^c	56% ^d	100% ^a	80% ^b	70% ^c	56% ^d
1	1	500	400	350	280	150	120	105	84
2 or more	1	600	480	420	336	150	120	105	84
2 or more	2 or more	600	480	420	336	200	160	140	112
1	2 or more	500	400	350	280	200	160	140	112

Condition B—Interruption of Continuous Traffic

Number of lanes for moving traffic on each approach		Vehicles per hour on major street (total of both approaches)				Vehicles per hour on higher-volume minor-street approach (one direction only)			
Major Street	Minor Street	100% ^a	80% ^b	70% ^c	56% ^d	100% ^a	80% ^b	70% ^c	56% ^d
1	1	750	600	525	420	75	60	53	42
2 or more	1	900	720	630	504	75	60	53	42
2 or more	2 or more	900	720	630	504	100	80	70	56
1	2 or more	750	600	525	420	100	80	70	56

^a Basic minimum hourly volume

^b Used for combination of Conditions A and B after adequate trial of other remedial measures

^c May be used when the major-street speed exceeds 40 mph or in an isolated community with a population of less than 10,000

^d May be used for combination of Conditions A and B after adequate trial of other remedial measures when the major-street speed exceeds 40 mph or in an isolated community with a population of less than 10,000

Option:

- 08 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 40 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, the traffic volumes in the 56 percent columns in Table 4C-1 may be used in place of the 80 percent columns.

Section 4C.03 Warrant 2, Four-Hour Vehicular Volume

Support:

- 01 The Four-Hour Vehicular Volume signal warrant conditions are intended to be applied where the volume of intersecting traffic is the principal reason to consider installing a traffic control signal.

Standard:

- 02 **The need for a traffic control signal shall be considered if an engineering study finds that, for each of any 4 hours of an average day, the plotted points representing the vehicles per hour on the major street (total of both approaches) and the corresponding vehicles per hour on the higher-volume minor-street approach (one direction only) all fall above the applicable curve in Figure 4C-1 for the existing combination of approach lanes. On the minor street, the higher volume shall not be required to be on the same approach during each of these 4 hours.**

Option:

- 03 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 40 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, Figure 4C-2 may be used in place of Figure 4C-1.

Section 4C.04 Warrant 3, Peak Hour

Support:

- 01 The Peak Hour signal warrant is intended for use at a location where traffic conditions are such that for a minimum of 1 hour of an average day, the minor-street traffic suffers undue delay when entering or crossing the major street.

Standard:

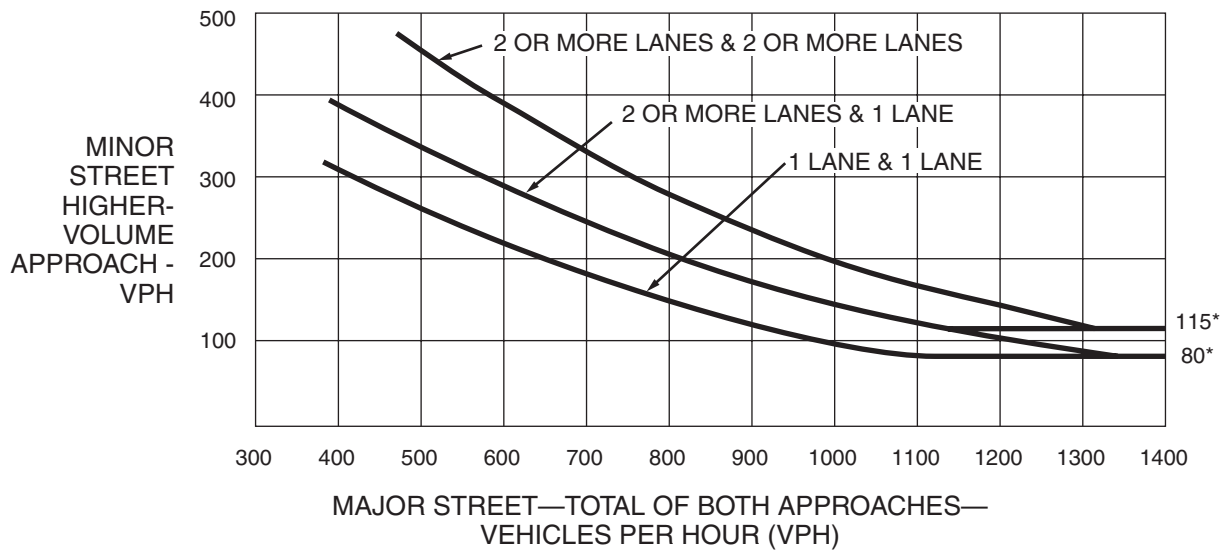
- 02 **This signal warrant shall be applied only in unusual cases, such as office complexes, manufacturing plants, industrial complexes, or high-occupancy vehicle facilities that attract or discharge large numbers of vehicles over a short time.**
- 03 **The need for a traffic control signal shall be considered if an engineering study finds that the criteria in either of the following two categories are met:**
- A. If all three of the following conditions exist for the same 1 hour (any four consecutive 15-minute periods) of an average day:**
 - 1. The total stopped time delay experienced by the traffic on one minor-street approach (one direction only) controlled by a STOP sign equals or exceeds: 4 vehicle-hours for a one-lane approach or 5 vehicle-hours for a two-lane approach; and**
 - 2. The volume on the same minor-street approach (one direction only) equals or exceeds 100 vehicles per hour for one moving lane of traffic or 150 vehicles per hour for two moving lanes; and**
 - 3. The total entering volume serviced during the hour equals or exceeds 650 vehicles per hour for intersections with three approaches or 800 vehicles per hour for intersections with four or more approaches.**
 - B. The plotted point representing the vehicles per hour on the major street (total of both approaches) and the corresponding vehicles per hour on the higher-volume minor-street approach (one direction only) for 1 hour (any four consecutive 15-minute periods) of an average day falls above the applicable curve in Figure 4C-3 for the existing combination of approach lanes.**

Option:

- 04 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 40 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, Figure 4C-4 may be used in place of Figure 4C-3 to evaluate the criteria in the second category of the Standard.
- 05 If this warrant is the only warrant met and a traffic control signal is justified by an engineering study, the traffic control signal may be operated in the flashing mode during the hours that the volume criteria of this warrant are not met.

Guidance:

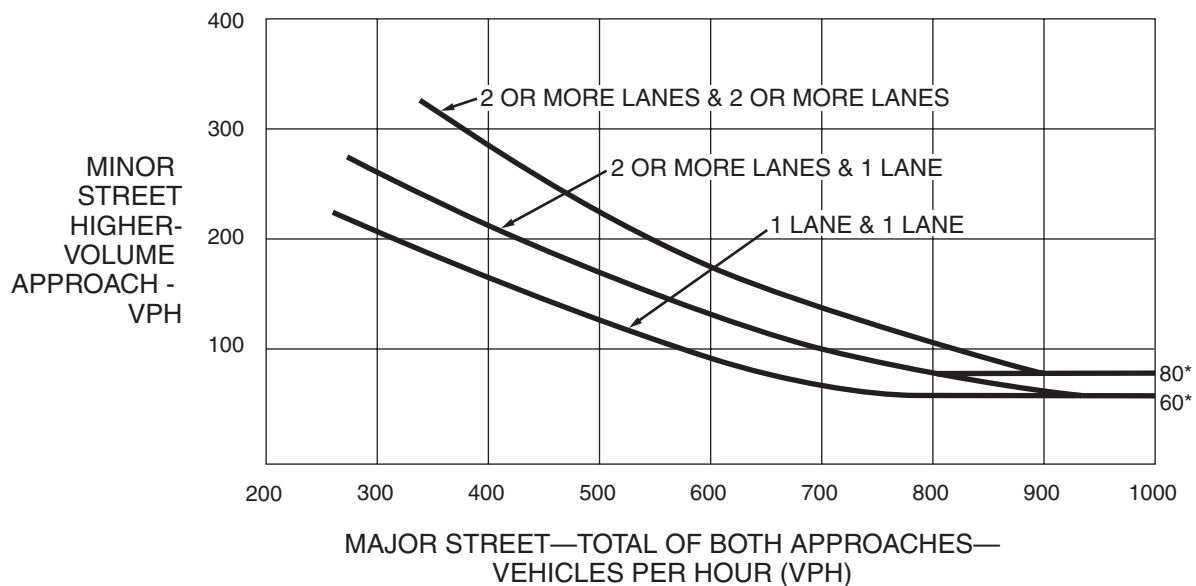
- 06 *If this warrant is the only warrant met and a traffic control signal is justified by an engineering study, the traffic control signal should be traffic-actuated.*

Figure 4C-1. Warrant 2, Four-Hour Vehicular Volume

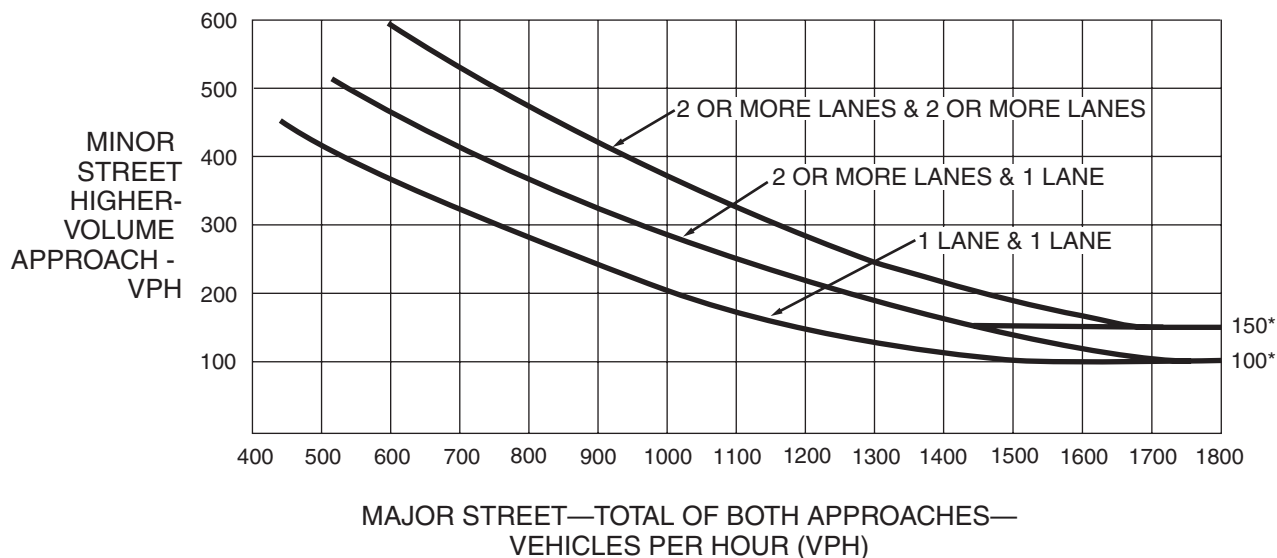
*Note: 115 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 80 vph applies as the lower threshold volume for a minor-street approach with one lane.

Figure 4C-2. Warrant 2, Four-Hour Vehicular Volume (70% Factor)

(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



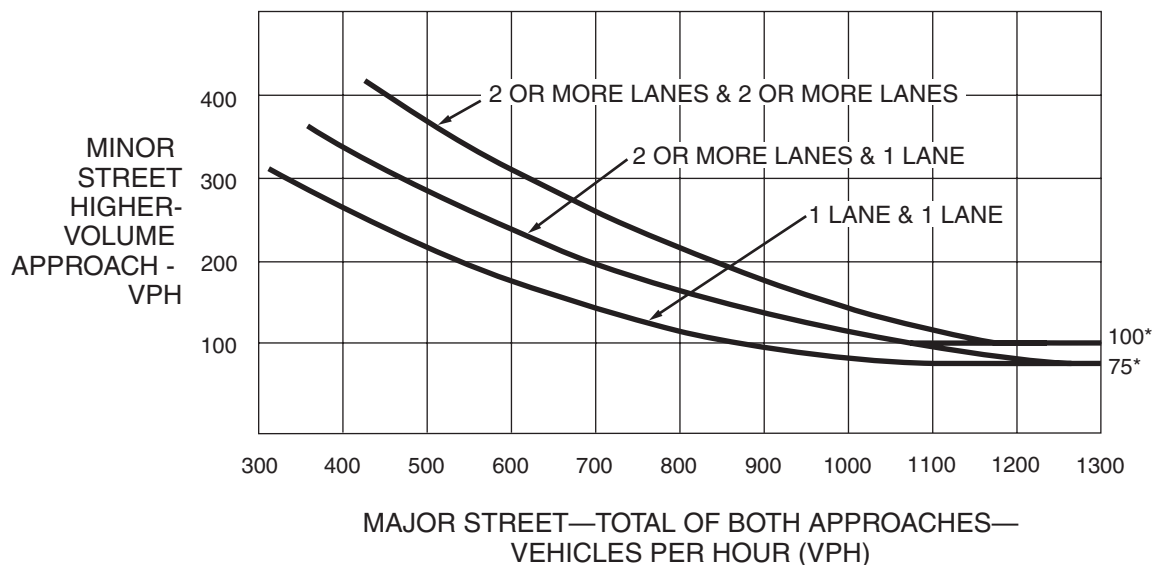
*Note: 80 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 60 vph applies as the lower threshold volume for a minor-street approach with one lane.

Figure 4C-3. Warrant 3, Peak Hour

*Note: 150 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 100 vph applies as the lower threshold volume for a minor-street approach with one lane.

Figure 4C-4. Warrant 3, Peak Hour (70% Factor)

(COMMUNITY LESS THAN 10,000 POPULATION OR ABOVE 40 MPH ON MAJOR STREET)



*Note: 100 vph applies as the lower threshold volume for a minor-street approach with two or more lanes and 75 vph applies as the lower threshold volume for a minor-street approach with one lane.

Section 4C.05 Warrant 4, Pedestrian Volume

Support:

- 01 The Pedestrian Volume signal warrant is intended for application where the traffic volume on a major street is so heavy that pedestrians experience excessive delay in crossing the major street.

Standard:

- 02 **The need for a traffic control signal at an intersection or midblock crossing shall be considered if an engineering study finds that one of the following criteria is met:**
- A. For each of any 4 hours of an average day, the plotted points representing the vehicles per hour on the major street (total of both approaches) and the corresponding pedestrians per hour crossing the major street (total of all crossings) all fall above the curve in Figure 4C-5; or
 - B. For 1 hour (any four consecutive 15-minute periods) of an average day, the plotted point representing the vehicles per hour on the major street (total of both approaches) and the corresponding pedestrians per hour crossing the major street (total of all crossings) falls above the curve in Figure 4C-7.

Option:

- 03 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 35 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, Figure 4C-6 may be used in place of Figure 4C-5 to evaluate Criterion A in Paragraph 2, and Figure 4C-8 may be used in place of Figure 4C-7 to evaluate Criterion B in Paragraph 2.

Standard:

- 04 **The Pedestrian Volume signal warrant shall not be applied at locations where the distance to the nearest traffic control signal or STOP sign controlling the street that pedestrians desire to cross is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.**
- 05 **If this warrant is met and a traffic control signal is justified by an engineering study, the traffic control signal shall be equipped with pedestrian signal heads complying with the provisions set forth in Chapter 4E.**

Guidance:

- 06 *If this warrant is met and a traffic control signal is justified by an engineering study, then:*
- A. *If it is installed at an intersection or major driveway location, the traffic control signal should also control the minor-street or driveway traffic, should be traffic-actuated, and should include pedestrian detection.*
 - B. *If it is installed at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs, and should be pedestrian-actuated. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.*
 - C. *Furthermore, if it is installed within a signal system, the traffic control signal should be coordinated.*

Option:

- 07 The criterion for the pedestrian volume crossing the major street may be reduced as much as 50 percent if the 15th-percentile crossing speed of pedestrians is less than 3.5 feet per second.
- 08 A traffic control signal may not be needed at the study location if adjacent coordinated traffic control signals consistently provide gaps of adequate length for pedestrians to cross the street.

Section 4C.06 Warrant 5, School Crossing

Support:

- 01 The School Crossing signal warrant is intended for application where the fact that schoolchildren cross the major street is the principal reason to consider installing a traffic control signal. For the purposes of this warrant, the word "schoolchildren" includes elementary through high school students.

Standard:

- 02 **The need for a traffic control signal shall be considered when an engineering study of the frequency and adequacy of gaps in the vehicular traffic stream as related to the number and size of groups of schoolchildren at an established school crossing across the major street shows that the number of adequate gaps in the traffic stream during the period when the schoolchildren are using the crossing is less than the number of minutes in the same period (see Section 7A.03) and there are a minimum of 20 schoolchildren during the highest crossing hour.**

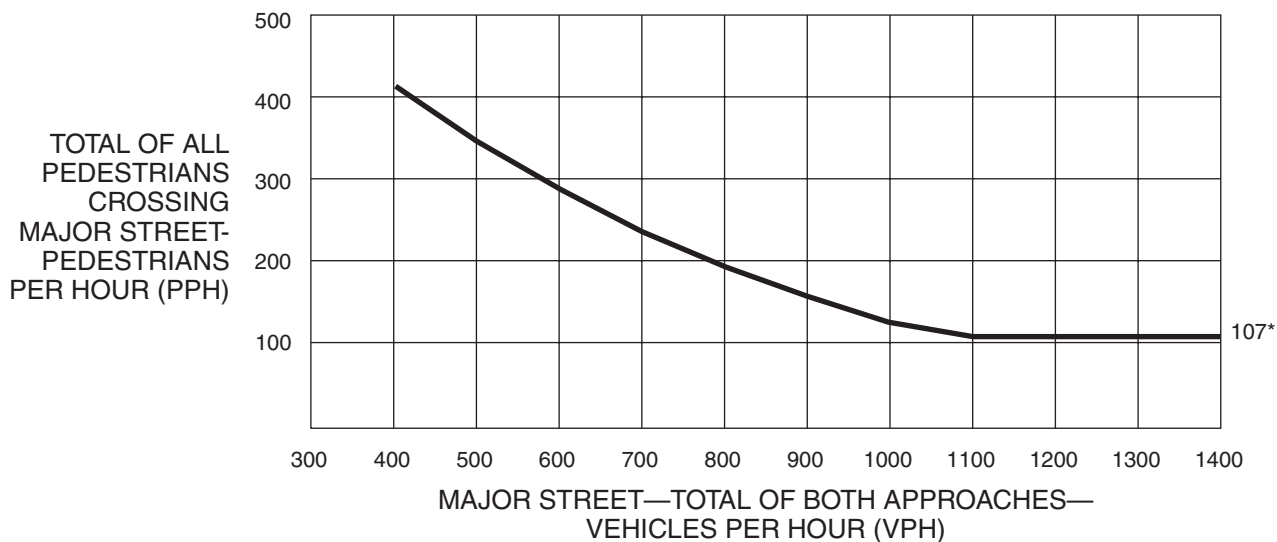
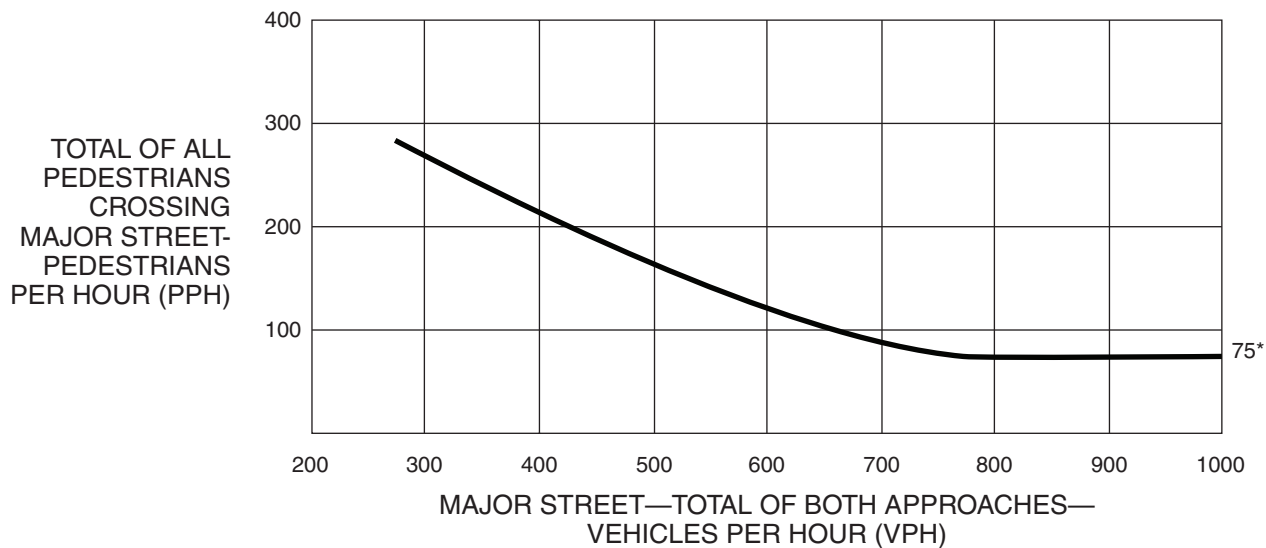
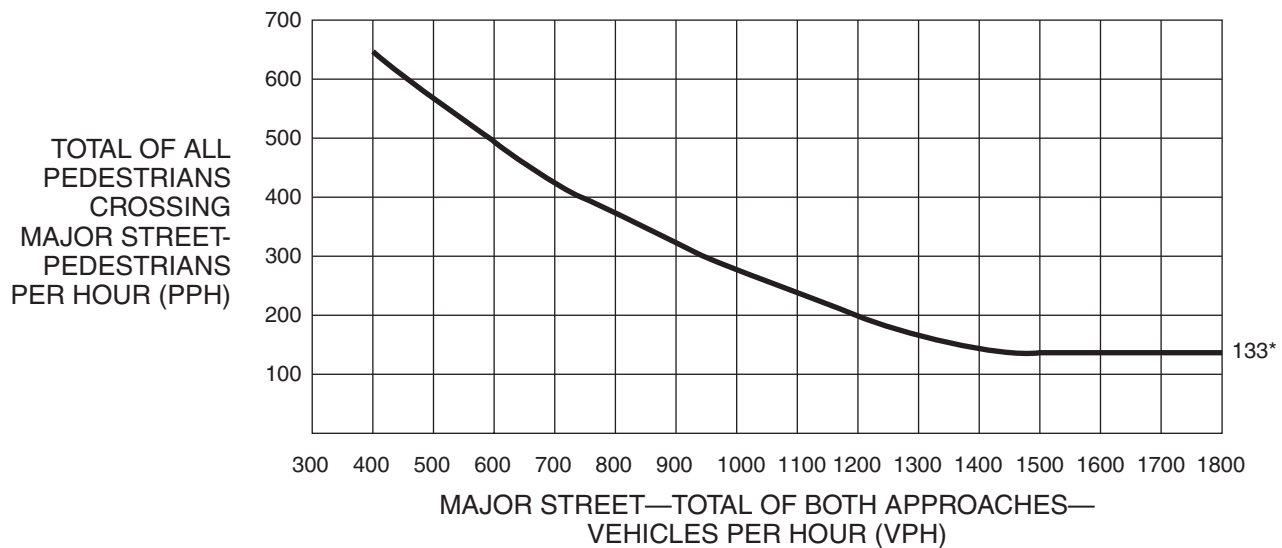
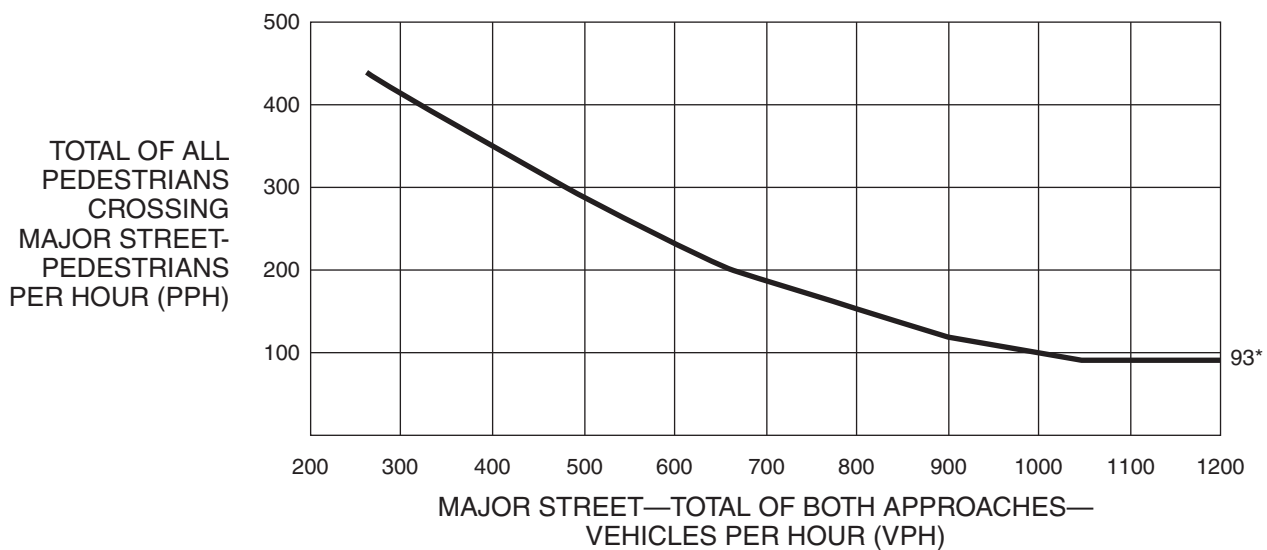
Figure 4C-5. Warrant 4, Pedestrian Four-Hour Volume**Figure 4C-6. Warrant 4, Pedestrian Four-Hour Volume (70% Factor)**

Figure 4C-7. Warrant 4, Pedestrian Peak Hour

*Note: 133 pph applies as the lower threshold volume.

Figure 4C-8. Warrant 4, Pedestrian Peak Hour (70% Factor)

*Note: 93 pph applies as the lower threshold volume.

- 03 **Before a decision is made to install a traffic control signal, consideration shall be given to the implementation of other remedial measures, such as warning signs and flashers, school speed zones, school crossing guards, or a grade-separated crossing.**
- 04 **The School Crossing signal warrant shall not be applied at locations where the distance to the nearest traffic control signal along the major street is less than 300 feet, unless the proposed traffic control signal will not restrict the progressive movement of traffic.**

Guidance:

- 05 *If this warrant is met and a traffic control signal is justified by an engineering study, then:*
- A. *If it is installed at an intersection or major driveway location, the traffic control signal should also control the minor-street or driveway traffic, should be traffic-actuated, and should include pedestrian detection.*
 - B. *If it is installed at a non-intersection crossing, the traffic control signal should be installed at least 100 feet from side streets or driveways that are controlled by STOP or YIELD signs, and should be pedestrian-actuated. If the traffic control signal is installed at a non-intersection crossing, at least one of the signal faces should be over the traveled way for each approach, parking and other sight obstructions should be prohibited for at least 100 feet in advance of and at least 20 feet beyond the crosswalk or site accommodations should be made through curb extensions or other techniques to provide adequate sight distance, and the installation should include suitable standard signs and pavement markings.*
 - C. *Furthermore, if it is installed within a signal system, the traffic control signal should be coordinated.*

Section 4C.07 Warrant 6, Coordinated Signal System

Support:

- 01 Progressive movement in a coordinated signal system sometimes necessitates installing traffic control signals at intersections where they would not otherwise be needed in order to maintain proper platooning of vehicles.

Standard:

- 02 **The need for a traffic control signal shall be considered if an engineering study finds that one of the following criteria is met:**
- A. **On a one-way street or a street that has traffic predominantly in one direction, the adjacent traffic control signals are so far apart that they do not provide the necessary degree of vehicular platooning.**
 - B. **On a two-way street, adjacent traffic control signals do not provide the necessary degree of platooning and the proposed and adjacent traffic control signals will collectively provide a progressive operation.**

Guidance:

- 03 *The Coordinated Signal System signal warrant should not be applied where the resultant spacing of traffic control signals would be less than 1,000 feet.*

Section 4C.08 Warrant 7, Crash Experience

Support:

- 01 The Crash Experience signal warrant conditions are intended for application where the severity and frequency of crashes are the principal reasons to consider installing a traffic control signal.

Standard:

- 02 **The need for a traffic control signal shall be considered if an engineering study finds that all of the following criteria are met:**
- A. **Adequate trial of alternatives with satisfactory observance and enforcement has failed to reduce the crash frequency; and**
 - B. **Five or more reported crashes, of types susceptible to correction by a traffic control signal, have occurred within a 12-month period, each crash involving personal injury or property damage apparently exceeding the applicable requirements for a reportable crash; and**
 - C. **For each of any 8 hours of an average day, the vehicles per hour (vph) given in both of the 80 percent columns of Condition A in Table 4C-1 (see Section 4C.02), or the vph in both of the 80 percent columns of Condition B in Table 4C-1 exists on the major-street and the higher-volume minor-street approach, respectively, to the intersection, or the volume of pedestrian traffic is not less than 80 percent of the requirements specified in the Pedestrian Volume warrant. These major-street and minor-street volumes shall be for the same 8 hours. On the minor street, the higher volume shall not be required to be on the same approach during each of the 8 hours.**

Option:

- 03 If the posted or statutory speed limit or the 85th-percentile speed on the major street exceeds 40 mph, or if the intersection lies within the built-up area of an isolated community having a population of less than 10,000, the traffic volumes in the 56 percent columns in Table 4C-1 may be used in place of the 80 percent columns.

Section 4C.09 Warrant 8, Roadway Network

Support:

- 01 Installing a traffic control signal at some intersections might be justified to encourage concentration and organization of traffic flow on a roadway network.

Standard:

- 02 **The need for a traffic control signal shall be considered if an engineering study finds that the common intersection of two or more major routes meets one or both of the following criteria:**

- A. **The intersection has a total existing, or immediately projected, entering volume of at least 1,000 vehicles per hour during the peak hour of a typical weekday and has 5-year projected traffic volumes, based on an engineering study, that meet one or more of Warrants 1, 2, and 3 during an average weekday; or**
- B. **The intersection has a total existing or immediately projected entering volume of at least 1,000 vehicles per hour for each of any 5 hours of a non-normal business day (Saturday or Sunday).**

- 03 **A major route as used in this signal warrant shall have at least one of the following characteristics:**

- A. **It is part of the street or highway system that serves as the principal roadway network for through traffic flow.**
- B. **It includes rural or suburban highways outside, entering, or traversing a city.**
- C. **It appears as a major route on an official plan, such as a major street plan in an urban area traffic and transportation study.**

Section 4C.10 Warrant 9, Intersection Near a Grade Crossing

Support:

- 01 The Intersection Near a Grade Crossing signal warrant is intended for use at a location where none of the conditions described in the other eight traffic signal warrants are met, but the proximity to the intersection of a grade crossing on an intersection approach controlled by a STOP or YIELD sign is the principal reason to consider installing a traffic control signal.

Guidance:

- 02 *This signal warrant should be applied only after adequate consideration has been given to other alternatives or after a trial of an alternative has failed to alleviate the safety concerns associated with the grade crossing. Among the alternatives that should be considered or tried are:*
- A. *Providing additional pavement that would enable vehicles to clear the track or that would provide space for an evasive maneuver, or*
 - B. *Reassigning the stop controls at the intersection to make the approach across the track a non-stopping approach.*

Standard:

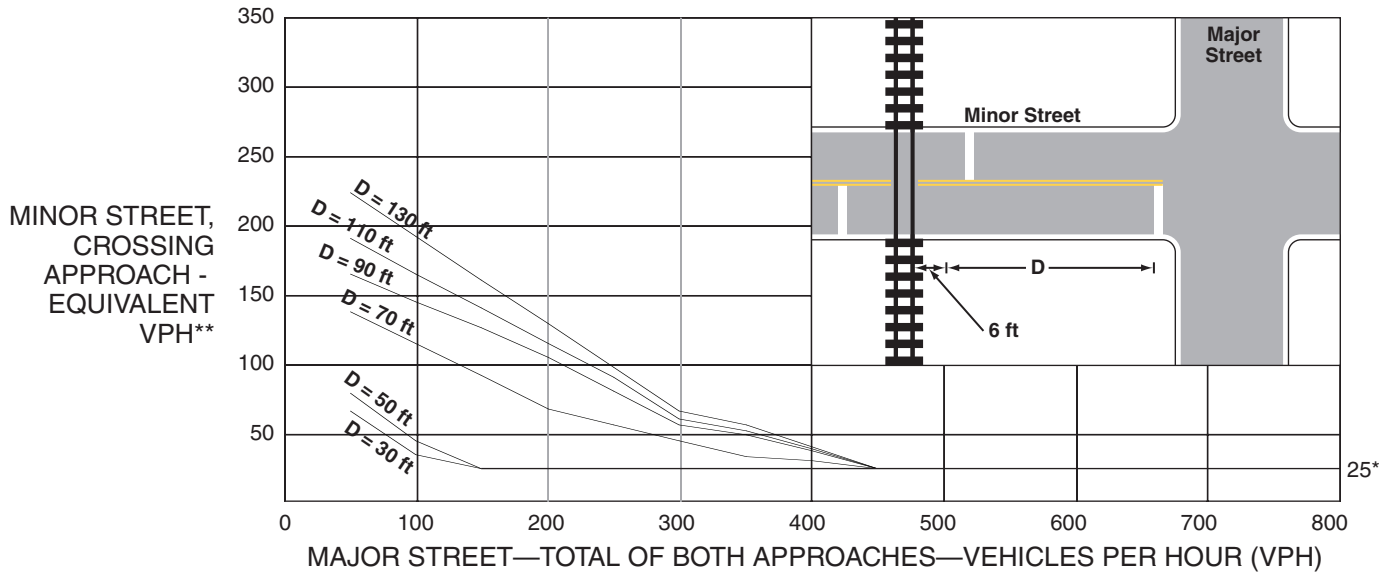
- 03 **The need for a traffic control signal shall be considered if an engineering study finds that both of the following criteria are met:**

- A. **A grade crossing exists on an approach controlled by a STOP or YIELD sign and the center of the track nearest to the intersection is within 140 feet of the stop line or yield line on the approach; and**
- B. **During the highest traffic volume hour during which rail traffic uses the crossing, the plotted point representing the vehicles per hour on the major street (total of both approaches) and the corresponding vehicles per hour on the minor-street approach that crosses the track (one direction only, approaching the intersection) falls above the applicable curve in Figure 4C-9 or 4C-10 for the existing combination of approach lanes over the track and the distance D, which is the clear storage distance as defined in Section 1A.13.**

Guidance:

- 04 *The following considerations apply when plotting the traffic volume data on Figure 4C-9 or 4C-10:*
- A. *Figure 4C-9 should be used if there is only one lane approaching the intersection at the track crossing location and Figure 4C-10 should be used if there are two or more lanes approaching the intersection at the track crossing location.*

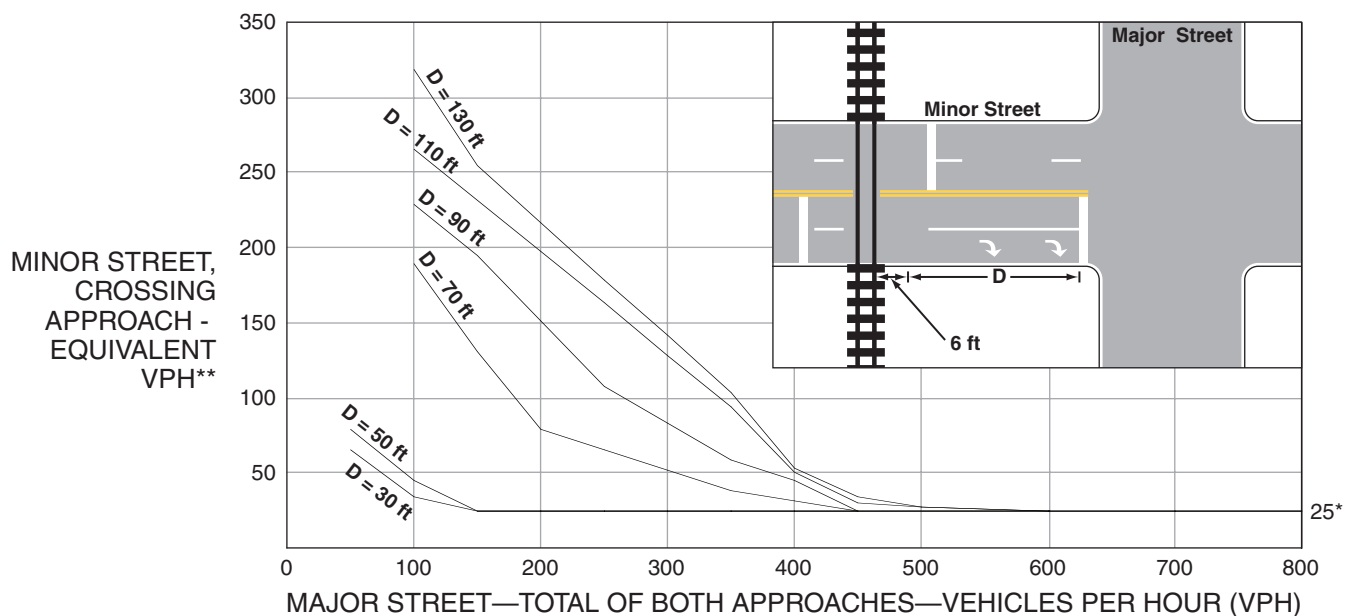
**Figure 4C-9. Warrant 9, Intersection Near a Grade Crossing
(One Approach Lane at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

**Figure 4C-10. Warrant 9, Intersection Near a Grade Crossing
(Two or More Approach Lanes at the Track Crossing)**



* 25 vph applies as the lower threshold volume

** VPH after applying the adjustment factors in Tables 4C-2, 4C-3, and/or 4C-4, if appropriate

- B. After determining the actual distance D , the curve for the distance D that is nearest to the actual distance D should be used. For example, if the actual distance D is 95 feet, the plotted point should be compared to the curve for $D = 90$ feet.*
- C. If the rail traffic arrival times are unknown, the highest traffic volume hour of the day should be used.*

Option:

- 05 The minor-street approach volume may be multiplied by up to three adjustment factors as provided in Paragraphs 6 through 8.
- 06 Because the curves are based on an average of four occurrences of rail traffic per day, the vehicles per hour on the minor-street approach may be multiplied by the adjustment factor shown in Table 4C-2 for the appropriate number of occurrences of rail traffic per day.
- 07 Because the curves are based on typical vehicle occupancy, if at least 2% of the vehicles crossing the track are buses carrying at least 20 people, the vehicles per hour on the minor-street approach may be multiplied by the adjustment factor shown in Table 4C-3 for the appropriate percentage of high-occupancy buses.
- 08 Because the curves are based on tractor-trailer trucks comprising 10% of the vehicles crossing the track, the vehicles per hour on the minor-street approach may be multiplied by the adjustment factor shown in Table 4C-4 for the appropriate distance and percentage of tractor-trailer trucks.

Standard:

- 09 **If this warrant is met and a traffic control signal at the intersection is justified by an engineering study, then:**
- A. The traffic control signal shall have actuation on the minor street;**
 - B. Preemption control shall be provided in accordance with Sections 4D.27, 8C.09, and 8C.10; and**
 - C. The grade crossing shall have flashing-light signals (see Chapter 8C).**

Guidance:

- 10 *If this warrant is met and a traffic control signal at the intersection is justified by an engineering study, the grade crossing should have automatic gates (see Chapter 8C).*

Table 4C-2. Warrant 9, Adjustment Factor for Daily Frequency of Rail Traffic

Rail Traffic per Day	Adjustment Factor
1	0.67
2	0.91
3 to 5	1.00
6 to 8	1.18
9 to 11	1.25
12 or more	1.33

Table 4C-3. Warrant 9, Adjustment Factor for Percentage of High-Occupancy Buses

% of High-Occupancy Buses* on Minor-Street Approach	Adjustment Factor
0%	1.00
2%	1.09
4%	1.19
6% or more	1.32

* A high-occupancy bus is defined as a bus occupied by at least 20 people.

Table 4C-4. Warrant 9, Adjustment Factor for Percentage of Tractor-Trailer Trucks

% of Tractor-Trailer Trucks on Minor-Street Approach	Adjustment Factor	
	D less than 70 feet	D of 70 feet or more
0% to 2.5%	0.50	0.50
2.6% to 7.5%	0.75	0.75
7.6% to 12.5%	1.00	1.00
12.6% to 17.5%	2.30	1.15
17.6% to 22.5%	2.70	1.35
22.6% to 27.5%	3.28	1.64
More than 27.5%	4.18	2.09

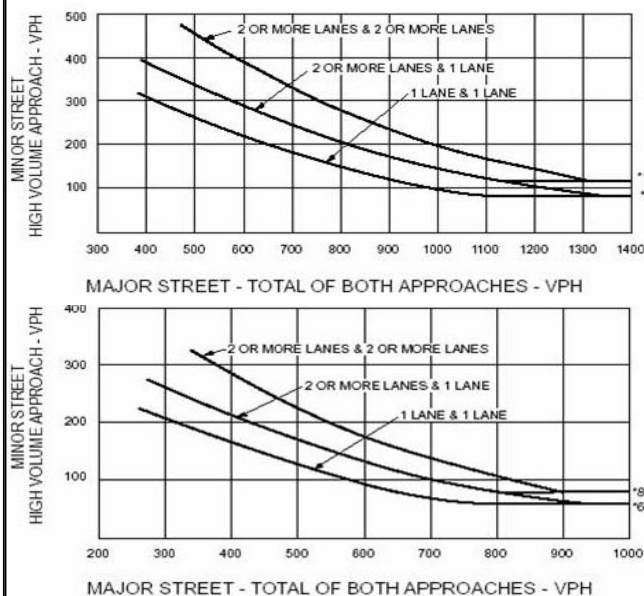
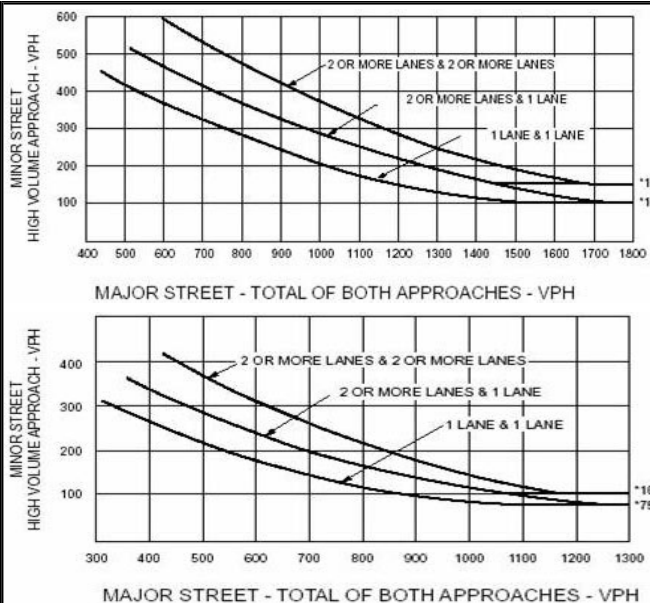
Warrants Volume			
Information			
Analyst	SBC	Intersection	Central/Dryden/Moorings
Agency/Co	Eriksson Engineering	Jurisdiction	IDOT/Arlington Hts/Private
Date Performed	3/15/2015	Units	U.S. Customary
Project ID		Time Period Analyzed	Total Traffic Volumes
East/West Street	Central Road	North/South Street	Dryden Place/Moorings Drive
File Name	Signal Analysis	Major Street	East-West
Project Description			

Warrant 1**Condition A—Minimum Vehicular Volume**

Number of lanes for moving traffic on each approach		Vehicles per hour on major street (total of both approaches)				Vehicles per hour on higher-volume minor-street approach (one direction only)			
Major Street	Minor Street	100%	80%	70%	56%	100%	80%	70%	56%
1	1	500	400	350	280	150	120	105	84
2 or more	1	600	480	420	336	150	120	105	84
2 or more	2 or more	600	480	420	336	200	160	140	112
1	2 or more	500	400	350	280	200	160	140	112

Condition B—Interruption of Continuous Traffic

Number of lanes for moving traffic on each approach		Vehicles per hour on major street (total of both approaches)				Vehicles per hour on higher-volume minor-street approach (one direction only)			
Major Street	Minor Street	100%	80%	70%	56%	100%	80%	70%	56%
1	1	750	600	525	420	75	60	53	42
2 or more	1	900	720	630	504	75	60	53	42
2 or more	2 or more	900	720	630	504	100	80	70	56
1	2 or more	750	600	525	420	100	80	70	56

Warrant 2**Warrant 3****Volume Summary**

Major Street Lanes 2+		Minor Street Lanes 2+		Speed		Population		10000+		
Hours	Major Volume	Minor Volume	Total Volume	1A (100%)	1A (80%)	1B (100%)	1B (80%)	2 (100%)	3A (100%)	3B (100%)
07-08	1920	55	1999	No	No	No	No	No	No	No
08-09	1865	84	1961	No	No	No	Yes	No	No	No
09-10	1330	0	1330	No	No	No	No	No	No	No
10-11	1134	0	1134	No	No	No	No	No	No	No
11-12	1362	0	1362	No	No	No	No	No	No	No
12-13	1508	0	1508	No	No	No	No	No	No	No
13-14	1486	0	1486	No	No	No	No	No	No	No
14-15	1556	0	1556	No	No	No	No	No	No	No
15-16	1876	0	1876	No	No	No	No	No	No	No
16-17	2186	60	2272	No	No	No	No	No	No	No
17-18	2442	42	2515	No	No	No	No	No	No	No
18-19	1042	0	1042	No	No	No	No	No	No	No
Totals	19707	241	20041	0	0	0	1	0	0	0

Warrants Summary												
Information												
Analyst	SBC					Intersection	Central/Dryden/Moorings					
Agency/Co	Eriksson Engineering					Jurisdiction	IDOT/Arlington Hts/Private					
Date Performed	3/15/2015					Units	U.S. Customary					
Project ID						Time Period Analyzed	Total Traffic Volumes					
East/West Street	Central Road					North/South Street	Dryden Place/Moorings					
File Name	Signal Analysis					Major Street	Drive					
							East-West					
Project Description												
General							Roadway Network					
Major Street Speed (mph)	40	☐	Population < 10,000				Two Major Routes			☐		
Nearest Signal (ft)	1300	☐	Coordinated Signal System				Weekend Count			☐		
Crashes (per year)	2	☐	Adequate Trials of Alternatives				5-yr Growth Factor			0		
Geometry and Traffic	EB			WB			NB			SB		
	LT	TH	RT	LT	TH	RT	LT	TH	RT	LT	TH	RT
Number of lanes, N	1	2	0	1	2	0	0	1	1	0	1	0
Lane usage	L	TR		L	TR			LT	R		LTR	
Vehicle Volume Averages (vph)	15	784	8	6	820	6	6	0	5	4	0	11
Peds (ped/h) / Gaps (gaps/h)	--	0 / 0	--	--	0 / 0	--	--	0 / 0	--	--	0 / 0	--
Delay (s/veh) / (veh-hr)	--	0 / 0	--	--	0 / 0	--	--	0 / 0	--	--	0 / 0	--
Warrant 1: Eight-Hour Vehicular Volume												☐
1 A. Minimum Vehicular Volumes (Both major approaches --and-- higher minor approach) --or--												☐
1 B. Interruption of Continuous Traffic (Both major approaches --and-- higher minor approach) --or--												☐
1 (80%) Vehicular --and-- Interruption Volumes (Both major approaches --and-- higher minor approach)												☐
Warrant 2: Four-Hour Vehicular Volume												☐
2 A. Four-Hour Vehicular Volumes (Both major approaches --and-- higher minor approach)												☐
Warrant 3: Peak Hour												☐
3 A. Peak-Hour Conditions (Minor delay --and-- minor volume --and-- total volume) --or--												☐
3 B. Peak- Hour Vehicular Volumes (Both major approaches --and-- higher minor approach)												☐
Warrant 4: Pedestrian Volume												☐
4 A. Four Hour Volumes --or--												☐
4 B. One-Hour Volumes												☐
Warrant 5: School Crossing												☐
5. Student Volumes --and--												☐
5. Gaps Same Period												☐
Warrant 6: Coordinated Signal System												☐
6. Degree of Platooning (Predominant direction or both directions)												☐
Warrant 7: Crash Experience												☐
7 A. Adequate trials of alternatives, observance and enforcement failed --and--												☐
7 B. Reported crashes susceptible to correction by signal (12-month period) --and--												☐

7 C. (80%) Volumes for Warrants 1A, 1B --or-- 4 are satisfied	☐
Warrant 8: Roadway Network	☐
8 A. Weekday Volume (Peak hour total --and-- projected warrants 1, 2 or 3) --or--	☐
8 B. Weekend Volume (Five hours total)	☐
Warrant 9: Grade Crossing	☐
9 A. Grade Crossing within 140 ft --and--	☐
9 B. Peak-Hour Vehicular Volumes	☐

PARKING STUDY ANALYSIS - SUMMARY

The Moorings of Arlington Heights is a congregate care retirement community containing a mixture of villas, apartments, sheltered-care and assisted living units, and common community facilities. The proposed plan calls for the construction of a new assisted living and memory care facility along with a resident fellowship hall on the campus. Eight existing resident cottage units and the existing skilled care building will be removed to allow space for these new buildings.

The proposed plan provides a *cumulative on-site parking supply for 538 spaces*. This includes 11 accessible spaces, which meets the accessible parking requirements. Through the planned new facilities modifications to the site, (58) spaces will be **removed** in order to implement the proposed site plan. A total of (78) new spaces will be **added**, creating a *net cumulative gain of 20 new spaces provided on-site*.

The *Village ordinance-regulated* parking requirement of 543 *cumulative spaces* for the proposed plan was calculated based on the Village of Arlington Heights' *current Zoning Ordinance*. This calculation, detailed in the chart on the following page, includes all *campus* unit requirements and *Presbyterian Homes'* interpretation of the requirements for the proposed Resident Fellowship Hall. ***We believe a parking variation for the Resident Fellowship Hall is warranted based on our planned and historical use of this space as noted in our discussion below.***

Planned Resident Fellowship Hall Parking Demand

The Village of Arlington Heights parking requirement calculations assume that the proposed Resident Fellowship Hall is similar and consistent in all respects with a traditional chapel or religious facility land use. The current and planned Resident Fellowship Hall provides some of the same functions, however, it is solely for the use of on-site Moorings residents for various activities and programs which will not generate any significant traffic or parking need from off-campus visitors. And like many of the support facilities at this senior living community, it is designed to be connected and walkable (accessible) for the residents via an interconnected, internal pedestrian circulation system

The hall will, on occasion, be used for memorial services. The Mooring's religious services team reports that most attendees of memorial services are from within the campus. In addition to on-site residents, memorial services typically draw 10-25 outside guests with a maximum of 20 vehicles. On very rare occasions (once every year or two) we may see a few more visitors. The Moorings has an internal parking management team that oversees and manages parking during these types of events and does not believe that there is or will be a lack of available parking for these types of events.

In conclusion, our calculation of the number of seats shown for the proposed Resident Fellowship Hall (486 seats) is based on the building code capacity (1 seat per seven square feet of floor space) and does not accurately reflect the proposed usage of the space.

Additionally, the Moorings of Arlington Heights has provided resident vehicle ownership data for the apartments and villas on the existing campus which is currently 0.61 vehicles per unit. As previously noted, residents in the skilled care and assisted living/memory care are not able to drive. Forty-three percent of the residential units do not have a vehicle. A parking survey of the campus was also completed to better understand and anticipate demand. Based on the analysis, a total *cumulative site* parking demand of 352 vehicles is projected for the proposed additional development. This amount is well *below* both the 543 spaces *cumulative ordinance* required, and the 538 spaces proposed *within our current plan*. These conclusions and data support our belief that a parking variation for our resident fellowship hall use is warranted.

**Table 1: Zoning Code Requirements for
The Moorings Proposed Plan**

Unit Type	Units	Zoning Code Requirement	Total Spaces
Senior Apartments	202	One Space per Unit	202.0
Senior Villas	73	Two Spaces per Unit	146.0
Skilled Care	105	One Space per Two Beds	52.5
Assisted Living	70	One Space per Two Beds	35.0
Assisted Living: Memory Care	20	One Space per Two Beds	10.0
Resident Fellowship Hall	486 ⁽¹⁾ seats	One Space for each 5 Seats	97.2
	470		542.7 (445.5)⁽²⁾

(1) Approximately 3,400 sq. ft. at 7 sq. ft. per person = 486 seats

(2) Requirement without Resident Fellowship Hall

August 25, 2015

The Moorings of Arlington Heights – Drainage Study



Eriksson Engineering Associates, Ltd.

145 Commerce Drive, Suite A
Grayslake, IL 60030
847.223.4804

601 W. Randolph St., Suite 500
Chicago, IL 60661
312.463.0551

Table of Contents

- Narrative
- Existing Drainage Calculations
 - Existing Drainage Summary
 - Existing West Lake Outfall
 - Existing West Lake Volume
- Proposed Drainage Calculations
 - Proposed Drainage Summary
 - Proposed Restrictor Calculation
 - Proposed West Lake Volume Calculation
 - Proposed West Lake Detention Requirement
 - Proposed Overflow Calculation
- Storm Sewer Calculations (10-Yr)
- Storm Sewer Calculations (100-Yr)
- Appendix I – Tributary Area Exhibit
- Appendix II – Storm Sewer HGL Profile (100-Yr)
- Appendix III – MWRD Permit No. 787-87

Narrative

INTRODUCTION

Currently detention is provided for the campus in five separate detention basins: West Lake, Southwest Basin, North Basin, East Lake, and Southeast Basin and are permitted under MWRD Permit No. 87-787. Of the 7.75 acres being affected by the proposed improvements 6.57 acres are tributary to West Lake, the remaining 1.22 acres are tributary to the Southwest Basin.

EXISTING CONDITIONS

In its current state, West Lake outfalls from an existing 10" sewer that is tributary to the Southwest Basin. The release rate of this sewer is calculated to be 3.00 cfs, less than the permitted 3.50 cfs according to MWRD Permit No. 87-787. This release and the existing tributary area of 14.87 acres create a required storage volume of 3.78 acre-feet, less than the available 4.52 acre-feet at an elevation of 689.00. Overflow from West Lake is currently a grassed area to the south of the lake that conveys water to Moorings Drive and the Southwest Basin.

PROPOSED CONDITIONS

Improvements around West Lake will expand the tributary area to encompass 15.23 acres and increase the impervious area by approximately 1 acre. Per Arlington Heights allowable release of 0.18 cfs/acre and the revised tributary area for West Lake, the new allowable release will be 2.74 cfs. Including the new impervious area equates to a new required volume of 4.31 acre-feet. Although the existing lake provides adequate detention, in order to provide adequate freeboard to the proposed Finished Floor Elevations the existing High Water Level will be lowered from 689.00 to 688.25 and the existing footprint will be expanded. Overflow from West Lake will be provided for at weirs in both the Restrictor Manhole and as a 40' grass spillway on the surface to ensure water is directed away from the new Assisted Living building and Resident Fellowship Hall. Restricted flow and Overflow from West Lake will remain tributary to an existing Bypass Swale and Sewer that run along the south of the Site.

Additional flow to the Southwest Basin will be investigated but it is not anticipated that significant improvements will be required.

STORM SEWER

Currently storm water is conveyed to West Lake through two pipe networks. One located to the northwest of the lake that conveys storm water from the north end of the site and one that conveys runoff from the Skilled Care courtyard. Both systems will be impacted by the new building footprints and will be re-routed underneath the connection between the Assisted Living building and Resident Fellowship Hall.

The proposed buildings will also impact existing overland flow routes. New pipe systems tributary to West Lake will be sized to convey runoff from the 100-year rain event.

Calculations

Existing Calculations

DRAINAGE SUMMARY - EXISTING CONDITIONS

Prebysterian Homes - Site Study

05/15/15

By: C. Fish



West Lake - Existing

Total Tributary Area =	14.87	acres	$C_{pond} =$	1.00	Per Arlington Heights Manual of Practice for The Design of Public and Private Improvements
Wet Pond Area =	1.44	acres	$C_{impervious} =$	0.95	
Impervious Area =	6.74	acres	$C_{pervious} =$	0.50	
Pervious Area =	6.69	acres			
Runoff Coefficient (C) =	0.75				
Allowable Release Rate =	3.50	cfs	Per MWRD Permit No. 87-787		
Actual Release Rate =	3.00	cfs			

100-Year Event, Bulletin 70 Rainfall Data

RUNOFF FACTOR	STORM DURATION (HRS)	RAINFALL INTENSITY (IN/HR)	DRAINAGE AREA (ACRES)	INFLOW RATE (CFS)	RELEASE RATE (CFS)	STORAGE RATE (CFS)	STORAGE REQUIRED (ACRE-FT)
0.75	0.08	11.40	14.87	127.54	3.00	124.55	0.86
0.75	0.17	9.82	14.87	109.87	3.00	106.87	1.47
0.75	0.25	8.20	14.87	91.74	3.00	88.74	1.83
0.75	0.50	5.60	14.87	62.65	3.00	59.66	2.47
0.75	1.00	3.56	14.87	39.83	3.00	36.83	3.04
0.75	2.00	2.23	14.87	24.95	3.00	21.95	3.63
0.75	3.00	1.61	14.87	18.01	3.00	15.02	3.72
0.75	6.00	0.95	14.87	10.63	3.00	7.63	3.78
0.75	12.00	0.55	14.87	6.14	3.00	3.14	3.12
0.75	18.00	0.39	14.87	4.36	3.00	1.37	2.03
0.75	24.00	0.31	14.87	3.47	3.00	0.47	0.93

Calculated	Existing Storage Required =	3.78	acre-ft
MWRD Permit No. 87-787	Existing Storage Required =	2.15	acre-ft
Elevation 689.00	Existing Storage Provided =	4.52	acre-ft

Culvert Capacity Calculations:

Prebysterian Homes - Site Study

05/15/15

By: C. Fish



Existing Culvert Size = 10 inch

Existing Pipe Slope = 0.03 ft/ft

Required Culvert Capacity = cfs

Cross Sectional Area:

$$a = \pi r^2 = 0.55 \text{ ft}^2$$

Pipe Flow Capacity (Flowing Full):

$$n = 0.013$$

$$Q = (1.49/n) * a * R_h^{2/3} * S^{1/2}$$
$$= 6.04 \text{ cfs}$$

$$\text{Capacity Of Pipe} = 6.04 \text{ cfs}$$

Pipe Flow Capacity (Including Vertical Head):

$$\text{Length of Pipe} = 268 \text{ ft.}$$

$$\text{Downstream Inv.} = 684$$

$$\text{hwl} = 689.00$$

$$\Delta h = \text{hwl} - \text{Inv.} = 5 \text{ ft.}$$

$$Q_{\text{cap}} = (1.49/n) * A * R_h^{2/3} * (h/L)^{1/2} = 3.00 \text{ cfs}$$

Storage Volume in Detention Pond

Prebysterian Homes - Site Study

05/15/15

By: C. Fish



Grade	Area (sq. ft.)	Volume (cu ft.)
685.5	51946	
		79830.56
687	54505	
		56511.48
688	58542	
		60701.54
689	62887	
		65770.61
690	68697	
		34348.50
690.5	68697	

Total Volume =	197043.58	cu ft.
Total Volume =	4.52	acre-ft

Proposed Calculations

DRAINAGE SUMMARY PROPOSED CONDITIONS

Presbyterian Homes
Moorings
CMF

06/15/15



Proposed Conditions

Total Property Area = acres
Total Watershed Area = 15.23 acres

Proposed	Impervious Area =	7.70 acres	CN _{impervious} =	98	VILLAGE	C _{impervious} =	0.95
	Wet Pond Area =	1.71 acres	CN _{gravel} =	100		C _{gravel} =	1.00
	Pervious Area =	5.82 acres	CN _{pervious} =	74		C _{pervious} =	0.50
	2-Year		CN =	89.1		C =	0.78
Allowable Release Rate =	-	0.18 cfs/acre	% Imp =	61.79%			
	-	2.74 cfs					

	2-YEAR	VILLAGE
MAXIMUM RESTRICTOR DIAMETER =	-	8.13 in
ACTUAL RESTRICTOR DIAMETER =	0.00	8.00 in
ALLOWABLE RELEASE RATE =	-	2.74 cfs
ACTUAL RELEASE RATE =	0.00	2.66 cfs
DETENTION VOLUME REQUIRED =		4.31 Acre*ft
DETENTION VOLUME PROVIDED =	0.00	4.29 Acre*ft
Restrictor Invert=	685.50	685.50
Basin High Water Elevation=	685.50	688.25
Basin Spill Elevation=		689.50 +/-

VILLAGE RESTRICTOR SIZING CALCULATIONS

Presbyterian Homes
Moorings
CMF

06/15/15

2-Year Restrictor

$$\begin{aligned} \text{2-year high water elevation} &= 685.50 \\ C_D &= 0.61 \quad (\text{constant}) \\ G &= 32.20 \quad \text{ft/sec}^2 \\ \text{Inv. restrictor} &= 685.50 \\ Q_{\text{allowable}} &= 0.00 \quad \text{cfs} \end{aligned}$$

$$\begin{aligned} \Delta h &= \text{hwe} - \text{Inv.} - 1/2 \text{ Dia.} \\ &= 0.00 \quad \text{ft.} \end{aligned}$$

$$\begin{aligned} Q &= C_D A (2gh)^{1/2} \\ A_{\text{restrictor}} &= (Q_{\text{allowable}}) / (C_D (2gh)^{1/2}) \\ A_{\text{restrictor}} &= 0.00 \quad \text{in}^2 \\ D_{\text{restrictor}} &= 0.000 \quad \text{in} \end{aligned}$$

=> Restrictor diameter = 0.000 inches

Release Rate Based on restrictor diameter

$$\begin{aligned} D_{\text{restrictor}} &= 0.00 \quad \text{in.} \\ A_{\text{restrictor}} &= 0.00 \quad \text{in}^2 \end{aligned}$$

$$Q = C_D A (2gh)^{1/2}$$

$$Q_{\text{release}} = 0.00 \quad \text{c.f.s.}$$

100-Year Restrictor

$$\begin{aligned} \text{100-year high water elevation} &= 688.25 \\ C_D &= 0.61 \quad (\text{constant}) \\ G &= 32.20 \quad \text{ft/sec}^2 \\ \text{Inv. restrictor} &= 685.50 \\ Q_{\text{allowable}} &= 2.74 \quad \text{cfs} \end{aligned}$$

$$\begin{aligned} Q_{2\text{year}} &= 0.00 \quad \text{cfs} \\ \text{Therefore: } Q_{\text{remaining}} &= 2.74 \quad \text{cfs} \end{aligned}$$

$$\begin{aligned} \Delta h &= \text{hwe} - \text{Inv.} - 1/2 \text{ Dia.} \\ &= 2.42 \quad \text{ft.} \end{aligned}$$

$$\begin{aligned} Q &= C_D A (2gh)^{1/2} \\ A_{\text{restrictor}} &= (Q_{\text{allowable}}) / (C_D (2gh)^{1/2}) \\ A_{\text{restrictor}} &= 51.87 \quad \text{in}^2 \\ D_{\text{restrictor}} &= 8.127 \quad \text{in} \end{aligned}$$

=> Restrictor diameter = 8.000 inches

Release Rate Based on restrictor diameter

$$\begin{aligned} D_{\text{restrictor}} &= 8.00 \quad \text{in.} \\ A_{\text{restrictor}} &= 50.24 \quad \text{in}^2 \end{aligned}$$

$$Q = C_D A (2gh)^{1/2}$$

$$Q_{\text{release}} = 2.66 \quad \text{c.f.s.}$$

BASIN VOLUME CALCULATIONS

Presbyterian Homes

06/15/15

Moorings

CMF

2 Year Restrictor

Dia= 0.000 in
 $C_d = 0.61$
 Inv. rest. = 685.50
 $g = 32.20 \text{ ft/sec}^2$
 $A_{rest} = 0.00 \text{ in}^2$

100 Year Restrictor

Dia= 8.000 in
 $C_d = 0.61$
 Inv. rest. = 685.50
 $g = 32.20 \text{ ft/sec}^2$
 $A_{rest} = 50.27 \text{ in}^2$

Pond

Elev	Area (sq. ft.)	Increm. Volume (cu ft.)	Increm. Volume (ac-ft)	Total Volume (ac-ft)		Q(2-Yr) (cfs)		Q(100-Yr) (cfs)		Q(Total) (cfs)
690	83808	81298.22	1.866	7.48		0.00		3.49		3.49
0	0	0.00	0.000	5.61		0.00		0.00		0.00
689	78814	57535.98	1.321	5.61		0.00		3.04		3.04
688.25	74634.25	18484.13	0.424	4.29		0.00		2.66		2.66
688	73241	70515.16	1.619	3.87		0.00		2.52		2.52
0	0	0.00	0.000	2.25		0.00		0.00		0.00
687	67824	98048.67	2.251	2.25		0.00		1.85		1.85
0	0	0.00	0.000	0.00		0.00		0.00		0.00
685.5	62938									

Site High Water Line =	685.50	688.25
100-Year Storage Volume =	0.00	4.29 acre-ft

VILLAGE DETENTION REQUIREMENTS 100-YEAR EVENT

Presbyterian Homes

06/15/15

Moorings

CMF

Total Tributary Area: 15.23 acre
 Total Impervious Area 9.41 acre
 Allowable Release Rate Per Acre: 0.18 cfs/acre
 Allowable Release Rate: 2.74 cfs
 Actual Release Rate: 2.66 cfs
 Runoff Coefficient (C): 0.78
 100 Year Intensity: 7.58 in Bul 70 100yr - 24hr

100-Year Event, Bulletin 70 Rainfall Data

RUNOFF FACTOR	STORM DURATION (HRS)	RAINFALL INTENSITY (IN/HR)	DRAINAGE AREA (ACRES)	INFLOW RATE (CFS)	RELEASE RATE (CFS)	STORAGE RATE (CFS)	STORAGE REQUIRED (ACRE-FT)
0.78	0.08	10.92	15.23	130.33	2.66	127.68	0.84
0.78	0.17	10.02	15.23	119.59	2.66	116.93	1.64
0.78	0.25	8.20	15.23	97.87	2.66	95.21	1.97
0.78	0.50	5.60	15.23	66.84	2.66	64.18	2.65
0.78	1.00	3.56	15.23	42.49	2.66	39.83	3.29
0.78	1.50	2.63	15.23	31.39	2.66	28.73	3.56
0.78	2.00	2.24	15.23	26.73	2.66	24.08	3.98
0.78	3.00	1.62	15.23	19.33	2.66	16.68	4.14
0.78	4.00	1.28	15.23	15.28	2.66	12.62	4.17
0.78	5.00	1.08	15.23	12.89	2.66	10.23	4.23
0.78	6.00	0.95	15.23	11.34	2.66	8.68	4.31
0.78	7.00	0.83	15.23	9.91	2.66	7.25	4.19
0.78	8.00	0.75	15.23	8.95	2.66	6.30	4.16
0.78	9.00	0.68	15.23	8.12	2.66	5.46	4.06
0.78	10.00	0.63	15.23	7.52	2.66	4.86	4.02
0.78	11.00	0.59	15.23	7.04	2.66	4.39	3.99
0.78	12.00	0.55	15.23	6.56	2.66	3.91	3.88
0.78	13.00	0.52	15.23	6.21	2.66	3.55	3.82
0.78	14.00	0.49	15.23	5.85	2.66	3.19	3.69
0.78	15.00	0.46	15.23	5.49	2.66	2.84	3.51
0.78	16.00	0.43	15.23	5.13	2.66	2.48	3.28
0.78	17.00	0.41	15.23	4.89	2.66	2.24	3.14
0.78	18.00	0.39	15.23	4.65	2.66	2.00	2.97
0.78	24.00	0.32	15.23	3.77	2.66	1.11	2.21

Required Storage: 4.31 acre-ft

Emergency Overflow Spillway Calculations

Presbyterian Homes

06/15/15

Moorings

CMF

100-year Rainfall Event

Tributary Area = 15.23 acre

Composite Runoff Coefficient = 0.78

100 year Rainfall Depth (Bulletin 70) = 7.58 inches

100-Year Runoff Rate = 11.34 cfs

Pond Overflow Type = [Grass Spillway](#)

Where: L (length) = [40.00](#) ft.

H (head) = [0.25](#) ft.

Pond Overflow Rate

Q = 13.00 cfs

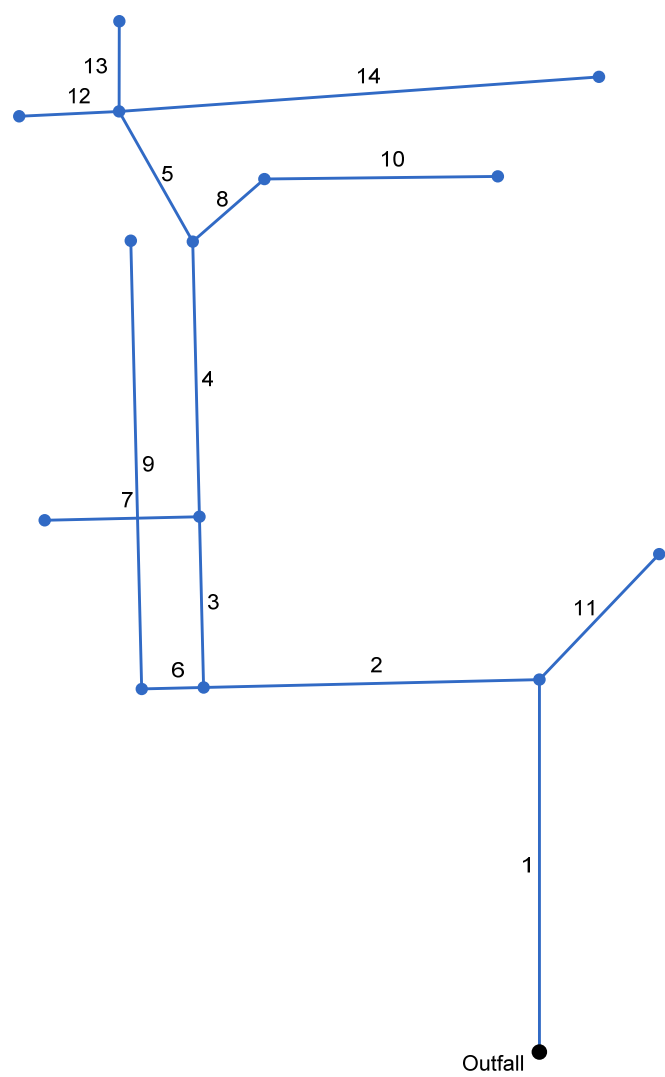
Weir Equation: $Q = 3.03 L H^{(3/2)}$ (Broad Crested Weir)

Concrete Wier Wall

Weir Equation: $Q = 2.60 L H^{(3/2)}$ (Broad Crested Weir)

Grass Spillway

Hydraflow Storm Sewers Extension for Autodesk® AutoCAD® Civil 3D® Plan



Project File: Moorings.stm	Number of lines: 14	Date: 6/24/2015
----------------------------	---------------------	-----------------

Storm Sewer Tabulation

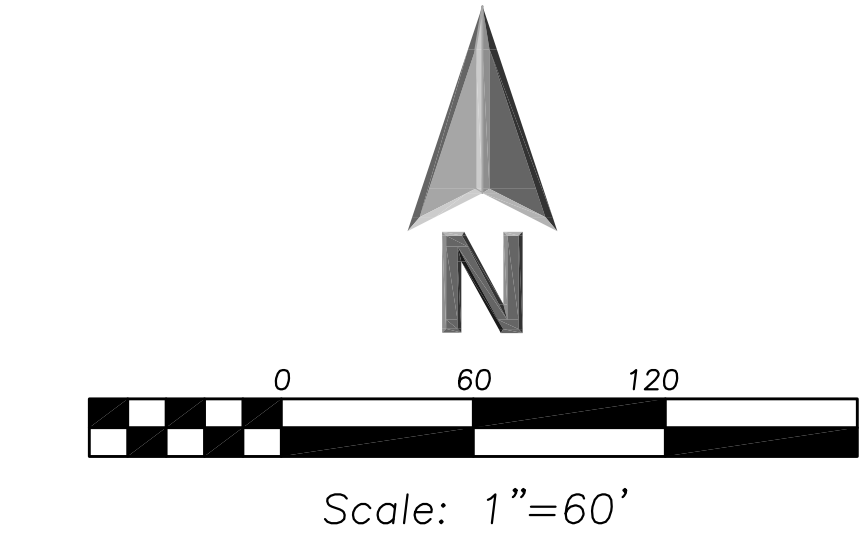
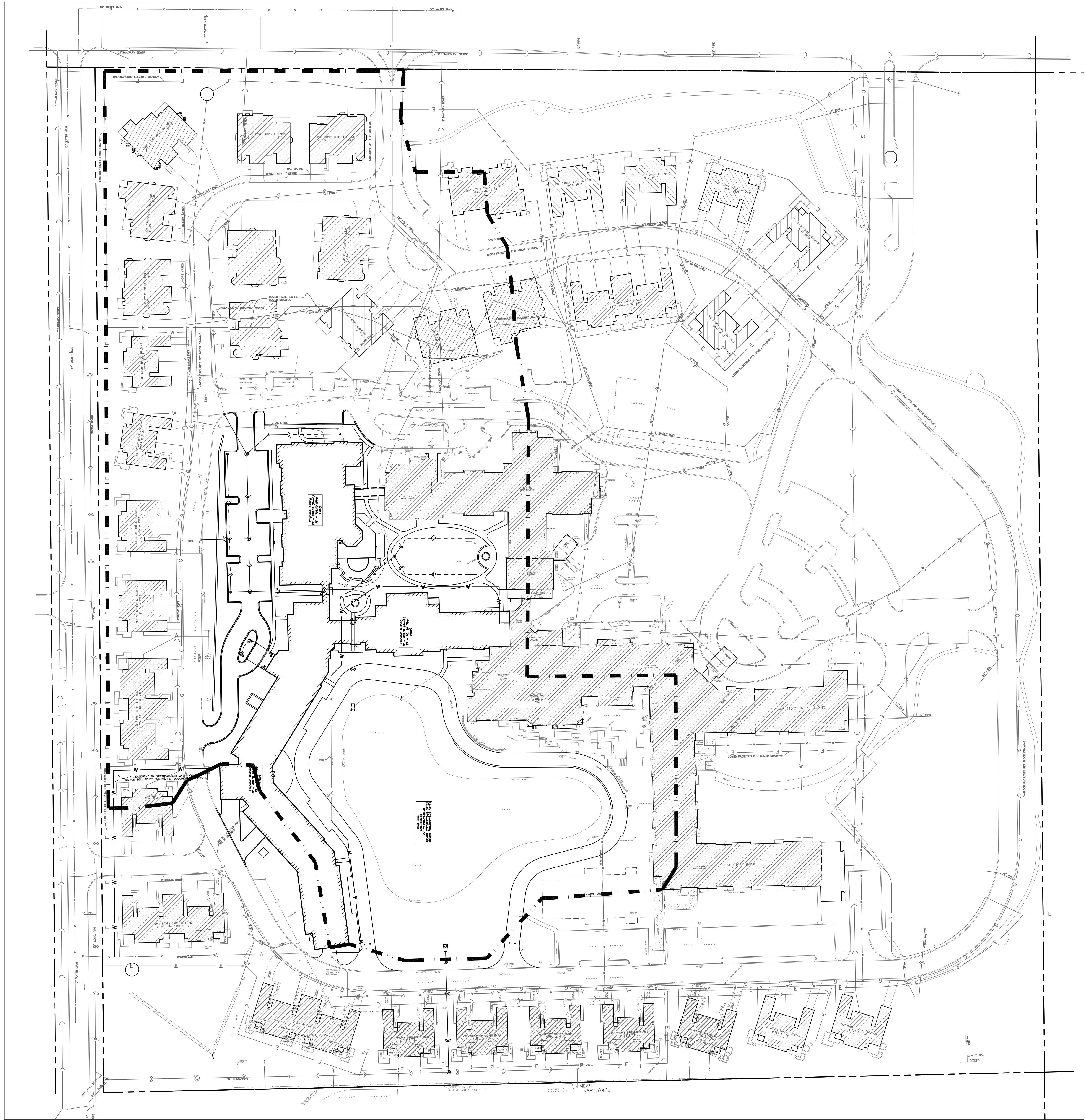
Station		Len	Drng Area		Rnoff coeff	Area x C		Tc		Rain (l)	Total flow	Cap full	Vel	Pipe		Invert Elev		HGL Elev		Grnd / Rim Elev		Line ID	
Line	To Line		Incr	Total		Incr	Total	Inlet	Syst					Size	Slope	Dn	Up	Dn	Up	Dn	Up		
		(ft)	(ac)	(ac)	(C)			(min)	(min)	(in/hr)	(cfs)	(cfs)	(ft/s)	(in)	(%)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)		
1	End	157.000	0.00	4.99	0.00	0.00	3.82	10.0	17.4	4.8	28.37	60.85	5.42	48	0.15	684.04	684.28	685.62	686.22	0.00	698.00	Ex.	
2		141.000	0.00	3.69	0.00	0.00	2.81	10.0	16.5	4.9	23.84	43.05	3.70	42	0.16	684.28	684.50	686.56	686.67	698.00	698.95		
3		72.000	0.00	2.93	0.00	0.00	2.14	10.0	16.1	4.9	20.69	32.98	3.49	36	0.21	684.50	684.65	686.89	686.94	698.95	698.95		
4		3	116.000	0.00	1.08	0.00	0.00	0.77	10.0	15.2	5.1	14.03	32.17	2.33	36	0.20	684.65	684.88	687.14	687.17	698.95		696.20
5		4	63.000	0.19	0.97	0.75	0.14	0.68	10.0	10.5	5.8	14.08	20.18	2.96	30	0.21	684.88	685.01	687.25	687.30	696.20		689.50
6		2	26.000	0.51	0.76	0.86	0.44	0.67	10.0	11.8	5.6	3.71	3.86	5.49	12	1.00	690.20	690.46	690.99	691.28	698.95		698.95
7		3	65.000	1.85	1.85	0.74	1.37	1.37	10.0	10.0	5.9	8.09	16.27	4.59	18	2.05	684.65	685.98	687.14	687.45	698.95		688.43
8		4	40.000	0.00	0.11	0.00	0.00	0.09	10.0	13.7	5.3	0.49	7.00	0.40	15	1.00	684.88	685.28	687.25	687.25	696.20		692.00
9		6	189.000	0.25	0.25	0.91	0.23	0.23	10.0	10.0	5.9	1.34	3.86	2.73	12	1.00	690.46	692.35	691.28	692.84	698.95		694.85
10		8	98.000	0.11	0.11	0.84	0.09	0.09	10.0	10.0	5.9	0.55	7.81	0.57	15	1.24	685.28	686.50	687.25	687.26	692.00		689.00
11		1	73.000	1.30	1.30	0.78	1.01	1.01	10.0	10.0	5.9	5.99	8.61	9.80	12	4.99	687.25	690.89	687.86	691.84	698.00		698.00
12		5	42.000	0.78	0.78	0.69	0.54	0.54	10.0	10.0	5.9	3.18	7.55	4.05	12	3.83	685.01	686.62	687.44	687.72	689.50		688.92
13	5	38.000	0.00	0.00	0.00	0.00	0.00	10.0	10.0	0.0	4.65	0.00	5.92	12	-1.11	685.01	684.59	687.44	687.99	689.50	689.49	Ex.	
14	5	202.000	0.00	0.00	0.00	0.00	0.00	10.0	10.0	0.0	5.47	5.46	6.97	12	2.00	685.01	689.05	687.44	691.50	689.50	692.95	Ex.	
Project File: Moorings.stm																Number of lines: 14				Run Date: 6/24/2015			
NOTES:Intensity = 144.66 / (Inlet time + 19.40) ^ 0.95; Return period =Yrs. 10 ; c = cir e = ellip b = box																							

Storm Sewer Tabulation

Station		Len	Drng Area		Rnoff coeff	Area x C		Tc		Rain (I)	Total flow	Cap full	Vel	Pipe		Invert Elev		HGL Elev		Grnd / Rim Elev		Line ID	
Line	To Line		Incr	Total		Incr	Total	Inlet	Syst					Size	Slope	Dn	Up	Dn	Up	Dn	Up		
		(ft)	(ac)	(ac)	(C)			(min)	(min)	(in/hr)	(cfs)	(cfs)	(ft/s)	(in)	(%)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)		
1	End	157.000	0.00	4.99	0.00	0.00	3.82	10.0	15.1	7.8	40.08	60.85	3.19	48	0.15	684.04	684.28	688.25	688.35	0.00	698.00	Ex.	
2	1	141.000	0.00	3.69	0.00	0.00	2.81	10.0	14.5	8.0	32.54	43.05	3.38	42	0.16	684.28	684.50	688.51	688.64	698.00	698.95		
3	2	72.000	0.00	2.93	0.00	0.00	2.14	10.0	14.2	8.1	27.37	32.98	3.87	36	0.21	684.50	684.65	688.82	688.92	698.95	698.95		
4	3	116.000	0.00	1.08	0.00	0.00	0.77	10.0	13.4	8.2	16.49	32.17	2.33	36	0.20	684.65	684.88	689.15	689.21	698.95	696.20		
5	4	63.000	0.19	0.97	0.75	0.14	0.68	10.0	10.5	9.0	16.24	20.18	3.31	30	0.21	684.88	685.01	689.28	689.36	696.20	689.50		
6	2	26.000	0.51	0.76	0.86	0.44	0.67	10.0	11.2	8.8	5.86	3.86	7.46	12	1.00	690.20	690.46	691.20	691.80	698.95	698.95		
7	3	65.000	1.85	1.85	0.74	1.37	1.37	10.0	10.0	9.1	12.51	16.27	7.08	18	2.05	684.65	685.98	689.15	689.94	698.95	688.43		
8	4	40.000	0.00	0.11	0.00	0.00	0.09	10.0	12.4	8.5	0.78	7.00	0.64	15	1.00	684.88	685.28	689.28	689.29	696.20	692.00		
9	6	189.000	0.25	0.25	0.91	0.23	0.23	10.0	10.0	9.1	2.08	3.86	2.82	12	1.00	690.46	692.35	692.67	693.18	698.95	694.85		
10	8	98.000	0.11	0.11	0.84	0.09	0.09	10.0	10.0	9.1	0.84	7.81	0.69	15	1.24	685.28	686.50	689.29	689.30	692.00	689.00		
11	1	73.000	1.30	1.30	0.78	1.01	1.01	10.0	10.0	9.1	9.26	8.61	11.80	12	4.99	687.25	690.89	688.51	692.72	698.00	698.00		
12	5	42.000	0.78	0.78	0.69	0.54	0.54	10.0	10.0	9.1	4.92	7.55	6.26	12	3.83	685.01	686.62	689.54	690.22	689.50	688.92		
13	5	38.000	0.00	0.00	0.00	0.00	0.00	10.0	10.0	0.0	4.65	0.00	5.92	12	-1.11	685.01	684.59	689.54	690.09	689.50	689.49	Ex.	
14	5	202.000	0.00	0.00	0.00	0.00	0.00	10.0	10.0	0.0	5.47	5.46	6.97	12	2.00	685.01	689.05	689.54	693.60	689.50	692.95	Ex.	
Project File: Moorings.stm																Number of lines: 14				Run Date: 6/24/2015			
NOTES:Intensity = 218.93 / (Inlet time + 19.10) ^ 0.94; Return period =Yrs. 100 ; c = cir e = ellip b = box																							

Appendix I

Tributary Area Exhibit



145 COMMERCE DRIVE, SUITE A
GRAYSLAKE, ILLINOIS 60030
PHONE (847) 223-4804
FAX (847) 223-4864
EMAIL INFO@EEA-LTD.COM

LEGEND

[] WEST LAKE TRIBUTARY AREA:
Area = 15.23 Ac.
Impervious = 7.70 Ac.
Pervious = 6.12 Ac.
Wet Pond Area = 1.41 Ac.

DRAWING NO.:
EX.
COMMISSION NO.:
2014104

WEST LAKE
TRIBUTARY
AREA
AS NOTED

DATE:
4/27/2015

REVISIONS	
NO.	DESCRIPTION
1	06/22/2015 PUD Application Submittal

FOR
THE MOORINGS OF ARLINGTON HEIGHTS
PRESBYTERIAN HOMES
811 EAST CENTRAL ROAD, ARLINGTON HEIGHTS, IL 60005
DRAWN BY: C.M.F. CHECKED BY: C.S.L. APPROVED BY: M.J.R.

rlps architects®
architecture • master planning • interior design
250 VALLEYBROOK DRIVE, LANCASTER, PA 17601
717-560-9501 FAX: 717-560-2373 RLPS, LLP

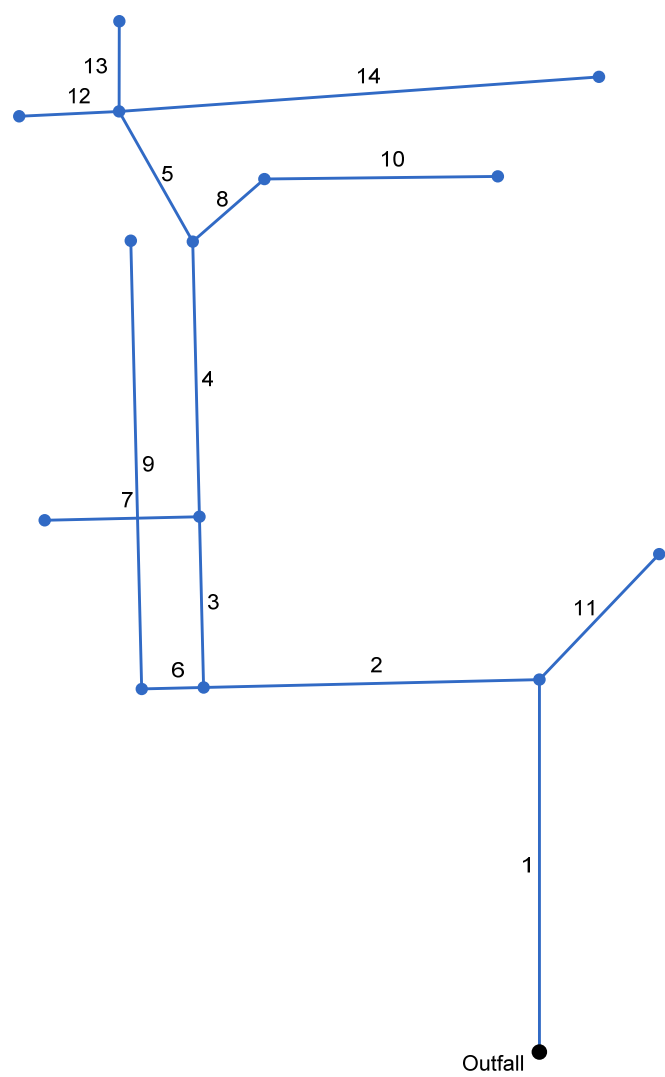
DESIGN PHASE

THIS DRAWING IS AN INSTRUMENT OF SERVICE. IT IS THE PROPERTY OF RLPS ARCHITECTS, LLP. IT IS TO BE USED ONLY FOR THE PROJECT AND SITE SPECIFICALLY IDENTIFIED HEREON. IT IS NOT TO BE REPRODUCED, COPIED, OR OTHERWISE TRANSMITTED IN ANY FORM OR BY ANY MEANS, WITHOUT THE WRITTEN PERMISSION OF RLPS ARCHITECTS, LLP. THE ARCHITECT ASSUMES NO LIABILITY FOR ANY ERRORS OR OMISSIONS IN THIS DRAWING. THE CONTRACTOR SHALL VERIFY ALL DIMENSIONS AND CONDITIONS AT THE SITE BEFORE PROCEEDING WITH THE WORK.

Appendix II

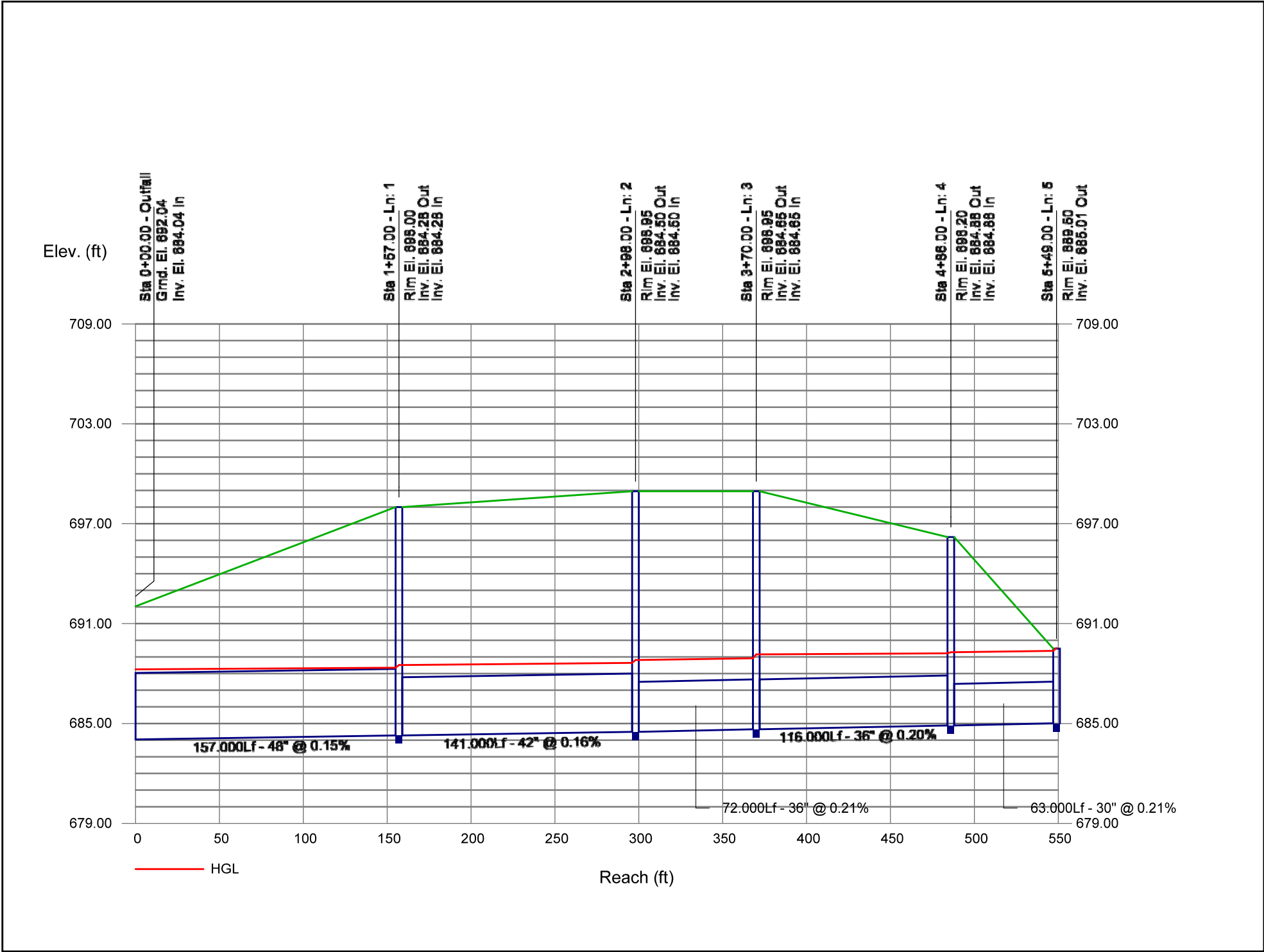
100-Yr HGL Profile

Hydraflow Storm Sewers Extension for Autodesk® AutoCAD® Civil 3D® Plan

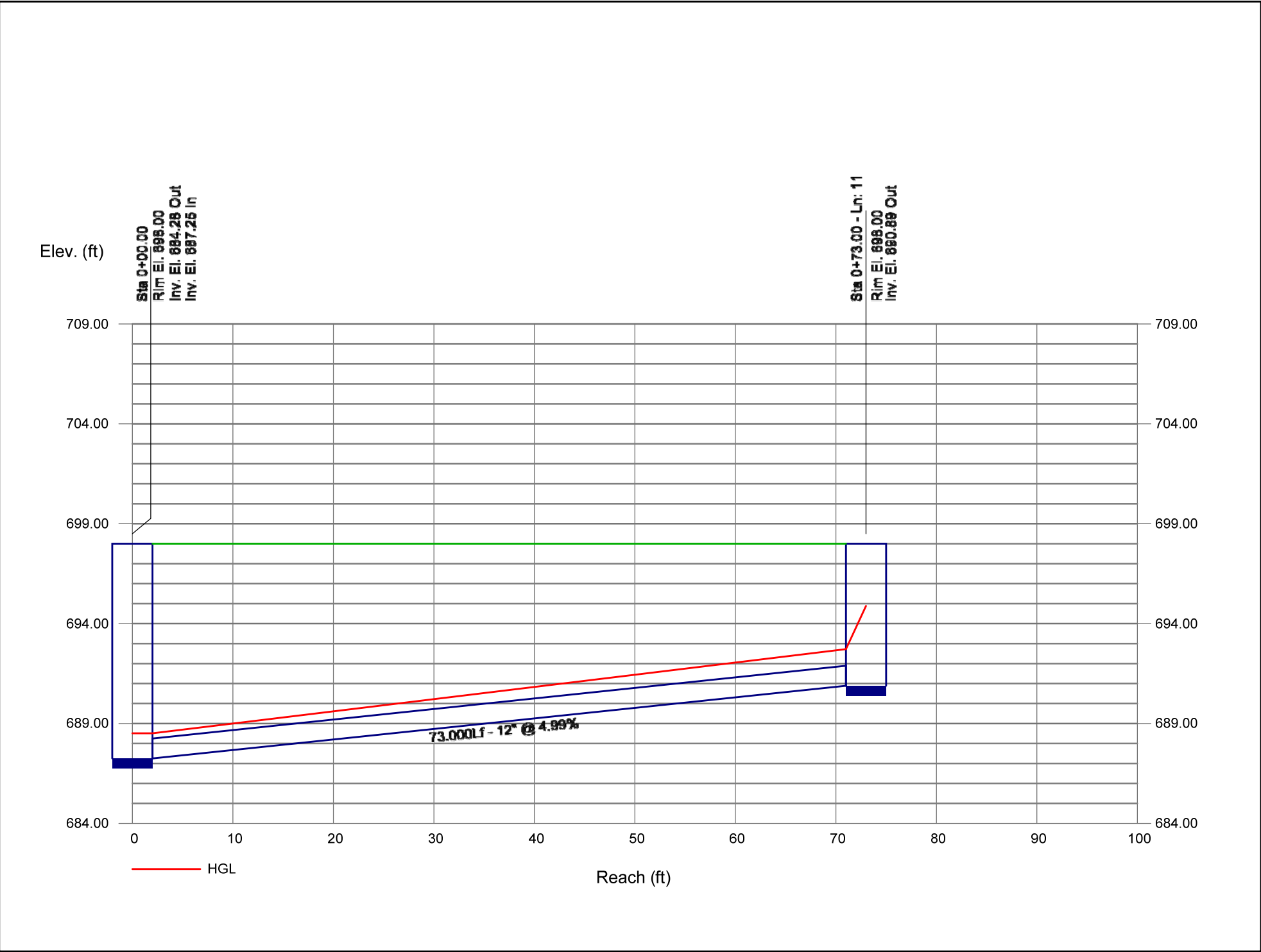


Project File: Moorings.stm	Number of lines: 14	Date: 6/24/2015
----------------------------	---------------------	-----------------

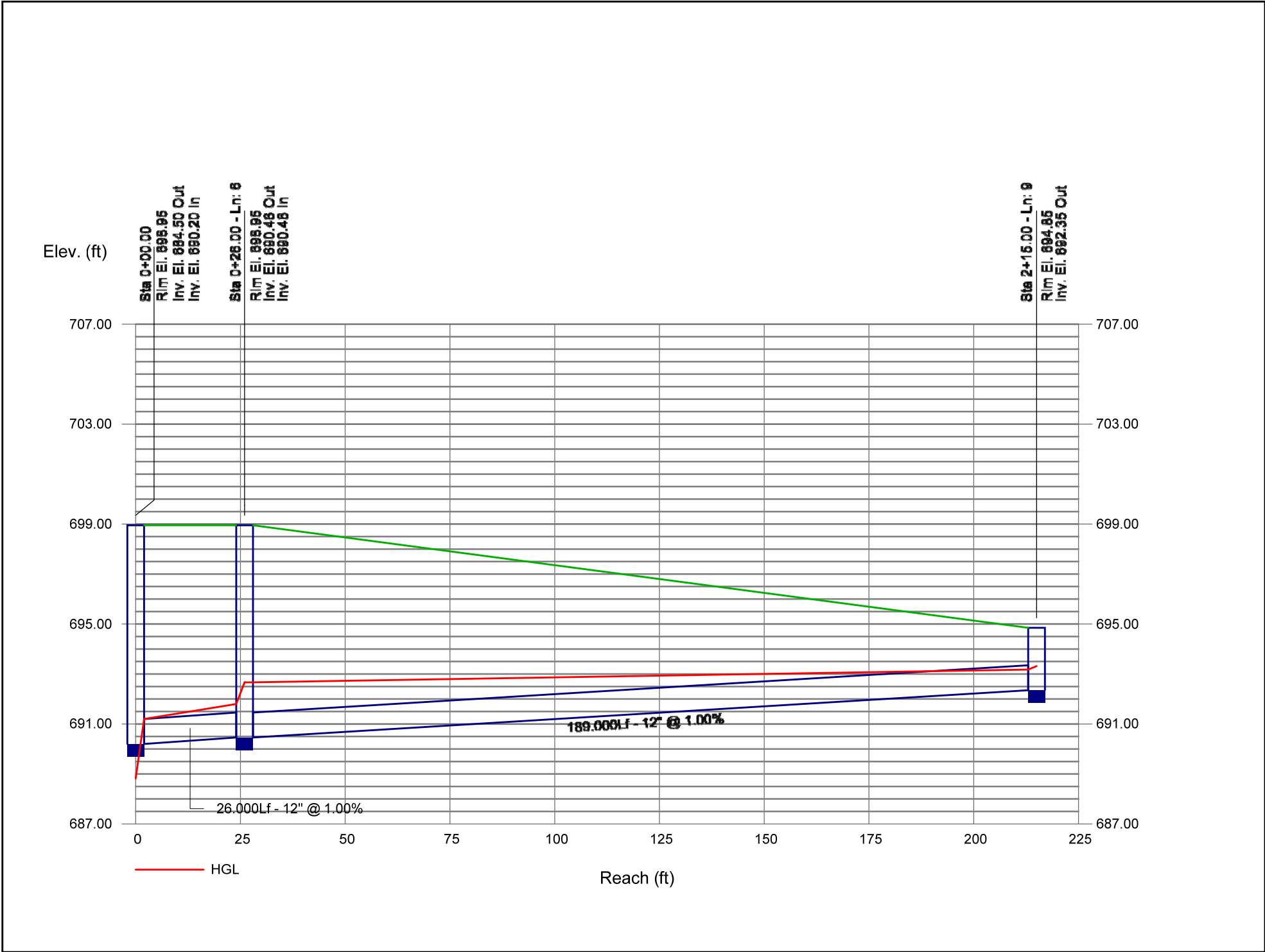
Storm Sewer Profile



Storm Sewer Profile

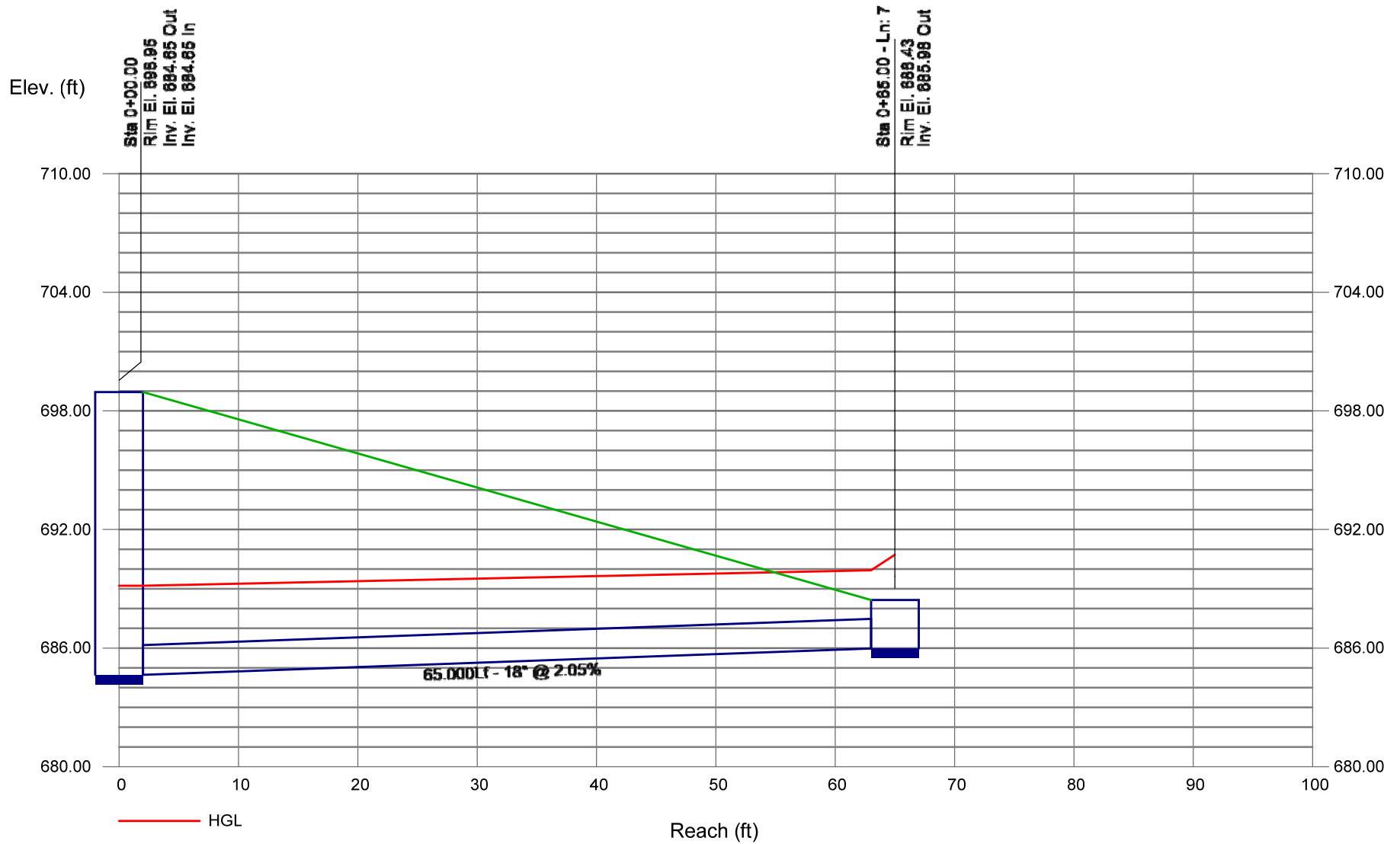


Storm Sewer Profile

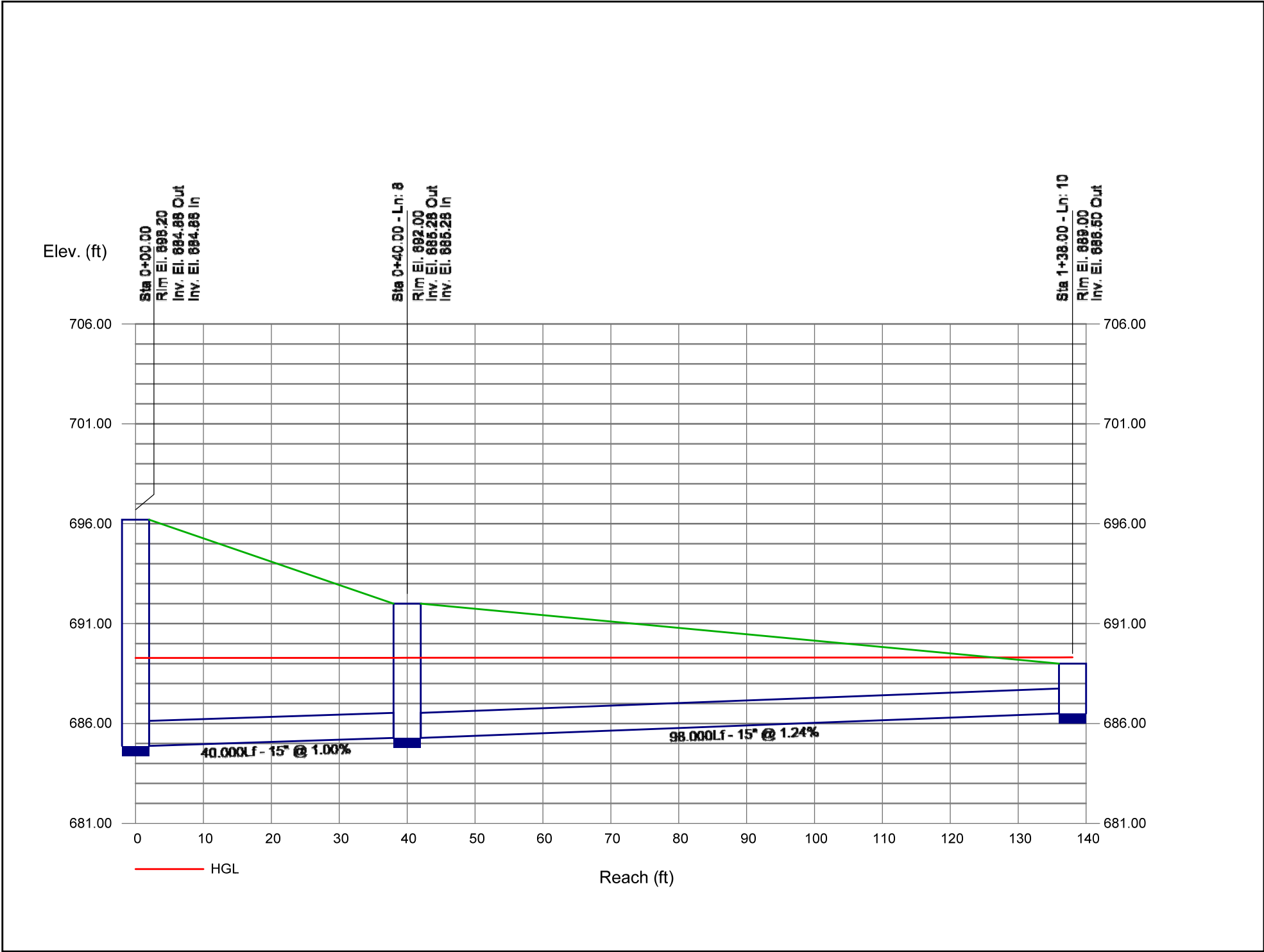


Storm Sewer Profile

Proj. file: Moorings.stm



Storm Sewer Profile



Appendix III

MWRD Permit No. 787-87



OFFICE COPY

MSDGC Permit No.
IEPA Log No.

ORIGINAL

87-787

SEWERAGE SYSTEM PERMIT

LOCAL SEWER SYSTEMS SECTION

NOV 12 AM 9:47

THE
METROPOLITAN SANITARY DISTRICT
OF GREATER CHICAGO
100 EAST ERIE, CHICAGO, ILLINOIS 60611 - 751-5600

INSTRUCTIONS FOR FILLING FORMS: Submit *typed* forms of permit and schedules in quadruplicate; complete all information or indicate non-applicability; do not leave any blank spaces; use "X" for checking applicable information. Submit four copies of location map, plans and all applicable schedules. Submit two copies of specifications, where applicable. Address all correspondence to Local Sewer Systems Section; for any inquiries or assistance, telephone 751-5789.

NAME AND LOCATION:Name of project (as shown on plans): The Moorings of Arlington Heights, IllinoisLocation of Project (street address or
with respect to two major streets): 801 Central RoadMunicipality (Township, if unincorporated) Arlington Heights, IllinoisSection 10, Township 41 N, Range 11 E.

Is project in MSDGC combined sewer area Yes [] No [X]

(OFFICE USE ONLY: X 10101413, Y 10101818, Code 101012.)Receiving STP and/or Lift Station North Side Sewage Treatment Works, Skokie.)**DOCUMENTS BEING SUBMITTED:** If project involves any of the items listed below, submit the corresponding schedule.

- | | |
|---|------------|
| ☒ Basic Information (Required in all cases) | Schedule A |
| ☒ Sewer Connection(s) | Schedule B |
| ☒ Sewer Extension(s) | Schedule C |
| ☒ Detention Facilities | Schedule D |
| ☐ Lift Station and/or Force Main | Schedule E |
| ☐ Characteristics of Waste Discharges | Schedule F |
| ☐ Treatment or Pre-treatment Facilities | Schedule G |
| ☐ Certification Relative to Compliance with Art. 4-1, 6-2d, and 6-3b | Schedule H |
| ☐ Affidavit Relative to Compliance with Art. 4-1, 6-2d, and 6-3b | Schedule J |
| ☒ Affidavit of Disclosure of Property Interest | Schedule K |
| ☐ Notice of Requirements for Storm Water Detention | Schedule L |
| ☐ Affidavit Relative to Compliance with Art. 6-4 | Schedule M |

OTHER DOCUMENTS: Indicate title, number of pages and originator:Plan sheets C-1 through C-13 entitled The Moorings of Arlington Hts., Il.
prepared by Austin Engineering Co. Inc., Peoria, Il.

1. **Adequacy of Design.** The schedules, plans, specifications and all other data and documents submitted for this permit are made a part hereof. The responsibility for the adequacy of the design shall rest solely with the Design Engineer and the issuing of this permit shall not relieve him of that responsibility. The issuance of this permit shall not be construed as approval of the concept or construction details of the proposed facilities and shall not absolve the Permittee, Co-Permittee or Design Engineer of their respective responsibilities.
2. **Joint Construction and Operation Permits.** Unless otherwise stated by the Special Conditions, the issuance of this permit shall be a joint construction and operation permit provided all General, Standard and Special Conditions are complied with.
3. **Allowable Discharges.** Discharges into the sanitary sewer system constructed under this permit shall consist of sanitary sewage only. Unless otherwise stated by the Special Conditions, there shall be no discharge of industrial wastes under this permit. Storm waters shall not be permitted to enter the sanitary sewer system. Without limiting the general prohibition of the previous sentence, roof and footing drains shall not be connected to the sanitary sewer system.
4. **Construction Inspection.** All sewer construction shall be inspected and approved by a Registered Professional Engineer acting on behalf of the Permittee or the owner of the project, or by a duly authorized and competent representative of the Professional Engineer. No sewer trenches shall be backfilled except as authorized by the Inspection Engineer after having inspected and approved the sewer installation.
5. **Maintenance.** The sewer connections, lines, systems or facilities constructed hereunder or serving the facilities constructed hereunder shall be properly maintained and operated at all times in accordance with all applicable requirements. It is understood that the responsibility for maintenance shall run as a joint and several obligation against the property served, the owner and/or the operator of the facilities, and said responsibility shall not be discharged nor in any way affected by change of ownership of said property.

MSDGC STANDARD CONDITIONS

6. **Indemnification.** The Permittee shall be solely responsible for and shall defend, indemnify and save harmless the Metropolitan Sanitary District of Greater Chicago (hereinafter MSDGC) from and against any and all claims, costs, damages, or expenses the MSDGC may suffer, incur, sustain or become liable for on account of any injury to, or death of, any person or persons, or any damage to, or destruction of, any real or personal property that may be caused by the construction, use, state of repair, operation and maintenance of the proposed facilities, arising out of or in consequence of the issuance of this permit. Without limiting the generality of the preceding sentence, the provisions of this paragraph shall extend to indemnify and save harmless the MSDGC from any claims or damages arising out of or in connection with the termination or revocation of this permit.
7. **Construction by MSDGC.** Permittee understands and acknowledges that the MSDGC has the right and power to construct and extend sewer service facilities and render such services within the area to be served by the project for which this permit is issued, and that by the MSDGC constructing and extending such sewer service facilities and rendering such services, the facilities constructed by the Permittee under this permit may decrease in value, become useless or of no value whatsoever, the Permittee may also sustain a loss of business, income and profits.

Therefore, by accepting this permit and acting thereon, the Permittee, for itself, its successors and assigns, does remise, release and forever discharge the MSDGC of any and all claims whatsoever which Permittee may now have or hereafter acquire and which Permittee's successors and assigns hereafter can, shall, or may have against the MSDGC for all losses and damages, either direct or indirect, claimed to have been incurred by reason of the construction or extension at any time hereafter by the MSDGC of sewer service facilities in the service area contemplated by this permit, the rendering of such services, which MSDGC facilities and services decrease the value of the facilities constructed by the Permittee under this permit, make same useless or of no value whatsoever, including but not limited to, any and all damages arising under Illinois Revised Statutes, Chapter 42, Section 339; the taking of private property for public use without due compensation; the interference with the contracts of Permittee; the interference with Permittee's use and enjoyment of its land; and the decrease in value of Permittee's land.

8. **Third Parties.** This permit does not grant the right or authority to the Permittee: (a) to construct or encroach upon any lands of the MSDGC or of any other parties, (b) to construct outside of the territorial boundaries of the MSDGC, (c) to construct or encroach upon the territorial boundaries of any units of local government within the MSDGC, (d) to connect to or discharge into or be served by (directly or indirectly) any sewer or sewer system owned or operated by third parties.
9. **Costs.** It is expressly stipulated and clearly understood that the sewerage system or facilities for which the permit is issued shall be constructed, operated and maintained at no cost to the MSDGC.

STATE OF ILLINOIS)
) SS
COUNTY OF COOK)

Name of Project: The Moorings of Arlington Heights, Illinois

Location of Project: 801 Central Road, Arlington Heights, Illinois

A. Michael S. McCarthy, after first being duly
(Name of Affiant - Type or Print)

sworn under oath, states that he is (the owner and record titleholder), (a principal beneficiary of and Trustee of _____, held by _____ (Name of Trust Holder) as Trustee), (an Officer

Vice-President/Secretary of Parkside Development Corporation. (a
(official capacity) (Name of Corporation)

(official capacity) (Name of Corporation) Partnership, which is the record title holder of
~~XXXXXXXXXXXXXXXXXXXX~~ (Name of Partnership) XXXXXXXX, the entity financing the project

the property which is the subject of a certain sewerage system permit application (covering the project indicated and designated by the number shown above) filed with the Metropolitan Sanitary District of Greater Chicago, which property is shown on the attached plat of survey which together with the legal description of the property are attached hereto as Exhibit "A" and specifically incorporated by reference herein.

B. Affiant further states that said property described in Exhibit "A" has a total area of 43 acres and constitutes the total contiguous ownership of the owner, and that the portion of the property currently proposed for development consists of 43 acres, and the property is intended for use as described hereinafter: Continuing Care Retirement Community for older adults and related nursing home center.

*C. Affiant further states that, because of its size and intended use, the property described in Exhibit "A" comes under the requirements of the MSDGC with respect to the establishment of on-site storm water detention, and that such detention facilities will be provided as part of the project in accordance with the design and calculations furnished to satisfy said requirements with respect to the property described in Exhibit "A", and further states that:

1. The owner of the property or any beneficiary of a land trust, if any, which is the record title holder of the property has no present interest, nor had any interest at any time during the previous two years, in any lands contiguous to said property. (If such interest is or was held, detention must be provided for the total.)

2. No owner of any lands contiguous to the property and no beneficiary of a land trust, if any, which is the record title holder of any land contiguous to the property has any interest in the property. (If such interest is held, detention must be provided for the total.)

3. Affiant understands and agrees that any permit issued by MSDGC in reliance upon this affidavit shall be deemed to contain a special condition that if, within two years after the issuance of the permit, the owner or any beneficiary of a land trust, if any, which is the record title holder of the property, acquires any interest in lands contiguous to the property, the owner shall provide for storm water detention for such lands in which an interest is acquired, regardless of the size of such lands.

XX
XX
XX

[illegible]

(Affidavit to be submitted with all permit applications in separate sewer areas.)

~~Delete paragraph C if exemption is claimed. Delete paragraph D if no exemption is claimed.~~

LSS-75-04/Rev. 76-03-12
Schedule K

Parcel One:

That part of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, T. 41 N., R. 11 E. of the 3rd P.M., described as follows: Commencing at the SW corner of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$; thence Easterly along the S. line thereof, 330.53' for a point of beginning; thence Northerly along a line, 330.5' E. of and parallel with the W. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ a distance of 192.66'; thence Easterly perpendicular to said W. line, 270.0'; thence Southeasterly along a line deflecting 45 degrees to the right from an extension of the last described line, 35.0'; thence Easterly along a line deflecting 45 degrees to the left from an extension of the last described line, 210.0'; thence Southerly parallel with said W. line, 25.0'; thence Easterly perpendicular to said W. line, 60.0'; thence Northerly parallel to said W. line, 97.48'; thence Easterly perpendicular to said W. line, 210.0'; thence Northwesterly along a line deflecting 45 degrees to the right from an extension of the last described line, 180.0'; thence Easterly perpendicular to said W. line of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$, a distance of 140.0'; thence Westerly along a line parallel to said W. line, 190.0'; thence Northerly parallel to said W. line, 130.0'; thence Northerly perpendicular to said W. line, 190.0'; thence Northerly parallel to said W. line, 135.84' to a point on a line 749.0' S. of and parallel to the S. line of Central Avenue; thence Easterly parallel to said S. line, 170.36'; thence Northerly perpendicular to said S. line 135.0'; thence Easterly parallel to said S. line, 200.0'; thence Northerly perpendicular to said S. line 70.0'; thence Westerly parallel to said S. line, 180.0'; thence Northerly perpendicular to said S. line, 95.0'; thence Westerly parallel with said S. line, 70.0'; thence Northerly perpendicular to said S. line, 135.0'; thence Northwesterly along a line deflecting 45 degrees to the left from an extension of the last described line, 141.42'; thence Westerly along a line deflecting 45 degrees to the left from an extension of the last described line, 175.0'; thence Southerly perpendicular to said S. line, 120.0'; thence Westerly parallel with said S. line, 434.0' to a point on the S. line of the aforesaid S. line of Central Avenue, 902.99' to a point on the E. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, said point being 50.0' S. of the NE corner thereof; thence Southerly along said E. line, 1368.57' to the SE corner of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$; thence Westerly along the S. line thereof, 991.0' to the point of beginning, containing 23.5198 acres, in Cook County, Illinois.

TRUE COPY

RECORDED
INDEXED
JUL 1 1907

Parcel Two: That part of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, T. 41 N., R. 11 E. of the 3rd P.M., described as follows: Commencing at the SW corner of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$; thence Easterly along the S. line thereof, 330.53'; thence Northerly along a line 330.50' E. of and parallel with the W. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$, a distance of 192.66' for a point of beginning; thence continuing Northerly along the last described line, a distance of 455.0' to a point on a line 749.0' S. of and parallel with the S. line of Central Avenue; thence Easterly along said parallel line, 287.50'; thence Southerly parallel with said W. line of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ a distance of 135.84'; thence Westerly perpendicular to said W. line, 190.0'; thence Southerly parallel with said W. line, 140.0'; thence Easterly perpendicular to said W. line, 130.0'; thence Southeasterly along a line deflecting 45 degrees to the right from an extension of the last described line, 180.0'; thence Easterly along a line deflecting 45 degrees to the left from an extension of the last described line, 210.0'; thence Southerly parallel with the aforesaid W. line of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, a distance of 97.48'; thence Westerly perpendicular to said W. line, 60.0'; thence Northerly parallel with said W. line 25.0'; thence Westerly perpendicular to said W. line, 210.0'; thence Northwesterly along a line deflecting 45 degrees to the right from an extension of the last described line, 35.0' thence Westerly along a line deflecting 45 degrees to the left from an extension of the last described line, 270.0' to the point of beginning, containing 2.8877 acres, in Cook County, Illinois.

3007

EXHIBIT A

Parcel Three:

That part of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, T. 41 N., R. 11 E. of the 3rd P.M., described as follows: Beginning at the SW corner of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10; thence Northerly along the W. line thereof, 1406.13' to the Southerly line of Central Avenue, being a line 50.0' S. of and parallel with the N. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$; thence Easterly along said S. line of Central Avenue, 419.50'; thence Southerly perpendicular to said S. line, 434.0'; thence Westerly parallel with said S. line, 104.0'; thence Southerly perpendicular to said S. line 75.0'; thence Westerly parallel with said S. line, 30.0'; thence Southerly perpendicular to said S. line, 20.0'; thence Westerly parallel with said S. line, 56.0'; thence Southerly perpendicular to said S. line, 220.0' to a point on a line 749.0' S. of and parallel with the aforesaid S. line of Central Avenue; thence Easterly along said parallel line, 112.14' to a point on a line 330.50' E. of and parallel with the W. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10; thence Southerly along said parallel line, 647.66' to a point on the S. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$, 330.53' E. of the point of beginning; thence Westerly along said S. line 330.53' to the point of beginning, containing 10.8645 acres, in Cook County, Illinois.

EXHIBIT A

87-787

Parcel Four:

That part of the NE $\frac{1}{4}$ of the NW $\frac{1}{4}$ of Sec. 10, T. 41 N., R. 11 E. of the 3rd P.M., described as follows: Commencing at the SW corner of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$; thence Easterly along the S. line thereof, 330.53'; thence Northerly along a line 330.50' E. of and parallel with the W. line of said NE $\frac{1}{4}$ of the NW $\frac{1}{4}$, a distance of 647.66' for a point of beginning; thence Westerly parallel to the S. line of Central Avenue, a distance of 112.14'; thence Northerly perpendicular to said S. line, 220.0'; thence Easterly parallel to said S. line, 56.0'; thence Northerly perpendicular to said S. line 20.0'; thence Easterly parallel with said S. line, 159.0'; thence Northerly perpendicular to said S. line 75.0'; thence Easterly parallel 30.0'; thence Northerly perpendicular to said S. line 120.0'; thence Easterly parallel S. line, 159.0'; thence Northerly perpendicular to said S. line 120.0'; thence Easterly with said S. line 175.0'; thence Southeasterly along a line deflecting 45 degrees to the right from an extension of the last described line, 141.42'; thence Southerly along a line deflecting 45 degrees to the right from an extension of the last described line, 135.0'; thence Easterly parallel with said S. line of Central Avenue, 70.0'; thence Southerly perpendicular to said S. line, 180.0'; thence Southerly perpendicular to said S. line 70.0'; thence Westerly parallel with said S. line, 200.0'; thence Southerly perpendicular to said S. line, 35.0'; thence Westerly parallel with said S. line, 457.86' to the point of beginning, containing 4.8239 acres, in Cook County, Illinois.

OFFICE COPY

87-282

EXHIBIT A

OFFICE COPY

MSDGC Permit No. 87-787
IEPA Log No. _____

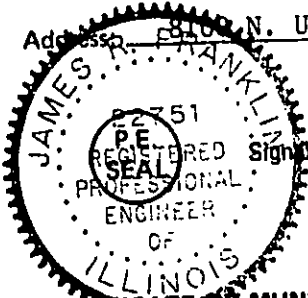
ENGINEERING CERTIFICATIONS

CERTIFICATE BY DESIGN ENGINEER: I hereby certify that the project described herein has been designed in accordance with the requirements set forth in this application and all applicable ordinances, rules, regulations, Local, State and Federal Laws, and design criteria of the issuing authority; that the storm drainage and sanitary sewer system designed for this project are proper and adequate; that, where the design involves one or more connections to an existing local sewer system, the capacity of said system has been examined and the system is found to be adequate to transport the wastewater that will be added through the proposed sewer without violating any provisions of the Illinois Environmental Protection Act or the rules and regulations thereunder.

Comments, if any: Bypass storm sewer & swale designed as dictated by Arlington Heights & Mt. Prospect.

Engineering Firm: Austin Engineering Co., Inc. Telephone: (309) 691-0224

Address: 810 N. University City: Peoria Zip: 61615



Signature [Signature] Date: September 21, 1987
(Name and Title)
James R. Franklin, P.E.
Vice President

CERTIFICATE BY MUNICIPAL OR SYSTEM ENGINEER: The application and the drawings, together with other data being submitted with this application, have been examined by me and are found to be in compliance with all applicable requirements. The manner of drainage is satisfactory and proper. The existing local sewer system to which the project discharges has been examined and the system is found to be adequate to transport the wastewater that will be added through the proposed sewer without violating any provisions of the Illinois Environmental Protection Act or the rules and regulations thereunder.

Comments, if any: _____

Owner of Local Sewer System Village of Arlington Heights, IL.

Acting Municipal Engineer: William C. Blecke Telephone: 312-577-5625

Address: 33 S. Arlington Heights Rd. City: Arlington Heights Zip: 60005



Signature [Signature] Date: 11-10-87
(Name and Title)

CERTIFICATE BY INSPECTION ENGINEER: I hereby certify that construction of the project will be in substantial compliance with the data and the plans submitted with this application; that approval will be obtained from the issuing authority prior to making any changes that would affect capacity, maintenance, design requirements, service area or the permit requirements; that a set of "As-Constructed" drawings, certified to be correct, over the signatures of both the Contractor and the Undersigned Engineer will be furnished to the MSDGC within sixty (60) days after testing and approval by the District of the completed work.

Engineering Firm: Donald Manhard & Associates Telephone: 1-312-634-1300

Address: 500 Knightsbridge Parkway Suite 150 City: Lincolnshire, IL Zip: 60069



Signature [Signature] Date: 10/28/87
(Name and Title)

SCHEDULE B - SEWER CONNECTIONS

BUILDING INFORMATION: Building sewer connections are [X], are not [] part of this permit; if part of this permit, complete the following:

- * 1. **TYPE OF CONSTRUCTION:** Residential [X], Commercial [], Light Industrial [], Manufacturing [], Recreational [], Existing Septic System to be abandoned [], Other _____.
2. **RESIDENTIAL BUILDINGS:** Single Family [], Multiple Family [X]. If single family: Total dwelling units _____; Estimated total population _____. If multiple family: Number of buildings 6; Number of dwelling units per building 251 Total; Total number of sewer connections 11; Estimated total population 542 + 50 employees (est.) *22 units / 122*
3. **NON-RESIDENTIAL BUILDINGS:** Describe use of building None.
Product manufactured or process used _____.
Number of buildings to be served under this permit _____. Number of sewer connections under this permit _____.
Estimated number of employees _____. Estimated number of occupants (transients) _____. Estimated total flow _____ gpd. Population equivalent (If based on BOD, use IPCB basis) _____.
4. **BUILDING USE:** Use of building will involve the following: Food preparation Yes [X] No []; Food processing Yes [] No [X]; Auto Service Yes [] No [X]; Auto Wash Yes [] No [X]. If building involves any of these uses, indicate if sewer connections will receive domestic sewage only [], will receive other wastes (commercial, not industrial) [X]; if wastes other than domestic are discharged, indicate method of control being provided; Grease separator [X], Triple Basin [], Mud Basin [], other [] specify _____.
Indicate whether control is inside [X], or outside building []. Industrial waste is [], is not [X] produced by the intended use of the building. (Unless permitted under the special conditions, discharge of industrial waste is prohibited). If industrial waste is produced, submit Schedule F, indicate method of disposal N/A.
This project includes a swimming pool: Yes [X], No []; if yes, submit piping drawings.
(Future swimming pool)
5. Complete summary of Sanitary Sewers on Schedule C.
- * Apartments for rent

SCHEDULE C - SEWER EXTENSIONS

NATURE OF PROJECT: Project consists of single sewer extension to serve the building(s) indicated above (not ~~to be~~ ~~extended~~ [X]; Consists of a sewer system (to serve a subdivision) []; Consists of a trunk sewer only (outlet sewer with no proposed connections) to serve future development []. Project is publicly financed Yes [], No [X].

AREA AND POPULATION: Submit a map of service area and complete the following:

1. Area serviceable by the sewers covered by this permit (including area to be served hereunder) 23.3 acres; population 542 + 50 employees
2. Potential service area of sewers covered by this permit, including planned or anticipated extensions 28.9 acres; population 596 + 50 employees
3. Design flow: average (if based on other than 100 gpcpd) 61,350 gpcpd; Maximum design flow as percent of average 400%. (Use MSDGC Manual of Procedures, Article 3 - 7).
4. Basis of design for area zoned or planned for non-residential use: Average design flow N/A gpd/acre. Maximum design flow as percent of average _____

SUMMARY OF SANITARY SEWERS (INCLUDE ALL SEWERS IN COMBINED SEWER AREA): Include building service sewers (stubs or risers) if any.

Pipe size - inches	10"	8" ✓	6"	#1 VCP ASTM C-700		
Total length - feet	2078	210	304 352	#2 ASTM C-425 & D-1784		
Min. slope used - %	0.28	0.50	1.00	#3 D.I. ANSI A21.51		
Max. slope used - %	0.28	6.00	100*	#4 ANSI ANSI A21.11		
Pipe Material & Spec.	#1	#1 #3	#1	*Service riser		
Joint Material & Spec.	#2	#2 #4	#2			
Total Manholes	9					
Total Cleanouts	0	0	5			

OFFICE COPY

MSDGC Permit No.
IEPA License No.

87-787

SCHEDULE D - DETENTION*

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington Heights, IllinoisLocation 801 Central Road, Arlington Heights, Illinois

Design criteria: MSDGC [] ; Local Government [] ; Other []

II. Determination of Allowable Release Rate - Undeveloped Site:

NORTH DETENTION BASIN

1. Area of site	80	acres
2. Average ground slope	0.009	foot/foot
3. Overland flow distance	700	feet
4. Overland flow time of concentration	45	minutes
5. Average slope of channelized flow (See Note a)	-	foot/foot
6. Channelized flow distance (See Note a)	-	feet
7. Channelized flow time of concentration	-	minutes
8. Total time of concentration (Line 4 + Line 7)	45	minutes
9. Rainfall intensity for three-year storm	1.91	inches/hr.
10. Runoff coefficient (Use c=0.15 as maximum, see Article 6-4b(1) of the MSDGC Manual)	0.15	
11. Allowable release rate, (line 1 x line 9 x line 10: Q=cIA)	2.29	cfs.

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections and slopes and submit necessary calculations and drawings.

III. Determination of Reservoir Size - Developed Site:

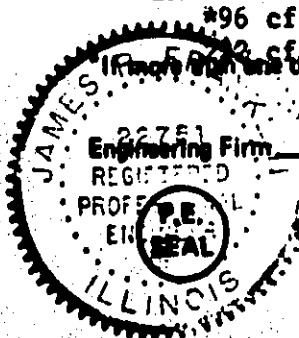
12. Impervious drainage area	3.1	acres
13. Pervious drainage area	4.9	acres
14. Composite runoff coefficient (c). (Submit calculations)	0.67	
15. Required reservoir capacity (Submit calculations)	1.14	acre-feet

IV. Permissible Bypass Rate through Development Site from Upstream Area:

16. Total area upstream	391	acres
17. Future/present impervious area (cross out inappropriate case)	-	acres
18. Future/present pervious area (cross out inappropriate case)	-	acres
19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2))	0.50	
20. Design storm frequency for the upstream area	5	year
(Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.)		
21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8)	92	minutes
22. Design storm intensity for above duration	2.06	inches/hour
23. Permissible bypass rate (line 16 x line 19 x line 22)	96	cfs.

*96 cfs = max. rate into Mt. Prospect storm sewer as per Mt. Prospect

If more than one detention reservoir is provided, submit separate schedules and calculations as necessary.



Austin Engineering Co., Inc., Peoria, Illinois

Signature James R. Franklin
(Name and Title)

Date Oct. 20, 1987Rev. 2/10/88

James R. Franklin, P.E. Vice President

OFFICE COPY

MSDGC Permit No. 87 787
IEPA Log No. _____

SCHEDULE D - DETENTION

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington HeightsLocation 801 Central Road, Arlington Hts., ILDesign criteria: MSDGC [] ; Local Government [☒]; Other [] _____

II. Determination of Allowable Release Rate - Undeveloped Site:

Northeast Detention Basin

- | | | |
|---|-------------|------------|
| 1. Area of site | <u>2.10</u> | acres |
| 2. Average ground slope | _____ | foot/foot |
| 3. Overland flow distance | _____ | feet |
| 4. Overland flow time of concentration | <u>45</u> | minutes |
| 5. Average slope of channelized flow (See Note a) | _____ | foot/foot |
| 6. Channelized flow distance (See Note a) | <u>1</u> | feet |
| 7. Channelized flow time of concentration | _____ | minutes |
| 8. Total time of concentration (Line 4 + Line 7) | <u>45</u> | minutes |
| 9. Rainfall intensity for three-year storm | <u>1.91</u> | inches/hr. |
| 10. Runoff coefficient (Use $c=0.15$ as maximum, see Article 6-4b(1) of the MSDGC Manual) | <u>0.15</u> | |
| 11. Allowable release rate, (line 1 x line 9 x line 10: $Q=ciA$) | <u>0.60</u> | cfs. |

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections and slopes and submit necessary calculations and drawings.

III. Determination of Reservoir Size - Developed Site:

- | | | |
|---|-------------|-----------|
| 12. Impervious drainage area | <u>0</u> | acres |
| 13. Pervious drainage area | <u>2.10</u> | acres |
| 14. Composite runoff coefficient (c). (Submit calculations) | <u>0.5</u> | |
| 15. Required reservoir capacity (Submit calculations) | <u>0.20</u> | acre-feet |

IV. Permissible Bypass Rate through Development Site from Upstream Area:

- | | | |
|--|-------|-------------|
| 16. Total area upstream | _____ | acres |
| 17. Future/present impervious area (cross out inappropriate case) | _____ | acres |
| 18. Future/present pervious area (cross out inappropriate case) | _____ | acres |
| 19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2)) | _____ | |
| 20. Design storm frequency for the upstream area | _____ | year |
| (Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.) | | |
| 21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8) | _____ | minutes |
| 22. Design storm intensity for above duration | _____ | inches/hour |
| 23. Permissible bypass rate (line 16 x line 19 x line 22) | _____ | cfs. |

If a detention reservoir is provided, submit separate schedules and calculations as necessary.

Donald Manhard Associates, Inc.



Signature _____

(Name and Title)

Proj. Eng. Date 2/10/88

OFFICE COPY

MSDGC Permit No.
IEPA Log No.

87 787

SCHEDULE D - DETENTION*

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington Heights, IllinoisLocation 801 Central Road, Arlington Heights, Illinois

Design criteria: MSDGC [] ; Local Government [] ; Other []

EAST LAKE

II. Determination of Allowable Release Rate - Undeveloped Site:

- | | | |
|---|--------|------------|
| 1. Area of site | 6.26 | acres |
| 2. Average ground slope | 0.014 | foot/foot |
| 3. Overland flow distance | 440 | feet |
| 4. Overland flow time of concentration | 45 | minutes |
| 5. Average slope of channelized flow (See Note a) | - | foot/foot |
| 6. Channelized flow distance (See Note a) | - | feet |
| 7. Channelized flow time of concentration | - | minutes |
| 8. Total time of concentration (Line 4 + Line 7) | 45 | minutes |
| 9. Rainfall intensity for three-year storm | 1.91 | inches/hr. |
| 10. Runoff coefficient (Use $c=0.15$ as maximum, see Article 6-4b(1) of the MSDGC Manual) | 0.15 | |
| 11. Allowable release rate, (line 1 x line 9 x line 10: $Q=ciA$) | * 1.79 | cfs. |

(USE 1.47 CFS AS PER VILLAGE

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections RESTRICTIONS and slopes and submit necessary calculations and drawings.

III. Determination of Reservoir Size - Developed Site:

- | | | |
|---|------|-----------|
| 12. Impervious drainage area | 2.84 | acres |
| 13. Pervious drainage area | 3.42 | acres |
| 14. Composite runoff coefficient (c). (Submit calculations) | 0.70 | |
| 15. Required reservoir capacity (Submit calculations) | 1.00 | acre-feet |

IV. Permissible Bypass Rate through Development Site from Upstream Area:

- | | | |
|--|--|-------------|
| 16. Total area upstream | | acres |
| 17. Future/present impervious area (cross out inappropriate case) | | acres |
| 18. Future/present pervious area (cross out inappropriate case) | | acres |
| 19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2)) | | |
| 20. Design storm frequency for the upstream area | | year |
| (Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.) | | |
| 21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8) | | minutes |
| 22. Design storm intensity for above duration | | inches/hour |
| 23. Permissible bypass rate (line 16 x line 19 x line 22) | | cfs. |

If more than one detention reservoir is provided, submit separate schedules and calculations as necessary.

Austin Engineering Co., Inc., Peoria, Illinois

Signature

(Name and Title)

Date Oct. 20, 1987

James R. Franklin, P.E. Vice President

Rev. 2/10/88

OFFICE COPY

MSDGC Permit ID
IEPA Log No.

87 787

SCHEDULE D - DETENTION*

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington Heights, IllinoisLocation 801 Central Road, Arlington Heights, Illinois

Design criteria: MSDGC [] ; Local Government [] ; Other []

SOUTHEAST DETENTION BASIN

II. Determination of Allowable Release Rate - Undeveloped Site:

1. Area of site 4.17 acres
2. Average ground slope 0.005 foot/foot
3. Overland flow distance 950 feet
4. Overland flow time of concentration 45 minutes
5. Average slope of channelized flow (See Note a) - foot/foot
6. Channelized flow distance (See Note a) - feet
7. Channelized flow time of concentration - minutes
8. Total time of concentration (Line 4 + Line 7) 45 minutes
9. Rainfall intensity for three-year storm 1.91 inches/hr.
10. Runoff coefficient (Use $c=0.15$ as maximum, see Article 6-4b(1) of the MSDGC Manual) 0.15
11. Allowable release rate, (line 1 x line 9 x line 10: $Q=ciA$) 1.19 cfs.

(USE 0.98 CFS AS PER VILLAGE RESTRICTIONS)

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections and slopes and submit necessary calculations and drawings.

* 1.19 cfs + 1.79 cfs from lake

TOTAL RELEASE = 2.98 cfs (use 2.45 cfs as per Village restrictions)

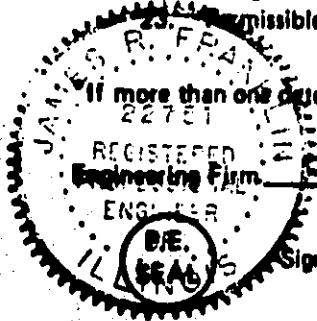
III. Determination of Reservoir Size - Developed Site:

12. Impervious drainage area 1.21 acres
13. Pervious drainage area 2.96 acres
14. Composite runoff coefficient (c). (Submit calculations) 0.63
15. Required reservoir capacity (Submit calculations) 0.58 acre-feet

IV. Permissible Bypass Rate through Development Site from Upstream Area:

16. Total area upstream - acres
17. Future/present impervious area (cross out inappropriate case) - acres
18. Future/present pervious area (cross out inappropriate case) - acres
19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2)) -
20. Design storm frequency for the upstream area - year
(Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.)
21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8) - minutes
22. Design storm intensity for above duration - inches/hour
23. Permissible bypass rate (line 16 x line 19 x line 22) - cfs.

If more than one detention reservoir is provided, submit separate schedules and calculations as necessary.



Austin Engineering Co., Inc., Peoria, Illinois

Signature

(Name and Title)

James R. Franklin, P.E. Vice President

Date Oct. 20, 1987

Rev. 2/10/88

SCHEDULE D - DETENTION*

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington Heights, IllinoisLocation 801 Central Road, Arlington Heights, Illinois

Design criteria: MSDGC [] ; Local Government [] ; Other []

II. Determination of Allowable Release Rate - Undeveloped Site:

WEST LAKE

1. Area of site	14.86	acres
2. Average ground slope	0.0033	foot/foot
3. Overland flow distance	1200	feet
4. Overland flow time of concentration	45	minutes
5. Average slope of channelized flow (See Note a)	-	foot/foot
6. Channelized flow distance (See Note a)	-	feet
7. Channelized flow time of concentration	-	minutes
8. Total time of concentration (Line 4 + Line 7)	45	minutes
9. Rainfall intensity for three-year storm	1.91	inches/hr.
10. Runoff coefficient (Use $c=0.15$ as maximum, see Article 6-4b(1) of the MSDGC Manual)	0.15	
11. Allowable release rate, (line 1 x line 9 x line 10: $Q=ciA$)	4.26	cfs.

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections and slopes and submit necessary calculations and drawings.

* use 3.50 cfs detention basin restriction

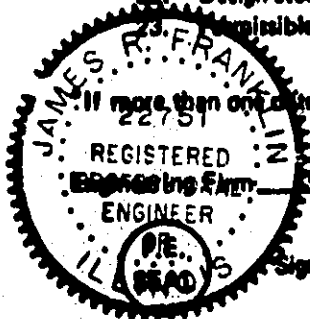
III. Determination of Reservoir Size - Developed Site:

12. Impervious drainage area	5.0	acres
13. Pervious drainage area	9.86	acres
14. Composite runoff coefficient (c). (Submit calculations)	0.65	
15. Required reservoir capacity (Submit calculations)	2.15	acre-feet

IV. Permissible Bypass Rate through Development Site from Upstream Area:

16. Total area upstream		acres
17. Future/present impervious area (cross out inappropriate case)		acres
18. Future/present pervious area (cross out inappropriate case)		acres
19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2))		
20. Design storm frequency for the upstream area		year
(Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.)		
21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8)		minutes
22. Design storm intensity for above duration		inches/hour
Permissible bypass rate (line 16 x line 19 x line 22)		cfs.

If more than one detention reservoir is provided, submit separate schedules and calculations as necessary.



Austin Engineering Co., Inc., Peoria, Illinois

Signature

(Name and Title)

Date Oct. 20, 1987

Rev. 2/10/88

James R. Franklin, P.E. Vice President

OFFICE COPY

MSDGC Permit No.
IEPA Log No.

87 787

SCHEDULE D - DETENTION*

I. Project Information

Name of Project (as shown on plans) The Moorings of Arlington Heights, IllinoisLocation 801 Central Road, Arlington Heights, Illinois

Design criteria: MSDGC [] ; Local Government [] ; Other []

SOUTHWEST DETENTION BASIN

II. Determination of Allowable Release Rate - Undeveloped Site:

- | | | |
|---|--------|------------|
| 1. Area of site | 4.02 | acres |
| 2. Average ground slope | 0.0008 | foot/foot |
| 3. Overland flow distance | 600 | feet |
| 4. Overland flow time of concentration | 4.5 | minutes |
| 5. Average slope of channelized flow (See Note a) | - | foot/foot |
| 6. Channelized flow distance (See Note a) | - | feet |
| 7. Channelized flow time of concentration | - | minutes |
| 8. Total time of concentration (Line 4 + Line 7) | 4.5 | minutes |
| 9. Rainfall intensity for three-year storm | 1.91 | inches/hr. |
| 10. Runoff coefficient (Use $c=0.15$ as maximum, see Article 6-4b(1) of the MSDGC Manual) | 0.15 | |
| 11. Allowable release rate, (line 1 x line 9 x line 10: $Q=cIA$) | 1.45 | cfs. |

(USE 0.98 CFS AS PER VILLAGE RESTRICTION)

Note a: For flow in a well defined channel determine time of concentration from measured lengths, cross-sections and slopes and submit necessary calculations and drawings.

*1.15 + 4.26 from west lake
TOTAL RELEASE = 5.41 cfs (use 4.45 cfs as per Village restrictions)

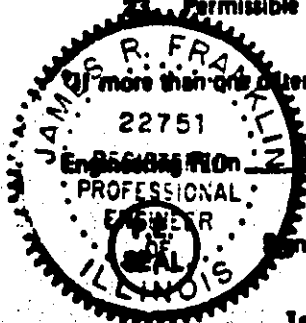
III. Determination of Reservoir Size - Developed Site:

- | | | |
|---|------|-----------|
| 12. Impervious drainage area | 1.39 | acres |
| 13. Pervious drainage area | 2.63 | acres |
| 14. Composite runoff coefficient (c). (Submit calculations) | 0.66 | |
| 15. Required reservoir capacity (Submit calculations) | 0.59 | acre-feet |

IV. Permissible Bypass Rate through Development Site from Upstream Area:

- | | | |
|--|--|-------------|
| 16. Total area upstream | | acres |
| 17. Future/present impervious area (cross out inappropriate case) | | acres |
| 18. Future/present pervious area (cross out inappropriate case) | | acres |
| 19. Composite runoff coefficient (Must not be less than 0.35 per MSDGC Manual of Procedures Article 6-4b(2)) | | |
| 20. Design storm frequency for the upstream area | | year |
| (Design storm frequency shall be as determined by local ordinance; if no local requirement is established, use 5-yr. storm frequency.) | | |
| 21. Time of concentration for the upstream area at point of entry; upstream area to be considered as developed. (By same method as line 8) | | minutes |
| 22. Design storm intensity for above duration | | inches/hour |
| 23. Permissible bypass rate (line 16 x line 19 x line 22) | | cfs. |

If more than one detention reservoir is provided, submit separate schedules and calculations as necessary.



Austin Engineering Co., Inc., Peoria, Illinois

Signature James R. Franklin
(Name and Title)

James R. Franklin, P.E. Vice President

Date Oct. 20, 1987

Rev. 2/10/88

SPECIAL CONDITIONS FOR PERMIT NO. 87-787

1. All waste containing grease shall be discharged to a grease interceptor or grease trap before discharge into the sewer with the exception of restaurant dishwashers, which shall have their discharge bypass the grease separator or grease trap and discharge to an open drain or directly to the sanitary sewer.
2. This permit is issued in reliance upon the Affidavit of Disclosure of Property Interest (Schedule K) submitted by the owner, and said Affidavit is incorporated herein and made a part hereof.
3. The storm water detention facilities shown on the plans are made a part of this permit. Construction of these facilities shall proceed prior to or concurrently with other construction on the project and shall be completed before any occupancy occurs. The detention is provided by two (2) lakes and four (4) detention basins with 6 outlet pipes as tabulated:

<u>Basin/Lake</u>	<u>Outlet Pipe Diameter (inches)</u>
North Basin	8
N.E. Basin	6
East Lake	8
S.E. Basin	6
West Lake	10
S.W. Basin	8

4. A swimming pool is not included under this permit. A new permit will be required for the swimming pool.

10. **Other Construction.** The MSDGC reserves the right, privilege and authority to permit others to reconstruct, change, alter and replace all sewers and appurtenances thereto at the point of connection of any sewerage system to an MSDGC interceptor and/or in public right-of-ways of MSDGC easements, and to introduce additional sewage flow through this connection into the intercepting sewer of said MSDGC.
11. **Change of Use.** This permit shall be incorporated in the Building and Occupancy Permit for the building or buildings served under this permit. The owner or occupant of any building served under this permit shall not cause, or permit, a change of use of the building to a use other than that indicated in this permit without first having obtained a written permission from the General Superintendent of the MSDGC.
12. **Interceptors Overloading.** The MSDGC hereby serves notice that its interceptors may flow full and may surcharge, and flooding of the proposed system may occur. The Permittee agrees that the proposed systems shall be constructed, operated and maintained at the sole risk of the Permittee.
13. **Non-Transferability.** This permit may not be assigned or transferred without the written consent of the General Superintendent of the MSDGC.
14. **Termination.** It is understood and agreed that in the event the Permittee shall default in or fail to perform and carry out any of the covenants, conditions and provisions of this permit and such default or violation shall continue for sixty (60) days after receipt or notice thereof in writing given by the General Superintendent of the MSDGC, then it shall be lawful for the MSDGC at or after the expiration of said sixty (60) days to declare said permit terminated. The Permittee agrees that immediately upon receipt of written notice of such termination it will stop all operations, discontinue any discharges and disconnect the sewerage system or facilities constructed under this permit. If the Permittee fails to do so, the MSDGC shall have the right to disconnect said system. The Permittee hereby agrees to pay for any costs incurred by the MSDGC for said disconnection. The various rights and remedies of the MSDGC contained in this permit shall be construed as cumulative, and no one of them shall be construed as exclusive of any one or more of the others or exclusive of any other rights or remedies allowed by applicable rules, regulations, ordinances and laws. An election by the MSDGC to enforce any one or more of its rights or remedies shall not be construed as a waiver of the rights of the MSDGC to pursue any other rights or remedies provided under the terms and provisions of this permit or under any applicable rules, regulations, ordinances or laws.
15. **Expiration.** This permit shall expire if construction has not started within one (1) year from the date of issue. Construction under an expired permit is deemed construction without a permit. All construction under this permit shall be completed within two (2) years after start of construction. If conditions so warrant, an extension may be granted. For publicly financed projects (e.g. special assessments) the one (1) year period indicated will be considered from the date of final court action.
16. **Revocation.** In issuing this permit, the MSDGC has relied upon the statements and representations made by the Permittee or his agent. Any incorrect statements or representations shall be cause for revocation of this permit, and all the rights of the Permittee hereunder shall immediately become null and void.
17. **Advance Notice.** Prior to commencement of construction under this permit, the Permittee shall give the MSDGC an advance notice of at least two working days. When advance notice is given, the Permittee shall provide the permit number, municipality and location.
18. **Compliance with Plans and Specifications.** All construction shall be in accordance with the plans and specifications submitted for this permit and made a part hereof. No changes in, or deviation from the plans and specifications which affect capacity, maintenance, design requirements, service area or permit requirements shall be permitted unless revised plans shall have been submitted to, and approved by, the MSDGC. The permit together with a set of the plans and specifications (revised plans and specifications, if any) shall be kept on the job site at all times during construction until final inspection and approval by the MSDGC.
19. **Testing and Approval.** All construction under this permit shall be subject to inspection, testing and approval by the MSDGC. All testing shall be made, or caused to be made, by the Permittee at no cost to the MSDGC and in the presence of the MSDGC representative. Upon satisfactory completion of construction, the Permittee and the owner shall submit, or cause to be submitted, a completion certificate and request for approval on the form prescribed by the MSDGC. No sewer or other facilities shall be put in service until all the conditions of the permit have been satisfactorily met.
20. **"As-Constructed Drawings."** Within sixty (60) days after final inspection and approval by the MSDGC, the Permittee shall furnish, or cause to be furnished to the MSDGC, a set of "As-Constructed" drawings, or a statement that the project was constructed in accordance with the original plans and specifications.
21. **Compliance with Rules and Regulations.** The Permittee hereby expressly assumes all responsibilities for meeting the requirements of all applicable rules, regulations, ordinances and laws of Local, State and Federal authorities. Issuance of this permit shall not constitute a waiver of any applicable requirements.

SPECIAL CONDITIONS: This permit is issued subject to the MSDGC's General Conditions, Standard Conditions and the following Special Conditions:

ATTACHED HERETO IS ONE PAGE OF SPECIAL CONDITIONS MADE A PART HEREOF.

CERTIFICATE BY APPLICANTS: We have read and thoroughly understand the conditions and requirements of this permit application, and agree to conform to the permit conditions and other applicable requirements of the MSDGC. It is understood that construction hereunder, after the permit is granted, shall constitute acceptance by the applicants of any Special Conditions that may be placed hereon by the MSDGC. It is further understood that this application shall not constitute a permit until it is approved, signed and returned by the Chief Engineer of the MSDGC.

Title to permit premises is held in a land trust: Yes [] No [X]. If yes, disclosure of beneficiaries is required.

If permit is granted: please return two copies of the permit to the Permittee []/Please mail one copy to Permittee and one copy to the person designated below [X]:

Name James R. Franklin, P.E. Address Austin Engineering Co., Inc.
8100 N. University, Peoria, IL 61615

PERMITTEE

CO-PERMITTEE*

Municipality <u>Village of Arlington Heights, IL</u>	Owner <u>Parkside Development Corporation</u>
Address <u>33 S. Arlington Road</u>	Address <u>c/o Lutheran General Health Care System</u>
<u>Arlington Heights, IL Zip 60005</u>	<u>1775 Dempster St.</u>
Signature <u>William C. Blech</u>	Signature <u>Robert F. Underwood</u>
Name & Title <u>ACTING DIR. OF ENG.</u>	Name & Title <u>Associate Director</u>
Date <u>11-10-87</u> Phone <u>577 5625</u>	Date _____ Phone <u>312-696-7190</u>

*(As required by MSDGC Ordinance; in other cases, as requested by Permittee)



REVIEW AND APPROVAL BY THE MSDGC

Reviewed by

Raymond Dingle Jr.
(Local Sewer Systems)

Date

4.8.88

Approved for issue:

THE METROPOLITAN SANITARY DISTRICT
OF GREATER CHICAGO

Date of Issue:

APR - 8 1988

By:

F. E. Juliano
For the (Chief Engineer)

THIS AREA TO BE
A FUTURE EXT.
WITH A SEPARATE
SAN. SEWER CONN.

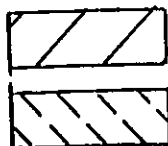
PHASE ①

DOUGLAS AVE.

FUTURE EXT. TO
PHASE ① TO BE
SERVED BY PHASE
① SAN. SEWERS

True copy of plans on file with
Metropolitan Sanitary District
of Greater Chicago Sewerage
Permit 87-7-87

OFFICE COPY



TOTAL PROPERTY AREA

42.1 ACRES

AREA OF PHASE ①

23.3 ACRES

FUTURE EXTENSION TO
PHASE ①

5.6 ACRES

REMAINING PROPERTY TO
BE SERVED BY SEPARATE
SAN. SEWER CONNECTION

13.2 ACRES

EXISTING 21"
SAN. SEWER
KIMBALL HULL
TO MSD INTER-
CEPTOR- UPPER
DESPLANES SEWER
CONT. II-B

MH 1

MH 2

MH 3

MH 4

MH 5

MH 6

MH 9

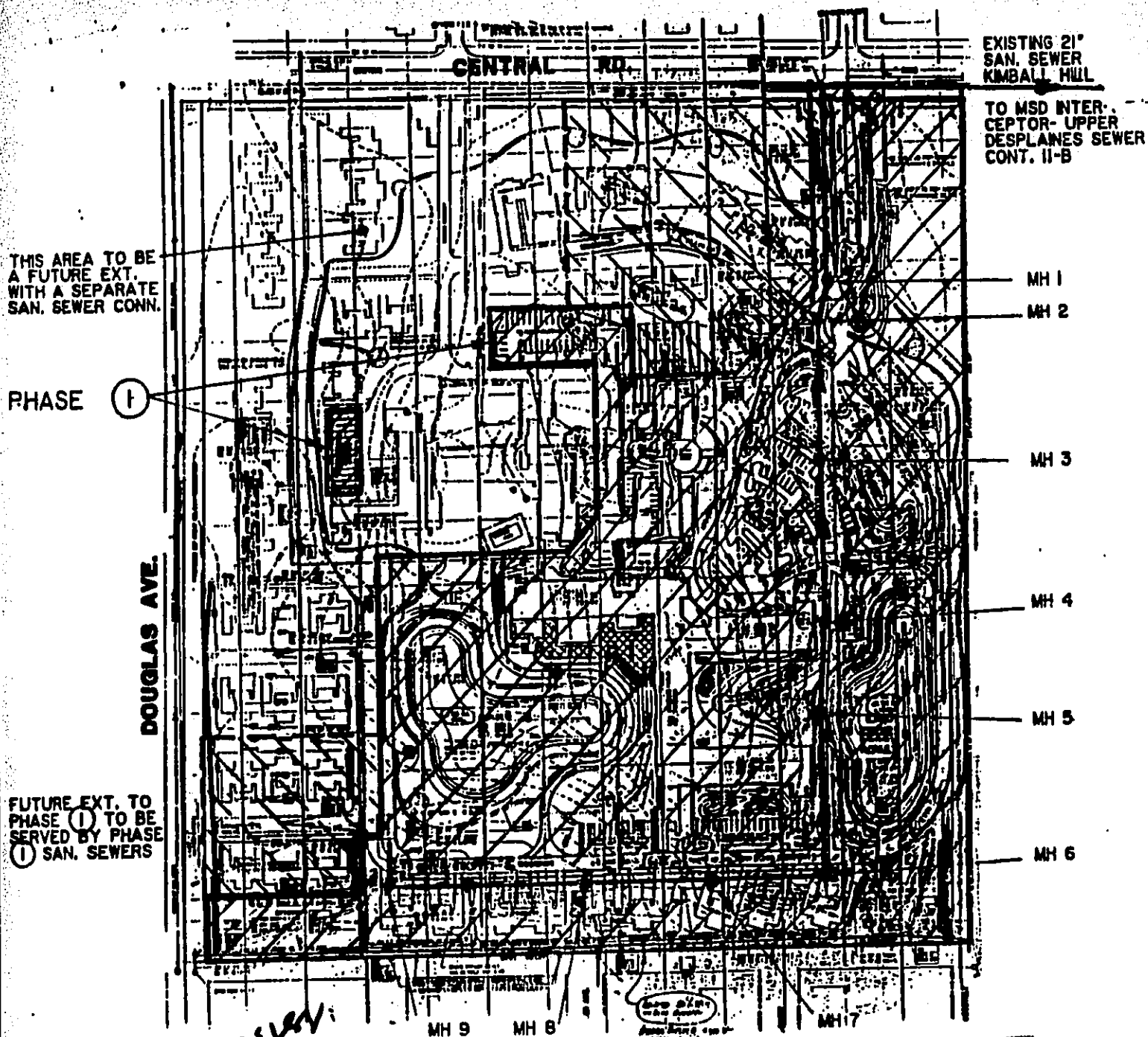
MH 8

MH 7



THE MOORINGS OF
ARLINGTON HEIGHTS, IL.

AUSTIN ENGINEERING CO., INC.



Revised 2/25/84

OFFICE COPY

87 787



TOTAL PROPERTY AREA

42.1 ACRES

AREA OF PHASE ①

23.3 ACRES

FUTURE EXTENSION TO PHASE ①

5.6 ACRES

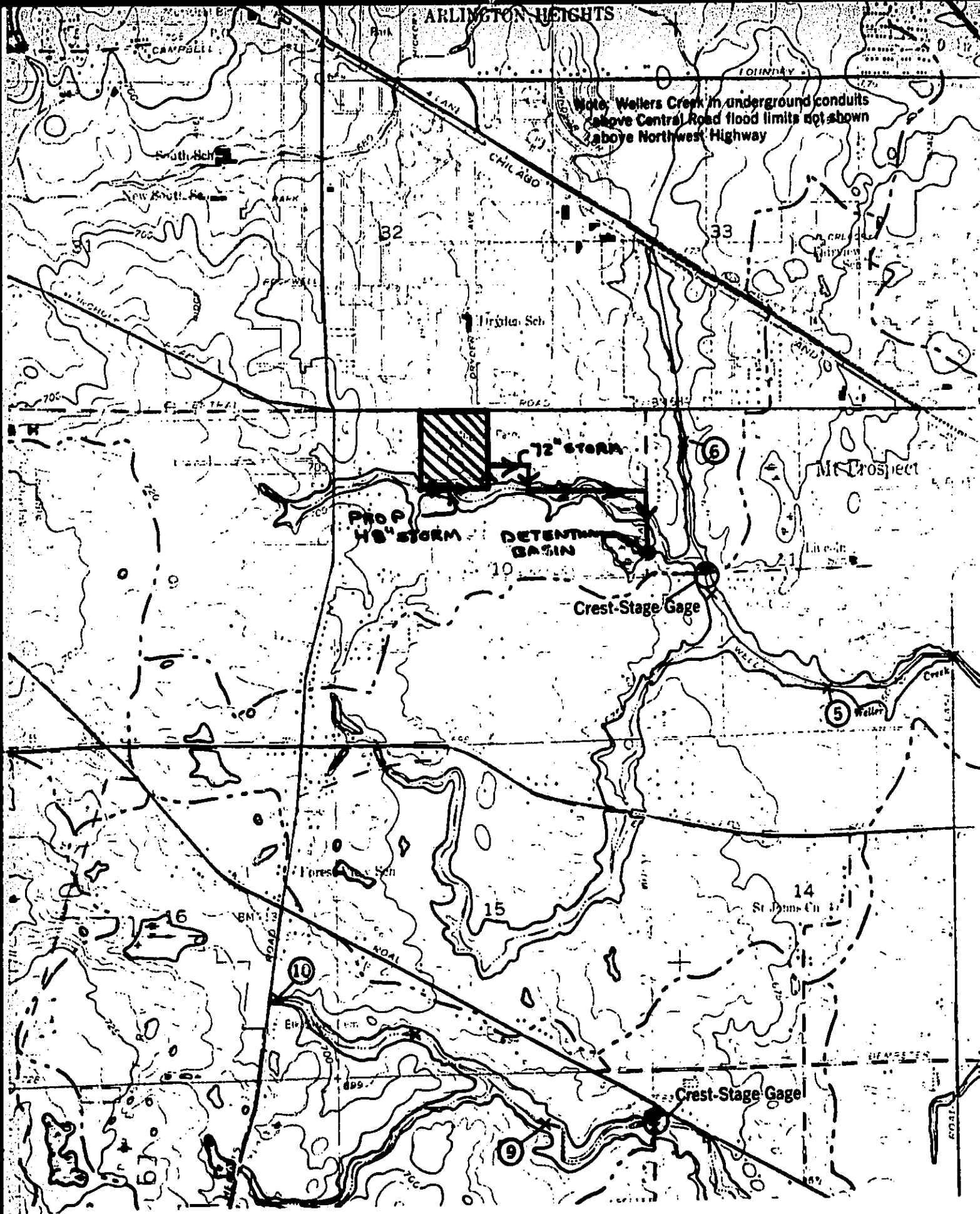
REMAINING PROPERTY TO BE SERVED BY SEPARATE SAN. SEWER CONNECTION

13.2 ACRES



THE MOORINGS OF
ARLINGTON HEIGHTS, IL.

AUSTIN ENGINEERING CO., INC.



ARLINGTON HEIGHTS QUADRANGLE MAP
USGS TOPOGRAPHY

87-787

OUTLET STORM SEWER ROUTING

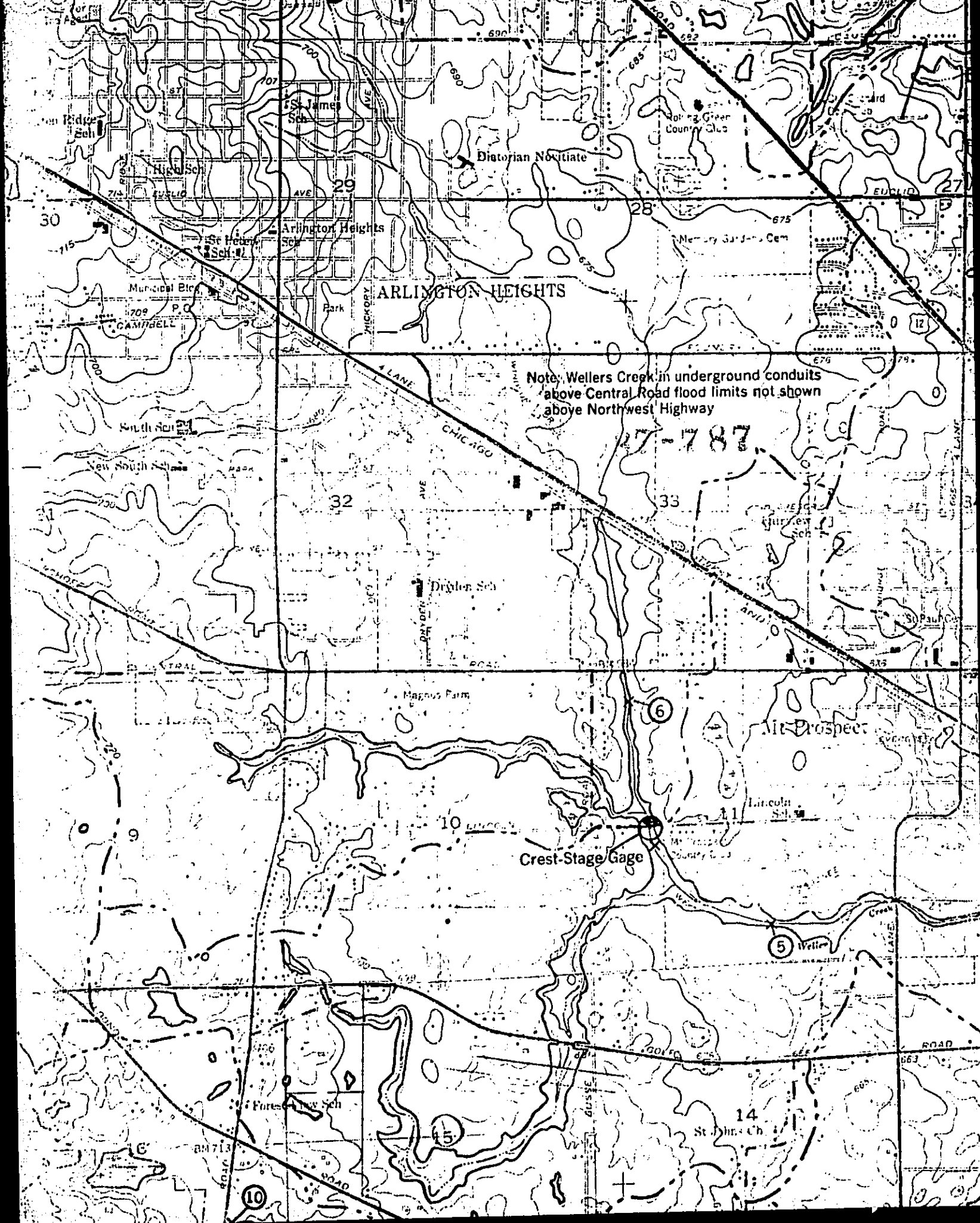
SHEET 19A OF 19

Arlington Heights.

87 787

Regular. Project Area
Existing Improvements
Office Copy
1972





DETENTION REVIEW SHEET

A. PROJECT

Permit No. **87 787**

Date Received 11/12/88

Name of Project The Moorings of Arlington Hgts

Location 801 Central Road

B. Basic Information

1. Total Project Area 42.1 Acres

2. Impervious Area: (a) Existing 28; (b) New 11.0

APP 0 11/12/88

3. Runoff Coefficient See calculations

4. Project is: Residential ☒; Non-Residential ☐

5. Project is in flood plain area yes/☒no

6. Building Connections are proposed under this permit ☒yes/no

7. Detention is required for the project covered by this permit ☒yes/no

8. Detention is provided under this permit ☒yes/no

9. Detention criteria: MSD ☒; Other ☐

C. Non-Applicability

Detention requirements are not applicable for the reason(s) indicated:

1. Project is in combined sewer area ☐

2. Total contiguous ownership is less than 5 acres ☐

3. Remaining developable ownership as of 1/1/72 is less than 5 acres . ☐

4. Project is single family, residential and area is less than 10 acres ☐

5. Project consists of an outlet sewer only and no connections are proposed ☐

6. Project consists of sewer rehabilitation work only ☐

7. Buildings existing and currently served by septic system ☐

8. No new impervious area proposed ☐

9. Other ☐

D. Relation with Other Projects

1. Detention required for this project is provided by existing/ proposed detention facilities ☐
Facilities are covered by Permit No.

D. Relation with Other Projects

2. Detention facilities provided under this permit are intended to serve other areas
If so, contributing area is _____ acres.
3. Project covered by permit receives drainage from another area and the flow is bypassed
4. This project is part of a previous development that exceeded five/ten acres and for which detention has been previously provided in full or in part
5. This project is part of a total contiguous land holding that exceeds five/ten acres and for which no detention has been provided
6. This project is part of an area previously encumbered for detention

E. Design Summary

	MSD Requirements	Project Design
1. Drainage area for which detention is provided under this permit	xxxx	39.41 acre
2. Detention requirements for area above	5.66 ac. ft.	10.94 ac. ft.
3. Detention requirements for this project	5.66 ac. ft.	10.94 ac. ft.
4. Release rate for drainage area (1) above	11.28 cfs	8.97 cfs
5. Bypass rate, if any (Bypass is routed thru the property without going thru the ponds)	284.0 cfs	284.00 cfs
6. Total discharge	295.28 cfs	292.97 cfs

F. Method of Detention

1. Method of Storage: Roof____, Ground____, Parking Lot____, Pond____, Other____

2. Method of Control: Roof Restrictor____, Weir____,
Pipe Outlet____, Size____, Length____,

Restrictor/Orifice____, Size____, Edge Type____

G. Other Comments

Tri-B. Area ACS	Panel	Vol. Req. AC ft.	Vol. Prev. AC ft.	MSD Allow Release cfs.	Actual Rel. cfs	Req. Size	Village All. Rel. cfs.
8.10	North Basin	1.14	1.15	2.29	2.23	8"-100' Long	
2.10	N. East Basin	0.2	0.20	0.60	0.60	6"-90' Long	
6.26	East Lake	1.0	2.73	1.79	2.98	8"-85' Long	1.47
4.17	S. East Basin	0.58	1.17	1.19	1.06	6"-40' Long	0.98
14.86	West Lake	2.15	5.04	4.26	3.25	10"-150' Long	3.5
4.02	S. West Basin	0.59	0.65	1.15	0.64	8"-30' Long	0.45
39.41		5.66	10.94	11.28	8.97		6.90

AC.

Reviewed: M.P. Date 4/7/84 Checked _____ Date _____

DETENTION RELEASE RATE SUMMARY

1. TOTAL SITE AREA = 42.1 ACRES

$$T_c = 45 \text{ MIN.} \quad I_3 = 1.91 \text{ in/hr}, \quad C = 0.15$$

$$\text{ALLOWABLE SITE RELEASE RATE} = (42.1)(1.91)(0.15) = 12.06 \text{ CFS}$$

2. AREA TRIBUTARY TO DETENTION BASINS

$$= 8.0 + 2.10 + 6.26 + 4.17 + 14.86 + 4.02 = 39.41 \text{ AC.}$$

3. UNDETAINED AREA = $42.10 - 39.41 = 2.69 \text{ AC.}$

Note:

IMPERVIOUS AREA = 0.48 AC

Existing Impervious

PERVIOUS AREA = 2.21 AC

area is approximately

2.8 ACs. for

$$C = \frac{(0.48 \times 0.95) + (2.21 \times 0.2)}{2.69} = 0.33$$

which det. is not

required. (developed prior

to 1972). Therefore $T_c = 45 \text{ MIN.}$ $I_{100} = 3.45 \text{ in/hr}$

credit could be from

for unrestricted release $Q_{UNR.}$ in equal area.

$$= (2.69)(3.45)(0.33) = 3.06 \text{ CFS}$$

4. ALLOWABLE DETENTION BASIN RELEASE = $12.06 - 3.06 = 9.00 \text{ CFS}$

$$\text{allowable release } 39.41 \times 1.91 \times 0.15 = 11.29 \text{ CFS.}$$

ACTUAL BASIN RELEASE RATES

NORTH 2.23 CFS ✓

NORTHEAST 0.60 CFS ✓

EAST & SOUTHWEST 2.25 CFS ✓

WEST & SOUTHWEST 3.89 CFS ✓

TOTAL BASIN RELEASE 8.97 CFS ✓ $\Sigma 11.29$

etc.

12/19/80 59.81
 2.8 AC

NORTH DETENTION POND

87-787

VOLUME TO ELEV. 689.5

EL.	685.5	0	2664	318
1.33	686	5328	1906	3496
1.66	687	11664	9586	5747
2.9	688	17784		14724
3.92	689	19944		18864
3.97	689.5	21096		10360

Invert
684.81

$$50013 = 1.15 \text{ AC.Ft.}$$

$$\text{TOTAL} = 55,108 \text{ CF} \\ = 1.27 \text{ AF}$$

ALLOWABLE REL. RATE = 2.29 SFS
 $H = 689.5 (\text{HWL}) - 685.47 (\text{TOP OF 8" PIPE}) = 4.03$
 ASSUME 8" PIPE

$$Q = (0.349) \left[\frac{4.03}{2(32.2)} + \frac{2.87(0.013)^2(100)}{(0.67)^{3/2}} \right]^{1/2} = 2.23$$

OK
2.26

∴ USE 8" PIPE

NORTH DETENTION BASIN

87-787

Attachment 1

A		B	C 5.36	D 2.29	E
Duration Time (Hrs.) (Min.)		Intensity for 100-Yr. Storm (In. / Hr.)	Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	Stored Rate (Col. C-Line 11) (cfs)	Reservoir Size (Col. A(Hrs.) x Col. D + 12) (Ac. -Ft.)
0.17	10	7.60	40.74	38.45	0.53
0.33	20	5.50	29.48	27.19	0.76
0.50	30	4.40	23.58	21.29	0.89
0.67	40	3.70	19.83	17.54	0.97
0.83	50	3.20	17.15	14.86	1.03
1.0	60	2.80	15.01	12.72	1.06
1.5	90	2.10	11.26	8.97	1.12
2.0	120	1.70	9.11	6.82	1.14
3.0	180	1.20	6.43	4.14	1.04
4.0	240	1.00	5.36	3.07	1.02

COMPOSITE 'C'

IMPERVIOUS AREA = 3.1 ACRES

PERVIOUS AREA = 4.9 ACRES

TOT. 8.0 ACRES

$$C = \frac{(3.1 \times 0.95) + (4.9 \times 0.5)}{8.0} = 0.67$$

87-787

NORTHEAST DETENTION BASIN

VOLUME TO ELEV 688.0

ELEV.	686.5	0	1494	996
	687	5977	7318	
	688	8659		

TOTAL 8812 CF 8314
 = 0.20 AF 119 ACFT.

ALLOWABLE RELEASE RATE = 0.60 CFS

$$H = 688 \text{ (HWL)} - 686.82 \text{ (TOP OF 6" PIPE)} = 1.18$$

ASSUME 6" PIPE

$$Q = (0.196) \left[\frac{1.18}{\frac{1+0.1}{2(32.2)} + \frac{2.87(0.013)^2(90)}{(0.5)^{4/3}}} \right]^{1/2} = 0.60 \text{ CFS } \checkmark$$

OK

∴ USE 6" PIPE

Attachment 1

87-787

A		B	C 1.05	D 0.60	E
Duration Time (Hrs.) (Min.)		Intensity for 100-Yr. Storm (In./Hr.)	Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	Stored Rate (Col. C-Line 11) (cfs)	Reservoir Size (Col. A(Hrs.)xCol. D + 12) (Ac.-Ft.)
0.17	10	7.60	7.98	7.38	0.10
0.33	20	5.50	5.78	5.18	0.14
0.50	30	4.40	4.62	4.12	0.17
0.67	40	3.70	3.89	3.29	0.18
0.83	50	3.20	3.36	2.76	0.19
1.0	60	2.80	2.94	2.34	0.20
1.5	90	2.10	2.21	1.61	0.20 ←
2.0	120	1.70	1.79	1.19	0.20
3.0	180	1.20	1.26	0.66	0.17
4.0	240	1.00	1.05	0.45	0.15

IMP. AREA = 0 AC.

PERV. AREA = 2.10 AC.

C = 0.50

87-787

EAST LAKE

VOLUME TO ELEV. 689

686	34,452 SF	39618(3) = 2.73 AF
689	44,784 SF	

TOTAL ALLOWABLE RELEASE TO 48" STORM
SEWER AS PER VILLAGE = 6.90 CFS

TOTAL TRIBUTARY AREA = 6.26 + 4.17 + 14.86 + 4.02
= 29.31 ACRES

ALLOWABLE RELEASE RATE (EAST LAKE =

$$= \frac{6.26}{29.31} \times 6.9 = 1.47 \text{ CFS}$$

$$Q = A \left[\frac{K_0 + K_1}{2g} + \frac{2.87 n^2 L}{D^{4/3}} \right]^{1/2}$$

$$Q = 1.47 \text{ CFS}$$

$$A = \text{RELEASE PIPE CROSS SECTION (8')} = 0.349 \text{ SF}$$

$$H = \text{HEAD} = 689 - 688 = 1.0' \text{ (DIFF IN MVL) } \checkmark$$

$$L = \text{LENGTH OF PIPE} = 83'$$

$$K_0 = 1$$

$$K_1 = 0.1$$

$$G = 32.2$$

$$n = 0.013$$

$$D = \text{PIPE DIAMETER} = 0.67'$$

$$Q = (0.349) \left[\frac{1 + 0.1}{2(32.2)} + \frac{2.87 (0.013)^2 (83)}{(0.67)^{4/3}} \right]^{1/2} = 1.19 \text{ CFS } \checkmark$$

USE 8" PIPE

7 of 19

THE MOORINGS EAST LAKE

87-787

Attachment 1

A Duration Time (Hrs.) (Min.)		B Intensity for 100-Yr. Storm (In. / Hr.)	C 4.38 Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	D 1.47 Stored Rate (Col. C-Line 11) (cfs)	E Reservoir Size (Col. A(Hrs.) x Col. D ÷ 12) (Ac.-Ft.)
0.17	10	7.60	33.30	31.83	0.44
0.33	20	5.50	24.10	22.63	0.63
0.50	30	4.40	19.28	17.81	0.74
0.67	40	3.70	16.21	14.74	0.82
0.83	50	3.20	14.02	12.55	0.87
1.0	60	2.80	12.27	10.80	0.90
1.5	90	2.10	9.20	7.73 ^{8.01}	0.96
2.0	120	1.70	7.45	5.98 ^{6.26}	1.00 ^{1.00} ←
3.0	180	1.20	5.26	3.79 ^{4.27}	0.95
4.0	240	1.00	4.38	2.91 ^{3.19}	0.97

COMPOSITE "C"

IMP. AREA	2.84 AC
PER. AREA	3.42 AC
	<u>6.26 AC</u>

$$C = \frac{(2.84)(0.95) + (3.42)(0.5)}{6.26} = 0.70$$

87-787

SOUTHEAST DETENTION BASIN

VOLUME TO ELEV. 688

682	0	600
683	3600	5994
684	8388	19368
685	10980	24840
688	13860	

$$\begin{aligned} \text{TOTAL PROVIDED} &= 50,802 \text{ CF} \\ &= 1.17 \text{ AF} \end{aligned}$$

$$\text{ALLOWABLE RELEASE RATE} = \frac{4.17}{29.31} \times 6.90 = 0.98 \text{ CFS}$$

$$\text{TOTAL RELEASE RATE} = 0.98 + 1.47 \text{ (EAST LAKE)} = 2.45 \text{ CFS}$$

ASSUME 6" RELEASE PIPE

$$H = 688 \text{ (HWL)} - 679.30 \text{ (TOP OF 6 PIPE)} = 8.70'$$

$$D = 0.5' \quad A = 0.196 \text{ SF}$$

$$Q = (0.196) \left[\frac{8.70}{\frac{1+0.1}{2(32.2)} + \frac{2.87(0.013)^2(40)}{(0.50)^{4/3}}} \right]^{1/2} = 2.25 \text{ CFS}$$

2.25 < 2.45 OK

∴ USE 6" RELEASE PIPE

87-782

Attachment 1

A		B	C 2.63	D 0.98	E
Duration Time (Hrs.) (Min.)		Intensity for 100-Yr. Storm (In./Hr.)	Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	Stored Rate (Col. C-Line 11) (cfs)	Reservoir Size (Col. A(Hrs.) x Col. D + 12) (Ac.-Ft.)
0.17	10	7.60	19.99	19.01	0.26
0.33	20	5.50	14.47	13.49	0.37
0.50	30	4.40	11.57	10.59	0.44
0.67	40	3.70	9.73	8.75	0.49
0.83	50	3.20	8.42	7.44	0.51
1.0	60	2.80	7.36	6.38	0.53
1.5	90	2.10	5.52	4.54	0.57
2.0	120	1.70	4.47	3.49	0.58 ←
3.0	180	1.20	3.16	2.18	0.55
4.0	240	1.00	2.63	1.65	0.55

COMPOSITE "C"

$$\begin{aligned}
 \text{IMP. AREA} &= 1.21 \text{ AC} \\
 \text{PER. AREA} &= \frac{2.96 \text{ AC}}{4.17} \\
 &= 0.71 \text{ AC}
 \end{aligned}$$

$$C = \frac{(1.21 \times 0.95) + (2.96 \times 0.5)}{4.17} = 0.63$$

87-787

WEST LAKE

VOL. TO ELEV. 690

686	46296 SF	54,900(4)	= 5.04 AF
690	63504 SF		

$$\text{ALLOWABLE REL. RATE} = \frac{14.86}{29.31} \times 6.90 = 3.50 \text{ CFS}$$

$$H = 690 \text{ MWL} - 686.07 \text{ (TOP OF 10" PIPE)} = 3.93$$

ASSUME 10" PIPE

$$Q = \left[\frac{1 + 0.1}{2(37.2)} + \frac{2.87(0.013)^2 150}{(0.83)^{4/3}} \right]^{1/2} 3.93 = 3.25 \text{ CFS} \checkmark$$

OK

 $\therefore$ USE 10" PIPE

WEST LAKE

87-787

Attachment 1

A		B	C ^{9.66}	D ^{3.50} _{3.25}	E
Duration Time (Hrs.) (Min.)		Intensity for 100-Yr. Storm (In. / Hr.)	Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	Stored Rate (Col. C-Line 11) (cfs)	Reservoir Size (Col. A(Hrs.) x Col. D + 12) (Ac. -Ft.)
0.17	10	7.60	73.42	69.92	0.97
0.33	20	5.50	53.13	49.63	1.37
0.50	30	4.40	42.50	39.00	1.62
0.67	40	3.70	35.74	32.24	1.79
0.83	50	3.20	30.91	27.41	1.90
1.0	60	2.80	27.05	23.55	1.96
1.5	90	2.10	20.29	^{20.08} 16.79	2.10 ^{2.13}
2.0	120	1.70	16.42	^{13.17} 12.92	2.15 ^{2.2}
3.0	180	1.20	11.59	^{8.34} 8.09	2.02 ^{2.09}
4.0	240	1.00	9.66	6.16	2.05

COMPOSITE 'C'

IMP. AREA = 5.0 AC

PERV. AREA = 9.86 AC

TOT. 14.86 AC.

$$C = \frac{(5.0 \times 0.95) + (9.86 \times 0.50)}{14.86} = 0.65$$

87-787

SOUTHWEST DETENTION POND

VOLUME TO ELEV. 688.0

684.65	0	235
685	2160	7182
686	12,204	13,302
687.5	15,516	20,790

$$\text{TOTAL} = 36,235 \text{ CF} = 0.65 \text{ AF} \checkmark$$

$$\text{ALLOWABLE RELEASE RATE} = \frac{4.02}{29.31} \times 6.90 = 0.95 \text{ CFS}$$

$$\text{TOTAL REL. RATE} = 0.95 + 3.50 (\text{FROM WEST LAKE}) = 4.45 \text{ CFS}$$

ASSUME 8" PIPE

$$H = 688 (\text{RWL}) - 682.58 (\text{TOP OF 8" PIPE}) = 5.42'$$

$$Q = 0.349 \left[\frac{5.42'}{\frac{1+0.1}{2(32.2)} + \frac{2.97(0.013)^2(32)}{(0.67)^{4/3}}} \right]^{1/2} = 3.89 \text{ CFS} \checkmark$$

USE 8" PIPE

SOUTHWEST BASIN

87-787

Attachment 1

A		B	C 2.65	D 0.95	E
Duration Time (Hrs.) (Min.)		Intensity for 100-Yr. Storm (In./Hr.)	Inflow Rate (Line 1 x Line 14 x Col. B) (cfs)	Stored Rate (Col. C-Line 11) (cfs)	Reservoir Size (Col. A(Hrs.) x Col. D + 12) (Ac.-Ft.)
0.17	10	7.60	20.14	19.19	0.27
0.33	20	5.50	14.58	13.63	0.38
0.50	30	4.40	11.66	10.71	0.45
0.67	40	3.70	9.81	8.86	0.49
0.83	50	3.20	8.48	7.53	0.52
1.0	60	2.80	7.42	6.47	0.54 .62
1.5	90	2.10	5.57	4.62	0.57 0.65
2.0	120	1.70	4.51	3.56	0.59 0.64
3.0	180	1.20	3.18	2.23	0.56
4.0	240	1.00	2.65	1.70	0.57

COMPOSITE "C"

IMP. AREA 1.39 AC
 PER. AREA 2.63 AC
 4.02 AC

$$C = \frac{(1.39 \times 0.95) + (2.63 \times 0.50)}{4.02} = 0.66$$

87-782

THE MOORINGS

DESIGN CALCULATIONS FOR

THE BYPASS STORM SEWER SYSTEM

(SEE ATTACHED MAP)

EXISTING OUTLET STORM SEWER @ SOUTHEAST
CORNER OF THE PROJECT = 72" PIPE @ 0.20%

EXISTING INLET STORM SEWER FROM SOUTH
48" PIPE @ 0.27%

ADDITIONAL CONTRIBUTING AREA FROM SOUTH
OVERLAND INTO EXISTING FIELD TILES
 $A = 10$ ACRES, $L = 1200'$, $T_c = 40$ MIN., $I_s = 2.59 \frac{1}{4} \%$
 $C = 0.35$

CALCULATE ALLOWABLE BYPASS FROM THE WEST
ALONG THE PROJECT'S SOUTH PROPERTY LINE,
ASSUMING PIPES FLOWING FULL

EXISTING 72" PIPE @ 0.20% = 180 CFS

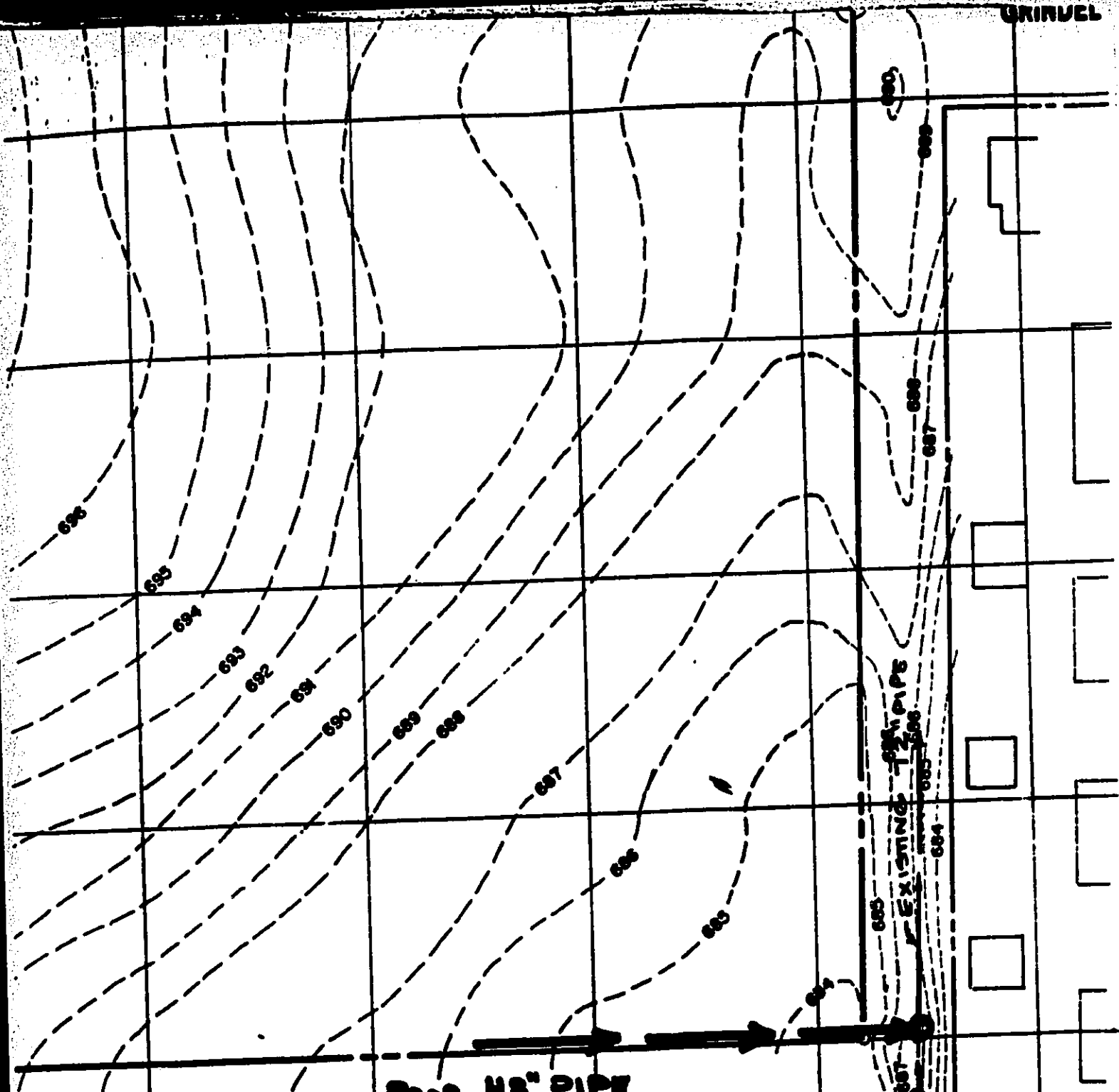
LESS EXISTING 48" PIPE @ 0.27% = - 75 CFS

LESS CONTRIBUTING AREA $Q = (0.35)(2.59)(10 \text{ AC}) = - 9 \text{ CFS}$

* ALLOWABLE BYPASS = 96 CFS
(AS REQUIRED BY MOUNT PROSPECT)

∴ USE 48" PIPE @ 0.48%

PREPARED BY:
DONALD MANNARO & ASSOC.
LINCOLNSHIRE, IL



PROP. 48" PIPE

EXISTING 24" PIPE

EXISTING 48" PIPE

PRAIRIE



87-787

10 ACRE
TRIBUTARY
AREA

ROOSEVELT

17

NAD OF EXISTING CONDITIONS
FOR BYARDS STORM SEWER
MO 10/14/87 DEN

MO
10/14/87
PEM

THE MOORINGS

87-782

DESIGN CALCULATIONS FOR

THE BYPASS DITCH ALONG S.P.L.

(SEE ATTACHED MAP)

C = COMPOSITE RUNOFF FACTOR FOR EXISTING
CONDITIONS OF ENTIRE TRIBUTARY AREA = 0.50

A = TRIBUTARY AREA TO BYPASS DITCH :

AREA 'A' = 0 ACRES (TRIBUTARY EAST OF PROPERTY)
AREA 'B-1' = 0 ACRES (TRIBUTARY EAST OF PROPERTY)
AREA 'B-2' = 0 ACRES, REL. RATE OF 6.9 CFS
AREA 'B-3' = 25 ACRES
AREA 'B-4' = 115 ACRES
AREA 'C-1' = 190 ACRES
AREA 'C-2' = 0 ACRES (TRIBUTARY CENTRAL AVE.)
AREA 'D' = 61 ACRES

TOTAL TRIBUTARY AREA = 391 ACRES

T_c = TIME OF CONCENTRATION = 92 MIN.

I_{100} = 100 YEAR RAINFALL INTENSITY = 2.06 IN/HR

Q_{100} = 100 YEAR TRIBUTARY RUNOFF = CIA
+ AREA B-2 REL. RATE
= $(0.50)(391)(2.06) + 6.9 = 410$ CFS

THIS QUANTITY WILL BE REDUCED BY THE
EXISTING 54" PIPE ON ARLINGTON HEIGHTS ROAD &
THE PROPOSED 48" PIPE ALONG THE SOUTH PROPERTY LINE.
AS FOLLOWS:

EXISTING 54" PIPE @ 0.48% = 126 CFS
PROPOSED 48" PIPE @ 0.48% = 96 CFS
TOTAL BYPASS = 222 CFS

DONALD MANHARD
48502
LINCOLN HEIGHTS IL
17 OF 19

(∴ TOTAL REQUIRED BYPASS DITCH CAPACITY

$$Q_{\text{BYPASS}} = 410 \text{ cfs} - 222 \text{ cfs} = 188 \text{ cfs}$$

BYPASS DITCH DESIGN

87-787

$$S = \text{SLOPE} = 0.30\%$$

$$n = \text{COEFFICIENT OF ROUGHNESS} = 0.025$$

$$W_p = 10' + 6.7' + 6.7' = 23.4'$$

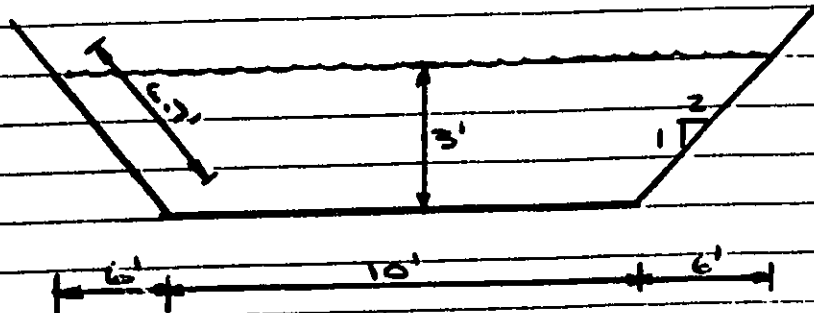
$$A = (2(\frac{1}{2} \times 6) + 10) 3 = 48 \text{ sf}$$

$$R = \text{HYD. RADIUS} = \frac{A}{W_p} = \frac{48}{23.4} = 2.05'$$

$$V = 5.2 \text{ FPS (SEE ATTACHED CHART)}$$

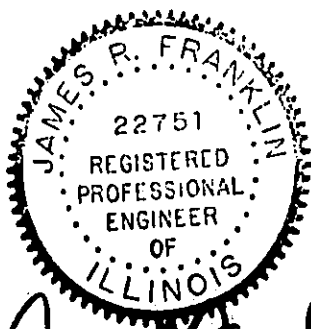
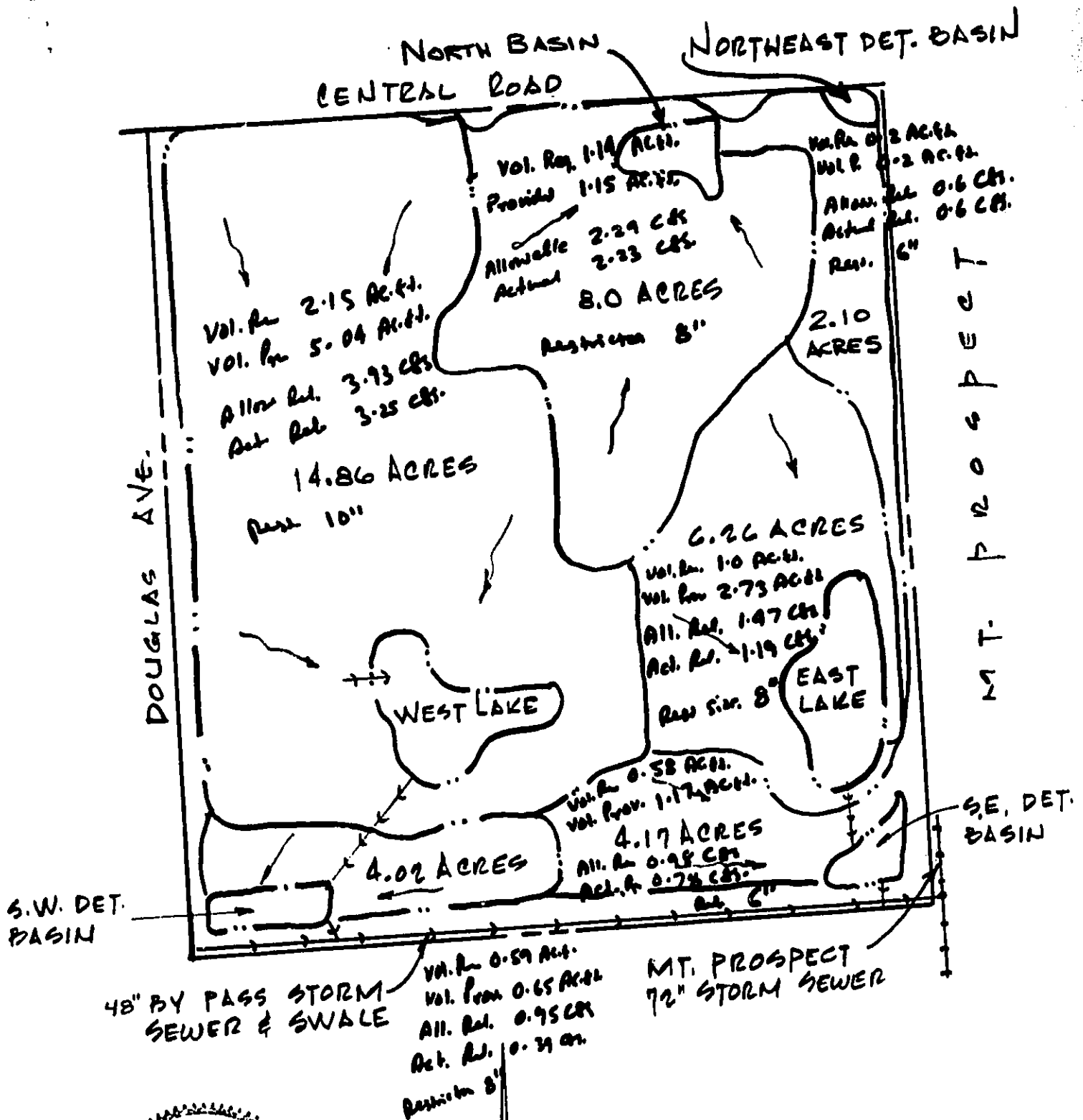
$$\therefore Q = AV = 48 \times 5.2 = 250 \text{ cfs} / > 188 \text{ cfs}$$

= MAX. PROPOSED CAPACITY > REQUIRED 100 YEAR BYPASS



TYPICAL DITCH CROSS-SECTION

DONALD MANHARD & Assoc.
LINCOLN, NE

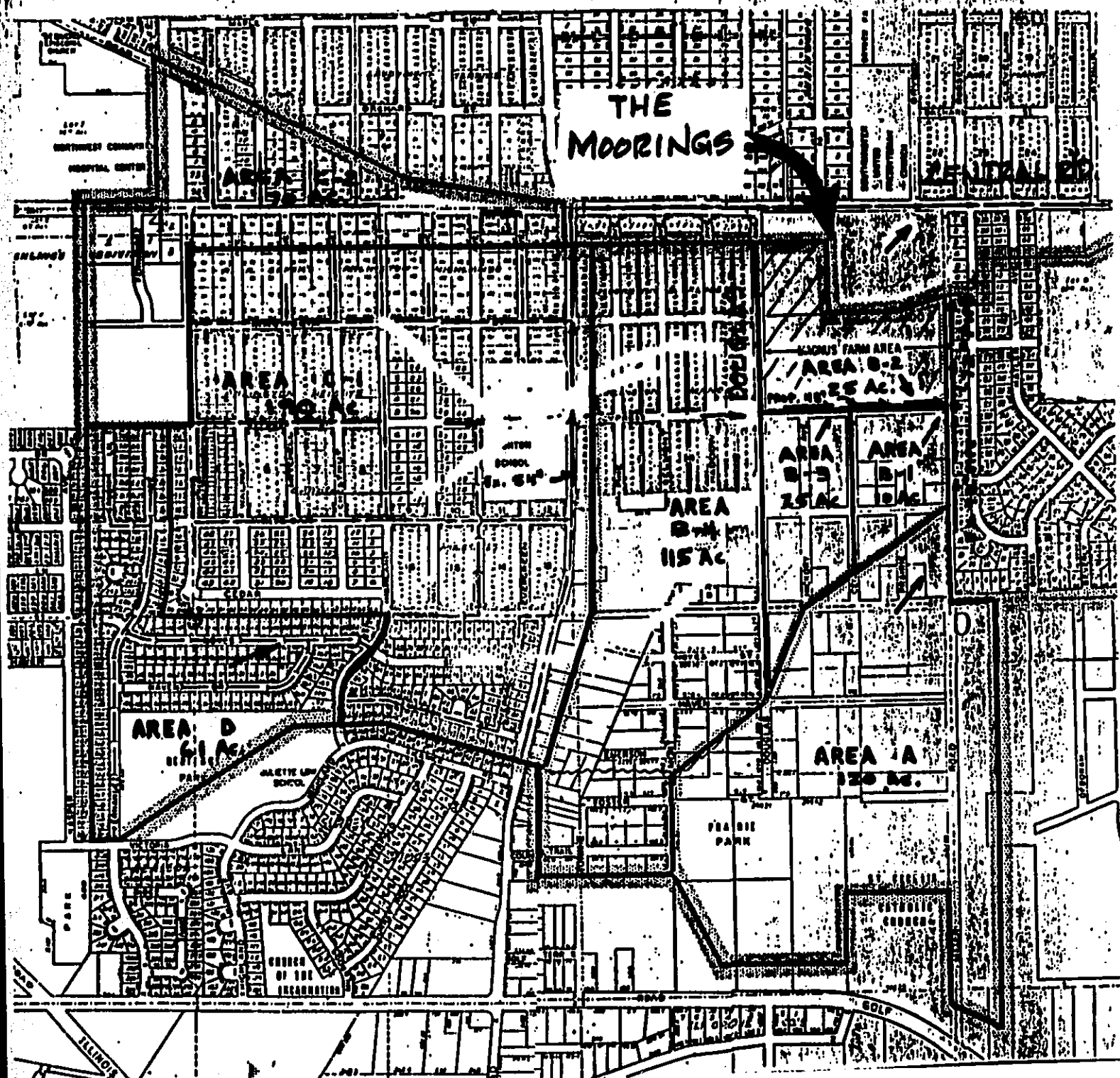


James R. Franklin
10/20/89

87 787

THE MOORINGS OF ARLINGTON HTS.
GENERAL DRAINAGE AREA MAP

REV 2/10/88



87-787

THE MOORINGS OF ARLINGTON HTS.
UPSTREAM DRAINAGE AREAS

87 787

For The Moorings of Arlington Heights
MSD Permit Number 87-787

SEWER LINE AGREEMENT

OFFICE COPY

SECTION
MAR 29 PM 2:32

This Agreement made this 28th day of March, 1988, by and between PARKSIDE DEVELOPMENT CORPORATION d/b/a THE MOORINGS, a Delaware non-profit corporation, with its office and principal place of business at 1775 West Dempster Street, Park Ridge, Illinois 60068 (hereinafter referred to as "PDC") and KIMBALL HILL, an individual with his principal place of business at 900 Des Plaines Avenue, Des Plaines, Illinois 60016 (hereinafter referred to as "Kimball Hill").

WITNESSETH

WHEREAS Kimball Hill owns and maintains the sanitary sewer along Central Road in Arlington Heights, Illinois (hereinafter "Sewer");

WHEREAS PDC is the owner of a certain parcel of property upon which it is developing an older adult retirement facility and health care center located at 801 Central Road, Arlington Heights, Illinois, known as The Moorings (hereinafter referred to as "Facility"); and

WHEREAS PDC is desirous of connecting the Facility to the Sewer if the same is extended southerly toward the Facility.

NOW THEREFORE, the parties hereto, in consideration of the mutual covenants and agreements herein, do hereby agree as follows:

Section 1. Construction of Sewer Line

Subject to the terms and conditions of this Agreement, PDC is granted the perpetual non-exclusive right to construct a sanitary sewer line (the "Project") northerly across its property suitable for the Facility's connection to the Sewer at Central Road.

87-787

Section 2. Payment of the Tap-in Fee

PDC agrees to pay Kimball Hill upon the execution of this Agreement a one-time tap-in fee for the perpetual non-exclusive right to tap-on to and use the Sewer for the entire Facility's sanitary sewage needs.

Section 3. Notice to Governmental Authorities

Upon execution of this Agreement, Kimball Hill will, upon the request of PDC, notify the Metropolitan Sanitary District ("MSD"), the Village of Arlington Heights ("Village") and other appropriate parties of the grant by Kimball Hill to PDC to tap-in to the Sewer in accordance with the terms of this Agreement. PDC shall obtain all required governmental and other permits, licenses, approvals and other consents, and shall comply with all applicable laws, rules and regulations.

Section 4. Title to the Sewer Line

Title to the Sewer is vested in Kimball Hill. Neither PDC, the Village or MSD shall have any claim of ownership in or to the Sewer or the Project.

Section 5 Maintenance of the Sewer Line

Kimball Hill shall keep and maintain, or cause to be kept and maintained, the Sewer and its related systems in good operating condition, repair and working order, ordinary wear and tear excepted, and will provide, at its own expense, all maintenance and service and make all repairs necessary for such purpose.

27-787

Section 6. Indemnification

The parties agree to indemnify and hold each other harmless from any liability claim for personal injuries, deaths, mechanics liens, judgments, lawsuits, claims or other costs, including reasonable attorneys' fees, arising out of or in connection with the intentional or negligent acts of their respective employees and/or agents as a consequence of or resulting from, directly or indirectly, the tap-in or use of the Sewer.

Section 7. Termination for Breach of Contract.

If either party shall violate any of the covenants undertaken herein, or any of the duties imposed upon it by this Agreement, such violation shall entitle the other party to terminate this Agreement, provided that the party desiring to terminate for such cause shall give the offending party at least thirty (30) days written notice, specifying the particulars wherein it is claimed that there has been a violation hereof; and if at the end of such time the party notified has not removed the cause of complaint, or remedied the purported violation, then the termination of this Agreement shall be deemed complete.

Section 8. Specific Performance

The parties hereto each acknowledge and agree that in the event of any breach of this Agreement, the non-breaching party would be irreparably harmed and could not be made whole by monetary damages alone. It is accordingly agreed that such parties, in addition to any other remedy to which they may be entitled at law or in equity, shall

be entitled to compel specific performance of this Agreement in any action instituted in any Court of the United States or any state having subject matter jurisdiction.

Section 9. Amendments

This Agreement may be amended only by a written instrument signed by all parties to this Agreement.

Section 10. Law of the State of Illinois to Govern

This Agreement and the rights and obligations of the parties hereunder shall be governed by, and construed in accordance with, the laws of the State of Illinois.

Section 11. Successors and Assigns

This Agreement shall be binding upon and shall inure to the benefit of the parties hereto and their heirs, successors and assigns. This Agreement may not be assigned by any party without the consent of all the other parties.

Section 12. Interpretation of Agreement

The rule of strict construction does not apply to this grant. This grant shall be given a reasonable construction so that the intention of the parties to confer a commercially useable right of enjoyment to the Sewer is carried out.

Section 13. Notices

All notices and other communications shall be sufficiently given and shall be deemed to be given when hand delivered or mailed by registered or certified mail, postage prepaid, addressed as follows:



A Presentation of Findings
Market Research and Analysis
For Expansion Plans Within
The Moorings of Arlington Heights

April 2014



Prepared by



Tracy Cross & Associates, Inc.
1920 N. Thoreau Drive
Schaumburg, Illinois 60173



Objectives

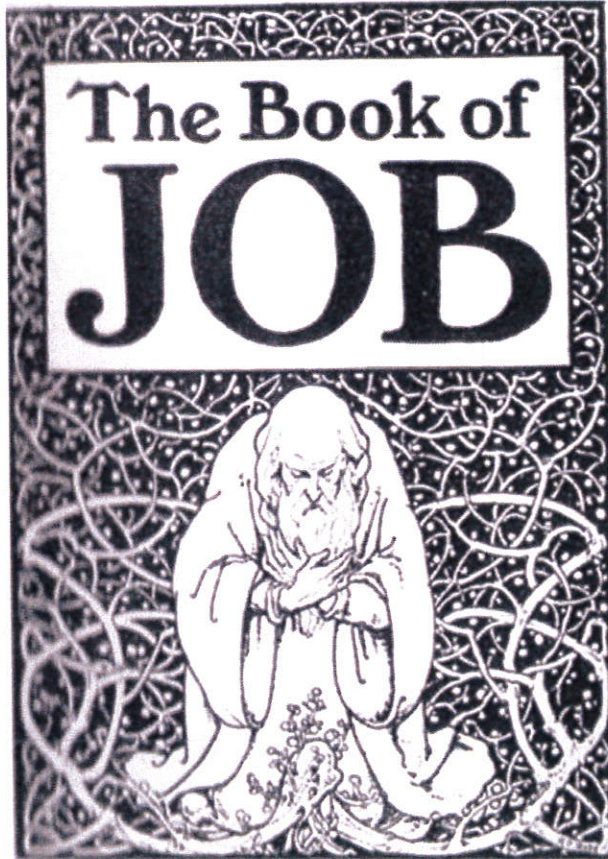


- ❑ Determine depth of market for CCRC development in the Arlington Heights area.
- ❑ Distribute demand estimates over the 2014 and 2019 time periods and extend estimates through 2040.
- ❑ Distribute demand estimates by product type, i.e., independent, assisted, and memory support living forms.
- ❑ Translate findings of market analysis and competitive evaluations into specific product recommendations.
- ❑ Provide entrance fee and service fee suggestions by product type.

Source: Tracy Cross & Associates, Inc.



Background to the Market -- Key Dependencies --

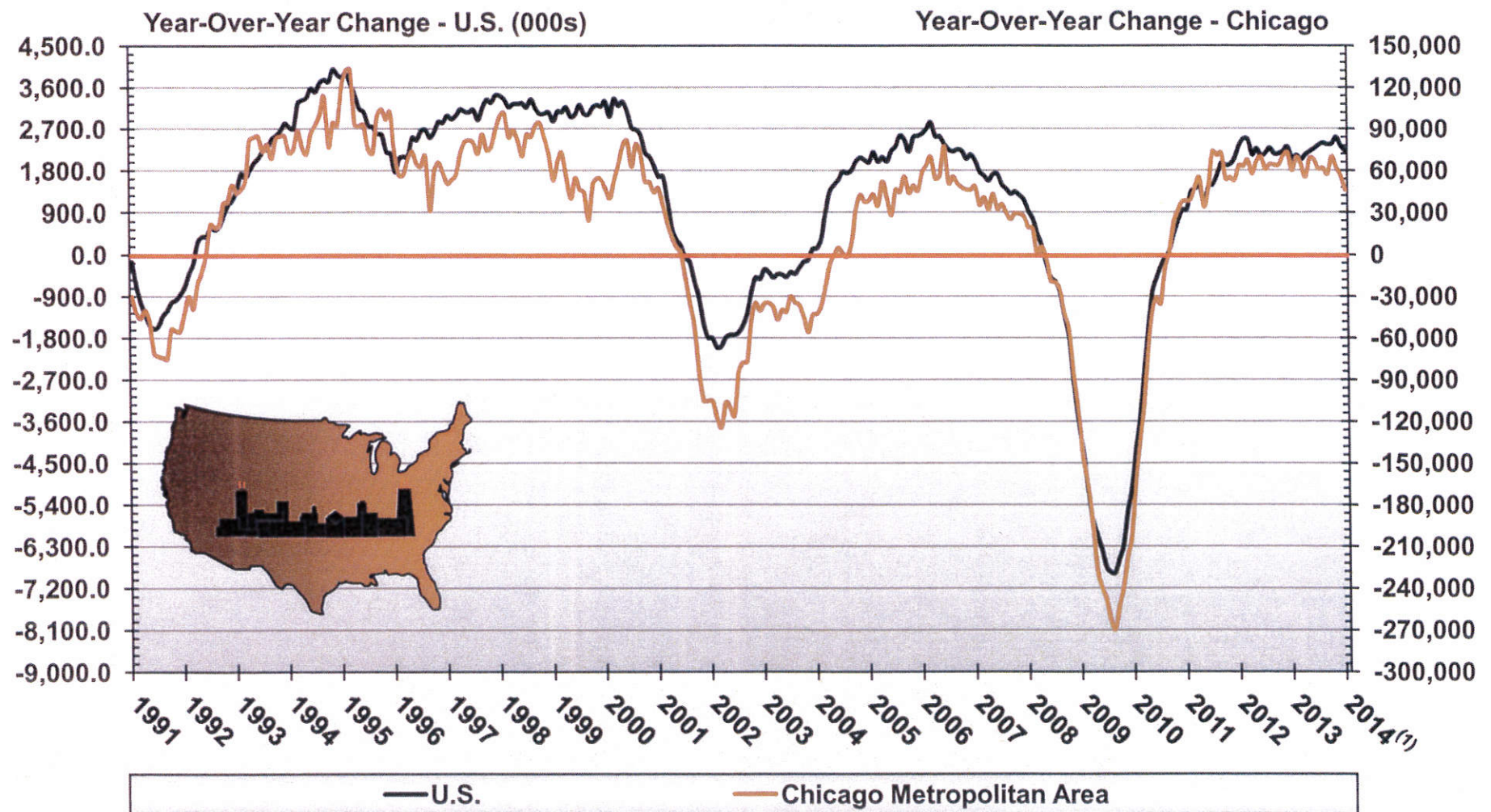


- ☐ Employment growth.
- ☐ Housing growth both volume and price.
- ☐ Population and household growth.
- ☐ Level of competition existing and future.

Source: Tracy Cross & Associates, Inc.



Trends in Nonfarm Employment -- Chicago Metropolitan Area and the U.S. --

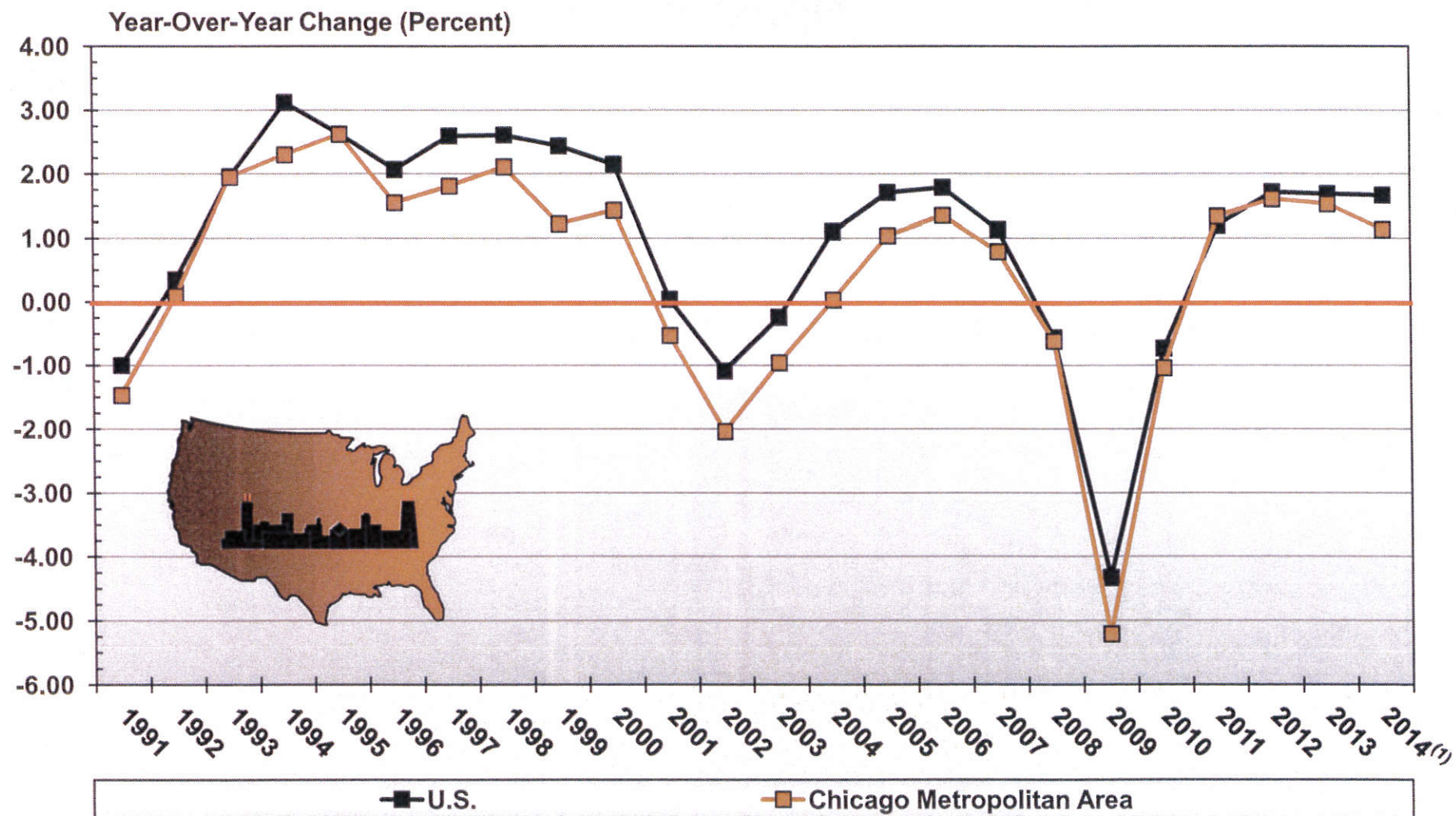


(1) YTD February.

Source: U.S. Department of Labor, Bureau of Labor Statistics



Nonfarm Employment Growth Comparisons -- Chicago Metropolitan Area and the U.S. --



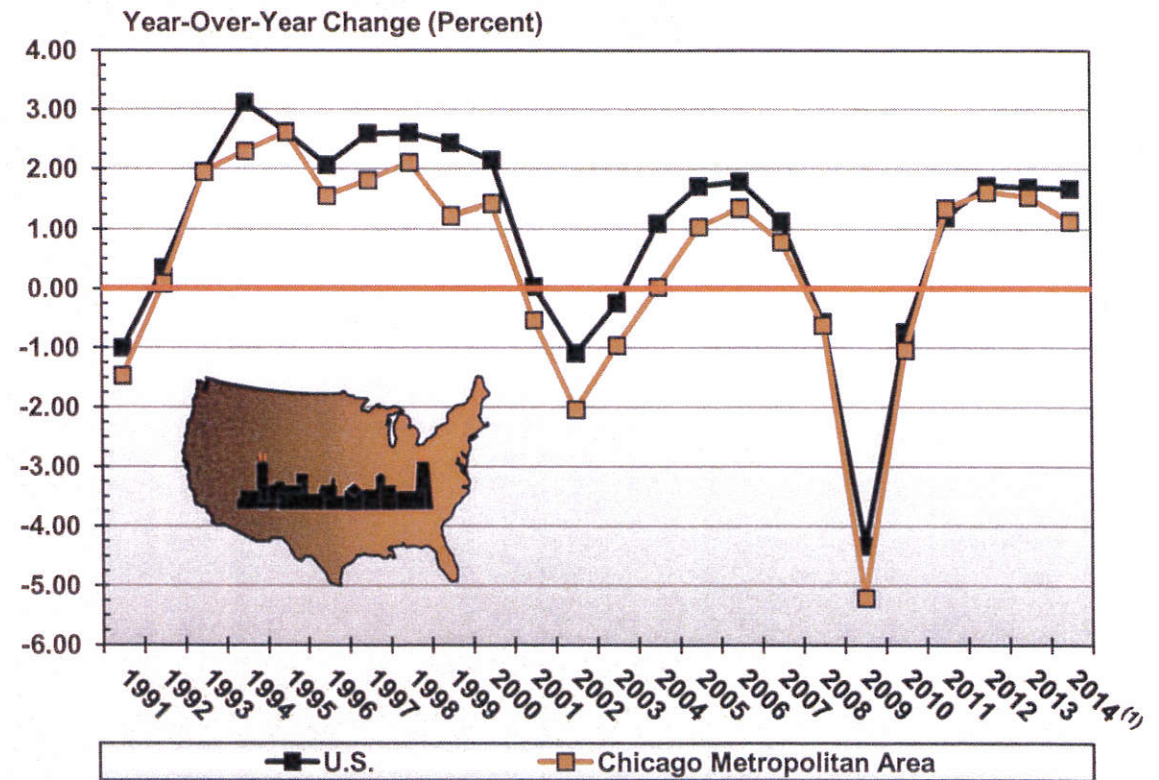
(1) YTD February.

Source: U.S. Department of Labor, Bureau of Labor Statistics



Nonfarm Employment Growth Comparisons -- Chicago Metropolitan Area and the U.S. --

<u>Year</u>	<u>U.S.</u>	<u>Chicago</u>
1991	-1.00	-1.47
1992	0.35	0.09
1993	1.96	1.95
1994	3.12	2.30
1995	2.63	2.62
1996	2.07	1.55
1997	2.60	1.81
1998	2.61	2.11
1999	2.44	1.22
2000	2.15	1.43
2001	0.04	-0.53
2002	-1.09	-2.04
2003	-0.24	-0.96
2004	1.10	0.03
2005	1.71	1.04
2006	1.79	1.35
2007	1.13	0.79
2008	-0.56	-0.62
2009	-4.33	-5.21
2010	-0.73	-1.04
2011	1.20	1.34
2012	1.72	1.61
2013	1.69	1.53
2014 ⁽¹⁾	1.67	1.13



⁽¹⁾ YTD February.

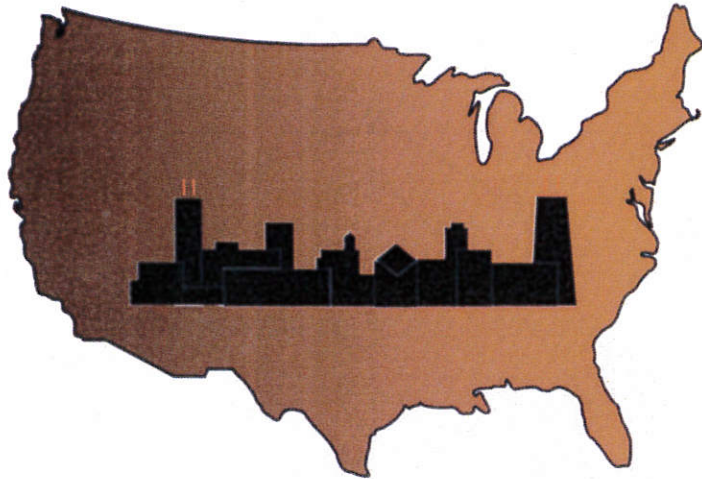
Source: U.S. Department of Labor, Bureau of Labor Statistics

⁽¹⁾ YTD February.

Source: U.S. Department of Labor, Bureau of Labor Statistics



Nonfarm Employment Comparisons -- Chicago Metropolitan Area and the U.S. --

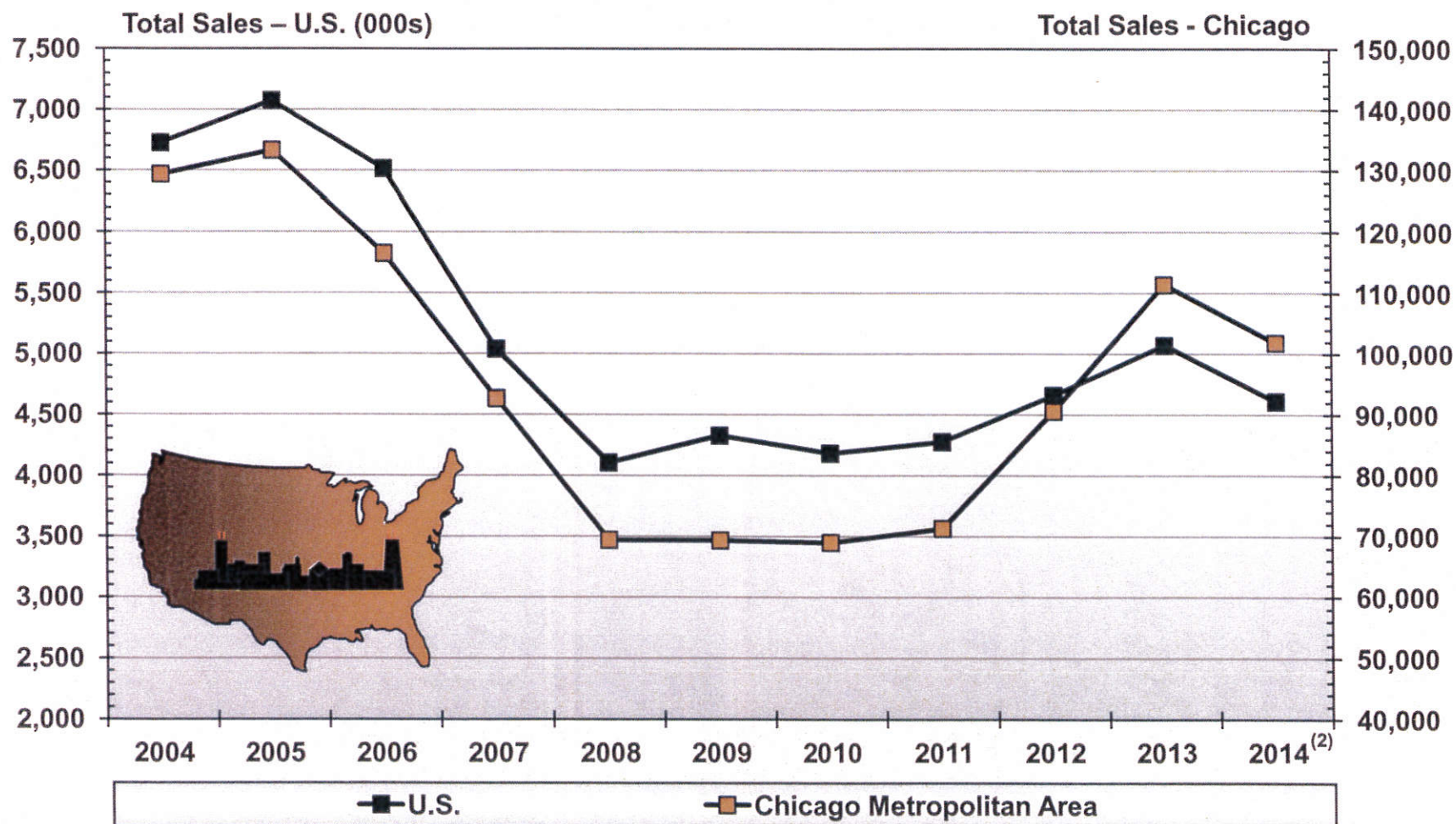


	<u>2000 - 2014</u>	
	<u>U.S.</u>	<u>Chicago</u>
Peak Employment	139,443,000 (Nov. 2007)	4,351,700 (Dec. 2000)
Feb. 2014 Employment	136,194,000	4,102,600
Percent Change from Peak	-2.33	-5.72

Source: U.S. Department of Labor, Bureau of Labor Statistics



Trends In Existing Home Sales: A Comparison -- Chicago Metropolitan Area⁽¹⁾ and the U.S. --



⁽¹⁾ Excludes Kenosha County, Wisconsin.

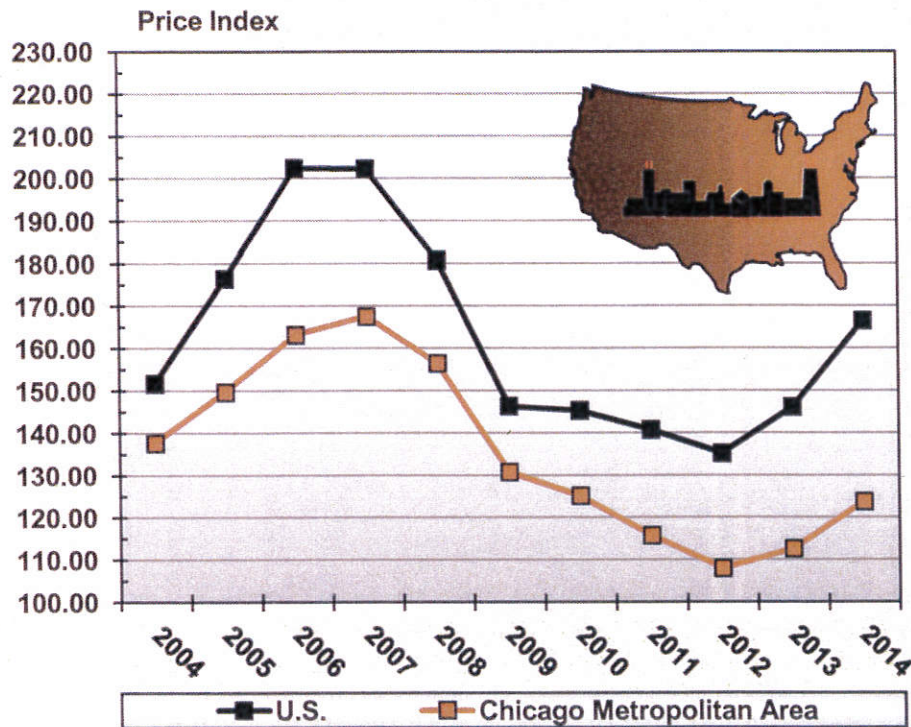
⁽²⁾ Seasonally adjusted, annualized rate YTD February.

Sources: National Association of Realtors, Illinois Association of Realtors, and Tracy Cross & Associates, Inc.

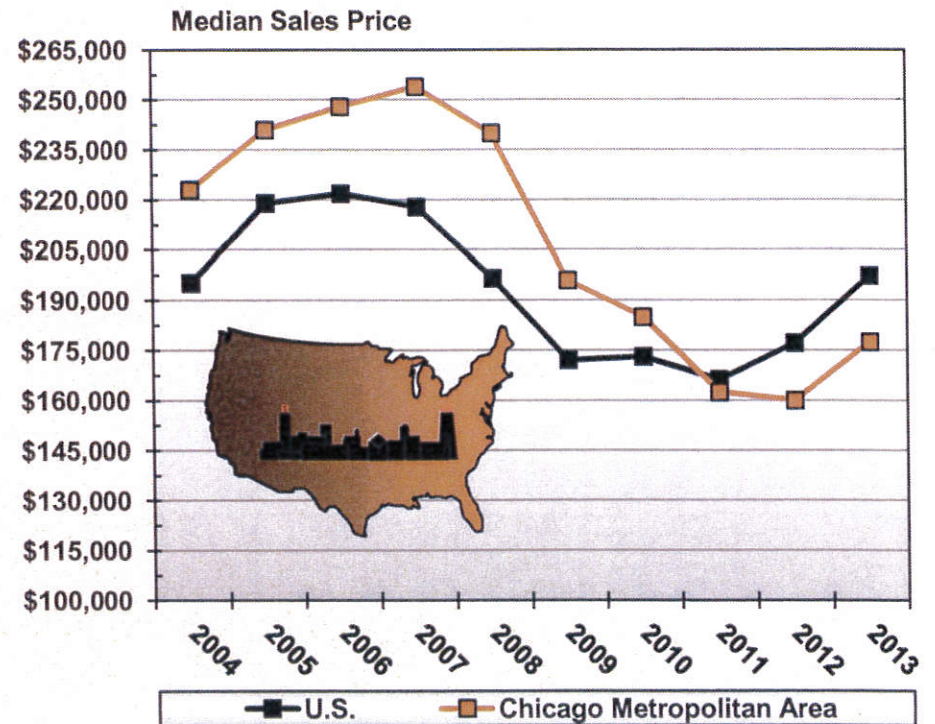


Trends in Existing Home Prices: A Comparison -- Chicago Metropolitan Area and the U.S. --

The Case-Shiller Index
(January 2000 = 100.00)



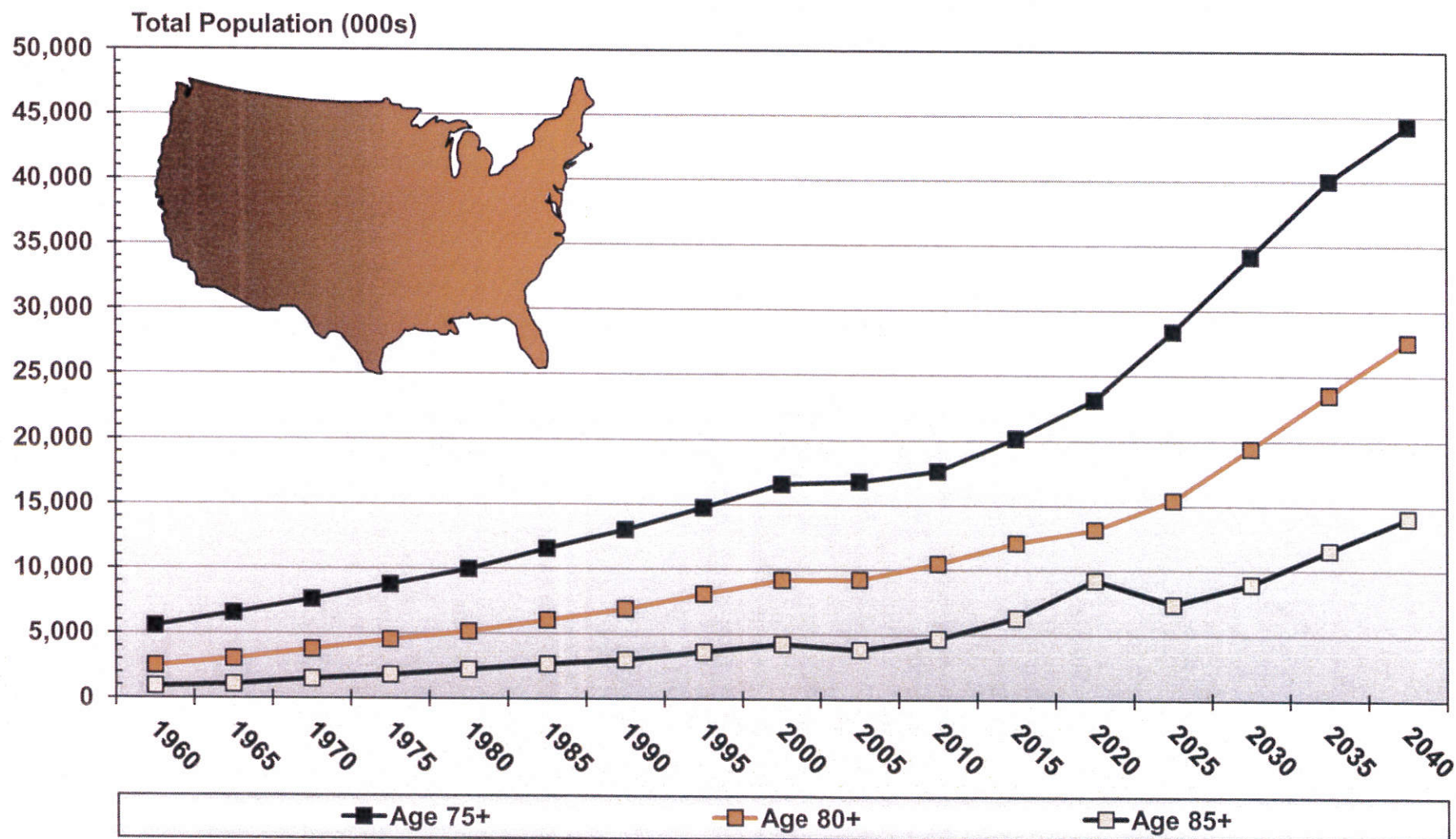
Association of Realtors



Sources: Standard & Poor's Case-Shiller Home Price Index, National Association of Realtors, Illinois Association of Realtors, and Tracy Cross & Associates, Inc.



The Older Population – Age 75+, 80+, and 85+ -- United States --



Source: U.S. Department of Commerce, Bureau of the Census



Occupancy Characteristics

-- Selected Independent Living and Assisted Living/Memory Care Communities --
Northwestern, Northern, And Western Suburbs

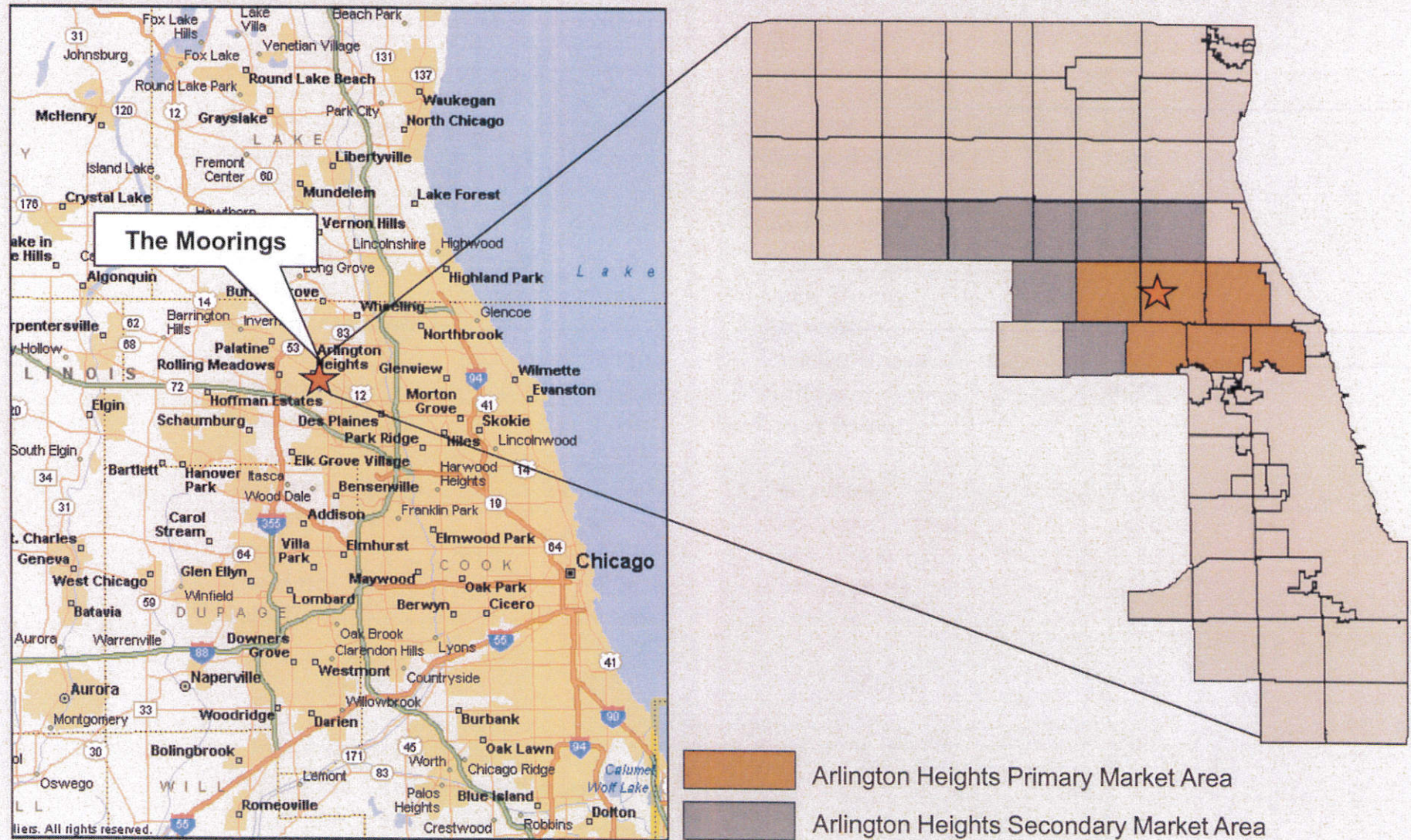


<u>Location</u>	<u>Number of Units</u>	<u>Number Vacant</u>	<u>Percent Vacant</u>
Independent Living			
<i>TOTAL ALL CORRIDORS</i>	<i>9,369</i>	<i>686</i>	<i>7.3</i>
Northwestern	2,478	188	7.6
Northern	4,171	265	6.4
Western	2,720	233	8.6
Assisted Living/Memory Care			
<i>TOTAL ALL CORRIDORS</i>	<i>2,190</i>	<i>121</i>	<i>5.5</i>
Northwestern	581	43	7.4
Northern	1,123	46	4.1
Western	486	32	6.6

Source: Tracy Cross & Associates, Inc.



Delineation of the Arlington Heights Market Area



Source: Microsoft Streets & Trips and Tracy Cross & Associates, Inc.



The Moorings of Arlington Heights -- Resident Point of Origin --

Primary Market Area		Secondary Market Area	
<u>Community</u>	<u>Percent</u>	<u>Community</u>	<u>Percent</u>
Arlington Heights	13.31	Huntley	3.57
Mount Prospect	10.55	Barrington ⁽²⁾	2.92
Park Ridge	6.17	Schaumburg	1.79
Palatine	5.68	Vernon Hills	0.65
Glenview ⁽¹⁾	3.90	Crystal Lake	0.49
Des Plaines	3.25	Lake Zurich	0.49
Rolling Meadows	2.60	Algonquin	0.32
Niles	2.11	Buffalo Grove	0.32
Northbrook	1.46	Kildeer	0.32
Prospect Heights	1.46	Long Grove	0.32
Skokie	1.30	Cary	0.16
Elk Grove Village	1.14	Deer Park	0.16
Morton Grove	0.97	Hoffman Estates	0.16
Inverness	0.65	Lake in the Hills	0.16
Wheeling	0.65	Lincolnshire	0.16
Northfield	0.32		
<i>Total</i>	<i>55.52</i>	<i>Total</i>	<i>11.99</i>

⁽¹⁾ Includes Golf.

⁽²⁾ Includes Barrington Hills and Lake Barrington.

⁽³⁾ Includes Harwood Heights and Norridge.

Source: Presbyterian Homes, Lead Count Analysis



The Moorings of Arlington Heights -- Resident Point of Origin --

All Other Areas			
<u>In State</u>	<u>Percent</u>	<u>Out of State</u>	<u>Percent</u>
Chicago ⁽³⁾	6.01	Florida	3.08
Other Chicago Suburbs	10.89	Arizona	1.79
Libertyville	0.65	California	1.14
Mundelein	0.65	Indiana	1.14
All Other	9.59	Wisconsin	1.14
Other Illinois	2.60	Other Out of State	4.70
<i>Total</i>	<i>19.50</i>	<i>Total</i>	<i>12.99</i>

(1) Includes Golf.

(2) Includes Barrington Hills and Lake Barrington.

(3) Includes Harwood Heights and Norridge.

Source: Presbyterian Homes, Lead Count Analysis



Population and Household Trends: Persons/Householders Age 75+ -- Arlington Heights Market Area --

Attribute/Area	2000	2010	2014	2019	Average Annual Change		
					2000 - 2010	2010 - 2014	2014 - 2019
Population							
Arlington Heights Market Area	64,652	78,207	80,459	85,870	1,355	563	1,082
Arlington Heights Primary Market Area	51,792	58,403	59,308	61,619	661	226	462
Village of Arlington Heights	6,129	6,882	6,876	7,002	75	-2	25
Remainder of Primary Market Area	45,663	51,521	52,432	54,617	586	228	437
Arlington Heights Secondary Market Area	12,860	19,804	21,151	24,251	694	337	620
Households							
Arlington Heights Market Area	39,182	51,133	52,597	55,822	1,195	366	645
Arlington Heights Primary Market Area	32,244	38,793	39,392	40,818	655	150	285
Village of Arlington Heights	3,884	4,748	4,779	4,915	86	8	27
Remainder of Primary Market Area	28,360	34,045	34,613	35,903	569	142	258
Arlington Heights Secondary Market Area	6,938	12,340	13,205	15,004	540	216	360

Sources: U.S. Department of Commerce, Bureau of the Census: *Census 2000* and *Census 2010*; The Nielsen Company: *Demographic Report 2014*; and Tracy Cross & Associates, Inc.



Population Change by Race/Hispanic or Latino: 2010 - 2014

-- Arlington Heights Market Area --

<u>Population</u>	<u>Arlington Heights Market Area</u>			<u>Arlington Heights Primary Market Area</u>			<u>Arlington Heights Secondary Market Area</u>		
	<u>2010</u>	<u>2014</u>	<u>Annual Change</u>	<u>2010</u>	<u>2014</u>	<u>Annual Change</u>	<u>2010</u>	<u>2014</u>	<u>Annual Change</u>
Total Population	1,101,310	1,114,660	3,337	686,285	697,953	2,916	415,025	416,707	421
White	859,650	853,531	-1,530	522,745	521,277	-367	336,905	332,254	-1,163
Black	26,039	26,750	178	16,653	16,942	72	9,386	9,808	106
American Indian & Alaskan Native	2,969	3,248	70	2,050	2,258	52	919	990	18
Asian	140,637	147,743	1,776	94,537	98,846	1,077	46,100	48,897	699
Hawaiian & Pacific Islander	285	332	12	189	214	6	96	118	6
All Other	71,730	83,056	2,831	50,111	58,416	2,076	21,619	24,640	755
Hispanic or Latino	128,471	144,190	3,930	89,879	101,094	2,804	38,592	43,096	1,126
Percent	11.67	12.94	---	13.10	14.48	---	9.30	10.34	---

Sources: U.S. Department of Commerce, Bureau of the Census: *Census 2010*; The Nielsen Company: *Demographic Report 2014*; and Tracy Cross & Associates, Inc.



Household Incomes - Householders Age 75+ -- Arlington Heights Market Area --

Income Range	Arlington Heights Market Area		Arlington Heights Primary Market Area		Village of Arlington Heights		Arlington Heights Secondary Market Area	
	2014	2019	2014	2019	2014	2019	2014	2019
Under \$15,000	8,324	8,336	6,335	6,295	684	667	1,989	2,041
15,000 - 24,999	10,930	10,994	8,362	8,330	1,006	957	2,568	2,664
25,000 - 34,999	8,712	9,008	6,737	6,836	690	708	1,975	2,172
35,000 - 49,999	8,242	8,741	6,150	6,371	719	728	2,092	2,370
50,000 - 74,999	7,474	8,062	5,545	5,811	798	842	1,929	2,251
75,000 - 99,999	3,583	4,120	2,515	2,785	423	452	1,068	1,335
100,000 - 124,999	2,113	2,495	1,498	1,698	202	248	615	797
125,000 - 149,999	1,073	1,333	806	957	89	113	267	376
150,000 - 199,999	1,081	1,296	739	848	86	98	342	448
200,000 and Over	1,065	1,437	705	887	82	102	360	550
Total	52,597	55,822	39,392	40,818	4,779	4,915	13,205	15,004
Median	\$33,086	\$34,529	\$32,544	\$33,460	\$35,197	\$37,586	\$35,524	\$38,996
Householders With Incomes of...								
\$50,000+	16,389	18,743	11,808	12,986	1,680	1,855	4,581	5,757
Percent	31.2	33.6	30.0	31.8	35.2	37.7	34.7	38.4
\$75,000+	8,915	10,681	6,263	7,175	882	1,013	2,652	3,506
Percent	16.9	19.1	15.9	17.6	18.5	20.6	20.1	23.4
\$100,000+	5,332	6,561	3,748	4,390	459	561	1,584	2,171
Percent	10.1	11.8	9.5	10.8	9.6	11.4	12.0	14.5

Source: The Nielsen Company: *Senior Life Report* and Tracy Cross & Associates, Inc.



Source: Tracy Cross & Associates, Inc.



Annual Fair Market Senior Housing Demand -- Arlington Heights Market Area -- 2019



<u>Product Type</u>	<u>Annual Net Absorption</u>		
	<u>Total</u> <u>Arlington Heights</u> <u>Market Area</u>	<u>Arlington Heights</u> <u>Primary</u> <u>Market Area</u>	<u>Arlington Heights</u> <u>Secondary</u> <u>Market Area</u>
	<u>2019</u>	<u>2019</u>	<u>2019</u>
Independent Living	102	79	23
Assisted Living	23	17	6
Memory Care as a Part	9	6	3
	<u>Annual Net Absorption</u> <u>With Added Impact From Tertiary Areas</u> <u>@ 15.0 Percent</u>		
Independent Living	117	91	26
Assisted Living	27	20	7
Memory Care as a Part	11	7	4

Source: Tracy Cross & Associates, Inc.



Annual Fair Market Senior Housing Demand -- Arlington Heights Market Area -- 2019 - 2040



<u>Product Type</u>	<u>Annual Net Absorption</u>					
	<u>Total Arlington Heights Market Area</u>		<u>Arlington Heights Primary Market Area</u>		<u>Arlington Heights Secondary Market Area</u>	
	<u>2019</u>	<u>2040</u>	<u>2019</u>	<u>2040</u>	<u>2019</u>	<u>2040</u>
Independent Living	102	223	79	173	23	50
Assisted Living	23	50	17	37	6	13
Memory Care as a Part	9	20	6	13	3	7

Source: Tracy Cross & Associates, Inc.



Occupancy Characteristics

-- Selected Assisted Living/Memory Care Communities --

Arlington Heights Market Area

<u>Location</u>	<u>Number of Units</u>	<u>Occupied</u>		<u>Vacant</u>	
		<u>Number</u>	<u>Percent</u>	<u>Number</u>	<u>Percent</u>
TOTAL ARLINGTON HEIGHTS MARKET AREA	1,312	1,239	94.4	73	5.6
Arlington Heights Primary Market Area	704	661	93.9	43	6.1
Arlington Heights	183	176	96.2	7	3.8
Prospect Heights	104	86	82.7	18	17.3
Wheeling	61	55	90.2	6	9.8
Des Plaines	40	40	100.0	0	0.0
Glenview	156	150	96.2	6	3.8
Niles	35	31	88.6	4	11.4
Northbrook	75	75	100.0	0	0.0
Park Ridge	50	48	96.0	2	4.0
Arlington Heights Secondary Market Area	608	578	95.1	30	4.9
Hoffman Estates	28	23	82.1	5	17.9
Lake Barrington	42	40	95.2	2	4.7
Schaumburg	163	158	97.0	5	3.1
Buffalo Grove	168	164	97.6	4	2.4
Lincolnshire	38	29	76.3	9	23.7
Vernon Hills	169	164	97.0	5	3.0

Source: Tracy Cross & Associates, Inc.

Assisted Living (frail) and Assisted Living (memory support) The Moorings of Arlington Heights

Background:

The residents of independent living apartments and villas at The Moorings desire updated and modern accommodations within the continuum of care at the assisted living and memory support levels of care. Although occupancy is high, residents have complained about: the size of the current apartments and the distance to the elevator or dining venue.

It was determined that new assisted living and memory support apartments were needed, so Presbyterian Homes and The Moorings of Arlington Heights retained the professional services of Tracy Cross and Associates, a Schaumburg based market research and analysis consultant to determine the potential and associated demand for additional assisted living and memory support units on its campus at 811 East Central Road in Arlington Heights. With increasing internal demand and overall market growth, the findings clearly indicated that the resident population at The Moorings of Arlington Heights would respond to updated and enlarged accommodations for assisted living services and any additional available units would be in very high demand in the external marketplace. The final report was presented to Presbyterian Homes in April 2014 for consideration.

Findings:

The continued maturing of the independent living residents at The Moorings of Arlington Heights has created significant demand for not only assisted living services, but also memory support services in an assisted living environment. The current assisted living building (originally built in the 1950's) is totally inadequate for this aging campus population. The recommendation was to build new, modern assisted living apartments to serve the needs of our older adults.

In addition, the overall demand for all forms of senior's housing in the northwestern suburbs is very high, not only during the initial study period; from 2014-2019, but well beyond when projected through 2040. This project is designed to satisfy the demand of The Moorings contractual residents, but will also respond to the communities request for assisted living and memory support services if available.

[Type text]

Sources:

Tracy Cross and Associates, Inc. 2014
U.S. Department of Commerce, Bureau of the Census

BUILDING DEPARTMENT

1

PETITIONER'S APPLICATION - ARLINGTON HEIGHTS PLAN COMMISSION

08-10-113-002-0000

Petition #: P.C. 15-012
 Petitioner: Nancy Tolan, V.P. Facilities, Planning & Construction
3200 Grant Street
Evanston IL 60201
 Owner: Presbyterian Homes
3200 Grant Street
Evanston IL 60201
 Contact Person: Nancy A.H. Tolan
 Address: 3200 Grant Street
Evanston IL 60201
 Phone #: 1-847-570-3380
 Fax #: 1-847-570-3363
 E-Mail: ntolan@presbyterianhomes.org

P.I.N.# 08-10-113-003-0000, 08-10-113-004-0000
 Location: 811 E. Central Road Arlington Heights, IL.
 Rezoning: Current: Proposed:
 Subdivision: N/A
 # of Lots: Current: Proposed:
 PUD: ✓ For: amendment
 Special Use: N/A For:
 Land Use Variation: N/A For:
 Land Use: I-PUD Current: Senior Living
 Proposed: Senior Living
 Site Gross Area: 41 acres
 # of Units Total: 73 Assisted Liv, 20 Memory Care
 1BR: 2BR: 3BR: 4BR:

(Petitioner: Please do not write below this line.)

DO EXISTING STRUCTURES, IF ANY, MEET MINIMUM REQUIREMENTS OF THE FOLLOWING:

YES NO

- | | | | | |
|----|---------------|---------------|-------------|---------------|
| 1. | <u>✓</u> | <u> </u> | VILLAGE | BUILDING CODE |
| 2. | <u> </u> | <u> </u> | PRESENT | ZONING USE |
| 3. | <u> </u> | <u> </u> | REQUESTED | ZONING USE |
| 4. | <u> </u> | <u> </u> | SUBDIVISION | REQUIRED |
| 5. | <u> </u> | <u> </u> | SIGN | CODE |

6. GENERAL COMMENTS:

Deb Pierce 8-3-15
~~Director~~ PLAN REVIEWER Date

1A

08-10-113-002-0000

P.I.N.# 08-10-113-003-0000, 08-10-113-004-0000

Location: 811 E. Central Road Arlington Heights, IL.

Rezonning: _____ Current: _____ Proposed: _____

Subdivision: N/A

of Lots: _____ Current: _____ Proposed: _____

PUD: ✓ For: amendment

Special Use: N/A For: amendment

Land Use Variation: N/A For:

Land Use: I-PUD Current: Senior Living

Proposed: Senior Living

Site Gross Area: 41 acres

of Units Total: 73 Assisted Liv 20 Memory Care

1BR: 2BR: 3BR: 4BR:

(Petitioner: Please do not write below this line.)

The Moorings

Inspectional Services / Fire Protection Notes:

1. Existing Fire Sprinkler and Fire Alarm systems in all occupied buildings must be kept operative and accessible during all phases of construction.
2. Fire Sprinkler and Fire Alarm drawings required under separate submittals.
3. Barricade fencing required around all open excavations and active construction areas.


Director Date

PUBLIC WORKS DEPARTMENT

2

PETITIONER'S APPLICATION - ARLINGTON HEIGHTS PLAN COMMISSION

08-10-113-002-0000

Petition #: P.C. 15-012
Petitioner: Nancy Tolan, V.P. Facilities, Planning & ConstructionP.I.N.# 08-10-113-003-0000, 08-10-113-004-0000Location: 811 E. Central Road Arlington Heights, IL.3200 Grant StreetRezoning: Current: Proposed: Evanston IL 60201Subdivision: N/AOwner: Presbyterian Homes# of Lots: Current: Proposed: 3200 Grant StreetPUD: ✓ For: amendmentEvanston IL 60201Special Use: N/A For: Contact Person: Nancy A.H. TolanLand Use Variation: N/A For: Address: 3200 Grant StreetLand Use: I-PUD Current: Senior LivingEvanston IL 60201Proposed: Senior LivingPhone #: 1-847-570-3380Site Gross Area: 41 acresFax #: 1-847-570-3363# of Units Total: 73 Assisted Liv, 20 Memory CareE-Mail: ntolan@presbyterianhomes.org1BR: 2BR: 3BR: 4BR: *(Petitioner: Please do not write below this line.)*

	EXISTING IMPROVEMENT	REQUIRED IMPROVEMENT	COMMENTS
1. <u>UTILITIES:</u>			
Water	<u> </u>	<u>✓</u>	<u> </u>
Metering	<u> </u>	<u> </u>	<u> </u>
Backflow	<u> </u>	<u> </u>	<u> </u>
Sanitary Sewer	<u> </u>	<u>✓</u>	<u> </u>
Storm Sewer	<u> </u>	<u>✓</u>	<u> </u>
2. <u>SURFACE:</u>			
Pavement	<u> </u>	<u> </u>	<u> </u>
Curb & Gutter	<u> </u>	<u> </u>	<u> </u>
Sidewalks	<u> </u>	<u> </u>	<u> </u>
Street Lighting	<u> </u>	<u>✓</u>	<u> </u>
3. <u>GENERAL COMMENTS:</u>			

Director

Date

Memorandum

To: Latika Bhide, Planning and Community Development
From: Cris Papierniak, Assistant Director of Public Works 
Date: August 19, 2015
Subject: 811 E Central Rd, P.C. #15-012

With regard to the proposed PUD, I have the following comments:

1. The general description states that all sanitary sewer connections will be routed to the northeast off Central. Civil plans do not show any connections. It would be preferable to route newly generated sanitary sewer towards Douglas.
2. The general description states that hydrants will be added to the system. The civil utility plans do not show the locations.
3. A sewer segment (141 LF of 42" RCP, Pg C4.0) runs through building and does not show in casement.
4. Plans do not indicate detention pond overflow route.
5. All existing sewer that will be connected must have condition verified with an internal video inspection if it is going to be reused.

Thank you for the opportunity to comment on the plans. If you have any questions, please feel free to contact me.

C: file

LF

ENGINEERING DEPARTMENT

3

PETITIONER'S APPLICATION - ARLINGTON HEIGHTS PLAN COMMISSION

08-10-113-002-0000

Petition #: P.C. 15-012 P.I.N.# 08-10-113-003-0000, 08-10-113-004-0000
 Petitioner: Nancy Tolan, V.P. Facilities, Planning & Construction Location: 811 E. Central Road Arlington Heights, IL.
3200 Grant Street Rezoning: _____ Current: _____ Proposed: _____
Evanston IL 60201 Subdivision: N/A
 Owner: Presbyterian Homes # of Lots: _____ Current: _____ Proposed: _____
3200 Grant Street PUD: ✓ For: amendment
Evanston IL 60201 Special Use: N/A For: _____
 Contact Person: Nancy A.H. Tolan Land Use Variation: N/A For: _____
 Address: 3200 Grant Street Land Use: I-PUD Current: Senior Living
Evanston IL 60201 Proposed: Senior Living
 Phone #: 1-847-570-3380 Site Gross Area: 41 acres
 Fax #: 1-847-570-3363 # of Units Total: 73 Assisted Liv., 20 Memory Care
 E-Mail: ntolan@presbyterianhomes.org 1BR: _____ 2BR: _____ 3BR: _____ 4BR: _____

(Petitioner: Please do not write below this line.)

1. PUBLIC IMPROVEMENTS

REQUIRED: _____ YES NO COMMENTS

a. Underground Utilities

Water _____ X _____

Sanitary Sewer _____ X _____

Storm Sewer _____ X _____

b. Surface Improvement

Pavement _____ X _____

Curb & Gutter _____ X _____

Sidewalks _____ X _____

Street Lighting _____ X _____

c. Easements

Utility & Drainage _____ X _____

Access _____ X _____

2. PERMITS REQUIRED OTHER THAN VILLAGE:

a. MWRDGC X

b. IDOT _____

c. ARMY CORP _____

d. IEPA _____

e. CCHD _____

3. R.O.W. DEDICATIONS? _____

4. SITE PLAN ACCEPTABLE? _____

5. PRELIMINARY PLAT ACCEPTABLE? _____

6. TRAFFIC STUDY ACCEPTABLE? _____

7. STORM WATER DETENTION REQUIRED? _____

8. CONTRIBUTION ORDINANCE EXISTING? _____

9. FLOOD PLAIN OR FLOODWAY EXISTING? _____

10. WETLAND EXISTING? _____

YES

NO

COMMENTS

X

SEE ADDITIONAL COMMENTS

N/A

X

X

X

X

X

GENERAL COMMENTS ATTACHED

 PLANS PREPARED BY: ERIKSSON ENGINEERING
 DATE OF PLANS: 06-22-15
 8/5/15
 Director Date

PLAN COMMISSION PC #15-012

The Moorings 811 E. Central PUD Amendment Round 1

11. The petitioner is notified that these comments are being provided to ensure that the project meets the requirements for submittal to the Plan Commission. Approval by the Plan Commission is not an endorsement or approval of these documents to obtain the required building permits, engineering approval, or permits required by other government or permitting agencies for construction. Detailed plan review with associated comments will be provided upon submittal of plans for a building permit. The petitioner shall acknowledge that they accept this understanding.
12. Final engineering plans for all public improvements must be approved prior to the final approval. An Engineers estimate of construction cost for full site improvements is required to complete the calculation for plan review, inspection, and other fees. This estimate should be submitted at least three weeks prior to the final Plan Commission meeting to allow us time to generate the fee letter and for the petitioner to assemble the proper documents.
13. Final engineering plans shall be georeferenced by using State Plane Coordinate System – Illinois East. Below are details about projection:

Projected Coordinate System:	NAD_1983_StatePlane_Illinois_East_FIPS_1201_Feet
Projection:	Transverse_Mercator
False_Easting:	984250.00000000
False_Northing:	0.00000000
Central_Meridian:	-88.33333333
Scale_Factor:	0.99997500
Latitude_Of_Origin:	36.66666667
Linear Unit:	Foot_US
Geographic Coordinate System:	GCS_North_American_1983
Datum:	D_North_American_1983
Prime Meridian:	Greenwich
Angular Unit:	Degree

Volume I – Civil

14. The exhibit showing the turning path of the Fire Department's responding vehicle is acceptable.
15. Consider including bicycle racks in development plan to encourage alternate modes of transportation for employees and patrons.
16. The stormwater detention information provided in the folder only shows calculations for the final condition. There is no information provided that describes the existing condition and how that was derived. Final approval will require a stormwater narrative describing the existing detention system, including any expansions over the years. Include the MWRD-required disturbed area exhibit, etc.
17. Sheet C7.0, Restrictor structure detail: How water tight is the sliding restrictor plate?

18. Plans are acceptable for preliminary approval only.

Volume II – Assisted Living

19. Sheet A002, Ground Floor Plan: When backing out of the first underground parking space, the garage door will need to open.

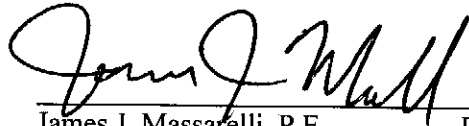
Volume III – Resident Fellowship Hall & Commons: No comments.

Volume IV – Assisted Living Memory Care: No comments.

Traffic Related Items:

20. The use of the Fellowship Hall for Sunday Services may attract relatives of residents wishing to attend services with patrons. Please provide information regarding attendance for this event.
21. Please provide a chart of events that would attract more off site attendance than just residents of the facility, days of the week and time of day that these activities would occur, and how many attendees would be anticipated.
22. Does the guard house keep any records of vehicle arrivals and departures by activity that the passengers may be participating in?
23. Please provide any list or sketch for the parking survey conducted that identified where on the property the cars were parked. Of particular interest is how many employees there are, where they park, and how patterns change with shift changes.
24. How many onsite physicians are employed by the Moorings versus numbers of visiting Physicians, nurses or hospital staff? Where do they park?
25. The traffic report Table 12 has a typo on the first line for number of 2 vehicle summary such that 3 units would contribute 6 total and not the 3 indicated for a total of 96 and not 93.
26. Please provide a parking plan for where future parking assignment will be identified for the new building structures and site development layout, as it is phased in, as well as the ultimate build out.
27. Please provide a parking plan that addresses the following:
 - a.) The reallocation of the 58 parking stalls that are going to be removed initially, and where the parking associated with these going to be relocated to?
 - b.) Identify a parking schedule to manage the requirements for workers to park during each of the building phases so that all construction parking is maintained on site.
28. Under the current ordinance, the property is required to participate in the proportionate cost of a traffic signal at Central Road if and when this traffic control device is warranted. The traffic report warrant analysis indicates that the current traffic data does not support a signal at this time. Although a traffic signal is currently not warranted, the new ordinance should keep intact the current ordinance requirement.

29. For the proposed new parking areas being built, there is possibility to allow front vehicle overhang into the landscaped area. The stall depth could be reduced to 16.5 ft. rather than the 18 ft. shown. This would permit more green space, and reduce pavement area and cost for installation.
30. Please explain what the widened areas adjacent to the fire lane surrounding the detention lake are being used for.
31. All lighting fixtures should be 'Night Sky' compliant. Provide the actual catalog cut sheets for all exterior lighting fixtures either pole mounted in the parking lots, or building mounted so they can be evaluated for glare.

 8/5/15
James J. Massarelli, P.E. Date
Director of Engineering



Arlington Heights Fire Department Plan Review Sheet

P. C. Number 15-012

Project Name The Morrings

Project Location 811 E. Central Rd.

Planning Department Contact Latika Bhide

General Comments

- 1) Building to be fully sprinkled.
- 2) Fire Department Connection (FDC) to be located at the main entrance.
- 3) Fully functional annunciator panel or alarm panel to be located inside the main entrance.
- 4) Fire hydrant located within 100' of the FDC.
- 5) Locate a Knox Box at the main front entrance.
- 6) Investigate providing hydrant access along the new fire lane.

RECEIVED

AUG 5 2015

PLANNING & COMMUNITY
DEVELOPMENT DEPARTMENT

**NOTE: PLAN IS CONCEPTUAL ONLY
SUBJECT TO DETAILED PLAN REVIEW**

Date August 5, 2015 Reviewed By: LT. Andrew Larson

ARLINGTON HEIGHTS POLICE DEPARTMENT

Community Services Bureau

DEPARTMENT PLAN REVIEW SUMMARY

Presbyterian Homes – The Moorings
811 E. Central Rd.
PC 15-012
Round 1

Review Comments

08/11/2015

1. Character of use:

The character of use is consistent with the area and is not a concern.

2. Are lighting requirements adequate?

Lighting should be up to Village of Arlington Heights code.

3. Present traffic problems?

There are no apparent traffic problems at this location.

4. Traffic accidents at particular location?

This is not a problem area in relation to traffic accidents.

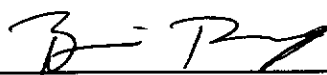
5. Traffic problems that may be created by the development.

This development should not create any additional traffic problems.

6. General comments:

Agent contact information must be provided to the Arlington Heights Police Department during all construction phases. Emergency contact cards can be filled out at the Village of Arlington Heights website (vah.com). This allows police department personnel to contact an agent during emergency situations or for suspicious/criminal activity on the property during all hours.

RECEIVED
AUG 11 2015
PLANNING & COMMUNITY
DEVELOPMENT DEPARTMENT

 #272

Brandi Romag, Crime Prevention Officer
Community Services Bureau

Approved by:



Supervisor's Signature

HEALTH SERVICES DEPARTMENT

6

PETITIONER'S APPLICATION - ARLINGTON HEIGHTS PLAN COMMISSION

08-10-113-002-0000

Petition #: P.C. 15-012
Petitioner: Nancy Tolan, V.P. Facilities, Planning & Construction
3200 Grant Street
Evanston IL 60201
Owner: Presbyterian Homes
3200 Grant Street
Evanston IL 60201
Contact Person: Nancy A.H. Tolan
Address: 3200 Grant Street
Evanston IL 60201
Phone #: 1-847-570-3380
Fax #: 1-847-570-3363
E-Mail: ntolan@presbyterianhomes.org

P.I.N.# 08-10-113-003-0000, 08-10-113-004-0000
Location: 811 E. Central Road Arlington Heights, IL.
Rezoning: Current: Proposed:
Subdivision: N/A
of Lots: Current: Proposed:
PUD: ✓ For: amendment
Special Use: N/A For:
Land Use Variation: N/A For:
Land Use: I-PUD Current: Senior Living
Proposed: Senior Living
Site Gross Area: 41 acres
of Units Total: 73 Assisted Liv. 20 Memory Care
1BR: 2BR: 3BR: 4BR:

(Petitioner: Please do not write below this line.)

1. GENERAL COMMENTS:

Solid waste storage sites must be provided for all new buildings.

Section 19-103(d). Solid waste storage sites for newly constructed or substantially remodeled multi-family residential, commercial or industrial establishments shall meet the following criteria:

1. Container Site:

- Area shall be of a sufficient size to easily accommodate the container;
- The surface shall be paved, curbed and graded to the front to prevent accumulation of liquid;
- Visual screening of the site shall be provided;

2. Access to Container:

- Sufficient space to accommodate the turning requirements of the scavenger truck shall be provided;
- Parking, fences, plantings, etc., shall be located so as to create no obstacles to service vehicles.

See attached memo regarding accessibility comments.

Sean Freres

7/29/15

Environmental Health Officer

Date

RECEIVED

JUL 30 2015

PLANNING & COMMUNITY
DEVELOPMENT DEPARTMENT

Sean Freres

7/29/15

Director

Date

Plan Review

Address: The Moorings
811 E. Central Rd.
Planned Unit Development
P.C. #15-012 Round 1

Submitted to: Latika Bhide, Planning and Community Development

Submitted by: David Robb, Disability Services Coordinator *David Robb*
(847) 368-5793

Date: July 29, 2015

Re: Illinois Accessibility Code (IAC), Effective April 1997
(<https://www.illinois.gov/cdb/business/codes/Pages/IllinoisAccessibilityCode.aspx>)

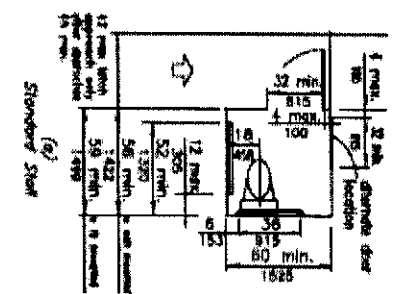
Residential Fellowship Hall & Commons

Sheet A101

1. The Single User Toilet Rooms lack adequate clear floor space maneuvering space for exiting each room per IAC Section 400.310(j)(5) and 400.Illustration B. Figures 25(c) Pull Side.

Sheet A102

2. In the Men's and Women's Toilet Rooms the wheelchair accessible "Standard Stall" door shall open opposite the clear floor space to allow adequate wheelchair maneuvering space within the stall, per IAC Section 400.Illustration B. Figure 30(a).



Assisted Living

Sheet A101

3. In the Men's and Women's Locker Rooms the wheelchair accessible "Standard Stall" door shall open opposite the clear floor space to allow adequate wheelchair maneuvering space within the stall, per IAC Section 400.Illustration B. Figure 30(a).

PLANNING & COMMUNITY DEVELOPMENT DEPARTMENT

7

PETITIONER'S APPLICATION - ARLINGTON HEIGHTS PLAN COMMISSION

08-10-113-002-0000

Petition #: P.C. 15-012
 Petitioner: Nancy Tolan, V.P. Facilities, Planning & Construction
3200 Grant Street
Evanston IL 60201
 Owner: Presbyterian Homes
3200 Grant Street
Evanston IL 60201
 Contact Person: Nancy A.H. Tolan
 Address: 3200 Grant Street
Evanston IL 60201
 Phone #: 1-847-570-3380
 Fax #: 1-847-570-3363
 E-Mail: ntolan@presbyterianhomes.org

P.I.N.# 08-10-113-003-0000, 08-10-113-004-0000
 Location: 811 E. Central Road Arlington Heights, IL.
 Rezoning: Current: Proposed:
 Subdivision: N/A
 # of Lots: Current: Proposed:
 PUD: ✓ For: amendment
 Special Use: N/A For:
 Land Use Variation: N/A For:
 Land Use: I-PUD Current: Senior Living
 Proposed: Senior Living
 Site Gross Area: 41 acres
 # of Units Total: 73 Assisted Liv 20 Memory Care
 1BR: 2BR: 3BR: 4BR:

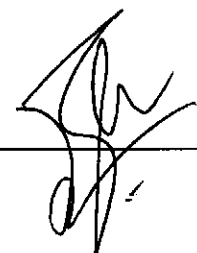
(Petitioner: Please do not write below this line.)

YES NO

1. ✓ COMPLIES WITH COMPREHENSIVE PLAN?
2. W/A COMPLIES WITH THOROUGHFARE PLAN?
3. ✓ VARIATIONS NEEDED FROM ZONING REGULATIONS?
 (See below.)
4. ✓ VARIATIONS NEEDED FROM SUBDIVISION REGULATIONS?
 (See below.)
5. ✓ SUBDIVISION REQUIRED?
6. ✓ SCHOOL/PARK DISTRICT CONTRIBUTIONS REQUIRED?
 (See below.)

Comments:

PLEASE SEE ATTACHED .

 8/6/15 Date

Planning Department Comments (PL15-012, The Moorings, 811 E. Central Road, Round 1)

7. The property at 811 E. Central Road is zoned I, Institutional. A Planned Unit Development Amendment and amendment to Ordinances 85-154, 88-015, 89-041, 91-108, 92-051, 93-051, 02-015 and 06-069 to allow a change in the approved site plan to allow the addition of an assisted living facility, memory care facility, and the addition of a chapel
8. A variation from the required number of parking spaces to allow 538 spaces is required. (Please see #19, #20, #21 below. The Code parking requirement will be higher as collective parking requirement for each of the different uses within the fellowship hall – beauty shop, doctor's office, office, etc. must be calculated, assisted living is calculated at 1 space per unit and the driveway spaces can be counted toward satisfying the parking requirement for the Villas, but cannot be counted towards general parking requirements.)
9. A variation from Section 5.1-8.11 from the requirement that inner courts are permitted for one and two story buildings to allow a 3-story building around the inner court.
10. A variation from Section 5.1-8.14, Minimum Distance from Building Wall to Paved Area, to allow the building wall for the Memory Care Assisted Living to be 2 feet from the sidewalk instead of the required 12 feet.
Please provide a written justification for the zoning variations #8, 9 and 10 above that addresses the following criteria:
 - a. The property in question cannot yield a reasonable return if permitted to be used only under the conditions allowed by the regulations in that zone.
 - b. The plight of the owner is due to unique circumstances.
 - c. The variation, if granted, will not alter the essential character of the locality.
11. Please provide a copy of the market study that was completed for Presbyterian Homes in 2014.

Volume I, Civil

12. On Sheet L-02, the parking row on the west of the Memory Care Assisted Living is deficient 2 landscaping islands. Revise to include islands. Also, please clarify if there is a landscaping island at the south end of the east row of parking.
13. It appears that the opposing walls of inner courts are spaced at least 100 feet apart. Please confirm compliance with Section 5.1-8.11, Spacing between multi-family buildings, including court standards.

Fellowship Hall

14. As was indicated in the narrative, there are occasions when the fellowship hall will be used for memorial services and a maximum of 20 outside vehicles will use the facility. Where will the vehicles park?
15. Also, if Villa residents are using the fellowship hall, where will they park vehicles if they drive to the site?

Assisted Living

16. What is the height of the Assisted Living Facility to the highest point? Per Ordinance 85-154, a variation to permit the construction of buildings up to five stories in height, with an average of 49.5 feet at the highest point was granted. It appears that the assisted living facility is 48' 4" to the midpoint of the roof.
17. What is the square footage of the units? The minimum floor area per Section 5.1-8.9 for one-bedroom units is 650 SF.

Memory Care Assisted Living

18. The minimum floor area requirements (per Section 5.1-8.9) do not apply to memory care assisted living facilities as to be classified as a dwelling, a kitchen must be installed permanently.

Parking and Loading

19. The required parking for Assisted Living is calculated at 1 parking space per unit (not one space per 2 beds). Therefore, 70 spaces are required for the Assisted Living facility.
20. For the fellowship hall, the Code required parking demand is based on the collective parking requirement for each of the different uses within the facility (Chapter 28, Section 11.2-6, Collective Provision). Therefore, the Code required parking for the other uses must be added to the parking requirement for the Fellowship Hall:
- Beauty shop: 1,740 SF requires 1 space for every 250 SF floor area and will require **7** spaces
 Doctors office: (40 x 30) 1,200 SF requires 1 space for every 200 SF floor area and will require **6** spaces
 General Office: (22 x 12) 264 SF requires 1 space for every 200 SF floor area and will require **1** space
 Fitness: (54 x 40 + 28 x 28 + 28 x 20) 3,504 SF requires 1 space for every 250 SF floor area and will require **14** spaces
 Lobby: 1,301 SF requires 1 space for every 300 SF floor area and will require **4** spaces
 Chaplains office: 300 SF requires 1 space for every 300 SF floor area and will require **1** space
 * Please calculate and add any other areas/uses not listed above.
21. The parking available for the driveways for the villas can be counted towards to satisfying the parking requirement for the Villas, but cannot be counted towards general parking requirements.

The revised parking requirement is copied below:

Senior Apartments	212 apartments	1 per unit	212
Senior Villas	81 villas	2 per villa	162
Skilled Care	105 beds	1 per 2 beds	52
Assisted Living	70 beds	1 per unit	70
Memory Care	20 beds	1 per 2 beds	10
Fellowship Hall	486 seats + other uses	1 per 5 spaces + other spaces as above	130 (97+ 7 + 6 + 1 + 14 + 4 + 1)
		Total	636 spaces

Please provide a revised listing of the available parking. As stated above, the driveway parking for the villas can be counted towards satisfying the parking for the villas, but cannot be counted towards satisfying the general parking requirement.

22. Per Section 11.7, Schedule of Loading Requirements, Institutional Uses are required to provide one loading berth (10-ft x 35-ft) for 10,000-200,000 SF GFA. 123,889 SF of GFA is being added. Therefore, one loading berth will be needed. Revise to provide a loading berth.

The Moorings
811 E. Central Road
P.C. #15-012
August 7, 2015

Tree Preservation

- 1) Approximately 164 trees on the site are identified for removal. On the tree inventory on sheet L-01 please include the disposition for each tree. Also, on the plan increase the size of the tree number/tag so that it is legible.
- 2) Are there additional trees that could be preserved? It is recommended that additional trees be preserved adjacent to west lake and near the court yard (Zone B - Fellowship Hall). Please reevaluate the trees proposed for removal. Also, explore options for transplanting some of the trees elsewhere on the site.

Landscape Comments

- 3) The ends of all parking rows must include a 4" caliper shade tree. Provide 4" caliper shade trees at the south end of the parking lot and in the northeast corner at the end of the parking row (Zone A - Al Memory Care).
- 4) All mechanical units must be screened and located away from the front elevation.
- 5) It is recommended that options be evaluated for screening the loading area.
- 6) A landscape compliance bond in the amount of 30% of the landscaping costs will be required and a tree fee of \$200 is required for each tree identified for preservation at time of permit.

MEMO

DATE: August 7, 2015
TO: Latika Bhide, Development Planner
FROM: Steve Hautzinger, Design Planner
RE: The Moorings, PC #15-012
811 E. Central Road
PUD Amendment – Plan Commission Submittal Review

Design Commission review/approval is required for the new Assisted Living, Fellowship Hall, and Memory Care buildings, as well as the corresponding landscape design. Design Commission review is currently scheduled for August 25, 2015 at 6:30pm.

Preliminary Staff design review comments are as follows:

1. General Comments:
 - a. Overall, the proposed designs are very nicely done and will fit in well with the context of the existing Moorings property.
 - b. The overall material/color palette is nicely coordinated, and using the same materials on all three buildings works very well to tie the designs together.
2. Assisted Living building:
 - a. The overall composition is nicely done, but the application of EIFS and horizontal siding looks out of balance. Consider reversing the two materials so that the EIFS is on the top floor of the building and the gables as the accent material, and use the horizontal siding on the body of the building.
3. Fellowship Hall building:
 - a. No comments.
4. Memory Care building:
 - a. Overall, very nicely done, but the main entry is understated and hard to identify. Consider enhancing the design of the entrance with a covered portico.

The Moorings of Arlington Heights

Village of Arlington Heights – Plan Commission Response to Plan Commission Comments

September 10, 2015

The following comments are in response to the Plan Commission Department reviews.

Building Department - 1A

1. We will comply
2. We will submit Fire sprinkler and Fire Alarm drawings will be submitted under separate submittals.
3. We will comply

Engineering Department - 1A

1. No response required.
2. No response required.
3. No response required.
4. No response required.
5. No response required.
6. No response required.
7. No response required.
8. No response required.
9. No response required.
10. No response required.
11. We accept this understanding.
12. We will forward the updated cost estimate at the end of construction documents.

13. Engineering plans are based on the survey performed by Gremley and Beidermann on 5/19/2015. At this time Engineering Plans are georeferenced to the Arlington Heights Vertical Datum only. Final Engineering Plans will be georeferenced to the state plane coordinates as described.
14. No response required.
15. The campus administration will review and consider the implementation of bicycle racks.
16. The stormwater report has been revised for this submittal to include an existing conditions narrative and calculations. A Tributary Area Exhibit has been included in this submittal; an MWRD exhibit shall be included in the Final Report. The Original MWRD Permit No. 87-787 has been included in the stormwater report for reference.
17. The restrictor plate detail has been revised to show a concrete baffle wall. See sheet C7.0.
18. No response required.
19. The garage plan has been revised. See attached Assisted Living drawing A102.
20. The traffic and parking study (4 - Parking) outlines the occurrences when resident relatives attend memorial services. It is extremely rare for a family member to attend a regular Sunday service at the facility with a resident. There are no records for this type of attendance because it doesn't occur. More often the resident will go off campus with family members to attend the church the family attends.
21. There are no consistent additional events that attract more off site attendance than as outlined in the traffic and parking study. The parking on site is for residents and staff. Only on a very rare occasion, like a neighborhood meeting, would there be an event on campus.
22. There are no events so the guard house does not keep records.
23. From the traffic study, Table 10 lists the existing parking inventory and Table 13 the overall parking demand.

Table 10
Moorings Existing Parking Inventory

Unit Type	Units	Location	Regular	Accessible	Total	Code Requirement	Diff.
Senior Apartments	212	Underground Garage Spaces	79		79		
		By Guard House	4		4		
		Surface Spaces South of Building	41	3	44		
		Surface Spaces by Entrance	70	3	73		
		subtotal	194	6	200	212	-12
Senior Villas	81	54 - One Car Garages	54		54		
		27 - Two Car Garages	54		54		
		Driveway Spaces	108		108		
		Off-Street Parking	12		12		
		subtotal	228		228	162	+66
Skilled Care Asstd. Living Memory Care	150	East of Building	18	1	19		
		Along Old Barn Road	31	2	33		
		West of Building	36	2	38		
		subtotal	85	5	90	75	+15
Totals	443		507	11	518	449	+69

Table 13
Existing Parking Survey

Unit Type	Spaces Available	Surveyed		Adjusted for Full Occupancy	
		Vehicles	%	Vehicles	%
Senior Apartments	200	161	71%	176	88%
Senior Villas	228	68	30%	74	33%
Skilled and Sheltered Care	90	66	73%	90	100%
Total	518	295	57%	340	67%

The location of the parked vehicles is provided below.

Moorings Existing Parking Counts

Unit Type	Units	Location	Total Spaces	Spaces Occupied
Senior Apartments	212	Underground Garage Spaces	79	75
		By Guard House	4	2
		Surface Spaces South of Building	44	25
		Surface Spaces by Entrance	73	59
		subtotal	200	161
Senior Villas	81	54 - One Car Garages	54	58
		27 - Two Car Garages	54	
		Driveway Spaces	108	
		Off-Street Parking	12	10
		subtotal	228	68
Skilled Care Asstd. Living Memory Care	150	East of Building	19	12
		Along Old Barn Road	33	21
		West of Building	38	33
		subtotal	90	66
Totals	443		518	295

24. There are 1-2 staff positions for physicians. This staff is included in the count indicated in the parking and traffic study. There are no offsite physicians. The Moorings provide transportation for residents to make off site visits.
25. Table 12 will be corrected as noted.

Table 12
Moorings Resident's Auto Ownership

Unit Type	Occupied Units ⁽¹⁾	Number of Units with			Total Vehicles	Average Vehicles per Unit
		0 veh.	1 veh.	2 veh.		
Senior Apartments	190	97	90	3	96	.51
Senior Villas	73	13	52	8	68	.93
Totals	263	110	142	11	164	.62

(1) March 2015 Data

26. The Moorings of Arlington Heights will maintain its existing general policy on parking assignments. The policy is that the staff parks furthest away from the entry points of the buildings. The residents are to park closest to the entry points of the building.

27. a.) Twenty of the 58 parking spaces will be lost when the 8 villas are demolished to make way for the assisted living building and do not need to be replaced. The 38 spaces in the west parking lot will not be removed until after the construction of the assisted living building when the underground parking will be available (23 spaces).

b.) The Moorings has completed a number of construction projects at the campus and has managed the parking of construction vehicles and workers so it does not impact the campus and the adjacent neighborhood. A detailed plan will be developed as construction plans and phasing are developed.
28. So noted and agreed.
29. The owner would prefer the use larger stall size for their residents. The larger parking stalls provides for easier maneuvering of vehicles for the senior population.
30. Per discussions and with Mike Pagones and Andrew Larson, the widened areas are provided at strategic areas around the detention pond. The widened areas will allow a fire truck to deploy outriggers and provide a lane for other emergency vehicles to pass.
31. All light fixtures are "Night Sky" compliant. See attached revised site lighting drawing and catalog cut information.

Fire Department

1. The buildings are fully sprinkled.
2. Acknowledged, the plans will show FDC's at the Assisted Living and Memory Care Main Entrances.
3. Agreed.
4. A fire hydrant will be located within 100' of the FDC's. See revised plan C4.0.
5. Agreed.
6. In addition to the two existing hydrants, a hydrant has been added in front of the Fellowship Hall so that all building faces are located within 150 feet of a hydrant. See revised plans C4.0

Heath Services Department

General Comments

1. There is a solid waste soil container (compactor) included in the dock area. We've included an updated drawing noting this location. See Assisted Living drawing A102
 - a.) The area accommodates the compactor selected by the owner.
 - b.) The location of the container is in the dock area. The surface is concrete. The area slopes to a linear drain.
 - c.) The dock area is fully enclosed by walls and an overhead door.
2.
 - a.) There is sufficient space for a truck to access this area.
 - b.) This container is in the dock area. Sufficient clearance is provided for access vehicles.

Disability Services

1. The plans have been modified to to provide required clearance. See attached Resident Fellowship Hall drawing A101.
2. The stalls have been modified to provide required clearances. See attached Resident Fellowship Hall drawing A102.
3. The stalls have been modified to provide required clearances. See attached Assisted Living drawing A101.

Planning & Community Development

1. No response required.
2. No response required.
3. No response required.
4. No response required.
5. No response required.
6. No response required.
7. This comment is informational. We would like to clarify that we are using the term "Resident Fellowship Hall" instead of "Chapel".

8. See attached list of variation requests.
9. See attached list of variation requests.
10. See attached list of variation requests.
11. A copy of the market study is attached.
12. Sheet L-02 has been revised to incorporate landscaping islands that meet the standards set forth in the "Requirements for Landscape Approval" document supplied by the Village Planning Department. There is a landscaping island at the south end of the east row of parking. This island is shown on Sheet L-04.
13. Acknowledged, Sheet C2.0 has been updated to show the 100 foot dimension in the courtyard.
- 14./15. The vehicles for memorial services and from the villas will park in the Independent Living parking lot. This is located at the main entrance to the Independent Living and Commons building. There are 20 people net expected which translates to 12 cars.
16. The height of the building is 48'-4" as per the zoning regulations definitions. Reference 3.2-28 **Building Height**. The vertical distance measured from the sidewalk level or its equivalent established grade opposite the middle of the front of the building to the highest point of the roof in the case of a flat roof; to the deck line of a mansard roof; and to the mean height level between eaves and the ridge of a gable, hip or gambrel roof; provided that where buildings are set back from the street line, the building height may be measured from the average elevation of the finished lot grade at the front of the building.
17. See attached list of variation requests.
18. We agree with the assessment. The memory care units do not have a minimum S.F. requirement because they do not have a kitchen.
19. The Village of Arlington Heights Zoning Code does not list a parking requirement for assisted living units. The parking demand ratio of 1 space per 2 beds for nursing care was used based on the parking ratios consistent with the Institute of Transportation Engineers Parking Generation, 4th Edition parking data of 0.41 parking spaces per assisted living unit. However, the zoning calculations will be revised with one parking space per unit.
20. The additional uses listed within the Fellowship Hall are currently provided at The Moorings development and should be considered ancillary uses of the existing congregate care retirement community. These areas are replacement space and would not generate additional traffic or parking beyond what they currently generate.

21. Please see a revised Table 9 from the traffic study. Note that the number of villas was reduced by the eight units that will be demolished to make way for the assisted living building. The assisted living ratio was updated per Comment 19. The senior apartments increased to 212. The ancillary spaces within the Fellowship Hall were not included per response to Comment 20.

Table 9
Zoning Code and ITE Requirements for
The Moorings with Phase 1

Unit Type	Units	Zoning Code Requirement	Total	ITE Parking Demand	Total
Senior Apartments	212	One Space per Unit	212.0	0.59 spaces per unit	125.0
Senior Villas	73	Two Spaces per Unit	146.0	0.59 spaces per unit	43.1
Skilled Care	105	One Space per Two Beds	52.5	0.35 spaces per bed	36.8
Assisted Living	70	One Space per Unit	70.0	0.41 spaces per unit	28.7
Assisted Living: Memory Care	20	One Space per Two Beds	10.0	0.41 spaces per bed	8.2
Fellowship Hall	486 ⁽¹⁾ seats	One Space for each 5 Seats	97.2	0.20 spaces per seat ⁽²⁾	97.2
	480		587.7 (480.5)⁽³⁾		339.2 (241.8)⁽³⁾

(1) Approximately 3,400 sq. ft. at 7 sq. ft. per person = 486 seats

(2) Peak demand on a Sunday

(3) Requirement without Fellowship Hall

The proposed parking supply for the overall campus is 536 spaces (see table below) which is 42 spaces less than the overall zoning requirement of 578 spaces with the Fellowship Hall. However, the senior villa parking supply of 208 spaces (146 spaces required) is not available to the other users of the campus. The senior apartments, fellowship hall, and sheltered care/assisted living units share their overall parking supply. Removing the senior parking supply and zoning requirements, the remaining uses on the campus require 432 spaces and provide 328 spaces which **requires a parking variation of 104 parking spaces. The majority of the variation is due to the fellowship parking requirements (97 spaces) which serves the existing residents and will generate no additional parking demand.**

Proposed Parking Inventory

Unit Type	Units	Location	Regular	Accessible	Total
Senior Apartments	212	Underground Garage Spaces	79		79
		By Guard House	4		4
		Surface Spaces South of Building	41	3	44
		Surface Spaces by Entrance	70	3	73
		subtotal	194	6	200
Senior Villas	73	48 - One Car Garages	48		48
		25 - Two Car Garages	50		50
		Driveway Spaces	98		98
		Off-Street Parking	12		12
		subtotal	208		208
Skilled and Sheltered Care	195	East of Building	18	1	19
		West of the Building	38	2	40
		Along Old Barn Road	44	2	46
		Under the Building	23		23
		subtotal	123	5	128
Totals	480		525	11	536

22. The loading berth is provided in the Assisted Living building. See attached Assisted Living drawing A102.

TREE PRESERVATION

- Sheet L-01 has been updated to reflect requested changes.
- While most of the trees planned for removal fall within new building/paving/wall or retention pond areas, some additional trees outside of these areas may require removal due to proposed site grading. Opportunities for preservation of additional trees will be further evaluated as civil engineering and grading plans are refined through the design development and construction documentation process. Identification of potential transplants will also be explored during subsequent refinements to landscape plans.

LANDSCAPE COMMENTS

- Additional trees have been added to the landscape plan at the south end and east end of the parking areas shown on Sheets L-02 & L-04.
- Landscape screening has been identified on Sheet L-04 and mechanical units have been located away from the front elevation.

5. Landscape screening of the loading area has been identified on Sheet L-04.
6. All required fees and bonds will be provided at time of permit.

DESIGN PLANNER

1.
 - a. No response required.
 - b. No response required.
2.
 - a. We reviewed this issue with the Design Commission. We agreed to the following:
 - A requirement that the west elevation of the memory care building be enhanced with siding material in lieu of EIFS at the 2 bay projections underneath the gabled roofs.
 - A recommendation that the petitioner study the exterior color scheme to determine if a more contrasting hardi-board color is necessary
 - A recommendation to add detailing to break up the 2-story blank EIFS wall adjacent to the service/loading area.
3.
 - a. No response required.
4.
 - a. There has been a conscious revision in the program since our initial Design Commission meeting. The owner wants the entrance for Assisted Living to also be the entrance for Memory Care. The Assisted Living entrance reception desk will be occupied more than the Memory Care entrance. The Memory Care still has a front door but we are downplaying it so it doesn't compete with Assisted Living entry.

Police Department

1. No response required.
2. The lighting requirements meet the Village of Arlington Heights code.
3. No response required.
4. No response required.
5. No response required.
6. Agent contact information will be provided when the project reaches the construction phase.

Public Works Department

1. At this time the only planned connections will be service connections to the existing sanitary main installed in Moorings Drive. New sanitary mains are not planned at this time.
2. The plans have been revised to show a new hydrant within 100' of the Assisted Living Entrance in anticipation of a new FDC. In addition, a hydrant has been added on the north side of the new fire lane around West Lake. See C4.0
3. The plans have been revised to show all proposed sewer segments running beneath buildings to be encased. See C4.0
4. The overflow route from West Lake will be designed for two locations. The first will be over the baffle wall of the restrictor manhole and the second is an overland route that will pass over a grassed weir to the south of West Lake and flow thru the Southwest Basin.
5. Acknowledged, a note has been added to sheet C4.0 stating that existing sewer to remain must be televised prior to new sewer connection.

End of Response

The Moorings of Arlington Heights

Village of Arlington Heights – Plan Commission

Variance Requests

September 10, 2015

Variation Observation

Variation #1 and #3 are in part or in whole being required because the Village of Arlington Heights interprets that Assisted Living units are dwelling units. We do not agree that the intent of a licensed care Assisted Living building or its units meets the intent of a dwelling or dwelling unit. Assisted Living buildings do not meet the definition of a ‘dwelling’ because it is not residential occupancy, it is licensed care. An Assisted Living unit does not have a permanent cooking facility to meet the definition of a “Dwelling Unit”.

We are submitting the following variation requests as instructed by the Village of Arlington Heights.

1. Variation #1 – Parking

The proposed parking supply for the overall campus is 536 spaces (see Proposed Parking Inventory table below) which is 52 spaces less than the overall zoning requirement of 588 spaces with the Fellowship Hall (See Table 9). However, the senior villa parking supply of 208 spaces (146 spaces required) is not available to the other users of the campus. The senior apartments, fellowship hall, and sheltered care/assisted living units share their overall parking supply. Removing the senior villa parking supply and zoning requirements, the remaining uses on the campus require 442 spaces and provide 328 spaces which requires a parking variation of 114 parking spaces. The majority of the variation is due to the fellowship parking requirements (97 spaces) which serves the existing residents and will generate no additional parking demand. Additionally including A.L. units as dwelling units increased the parking count an additional 35 spaces.

We believe a parking variation for the Resident Fellowship Hall and Assisted Living units is warranted based on our planned and historical use of these spaces as noted in our discussion below.

Planned Resident Fellowship Hall Parking Demand

The Village of Arlington Heights parking requirement calculations assume that the proposed Resident Fellowship Hall is similar and consistent in all respects with a traditional chapel or religious facility land use. The current and planned Resident Fellowship Hall uniquely provides some of the same functions, however, it is intended solely for the use of on-site Moorings residents for various activities and programs which will not generate any significant traffic or parking need from off-campus visitors. Like many of the support facilities at this senior living community, it is designed to be connected and walkable (accessible) for the residents via an interconnected, internal pedestrian circulation system.

The hall will, on occasion, be used for memorial services. The Mooring's religious services team reports that most attendees of memorial services uniquely are from within the campus. In addition to on-site residents, memorial services typically draw 10-25 outside guests with a maximum of 20 vehicles. On very rare occasions (once every year or two) we may see a few more visitors. The Moorings has an internal parking management team that oversees and manages parking during these types of events and does not believe that there is, or will be, a lack of available parking for these types of events.

In conclusion, our calculation of the number of seats shown for the proposed Resident Fellowship Hall (486 seats) is based on the building code capacity (1 seat per seven square feet of floor space) and does not accurately reflect the proposed usage of the space and reasonable use of the project will be diminished if developed under the stated guidelines.

Additionally, the Moorings of Arlington Heights has provided resident vehicle ownership data for the apartments and villas on the existing campus which is currently 0.61 vehicles per unit. Residents in the skilled care and assisted living/memory care are not able to drive. Forty-three percent of the residential units do not have a vehicle. A parking survey of the campus was also completed to better understand and anticipate demand. Based on the analysis, a total *cumulative site* parking demand of 352 vehicles is projected for the proposed additional development. This amount is well *below* both the 588 spaces *cumulative ordinance* required, and the 536 spaces proposed *within our current plan*. These conclusions and data support our belief that a parking variation for our Resident Fellowship Hall use is warranted and will not alter the essential character of the locality for the parking of the vehicles solely contained within the perimeter of the Moorings.

Included with this discussion is the issue that Assisted Living residents rarely are capable of driving. The assignment of one parking space per Assisted Living unit is not representative of the resident's capabilities and not representative of the actual Assisted Living parking requirements.

Please see a revised Table 9 from the traffic study. Note that the number of villas was reduced by the eight units that will be demolished to make way for the assisted living building. The assisted living ratio was updated per Engineering Comment 19. The senior apartments increased to 212. The ancillary spaces within the Fellowship Hall were not included per response to Comment 20. Comments 19 and 20 are copied here for ease of reference:

19. *The Village of Arlington Heights Zoning Code does not list a parking requirement for assisted living units. The parking demand ratio of 1 space per 2 beds for nursing care was used based on the parking ratios consistent with the Institute of Transportation Engineers Parking Generation, 4th Edition parking data of 0.41 parking spaces per assisted living unit. However, the zoning calculations will be revised with one parking space per unit.*

20. *The additional uses listed within the Fellowship Hall are currently provided at The Moorings development and should be considered ancillary uses of the existing congregate care retirement community. These areas are replacement space and would not generate additional traffic or parking beyond what they currently generate.*

Table 9
Zoning Code and ITE Requirements for
The Moorings with Phase 1

Unit Type	Units	Zoning Code Requirement	Total	ITE Parking Demand	Total
Senior Apartments	212	One Space per Unit	212.0	0.59 spaces per unit	125.0
Senior Villas	73	Two Spaces per Unit	146.0	0.59 spaces per unit	43.1
Skilled Care	105	One Space per Two Beds	52.5	0.35 spaces per bed	36.8
Assisted Living	70	One Space per Unit	70.0	0.41 spaces per unit	28.7
Assisted Living: Memory Care	20	One Space per Two Beds	10.0	0.41 spaces per bed	8.2
Fellowship Hall	486 ⁽¹⁾ seats	One Space for each 5 Seats	97.2	0.20 spaces per seat ⁽²⁾	97.2
	480		587.7 (480.5)⁽³⁾		339.0 (241.8)⁽³⁾

(1) Approximately 3,400 sq. ft. at 7 sq. ft. per person = 486 seats

(2) Peak demand on a Sunday

(3) Requirement without Fellowship Hall

Proposed Parking Inventory

Unit Type	Units	Location	Regular	Accessible	Total
Senior Apartments	212	Underground Garage Spaces	79		79
		By Guard House	4		4
		Surface Spaces South of Building	41	3	44
		Surface Spaces by Entrance	70	3	73
		subtotal	194	6	200
Senior Villas	73	48 - One Car Garages	48		48
		25 - Two Car Garages	50		50
		Driveway Spaces	98		98
		Off-Street Parking	12		12
		subtotal	208		208
Skilled and Sheltered Care	195	East of Building	18	1	19
		West of the Building	38	2	40
		Along Old Barn Road	44	2	46
		Under the Building	23		23
		subtotal	123	5	128
Totals	480		525	11	536

The petitioner is reviewing plans to “Land Bank” the 114 parking spaces outlined in the variation request. If parking becomes an issue in the future, the “Land Bank” parking spaces can be considered at that time. The location of the “Land Bank” parking spaces is an extension of the parking lot to the Northeast of the Independent Living / Commons entrance. This is at the main entrance to the facility.

2. Variation #2 – Inner Court Access

A Variation from Chapter 28, Section 5-8.11, a, requirement for a 12’ wide (minimum) direct access for an emergency vehicle into an inner court.

The current zoning requirement is to have a 12’ wide emergency vehicle access into the courtyard; however a corner of the courtyard is open and the courtyard cannot yield a reasonable return if permitted to be used only under the conditions allowed by the regulations in that zone. At that unique location there is also an underground tunnel that connects the Memory Care lower level to the Skilled Care lower level and an emergency vehicle would compromise the structure of the tunnel if it drove over it.

The variation request for the inner court without 12’ wide emergency vehicle access will not alter the essential character of the locality on an internal courtyard and is based on the following conditions:

- a. All of the buildings (existing and proposed) that surround the inner court are a non-combustible construction type.
- b. All of the buildings (existing and proposed) that surround the inner court are fully sprinklered.
- c. The inner court is open on the northwest corner but the vehicle size / weight is restricted.
- d. All of the buildings that (existing and proposed) surround the inner court are accessible by a fire truck on the opposite side of the inner court buildings.
- e. The Village Fire Department did not state concerns or comments regarding this inner court.

3. Variation #3 – One Bedroom Dwelling Unit size

A variation from Chapter 28, Section 5-8.10 , c, requirement for a one bedroom dwelling unit to be a minimum of 650 square feet.

The current zoning requirement is that all one bedroom dwelling units are a minimum of 650 square feet. The one dwelling units in the Assisted Living building are less than 650 square feet. The typical proposed 1 bedroom unit is 585 square feet. The Assisted Living units uniquely function differently than a typical multi-family dwelling unit and unless granted, the Assisted Living cannot yield a reasonable return if permitted only as used under the conditions allowed in the code.

Assisted Living residents share common use spaces outside their units. This is why their units are typically smaller. Residents are encouraged to live outside their units and

enjoy interaction with their neighbors. 14 Assisted Living units make up a neighborhood within the building. The neighborhood and overall building common spaces include living rooms, activity rooms, dining rooms, terraces and laundry rooms as a few examples.

The variation request for a one bedroom assisted living unit to be less than 650 square feet is based on the following conditions:

- a. The residents in an Assisted Living unit function differently than a typical multi-family dwelling unit. The facility provides a level of assistance dependent on the residents' abilities. Residents share common spaces outside of their units allowing the units to be smaller.
- b. Residents are provided three meals a day in the dining room. The kitchenette in the Assisted Living unit is not a cooking kitchen. The function of the kitchenette is for residents to have access to drinks and snacks, not preparing meals.
- c. The average size assisted living unit across the country is less than 650 S.F. Units below 650 square feet retain the institutional structure will not alter the essential character of the locality.

Variation #4 – Minimum distance from building wall to paved area

A variation from Chapter 28, Section 5.1-8.14 Minimum distance from Building Wall to Paved Area.

The zoning requires a 12' minimum distance from a building wall to paved area. The new buildings (Resident Fellowship Hall, Assisted Living and Memory Care) are located adjacent to the existing skilled care and commons building for interconnectivity. The building circulation for both staff and residents is to be continuous between the buildings. The proposed buildings are uniquely located within the existing campus ring road (to facilitate this connectivity) and around the existing west pond. There's a limited amount of open space to place the new buildings and unless granted, the new buildings cannot yield a responsible return if only as used under the conditions allowed by the code. Some portions of the parking lot to the east of Memory Care and the Skilled Care drive to the northeast of the Memory Care encroach into this minimum setback distance and will not alter the essential character of the locality if granted.

The variation request for encroaching on this minimum distance is based on the following conditions:

- a. There is a uniquely minimum amount of space for the proposed buildings to fit in the space available to maintain required connectivity of the buildings.
- b. Landscaping on the west side of the Memory Care building (Between building and parking lot) will be increased.
- c. Landscaping will be added to the northeast corner of the Memory Care building between the building and the adjacent sidewalk / skilled care drive.

End of Variation Requests

From: Village of Arlington Heights <info@vah.com>
Sent: Friday, September 11, 2015 4:34 PM
To: Bhide, Latika
Subject: Village of Arlington Heights Contact Staff - Moorings/Presbyterian
HomesAssist Living Project

This form was submitted from the Village Website. Please review the information that was submitted below and reply to the e-mail address that is listed below.

Name: Ted Babicz
E-mail: [REDACTED]
Concerning: Latika Bhide
Address: [REDACTED]
City: Arlington Heights
State: IL
Zip: 60005-3251
Phone: [REDACTED]
Length of Residency: 38 Years

Comment: Ms Bhide, I am requesting to meet with you in person on either September. 16, 17 or 18, 2015, please let me know if these dates fit your schedule to meet with me. I am representing a number of concerned neighbors on the 1000 and 1100 block of South Douglas Avenue in Arlington Heights. Other residents and I attended a meeting on 9-9-2015 at the Moorings where the Presbyterian Homes presented an expansion of their facilities to include an Assisted Care Building. First, I need say that the Moorings have been and are good neighbors and have taken excellent care of their property. A bit of history, I was one of the members of the original residents on Douglas Ave that worked with (at the time) Lutheran General (Magnus Farms) , The Village of Arlington Heights and local residents to come to a successful agreement between all parties on the current PUD Moorings project. At that time we were told that no additional construction would be done other than the addition of the single story to a story and one half Villas on the North and Northwest corner of the property. As was presented at Wednesday's neighbor meeting the plan is to construct a 5 story (6 including the roof) on the west side of the property. The line of sight from Douglas Avenue would be the 5 story institutional structure. Today the Moorings integrates with the neighborhoods on all sides of the property with residents owning single and 2 story homes. This new institutional building will be located on the east side of the Moorings, Moorings Drive where structures that are integral with the surrounding properties will be torn down and the 5 story institutional structure will take their place. What is there today works! My case in particular is I am located on Douglas Ave, directly across from the emergency exit, my neighbors and I would be directly affected looking at this massive structure down the open street. There will be a definite devaluation of the property values on the 1000 and 1100 blocks of Douglas Ave and adjacent neighbors on the South and East sides or the Moorings Property. What I would like to receive from the meeting with you would be; - to discuss what is to be expected at the Plan Commission Meeting, - how do we represent ourselves, - what can the Plan Commission do to protect the Douglas Avenue residents - and potential next steps. Thank you, Respectfully, Ted Babicz [REDACTED] Arlington Heights, IL 60005 [REDACTED]













DOUGLAS
MAGNOLIA













S DOUGLAS AVE
MAGNOLIA









MaROUS & COMPANY

September 17, 2015

Ms. Nancy Tolan, Vice President
Presbyterian Homes
3200 Grant Street
Evanston, Illinois 60201

Subject: Market Impact Analysis
Amendment to Existing PUD
The Moorings of Arlington Heights
811 East Central Road
Arlington Heights, Illinois 60005

Dear Ms. Tolan:

In accordance with your request, the request for an amendment to the existing Planned Unit Development (PUD) and a variation from the parking requirements for The Moorings of Arlington Heights located at 811 East Central Road, Arlington Heights, Illinois, has been analyzed and this market impact analysis has been prepared.

MaRous & Company has conducted similar market impact studies for a variety of clients and for a number of different proposed developments over the last 30 years. Clients have ranged from municipalities, counties, and school districts, to corporations, developers, and citizen's groups. The types of proposals analyzed include: commercial developments such as shopping centers and big-box retail facilities; religious facilities such as mosques and mega-churches; residential developments such as high-density multifamily and congregate-care buildings and large single-family subdivisions; recreational uses such as skate parks and lighted high school athletic fields; industrial uses such as waste transfer stations, land-fills, and quarries; and utilities such as natural gas power plants, high-tension wires, and wind farms.

Projects specifically related to this project include the proposed development of an assisted living facility in Highland Park; the proposed development of a residential rehabilitation facility near St. Charles; a senior independent-living building in Grayslake; expansion of a continuing care community in Lake Forest; and two Presbyterian Homes facilities in Evanston, one new construction and one proposed redevelopment.

Purpose and Intended Use of the Study

The purpose of this appraisal assignment is to analyze the potential impact, if any, on the value of the surrounding residential properties of the approval of an amendment to the existing Planned Unit Development (PUD) and variations from the parking requirements, fire department access to the cloister courtyard, side yard set back for the memory care buildings, and assisted-living unit sizes. Specifically,

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

this study is designed to address Article 9.4-2 of the Arlington Heights zoning ordinance which states that variations “shall not exercise a detrimental influence on the surrounding neighborhood.” The report is intended specifically for the use of Presbyterian Homes as part of an application to the Village of Arlington Heights for an amendment to the existing PUD and variations. Any other use or user of this report is considered to be unintended.

Executive Summary

As a result of the market impact analysis undertaken, previous analysis of similar facilities in comparable communities, and based on my experience valuing properties the area, it is my opinion that the approval of the amendment to the existing PUD and a variation from the required on-site parking will not exercise a detrimental influence on the value of other properties in the neighborhood. Specifically:

- The proposed development is similar in height, building mass, and appearance to the previous development on this site, and the amount of anticipated traffic is comparable;
- The proposed development is located in the center of the facility campus and is marginally visible from adjoining single-family houses;
- The existing development and the development of similar facilities in Cary and Northbrook have not had a negative impact on the value of the surrounding residential properties; and
- Previous market impact studies conducted for developments in Evanston, Lake Forest, and Grayslake indicated that there was no measurable negative impact on the value of residential properties adjacent to assisted living facilities.

Definition of Market Value

When discussing market value, the following definition is used:

The most probable price a property should bring in a competitive and open market under all conditions requisite to a fair sale, the buyer and seller each acting prudently and knowledgeably, and assuming the price is not affected by undue stimulus. Implicit in this definition is the consummation of a sale as of a specified date and the passing of title from seller to buyer under conditions whereby:

- Buyer and seller are typically motivated;
- Both parties are well informed or well advised, and acting in what they consider their own best interests;
- A reasonable time is allowed for exposure in the open market;
- Payment is made in terms of cash in U.S. dollars or in terms of financial arrangements comparable thereto; and

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

- The price represents the normal consideration for the property sold unaffected by special or creative financing or sales concessions granted by anyone associated with the sale.¹

Scope of Work and Reporting Process

Information was gathered concerning the real estate market generally and the market of the area surrounding the proposed annexation and special use specifically. The uses in the surrounding area, as well as the proposed development, were considered. The following information has been reviewed.

- Village of Arlington Heights Zoning Ordinance and map;
- Village of Arlington Heights Comprehensive Plan;
- Application for amendment of the existing PUD and requests for variations from Presbyterian Homes, including supporting documents (Market Research and Analysis for Expansion Plans Within The Moorings of Arlington Heights, Tracy Cross & Associates; Visual Lighting Plan, June 1, 2015; Dakota Landscape Plans dated July 21, 2015; rlps architects, plans dated September 1, 2015; Drainage Study and drawings by Ericsson Engineering Associates dated August 25, 2015; and Traffic and Parking Study by Ericsson Engineering Associates dated June, 2015);
- Data on the community from the Site to do Business, STDB.com;
- Data on the market and for single-family houses in the immediate area of the proposed project from Midwest Real Estate Data (MRED), and other data sources; and
- An inspection of the subject property and the surrounding area was made by Michael S. MaRous, MAI, CRE, on August 7, 2015, and by Anita Rifkind on July 10, 2015.

This document is considered to conform to the requirements of the *Uniform Standards of Professional Appraisal Practice and Advisory Opinions* (USPAP). This letter is a brief recapitulation of the appraisal data, analyses, and conclusions; additional supporting documentation is retained in the MaRous and Company office file. There are no extraordinary assumptions or hypothetical conditions included in the market study.

In order to form a judgment concerning the potential impact, if any, on the value of the surrounding properties and on the trend of development in the area by the approval of the proposed special use, we have considered the following:

- The nature of, and the possible uses for which the land might be used under the Arlington Heights Comprehensive Plan and Zoning Ordinance;

¹ (12 C.F.R. Part 34.42(g); 55 Federal Register 34696, August 24, 1990, as amended at 57 Federal Register 12202, April 9, 1992; 59 Federal Register 29499, June 7, 1994)

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

- The nature of the surrounding development; and
- The potential impact on the character and the value of the surrounding residential properties by the approval of the amendment to the existing PUD and variations.

Description of Property, Nearby Uses, and Proposed Development

Area Analysis

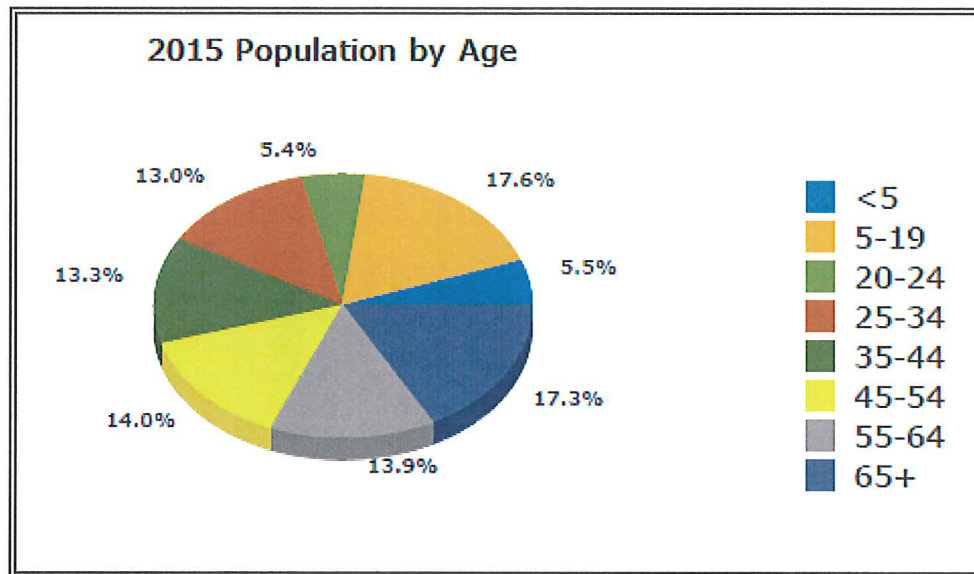
The subject property is located in the Village of Arlington Heights, Illinois, which is an established suburban community located in the northwest section of Cook County and within the Chicago metropolitan area. Distances to O'Hare International Airport and to Chicago's central business district are approximately 7 and 22 miles to the southeast respectively. The community is surrounded by the communities of Buffalo Grove and Long Grove, as well as the Buffalo Grove Forest Preserve to the north; by Elk Grove Village and the expansive Ned Brown Forest Preserve to the south; by Buffalo Grove, Wheeling, Prospect Heights, and Mount Prospect to the east; and by Palatine and Rolling Meadows to the west.

Arlington Heights is easily accessible via Interstates 53 and 90, located immediately west and south of the community, respectively. Arlington Heights is accessible from Interstate 90 via a full interchange at Arlington Heights Road and via Interstate 53 via full or partial interchanges at Lake Cook, Dundee, Rand, Palatine, and Algonquin roads; from Northwest Highway; and from Euclid Avenue.

Metra's Union Pacific Northwest commuter rail line operates between Chicago's Ogilvie Station and both the Harvard and McHenry stations with intermediate stops including both the Arlington Heights and Arlington Park stations.

As reported by esri.com, the estimated population in 2015 within a 5-mile radius of the property being appraised was 289,594 persons, of which 111,683 were older than 50 years of age. The following chart illustrates the breakdown in population by age group.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015



As this chart illustrates, more than 30 percent of the population is older than 55 years, and more than 17 percent is older than 65 years.

There were 55,809 households with residents over 55 years of age in the 5-mile radius with a median household income of \$58,972 and an average household income of \$85,472. By 2020, the number of households with residents over 55 years of age is expected to increase to 59,312, with a median household income of \$69,439, and an average household income of \$98,395.

The total number of households in the area is expected to remain relatively stable, with the 116,500 households estimated in 2015, and 118,252 estimated for 2020.

Immediate Area

The subject property is located in the southeast corner of Arlington Heights in an area of primarily single family residential uses. To the immediate east is single-family development in Mount Prospect.

The following table summarizes sales of single-family houses in the area bounded by Central Road on the north, Lincoln Road on the south, Arlington Heights Road on the west, and Hatlen Avenue on the east.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

RECENT SINGLE-FAMILY SALES SUMMARY

No.	LOCATION	SALE PRICE	SALE DATE	DAYS ON MARKET	SITE SIZE (SQ. FT.)	YEAR BUILT	BUILDING SIZE SQ. FT./RMS./BRS.	SALE PRICE PER SQ. FT. BLDG. AREA INCL. LAND
1	1215 S. Pine Ave. Arlington Heights	\$170,000	9/15	47	7,523	1931	1,220 6/3	\$139.34
2	1306 S. Pine Ave. Arlington Heights	\$607,000	9/15	32	10,289	1992	2,962 9/5	\$204.93
3	332 S. Helena Ave. Arlington Heights	\$460,000	8/15	5	11,095	1993	3,178 9/4	\$144.75
4	1003 S. Belmont Ave. Arlington Heights	\$232,000 (F)	7/15	46	8,910	1986	1,380 7/3	\$168.12
5	1041 S. Pine Ave. Arlington Heights	\$387,000	7/15	56	9,638	1958	1,700 7/3	\$227.65
6	341 S. Leonard Ln. Arlington Heights	\$393,000	7/15	35	9,900	1975	1,716 9/3	\$229.02
7	1140 S. Pine Ave. Arlington Heights	\$292,000 (F)	7/15	232	6,250	1990	2,108 8/4	\$138.52
8	9 S. Hatlen Ave. Mount Prospect	\$320,000	6/15	47	10,005	1957	1,513 7/3	\$211.50
9	202 S. Audrey Ln. Mount Prospect	\$310,000	6/15	10	11,000	1957	1,346 10/3	\$230.31
10	323 S. Beverly Ln. Mount Prospect	\$335,000	5/15	17	10,064	1958	1,215 7/3	\$275.72
11	1112 S. Belmont Ave. Arlington Heights	\$395,000	5/15	52	6,100	1974	1,550 9/3	\$254.84
12	218 S. Audrey Mount Prospect	\$312,000 (S)	5/15	31	11,000	1957	1,444 11/3	\$216.07
13	1080 S. Haddow Ave. Arlington Heights	\$281,100	4/15	5	12,100	1958	1,625 7/3	\$172.98
14	1907 W. Bonito Ave. Mount Prospect	\$313,500	4/15	20	10,080	1957	1,107 8/3	\$283.20
15	220 E. Cypress St. Arlington Heights	\$428,000	4/15	97	8,125	2007	2,800 9/4	\$152.86
16	323 S. Leonard Ln. Arlington Heights	\$350,000	2/15	3	10,064	1974	1,716 8/3	\$203.96
17	1021 S. Haddow Ave. Arlington Heights	\$239,000 (F)	1/15	10	7,500	1930	1,166 6/2	\$204.97
18	1112 S. Belmont Ave. Arlington Heights	\$255,000	1/15	125	6,100	1974	1,550 9/3	\$164.52
19	1217 S. Pine Ave. Arlington Heights	\$485,000	1/15	4	6,600	1997	2,162 7/3	\$224.33

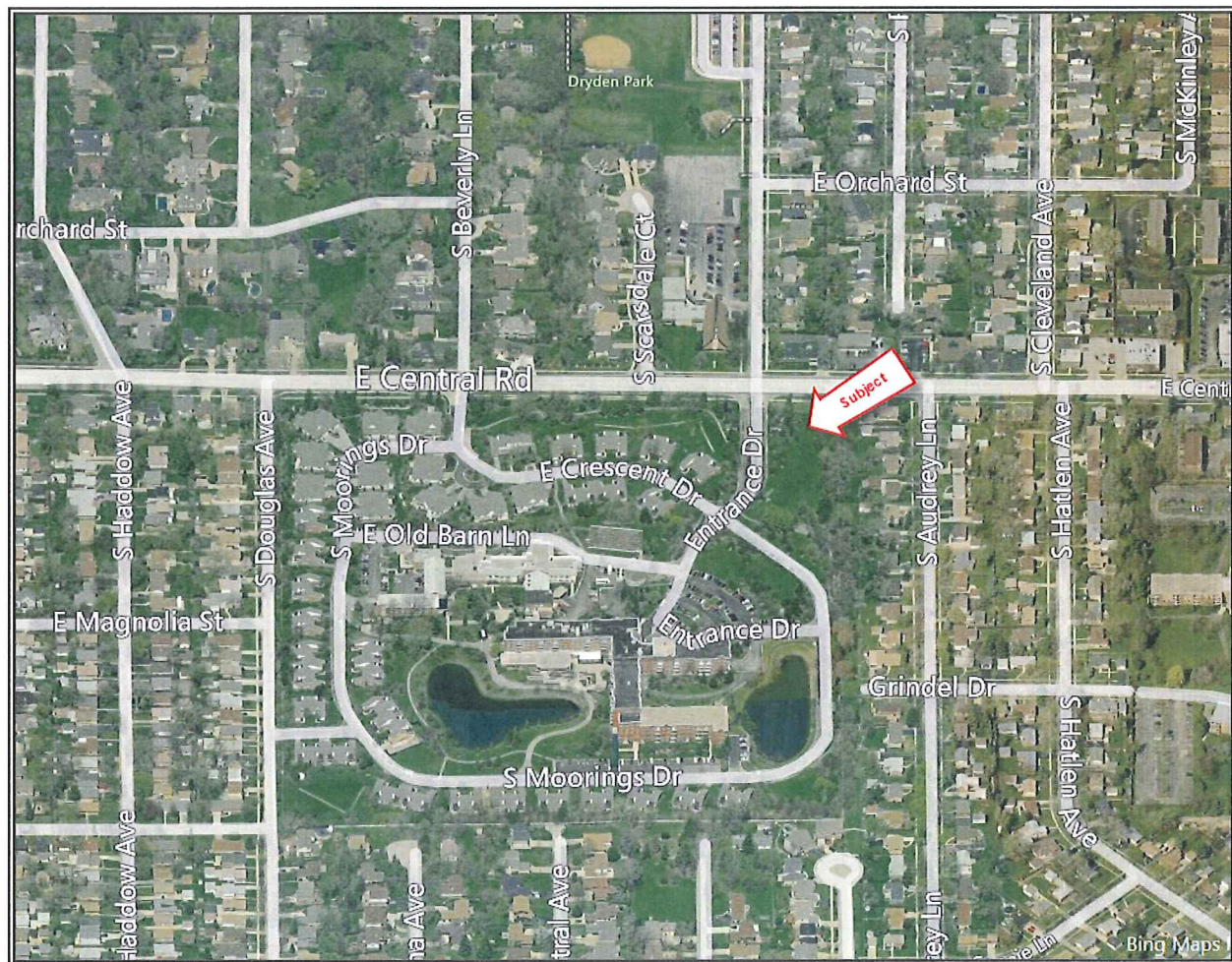
(F) Foreclosure

(S) Short sale

Source: MRED.com

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

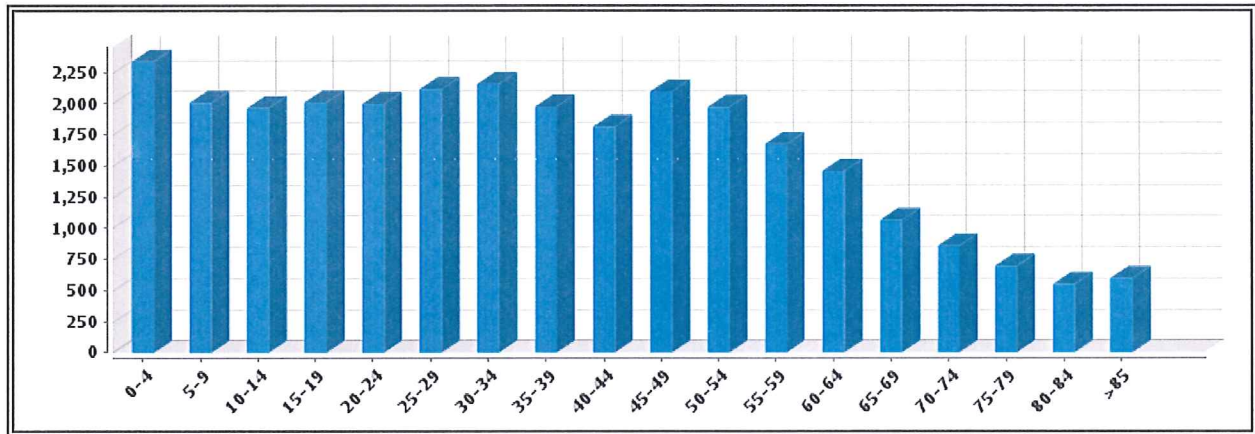
The following aerial location map illustrates the location of the existing improvements in relationship to the surrounding uses.



Market Conditions

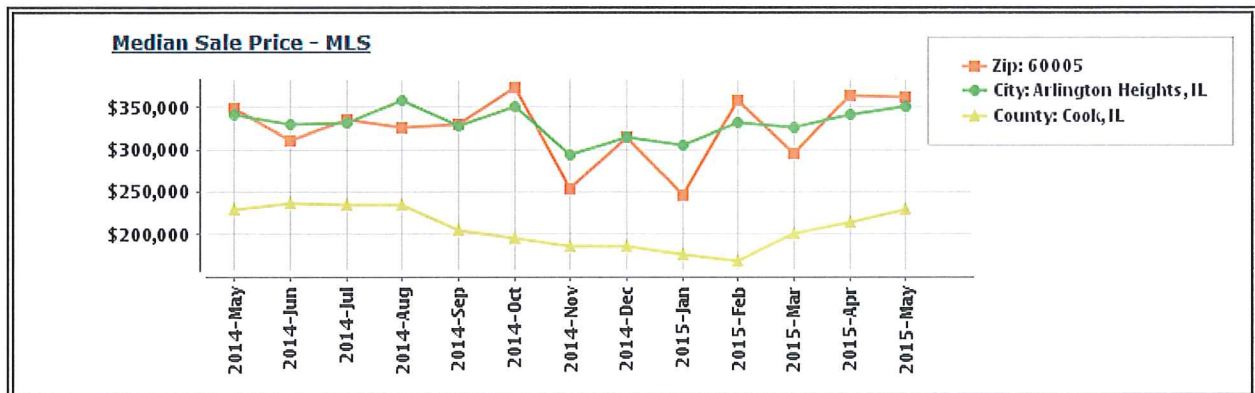
The following graph illustrates the spread in age of the population within the 60005 zip code.

Ms. Nancy Tolan
 The Moorings of Arlington Heights
 September 17, 2015



The average household income is \$99,455. The following graph illustrates the spread in household incomes within the 60005 zip code.

Median single-family house sales in the 60005 zip code mirror those of Arlington Heights as a whole, as the following graph illustrates. Except for some seasonal fluctuations, sale prices have been steady over the past 12 months.



Overall, the residential real estate market in Arlington Heights is considered to be stable.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

Proposed Development

The existing development on the 41-acre site consists of a variety of building types and sizes that are part of a continuing care retirement community. The perimeter of the site is comprised of 81 Villa Units, with an additional 212 apartment units in the center of the property. There are an additional 150 skilled nursing and sheltered care units also located in the center of the property. The existing development comprises 475,944 square feet.

The existing facility has been very successful. In addition to meeting the demand for such facilities in the immediate and broad market area, The Moorings contributes to the tax base of the community. In order to remain successful, on-going modernization and upgrading of the facility is necessary.

The redevelopment proposed for the subject property is demolition of the existing Sheltered Care building and two quad villas, and the development of a new four-story assisted living building, a one-story memory care building, and a two-story resident fellowship hall. Additional renovations to part of the Commons Building are also planned. The total number of parking spaces on site after the redevelopment will be 538, a net increase of 20 spaces. The net proposed construction totals 123,889 square feet, for a total for all buildings of 599,833 square feet. The estimated total project cost is approximately \$70,000,000.

The floor area ratio for the 599,833 square feet on 41 acres is 0.34 to 1.0. The allowed density for residential uses in single-family districts, R-1, R-2, R-3, and R-4 varies by lot size; however, the maximum FAR ranges between 0.30 and 0.45 of the land area or adjusted land area. The proposed development puts The Moorings at the low end of that range. The lot coverage for the net proposed construction is 304,455 square feet or 17 percent of the 41-acre site. The allowed lot coverage for the R-1, R-2, R-3, and R-4 single-family districts ranges between 35 and 55 percent. After the proposed development, The Moorings is below that range.

A copy of the site plan illustrating the proposed improvements in relationship to the surrounding uses is included in the addenda to this market impact study.

Highest and Best Use

In order to evaluate the potential impact, if any, on the value of the surrounding properties by the approval of the requested amendment to the existing PUD and a variations parking, we have briefly considered the highest and best use of the proposed property.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

The subject property currently is zoned I, Institutional, and was developed as a Residential PUD. The 2006 PUD approval allowed a total of 349 independent living units. There are currently 293 such units. In addition, there are currently 150 skilled nursing/sheltered care beds. The 1997 Comprehensive Plan identifies the subject property as an area of institutional development.

The demand for senior housing, especially continuing care retirement communities, is strong. There are few such facilities in the immediate area, and with an aging population, demand is likely to continue to increase. Given the existing development on the site, and the expected demand, the highest and best use of the site is continued use as a continuing care retirement facility, with development to the maximum allowed under the current zoning.

Market Impact Analysis

This market impact analysis is undertaken to develop an opinion as to whether the requested amendment to the existing PUD and variations will have a detrimental impact on the surrounding neighborhood, in particular a negative impact on property values. This analysis is based on the development of matched pairs analyzing the impact on value of residential properties proximate to the existing development at the subject location, as well as on the value of residential properties proximate to similar facilities in other suburban communities.

Matched Pair Analysis

A matched pair analysis is a methodology which analyzes the importance of a selected characteristic, in this instance proximity to a continuing care retirement community/assisted living facility, to the value of a property. This technique compares the sale of a property in proximity to the selected characteristic to the sale of a similar property in the same market area and under similar market conditions but without the proximity to the selected characteristic. An alternative is to review a sale and resale of the same property and to consider whether the proximity to the selected characteristic influenced value.

It is difficult to find properties that are identical except for proximity to a continuing care retirement community. However, there was a sale/resale of a property proximate to the subject development, and the sale of a property which was used as a target sale in a matched pair analysis. In addition, we have considered matched pairs near two similar developments, one of which is a continuing care retirement community and the other is an assisted living facility.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

Sale/Resale

The following table summarized the sale/resale of house at 1108 South Douglas Avenue in Arlington Heights that faces the rear of the villas along South Moorings Drive. The property was purchased by contractor who substantially renovated the property between August 2013, and the resale in April 2014. The property sold with \$20,000 in “structural repairs” required, and without central air conditioning. The renovation included opening up the interior; updating the kitchens and bathrooms, including heated floors; adding/refinishing hardwood floors; new windows and doors; finishing the basement; and installing central air conditioning.

This sale/resale is an indicator of the strength of the area adjoining the subject property, and illustrates that the subject property has not negatively impacted the trend of development in the immediate area.

SALE/RESALE - ARLINGTON HEIGHTS		
	SALE 1A	RESALE 1B
Address	1108 S. Douglas Ave.	1108 S. Douglas Ave.
Sale Date	July 2013	April 2014
Days on Market	8	28
Sale/List Price	\$190,000/\$200,000	\$360,000/\$398,900
Sale Price/Sq. Ft.	\$152.73	\$289.39
Year Built	1962	1962
Building Size	1,244 sq. ft.	1,244 sq. ft.
Lot Size	6,375 sq. ft.	6,375 sq. ft.
Style	Split-level; brick 6 rms., 3 bdrms. 2 ba.; 2-car detached garage	Split-level; brick 6 rooms, 3 bdrms.2 ba.; 2-car detached garage
Basement	Partially finished	Finished
Other	Window AC units	Open floor plan; central AC; heated floors in bathrooms; new windows & doors

Matched Pair - The Moorings, Arlington Heights

The first set of matched pairs compares a property that faces the southwest corner of The Moorings site, located at 1136 South Douglas Avenue, with two similar houses that also are located in Arlington Heights, but not proximate to a continuing care retirement community.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

MATCHED PAIR - ARLINGTON HEIGHTS

	PROXIMATE TO THE MOORINGS 2A	NOT PROXIMATE TO AN ASSISTED-LIVING FACILITY 2B	2C
Address	1136 S. Douglas Ave.	213 S. Dryden Pl.	706 S. McKinley Ave.
Sale Date	August 2013	July 2013	July 2013
Days on Market	19	59	30
Sale/ List Price	\$300,000/\$314,000	\$249,000/\$235,000	\$383,000/\$409,000
Sale Price/Sq. Ft.	\$172.12	\$144.77	\$189.04
Year Built	1962	1956	1968
Building Size	1,743 sq. ft.	1,720 sq. ft.	2,026 sq. ft.
Lot Size	6,375	5,306 sq. ft.	7,205 sq. ft.
Style	2-story Georgian 9 rms., 4 bdrms., 2 ba.; 2-car detached garage	2-story 8 rms, 4 bdrms., 2.1 ba.; 2-car detached garage	2-story Colonial 9 rooms, 4 bdrms., 2.1 ba.; 2-car detached garage
Basement	Partially finished	Crawl	Unfinished
Other		Rehabbed prior to sale	1st floor family room; updated bathrooms; patio

The house on Dryden Place is of slightly older construction than the house on Douglas Avenue and is inferior because of a smaller lot size and because it was constructed over a crawl space and not a full basement. This house has an extra powder room. The lower sale price of this house appears warranted considering these differences.

The house on McKinley Avenue is of slightly newer construction than the house on Douglas Avenue and is also superior because of the larger building size, the larger lot size, a patio, the extra powder room, and a first-floor family room. The higher sale price of this house appears justified by these superior amenities, and appears unrelated to the location of the Douglas Avenue property in proximity to The Moorings.

These matched pairs do not support a finding that proximity to The Moorings has had a negative influence on the value of the surrounding property.

Matched Pair - Covenant Village, Northbrook

The next set of matched pairs compares a sale of house in proximity to Covenant Village in Northbrook with similar houses not in proximity to either a continuing care retirement community or an assisted living facility. Covenant Village is a very large, continuing care retirement community that has a variety of living options for senior citizens, including villas and a variety independent living units in buildings

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

ranging in height from one-story to three stories, an assisted-living building, and a nursing home. It is located on 55 acres wrapping the corner of the northwest quadrant of Pfingsten and Techny roads. A second three-story building recently was constructed on the site. Uses west of the facility on Techny Road include a YMCA and a church; all other uses surrounding the property are residential.

A house north across Techny Road from the existing three-story building and the construction site of the second three-story building, at 2619 Mulberry Lane, Northbrook, sold in October 2013 for \$465,000. There were sales that occurred in similar market conditions of houses in Northbrook that were not proximate to an assisted-living facility with which the sale price of this house could be compared. These houses are summarized in the following table.

MATCHED PAIRS - NORTHBROOK

	PROXIMATE TO COVENANT VILLAGE FACILITY 3A	NOT PROXIMATE TO AN ASSISTED-LIVING FACILITY 3B	3C
Address	2619 Mulberry Ln.	1826 Smith Rd.	870 Hawthorne Ln.
Sale Date	October 2013	July 2013	June 2013
Days on Market	60	8	13
Sale/List Price	\$465,000/\$679,000	\$525,500/\$549,000	\$510,000/\$525,000
Sale Price/Sq. Ft.	\$197.62	\$210.54	NA
Year Built	1973	1965	1960
Building Size	2,353 sq. ft.	2,496 sq. ft.	1,758 sq. ft.
Lot Size	12,044 sq. ft.	10,890 sq. ft.	12,000 sq. ft.
Style	Split-level; frame 9 rms., 4 bdrms., 2.3 ba.; 2-car attached garage	Split-level; brick/frame 9 rooms, 4 bdrms., 2.1 ba.; 2-car attached garage	Split-level; brick/frame 9 rooms, 4 bdrms., 2.1 ba.; 2-car attached garage
Basement	Finished	Finished	Partially finished
Other	Master bath; remodeled 2012 In-ground swimming pool	Master bath w/ whirlpool; Open floor plan; Remodeled and newer HVAC Wooded lot	Master bath; Remodeled; new roof, furnace and hot water heater in 2012

All three houses have a similar number of rooms, are of similar construction vintage, and have been updated. However, the houses at 1826 Smith Road and 870 Hawthorne Lane are brick construction with some areas of siding, compared to the house at 2619 Mulberry Lane, which is all frame. Brick construction is considered superior to frame construction in this market area.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

The site sizes are similar; however, the house at 2619 Mulberry Lane has a in-ground swimming pool. Generally, a swimming pool makes it more difficult to sell a house, and is not considered a positive amenity to most purchasers.

The house at 1826 Smith Road has been remodeled and the interior now has an open floor plan, considered superior in the general market. This house also is close to West Park, and within walking distance of the Northbrook central business district and the commuter train. The house at 870 Hawthorne Lane has a new roof, furnace, and water heater, all highly desirable improvements.

Taking into account the superior amenities of the house on Smith Road, and the difficulty of selling a house with an in-ground swimming pool, there does not appear to be any difference in value attributable to the location proximate to the Covenant Village senior citizen community for the house at 2619 Mulberry Lane.

Matched Pair - Spectrum Senior Living, Cary

The last set of matched pairs includes the sale of a house south adjacent to the Spectrum Senior Living facility located between Three Oaks Road and Patriot Lane on Silver Lake Road, in Cary Illinois. This facility is a recently constructed, two-story, masonry constructed building that has 88 units of which 65 are assisted living units and 23 are memory care units. The facility is approximately 98 percent occupied, and there are a total of 38 staff members per day, 23 at any given time. The facility opened in late 2012.

Uses along Silver Lakes Road are mixed; there are office and office/service uses on the west side of Silver Lake Road. On the east side of Silver Lake Road are single-family subdivisions, both north and south of Three Oaks Road.

A house located directly south adjacent to the assisted living facility at 452 Ann Street sold in October 2013, after completion and occupancy of the assisted living facility. There were sales that occurred in similar market conditions of similar houses in Cary that were not proximate to an assisted living facility with which the sale price of this house could be compared. These houses are summarized in the following table.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

MATCHED PAIR - CARY

	PROXIMATE TO SPECTRUM FACILITY 4A	NOT PROXIMATE TO AN ASSISTED-LIVING FACILITY 4B	4C
Address	454 Ann Street	325 Oriole Trail	550 Alida Dr.
Sale Date	October 2013	April 2012	May 2013
Days on Market	40	490	3
Sale/List Price	\$135,000/\$154,900	\$130,000/\$185,000	\$165,000/\$169,900
Sale Price/Sq. Ft.	\$110.84	\$86.67	\$89.19
Year Built	1961	1962	1975
Building Size	1,218 sq. ft.	1,500 sq. ft.	1,850 sq. ft.
Lot Size	7,840 sq. ft.	18,340 sq. ft.	10,454 sq. ft.
Style	Split-level; frame 6 rms., 3 bdrms., 2.0 ba.; 1-car attached garage	Split-level; frame 6 rooms, 3 bdrms., 2.0 ba.; 1-car attached garage	Split-level; frame 6 rooms, 3 bdrms., 2.0 ba.; 2-car attached garage
Basement	Sub-basement, unfinished	Sub-basement; unfinished	Sub-basement; unfinished
Other	Sold as-is	Some remodeling	Updated kitchen & baths

The house at 454 Ann Street has the same number of rooms, but is a smaller house situated on a smaller lot than either the house at 325 Oriole Trail or at 550 Alida Drive. The house at 550 Alida Drive also is superior because it is of somewhat newer construction, has a two-car garage, and had been substantially renovated. Nevertheless, the house at 454 Ann Street sold with a much higher unit sale price per square foot than either of the other two comparable sales. Market conditions are considered substantially similar for all three houses.

Taking into consideration the differences between these properties, it does not appear that the location of the house south adjacent to the Spectrum assisted living facility had any impact on the sale price of the property.

Other Market Impact Studies

In addition to this analysis, MaRous & Company has developed market impact studies for proposed developments or expansions of assisted living facilities in Evanston, Lake Forest, and Grayslake. These studies did not find measurable negative impact on the surrounding residential properties. The Presbyterian Homes properties in Evanston and Lake Forest were expansions of existing continuing care campus facilities. The studies conducted analyzed the impact of the existing developments on the surrounding residential properties. No measurable impact on values was evident.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

The development in Grayslake is a subsidized senior housing building. The three-story, 74,539-square-foot building is constructed of stone and siding, and has 63 one-bedroom and 7 one-bedroom plus den units. There are 50 on-site parking spaces. Sales of single-family houses in proximity to the site after the project was approved and publicized were analyzed and compared with sales of similar houses in the surrounding community. No measurable impact on values was found.

Conclusions of Market Value Impact Analysis

Taking into consideration the sales/resale and matched pair analysis undertaken for the subject facility as well as a similar continuing care retirement community in Northbrook, and an assisted living facility, as well as the market impact studies in Evanston, Lake Forest, and Grayslake previously conducted, the proximity of the single-family residential properties to such developments does not appear to have a negative impact on value or on the trend of development in the area.

Conclusions

After analyzing the proposed development, and after analyzing the impact on values of single-family residential properties adjoining similar facilities, and based on previous analysis of similar facilities in comparable suburban communities, and based on my experience valuing properties in Arlington Heights, it is my opinion that the approval of an amendment to the existing PUD and a variation from the parking requirements will not have a negative impact on the value of residential property or on the trend of development in the neighborhood. Specifically:

- The proposed development is similar in height, building mass, and appearance to the previous development on this site, and the amount of anticipated traffic is comparable;
- The proposed development is located in the center of the facility campus and is marginally visible from adjoining single-family houses;
- The existing development and the development of similar facilities in Cary and Northbrook have not had a negative impact on the value of the surrounding residential properties; and
- Previous market impact studies conducted for developments in Evanston, Lake Forest, and Grayslake indicated that there was no measurable negative impact on the value of residential properties adjacent to assisted living facilities.

Ms. Nancy Tolan
The Moorings of Arlington Heights
September 17, 2015

This report is based on market conditions existing as of August 7, 2015.

This market impact study has been prepared specifically for the use of Presbyterian Homes as part of an application to the Village of Arlington Heights for approval of an amendment to the existing Planned Unit Development (PUD) and a variation from the parking requirements for The Moorings of Arlington Heights. Any other use or user of this report is considered to be unintended.

Respectfully submitted,

MaRous & Company



Michael S. MaRous, MAI, CRE
Illinois Certified General - #553.000141 (9/17 expiration)

CERTIFICATION

I do hereby certify that, to the best of my knowledge and belief:

1. The statements of fact contained in this appraisal report are true and correct;
2. The reported analyses, opinions, and conclusions are limited only by the reported assumptions and limiting conditions and are my personal, impartial, and unbiased professional analyses, opinions, and conclusions;
3. I have no present or prospective personal interest in the property that is the subject of this report and no personal interest with respect to the parties involved;
4. I have performed no services, as an appraiser or in any other capacity, regarding the property that is the subject of this report within the three-year period immediately preceding acceptance of this assignment;
5. I have no bias with respect to the property that is the subject of this report or to the parties involved with this assignment;
6. My engagement in this assignment was not contingent upon developing or reporting predetermined results;
7. The compensation for completing this assignment is not contingent upon the development or reporting of a predetermined value or direction in value that favors the cause of the client, the amount of the value opinion, the attainment of a stipulated result, or the occurrence of a subsequent event directly related to the intended use of this appraisal;
8. The reported analyses, opinions, and conclusions were developed, and this report has been prepared in conformity with the *Uniform Standards of Professional Appraisal Practice*;
9. I have personally inspected the interior and exterior of the subject property;
10. Anita Rifkind provided real property appraisal assistance to the person signing this certification;
11. The reported analysis, opinions, and conclusions were developed, and this report has been prepared, in conformity with the Code of Professional Ethics and Standards of Professional Appraisal Practice of The Appraisal Foundation;
12. The use of the report is subject to the requirements of the Appraisal Institute relating to review by its duly authorized representatives; and
13. As of the date of this report, Michael S. MaRous, MAI, CRE, has completed the continuing education requirements for Designated Members of the Appraisal Institute.

MaRous & Company

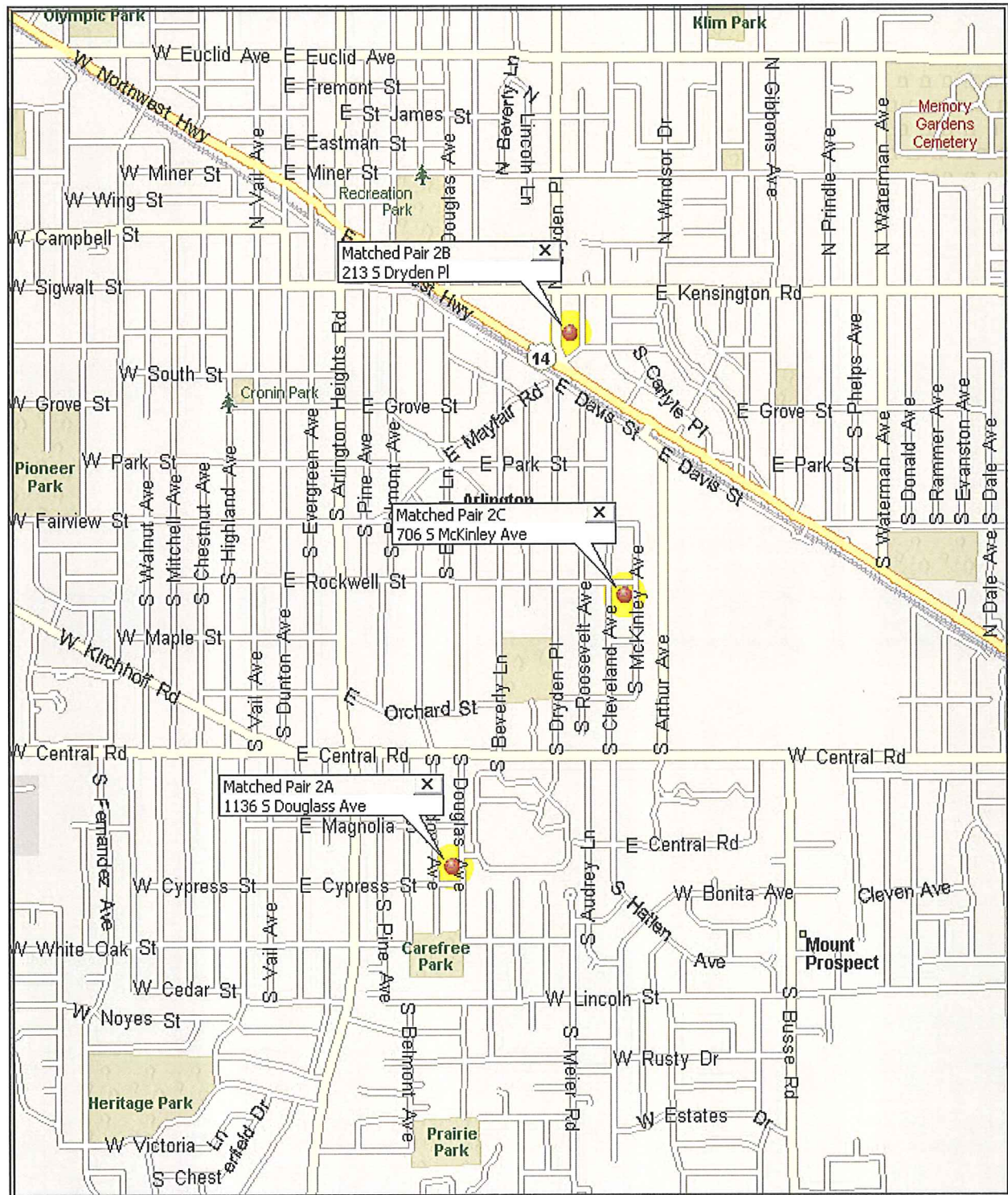

Michael S. MaRous, MAI, CRE

Illinois Certified - #553.000141 (9/17 expiration)

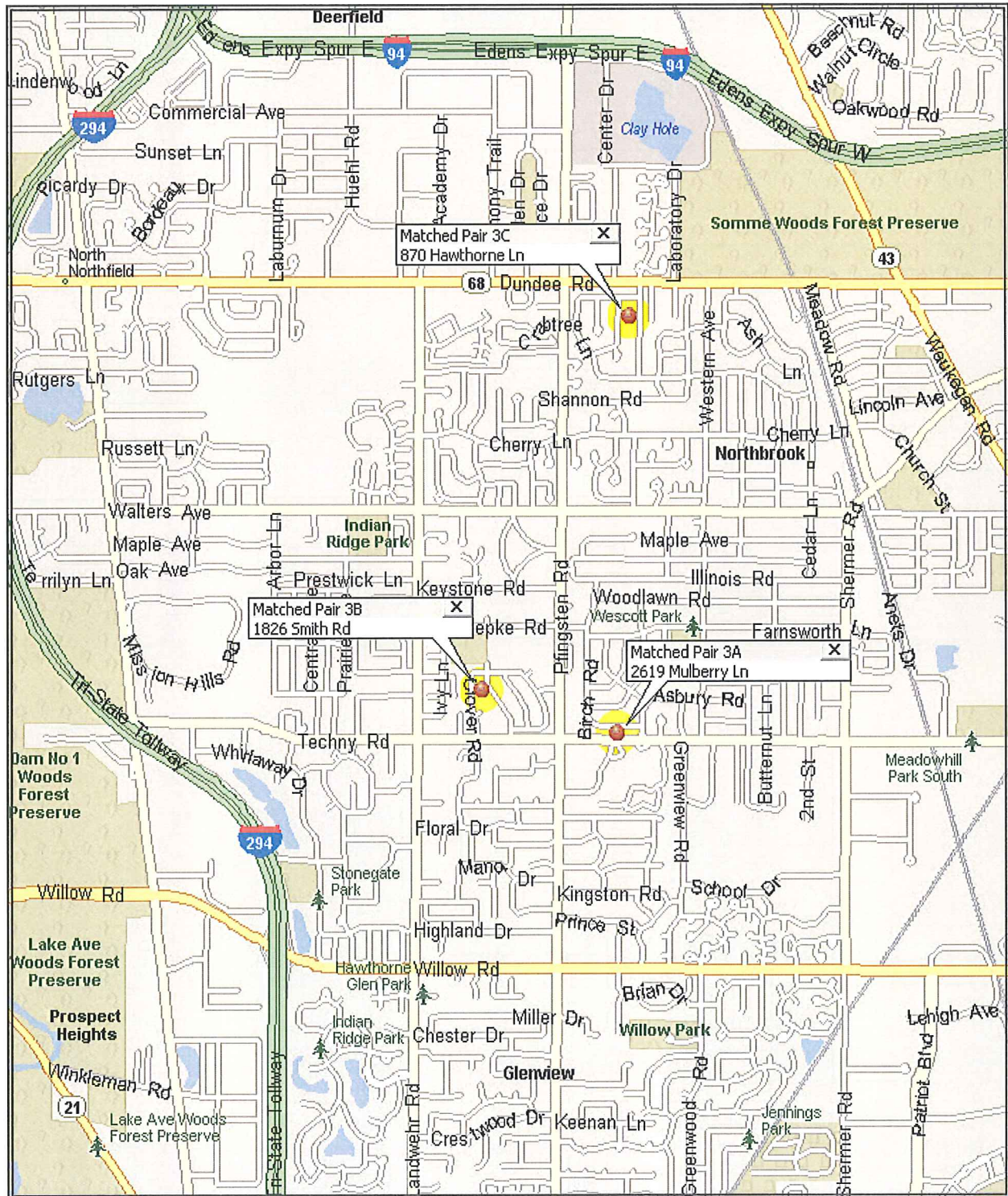
ADDENDA



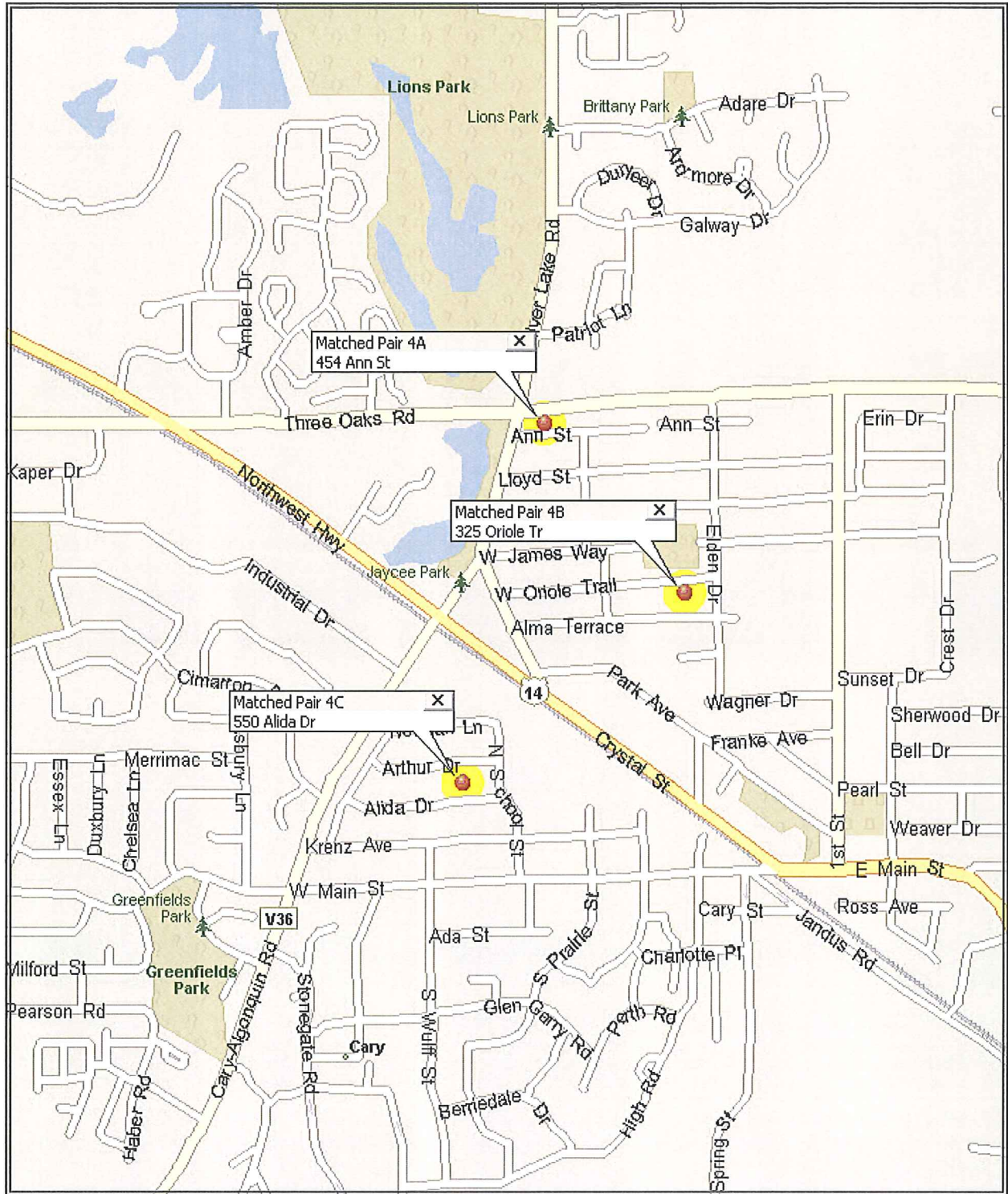
PROPOSED SITE PLAN



MATCHED PAIRS LOCATION MAP - THE MOORINGS, ARLINGTON HEIGHTS



MATCHED PAIRS LOCATION MAP - COVENANT VILLAGE, NORTHBROOK



MATCHED PAIRS LOCATION MAP - SPECTRUM PROJECT, CARY

PHOTOGRAPHS OF SUBJECT PROPERTY



SOUTH IN DOUGLAS AVENUE - THE MOORINGS AT LEFT



VIEW NORTHEAST AT THE SOUTHWEST CORNER OF CAMPUS



EXISTING DEVELOPMENT - NORTHERN ELEVATION



VIEW SOUTHEAST ACROSS SUBJECT SITE



VIEW WEST IN SOUTH MOORINGS DRIVE

MICHAEL S. MAROUS

STATEMENT OF QUALIFICATIONS

Michael S. MaRous, MAI, CRE, is president and owner of MaRous and Company. He has appraised more than \$15 billion worth of primarily investment-grade real estate in more than 25 states. In addition to providing documented appraisals, he has served as an expert witness in litigation proceedings for many law firms; financial institutions; corporations; builders and developers; architects; local, state, county, and federal governments and agencies; and school districts in the Chicago metropolitan area. His experience in partial interest, condemnation, damage impact, easement (including aerial and subsurface), marital dissolutions, bankruptcy proceedings, and other valuation issues is extensive. He has provided highest and best use, marketability, and feasibility studies for a variety of properties. Many of the largest redevelopment areas and public projects, including Interstate 355, the O'Hare International Airport expansion, the Midway Airport expansion, and the McCormick Place expansion, are part of Mr. MaRous' experience. Also, he purchases and develops real estate for his own account.

APPRAISAL AND CONSULTATION EXPERIENCE

Business Parks Distribution Centers	Industrial Properties Manufacturing Facilities Research Facilities	Self-storage Facilities Warehouses
	Commercial Properties Gasoline Stations Hotels and Motels Office Buildings	Restaurants Shopping Centers Theaters
Auto Sales/Service Facilities Banquet Halls Big Box Stores	Special-Purpose Properties Lumber Yards Nurseries Riverboat Gambling Facilities Schools Stadium Expansion Issues	Tank Farms Underground Gas Aquifers Utility Corridors Waste Transfer Facilities
Bowling Alleys Cemeteries Farms Golf Courses	Residential Properties Condominium Developments Single-family Residences	Subdivision Developments Townhouse Developments
Apartment Complexes Condominium Conversions	Vacant Land Easements Industrial Residential	Right of Ways Streets Vacations
Agricultural Alleys Commercial	Clients Law Firms Not-for-profit Associations	Private Parties Public Entities
Corporations Financial Institutions		

EDUCATION

B.S., Urban Land Economics, University of Illinois, Urbana-Champaign
Continuing education seminars and programs through the Appraisal Institute
and the American Society of Real Estate Counselors and real estate brokerage classes

PUBLIC SERVICE

Mayor, City of Park Ridge, Illinois (2003-2005)
Alderman, City of Park Ridge, including Liaison to the Zoning Board of Appeals and Planning and Zoning and
Chairman of the Finance and Public Safety Committees (1997-2005)

PROFESSIONAL AFFILIATIONS AND LICENSES

Appraisal Institute, MAI designation, Number 6159
American Society of Real Estate Counselors, CRE designation
Illinois Certified General Real Estate Appraiser, License Number 553.000141 (9/17)
Licensed Real Estate Broker (Illinois)

PROFESSIONAL ACTIVITIES

Mr. MaRous is past president of the Chicago Chapter of the Appraisal Institute. He is former chair and vice chair of the National Publications Committee and has sat on the board of *The Appraisal Journal*. In addition, he has served on and/or chaired more than fifteen other committees of the Appraisal Institute, the Society of Real Estate Appraisers, and the American Institute of Real Estate Appraisers.

Mr. MaRous served as chair of the Midwest Chapter of the American Society of Real Estate Counselors in 2006 and 2007. He has sat on the Chicago Chapter Board of Directors, the Editorial Board of *Real Estate Issues*, and on various other committees.

Mr. MaRous also is past president of the Illinois Coalition of Appraisal Professionals. He has sat on the board of directors, has held office, and has served on numerous committees of many other professional associations, including the National Association of Security Dealers, the International Research Council, the Chicago Real Estate Board, the Northwest Suburban Real Estate Board, the National Association of Real Estate Boards, and the Northern Illinois Commercial Association of Realtors.

PUBLICATIONS AND PROFESSIONAL RECOGNITION

Mr. MaRous has spoken at more than 20 programs and seminars related to real estate appraisal and valuation.

Author

- "Low-income Housing in Our Backyards," *The Appraisal Journal*, January 1996
- "The Appraisal Institute Moves Forward," *Illinois Real Estate Magazine*, December 1993
- "Chicago Chapter, Appraisal Institute," *Northern Illinois Real Estate Magazine*, February 1993
- "Independent Appraisals Can Help Protect Your Financial Base," *Illinois School Board Journal*, November-December 1990
- "What Real Estate Appraisals Can Do For School Districts," *School Business Affairs*, October 1990

Awards

- Chicago Chapter of the Appraisal Institute - F. Gregory Opelka Award, 2002
- Appraisal Institute - George L. Schmutz Memorial Award, 2001
- Chicago Chapter of the Appraisal Institute - Heritage Award, 2000
- Chicago Chapter of the Appraisal Institute - Herman O. Walther, 1987 (Distinguished Chapter Member)

Reviewer or Citation in the Following Books

- Appraisal of Real Estate*, Twelfth Edition, 2001
- Appraisal of Real Estate*, Thirteenth Edition, 2008
- Subdivision Valuation*, 2008
- Real Estate Damages*, 2008
- Valuation of Apartment Properties*, 2007
- Valuation of Billboards*, 2006
- Appraising Industrial Properties*, 2005
- Valuation of Market Studies for Affordable Housing*, 2005
- Valuing Undivided Interest in Real Property: Partnerships and Cotenancies*, 2004
- Analysis and Valuation of Golf Courses and Country Clubs*, 2003
- Dictionary of Real Estate Appraisal*, Fourth Edition, 2002
- Valuing Contaminated Properties: An Appraisal Institute Anthology*, 2002
- Hotels and Motels: Valuation and Market Studies*, 2001
- Land Valuation: Adjustment Procedures and Assignments*, 2001
- Appraisal of Rural Property*, Second Edition, 2000
- Capitalization Theory and Techniques, Study Guide*, Second Edition, 2000
- Guide to Appraisal Valuation Modeling Land*, 2000
- Appraising Residential Properties*, Third Edition, 1999
- Business of Show Business: The Valuation of Movie Theaters*, 1999
- GIS in Real Estate: Integrating, Analyzing and Presenting Locational Information*, 1998
- Market Analysis for Valuation Appraisals*, 1995

REPRESENTATIVE WORK OF MICHAEL S. MAROUS

Headquarters/Corporate Office Facilities in Illinois

Fortune 500 corporation facility, 200,000 sq. ft., Libertyville
Corporate headquarters, 300,000 sq. ft. and 500,000 sq. ft., Chicago
Fortune 500 corporation facility, 450,000 sq. ft., Northfield
Major airline headquarters, 1,100,000 million sq. ft. on 47 acres, Elk Grove Village
Former communications facility, 1,400,000 million sq. ft. on 62 acres, Skokie and Niles
Corporate Headquarters, 1,500,000+ sq. ft., Lake County
Former Sears Headquarters Redevelopment Project, Chicago

Office Buildings in Chicago

401 South LaSalle Street, 140,000 sq. ft.
134 North LaSalle Street, 260,000 sq. ft.
333 North Michigan Avenue, 260,000 sq. ft.
171 West Randolph Street, 360,000 sq. ft.
20 West Kinzie Street, 405,000 sq. ft.
55 East Washington Street, 500,000 sq. ft.
10 South LaSalle Street, 870,000 sq. ft.
222 West Adams, 1,000,000 sq. ft.
175 West Jackson Boulevard, 1,450,000 sq. ft.
227 West Monroe, 1,800,000 sq. ft.
10 South Dearborn Street, 1,900,000 sq. ft.

Hotels in Chicago

10 E. Grand Avenue (Hilton Garden Inn)
106 East Superior Street (Peninsula Hotel)
140 East Walton Place (The Drake Hotel)
676 North Michigan Avenue (Omni Chicago Hotel)
One West Wacker Drive (Renaissance Chicago Hotel)
320 North Dearborn Street (Westin Chicago River North)
505 North Michigan Avenue (Hotel InterContinental)

Large Industrial Properties in Illinois

Large industrial complexes, 400,000 sq. ft., 87th Street and Greenwood Avenue, Chicago
Distribution warehouse, 580,000 sq. ft. on 62 acres, Champaign
Publishing house, 700,000 sq. ft. on 195 acres, U.S. Route 45, Mattoon
AM Chicago International, 700,000± sq. ft. on 41 acres, 1800 West Central, Mt. Prospect
Nestlé distribution center, 860,000 sq. ft. on 153 acres, DeKalb
Fortune 500 company distribution center, 1,000,000 sq. ft., Elk Grove Village
U.S. Government Services Administration distribution facility, 860,000 sq. ft., 76th Street and Kostner Avenue, Chicago
Self-storage facilities, various Chicago metropolitan locations

Vacant Land in Illinois

15 acres, office, Northbrook	450 acres, residential, Wauconda
20 acres, residential, Glenview	475± acres, various uses, Lake County
25 acres, Hinsdale	650 acres, Hawthorne Woods
55 acres, mixed-use, Darien	650 acres, Waukegan/Libertyville
75 acres, I-88 at I-355, Downers Grove	800 acres, Woodridge
100± acres, various uses, Lake County	900 acres, Matteson
140 acres, Flossmoor	1,000± acres, Batavia area
142 acres, residential, Lake County	2,000± acres, Northern Lake County
160 acres, residential, Cary	5,000 acres, southwest suburban Chicago area
200 acres, mixed-use, Bartlett	Landfill expansion, Lake County
250 acres, Island Lake	

Business and Industrial Parks

Chevy Chase Business Park, 30 acres, Buffalo Grove
Carol Point Business Center, 300-acre industrial park, Carol Stream, \$125,000,000+ project
Internationale Centre, approximately 1,000 acre-multiuse business park, Woodridge

Retail Facilities

10 Community shopping centers, various Chicago, Metropolitan locations
Big-box uses, various Chicago metropolitan locations
Gasoline Stations, various Chicago metropolitan locations
More than 30 single-tenant retail facilities larger than 80,000 sq. ft., various Chicago metropolitan locations

Residential Projects

Federal Square townhouse development project, 118 units, \$15,000,000+ sq. ft. project, Dearborn Place, Chicago
Marketability and feasibility study, 219 East Lake Shore Drive, Chicago
Riverview II, Chicago, Old Town East and West, Chicago, Museum Park Lofts II, Museum Park Tower 4,
University Commons, Two River Place, River Place on the Park, Chicago

Market Studies

Impact of land fill on adjacent property values
Impact of low-income housing on adjacent residential property values
Impact of proposed quarry expansion on neighboring properties
Impact of commercial and parking uses on adjacent residential property values
Impact of significant zoning changes on residential property values
Sanitary sewer value impact study
Waste transfer facility impact study

Properties in Other States

330,000 sq. ft., Newport Beach, California
Former government depot/warehouse and distribution center, 2,500,000 sq. ft. on 100+ acres, Ohio
Shopping Center, St. Louis, Missouri
Office Building, Clayton, Missouri
Condominium Development, New York, New York

Airport Related Properties

Mr. MaRous has done valuations on more than 100 parcels in and around O'Hare International Airport,
Chicago Midway Airport, Palwaukee Municipal Airport, Chicago Aurora Airport, DuPage Airport,
and Lambert-St. Louis International Airport

REPRESENTATIVE CLIENT LISTING OF MICHAEL S. MAROUS

Law Firms

Botti Law Firm, P.C.
Alschuler, Simantz & Hem, LLC
Arnstein & Lehr LLP
Steven B. Bashaw, P.C.
Berger, Newmark & Fenchel P.C.
Berger Schatz
Carmody MacDonald P.C.
Crane, Heyman, Simon, Welch & Clar
Daley & Georges, Ltd.
DLA Piper
Drinker, Biddle & Reath LLP
Figliulo & Silverman, P.C.
Foley & Lardner LLP
Foran, O'Toole & Burke LLC
Franczek Radelet P.C.
Freeborn & Peters LLP
Goldberg Kohn
Gould & Ratner LLP
Graft & Jordan
Greenberg Traurig LLP
Helm & Wagner
Robert Hill Law, Ltd.
Hinshaw & Culbertson LLP

Holland & Knight LLP
Jenner & Block
Donald L. Johnson
Kinnally, Flaherty, Krentz & Loran PC
Kirkland & Ellis LLP
Klein, Thorpe & Jenkins, Ltd.
Locke Lord LLP
McDermott, Will & Emery
Mayer Brown
McGuireWoods LLP
Michael Best & Friedrich LLP
Miller & Sweeney CO
Morrison & Morrison, Ltd.
Bryan E. Mraz & Associates
Neal, Gerber & Eisenberg, LLP
Neal & Leroy LLC
O'Donnell Law Firm Ltd.
O'Halloran Kosoff Geitner & Cook, LLC
Owens, Owens & Rinn, Ltd.
Prendergast & DelPrincipe
Rathje & Woodward, LLC
Raysa & Zimmermann, LLC
Righeimer, Martin & Cinquino, P.C.

Mary Riordan, Attorney
Robbins, Salomon & Patt, Ltd.
Rosenfeld Hafron Shapiro & Farmer
Rosenthal, Murphey, Coblenz & Donahue
Rubin & Norris, LLC
Ryan and Ryan Attorneys at Law, P.C.
Reed Smith LLP
Sarnoff & Baccash
Scariano, Himes & Petrarca, Chtd.
Schiff Hardin LLP
Schiller, DuCanto & Fleck LLP
Schirott, Luetkehans & Garner, LLC
Schuyler, Roche & Crisham, P.C.
Sidley Austin LLP
Sonnenschien, Nath & Rosenthal LLP
Storino, Ramello & Durkin
Thomas M. Tully & Associates
Thompson Coburn, LLP
Tuttle, Vedral & Collins, P.C.
Vedder Price
Wildman, Harrold, Allen & Dixon
Winston & Strawn LLP
Worsek & Vihon LLP

Financial Institutions

AmericaUnited Bank and Trust
Charter One
Citibank
Cole Taylor Bank
Covest Banc
First Bank of Highland Park
First Midwest Bank

First Northwest Bank
Glenview State Bank
Harris Bank
Itasca Bank and Trust
Lake Forest Bank & Trust
MB Financial Bank
Midwest Bank & Trust Company

Northern Trust Bank
Northview Bank & Trust
Private Bank & Trust Co.
State Financial Bank
Winfield Community Bank
Wintrust Bank Group

Corporations

Advocate Health Care System
American Stores Company
Archdiocese of Chicago
Arthur J. Rogers and Company
BP Amoco Oil Company
Christopher B. Burke Engineering, Ltd.
Cambridge Homes
Canadian National Railroad
Capital Realty Services, Inc.
Chicago Cubs
Children's Memorial Hospital
Chrysler Realty Corporation
Citgo Petroleum Corporation

CorLands
Edward R. James Partners, LLC
Enterprise Development Corporation
Enterprise Leasing Company
Exxon Mobil Corporation
Hamilton Partners
Hewitt Associates LLC
Hollister Corporation
Imperial Realty Company
Kenard Corporation
Kimco Realty Corporation
Kinder Morgan, Inc.
Kmart Corporation
Lakewood Homes

Loyola University Health System
Marathon Oil Corporation
Meijer, Inc.
Mesirow Stein Real Estate, Inc.
Prime Group Realty Trust
Public Storage Corporation
RREEF Corporation
Shell Oil Company
Stewart Warner Corporation
Union Pacific Railroad Company
United Airlines, Inc.
United of America Insurance Company

Public Entities
Illinois Local Governments and Agencies

Village of Arlington Heights	Village of Glenview	Village of Orland Park
Village of Barrington	Glenview Park District	City of Palos Hills
Village of Bartlett	Village of Harwood Heights	City of Prospect Heights
Village of Bellwood	City of Highland Park	City of Rolling Meadows
Village of Brookfield	Village of Hinsdale	Village of Rosemont
Village of Burr Ridge	Village of Inverness	City of St. Charles
Village of Cary	Village of Kildeer	Village of Schaumburg
City of Chicago	Village of Lake Zurich	Village of Schiller Park
Village of Deer Park	Leyden Township	Village of Skokie
City of Des Plaines	Village of Lincolnshire	Village of South Barrington
Des Plaines Park District	Village of Lincolnwood	Village of Streamwood
Downers Grove Park District	Village of Morton Grove	Metropolitan Water Reclamation
City of Elgin	Village of Mount Prospect	District of Greater Chicago
Elk Grove Village	Village of North Aurora	City of Waukegan
City of Elmhurst	Village of Northbrook	Village of Wheeling
Village of Elmwood Park	City of North Chicago	Village of Wilmette
City of Evanston	Village of Northfield	Village of Willowbrook
Village of Forest Park	Northfield Township	Village of Winnetka
Village of Franklin Park	Village of Oak Brook	Village of Woodridge

County Governments and Agencies

Boone County State's Attorney's Office	Forest Preserve District of DuPage	Lake County
Forest Preserve of Cook County	County	Lake County Forest Preserve District
Cook County State's Attorney's Office	Kane County	Lake County State's Attorney's Office
DuPage County Board of Review	Kendall County Board of Review	

State and Federal Government Agencies

Federal Deposit Insurance Corporation	Illinois Housing Development Authority	Internal Revenue Service
U.S. General Services Administration	Illinois State Toll Highway Authority	The U.S. Postal Service

Schools

Argo Community High School	Consolidated High School	Morton College
District No. 217	District No. 230	Niles Elementary District No. 71
Arlington Heights District No. 25	Darien District No. 61	North Shore District No. 112,
Township High School District No.	DePaul University	Highland Park
214, Arlington Heights	Elmhurst Community Unit School	Northwestern University
Barrington Community Unit District	District No. 205	Rosalind Franklin University
No. 220	Indian Springs School District No. 109	Roselle School District No. 12
Chicago Board of Education	LaGrange School District No. 105	Schaumburg Community Consolidated
Chicago Ridge District No. 127½	Loyola University	District No. 54
College of Lake County	Lyons Township High School District	University of Illinois
Community Consolidated School	No. 204	Wheeling Community Consolidated
District No. 146	Maine Township High School District	District No. 21
	No. 207	Wilmette District No. 39

PLAN COMMISSION PROJECT TIMELINE

Project Name: The Moorings PUD Amendment
PC Number: PC 15-012
Location: 811 E Central Road
Requested Action: PUD Amendment

	Date	# of Business Days
Plat and Sub Committee Meeting	11-12-14	
Awaiting Petitioner PC Application	7-10-15	8 months
PC Application Submittal Date	7-10-15	
1 st Round Department Comments	8-5-15	26 days
Petitioner's Response	9-10-15	12 days
2 nd Round Department Comments	9-22-15	12 days
PC Hearing*	9-30-15	82 days from application date
Village Board	10-19-15	20 days

Note:

* Legal notice; State Statute requires 15 to 30 days notice.



Item: Review of FY2015 Comprehensive Annual Financial Report (CAFR)

Department: Finance

Review of FY2015 Comprehensive Annual Financial Report (CAFR) - Mr. Ron Amen, Lauterbach & Amen, LLP

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:



Item: Lexington Homes - 900 W. Campbell St. - Early Review

Department: Planning & Community Development

Background

Lexington Homes is the contract purchaser of multiple properties located in the 900 block of West Campbell Street. Previously, a developer (D.R. Horton) presented to the Village Board a Plat of Subdivision for 6 single family lots with an additional lot for detention. The Plat included partial construction of Kennicott Avenue. The Village Board tabled the project on December 15, 2014 and requested that the developer attempt to develop the area in a more comprehensive manner. Since that time, the previous developer no longer has the property under contract as Lexington Homes has verbally indicated that they have all the properties on the block (except for those fronting on Patton Avenue) under contract.

Attached is a proposed conceptual Plat of Subdivision to subdivide the area into 15 single family lots with one lot for detention which fronts on Sigwalt Street. Kennicott Avenue would be fully constructed and dedicated to the Village. Detention would be placed along Sigwalt Street given the natural grade of the land. As with other detention facilities, the Village would take ownership of the detention to better ensure long term maintenance.

Storm water management must meet the requirements of the Metropolitan Water Reclamation District (MWRD). It should be noted that the MWRD approved a Watershed Management Ordinance (WMO) in May 2014 which modified detention basin design in Cook County. The MWRD now allows for and encourages the use of open detention basins within the combined sewer area and promotes the use of bio swale/rain gardens within development detention basins. Underground detention may be an option however until detailed engineering plans are submitted for review, staff does not know at this point if underground detention is feasible. As with the recent Christina Court Subdivision, the Village would require a fee for maintenance for an agreed to period of time.

Lexington Homes, after consultation from Village Staff, is seeking Early Review of the Village Board pursuant to the Early Review Guidelines, guideline #6 for projects deemed unique by the Village Manager. Given that a previous subdivision for this site was tabled, and the previous direction provided by the Board, this project qualifies for Early Review. The purpose of Early Review is for the Board to provide general

direction to the developer regarding the conceptual plans presented. Staff is supportive of this concept as it addresses issues raised by the Board in December, 2014 by developing the site in a comprehensive manner, including proper siting of the detention and full improvements for Kennicott Avenue. This concept is also consistent with Option B which was previously forwarded to the Board as part of a status report in February, 2015.

Recommendation

It is recommended that the Board evaluate the conceptual plat of subdivision and provide direction regarding the proposed development.

Bid Section

Item:

Bid Opening Date:

Account Numbers:

Total Budget for Specific Item:

Bid Amount:

ATTACHMENTS:

Description	Type
Letter requesting Early Review	Correspondence
Conceptual Plat of Subdivision	Exhibits
Elevations 1	Exhibits
Elevations 2	Exhibits



Sept 24, 2015

Randall Recklaus, Village Manager
Village of Arlington Heights
33 S. Arlington Heights Road
Arlington Heights, IL 60005

SUBJ: REQUEST OF LEXINGTON HOMES FOR 'EARLY REVIEW' FOR OUR PROPOSED NEW
SUBDIVISION AT 909 W. CAMPBELL STREET, TENTATIVELY CALLED 'LEXINGTON AT
ARLINGTON SQUARE'

Dear Mr. Recklaus,

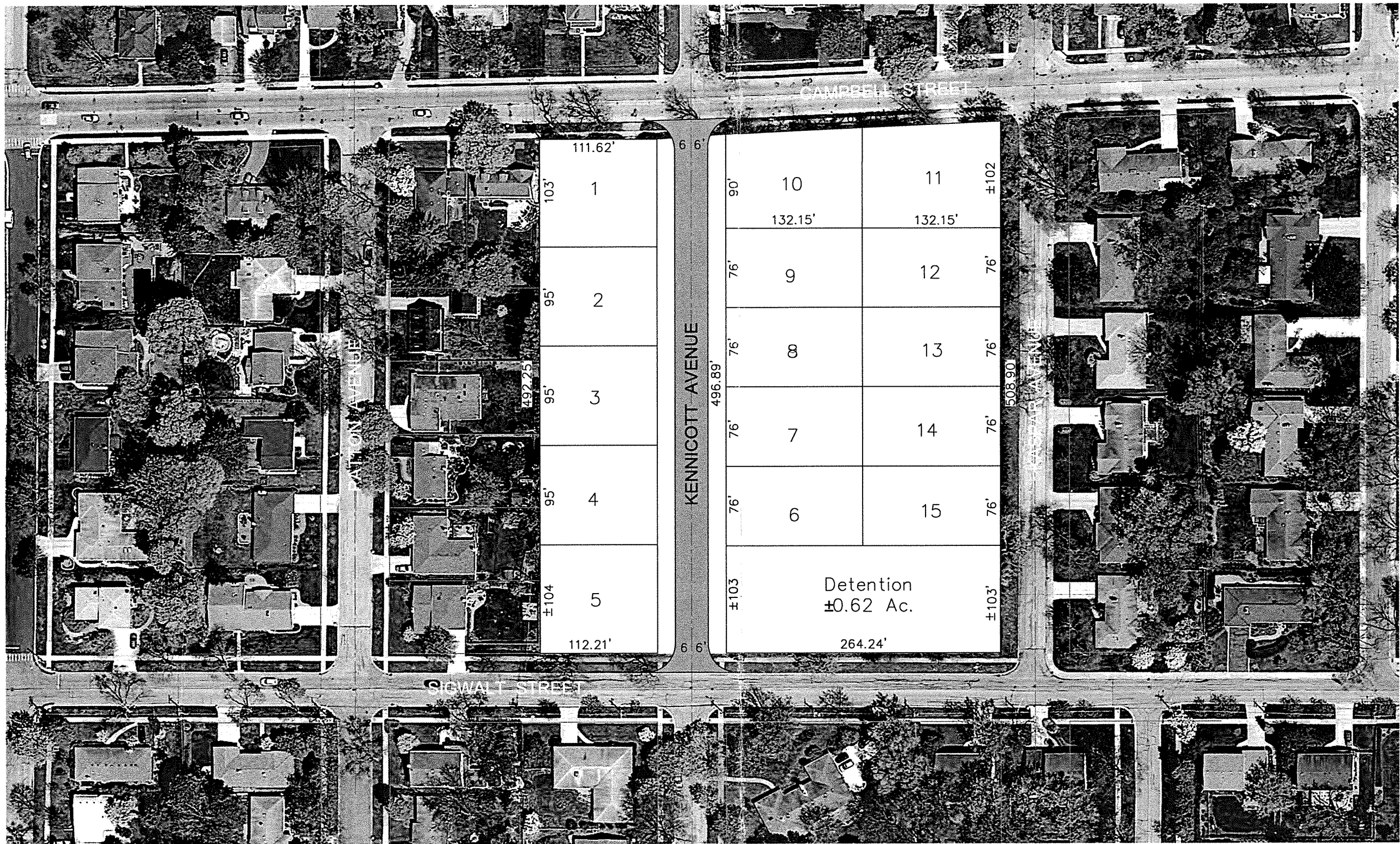
With this letter, Lexington Homes is requesting an 'Early Review' of the Village Board of our proposed 'Lexington at Arlington Square' 15 lot single family subdivision at 909 W. Campbell Street in order to provide direction to Lexington on the acceptability of the development plan. I have attached a draft of our site plan, showing 15 lots and a Village owned detention basin at the northwest corner of Kaspar and Sigwalt. I've also attached two house plans that will be offered in the subdivision. Please note that these plans show side swing garages, which cannot fit on the lots we have proposed, so they will be modified to become front loaded two car garages.

If the Village does grant our request, please let me know the day, the time, and the materials you wish submitted.

Sincerely yours,

Bill Rotolo, VP
Acquisitions/Entitlements
Lexington Homes

Cc: Charles W. Perkins
Bill Enright



SITE DATA

	ACRES	PERCENT	
TOTAL SIZE	4.69	100.00	MINIMUM LOT SIZE.....10,000 S.F.
AREA IN R.O.W.	0.37	7.89	AVERAGE LOT SIZE.....10,744 S.F.
AREA IN DETENTION	0.62	13.22	MINIMUM LOT WIDTH.....75 FT INTERIOR; 90 FT CORNER
AREA IN LOTS	3.70	78.89	YARDS
			FRONT.....25 FT
TOTAL NUMBER OF LOTS...15			SIDE EXTERIOR.....10 FT
GROSS SITE DENSITY.....3.20 D.U./AC			SIDE INTERIOR.....10% L.W.
			REAR.....30 FT



Job # 1315
Date 09-14-15
Scale 1"=100'

Revisions

LEXINGTON HOMES
1731 NORTH MARCEY
SUITE 200
CHICAGO IL. 60614

SITE PLAN
CAMPBELL STREET
ARLINGTON HEIGHTS IL.

JEN LAND LLC
LAND PLANNING DESIGN CONSULTATION
P.O. BOX 4397 • OAK PARK, IL 60304
P/F 708.848.4350 • www.jenland.com



EXTERIOR B



EXTERIOR C



EXTERIOR D

WOODLEAF

at The Sanctuary Club

23103 N. Sanctuary Club Drive, Kildeer, IL 60047 • (847) 531-6300
www.woodlefsanctuaryclub.com

Lexington Homes
 LUXURY PROPERTIES

In a continuous effort to improve our product, Lexington Homes reserves the right to change, from time to time, specifications and dimensions. All dimensions shown are approximate. The depicted information is not warranted or guaranteed.

APRIL, 2015



THE WILLOW



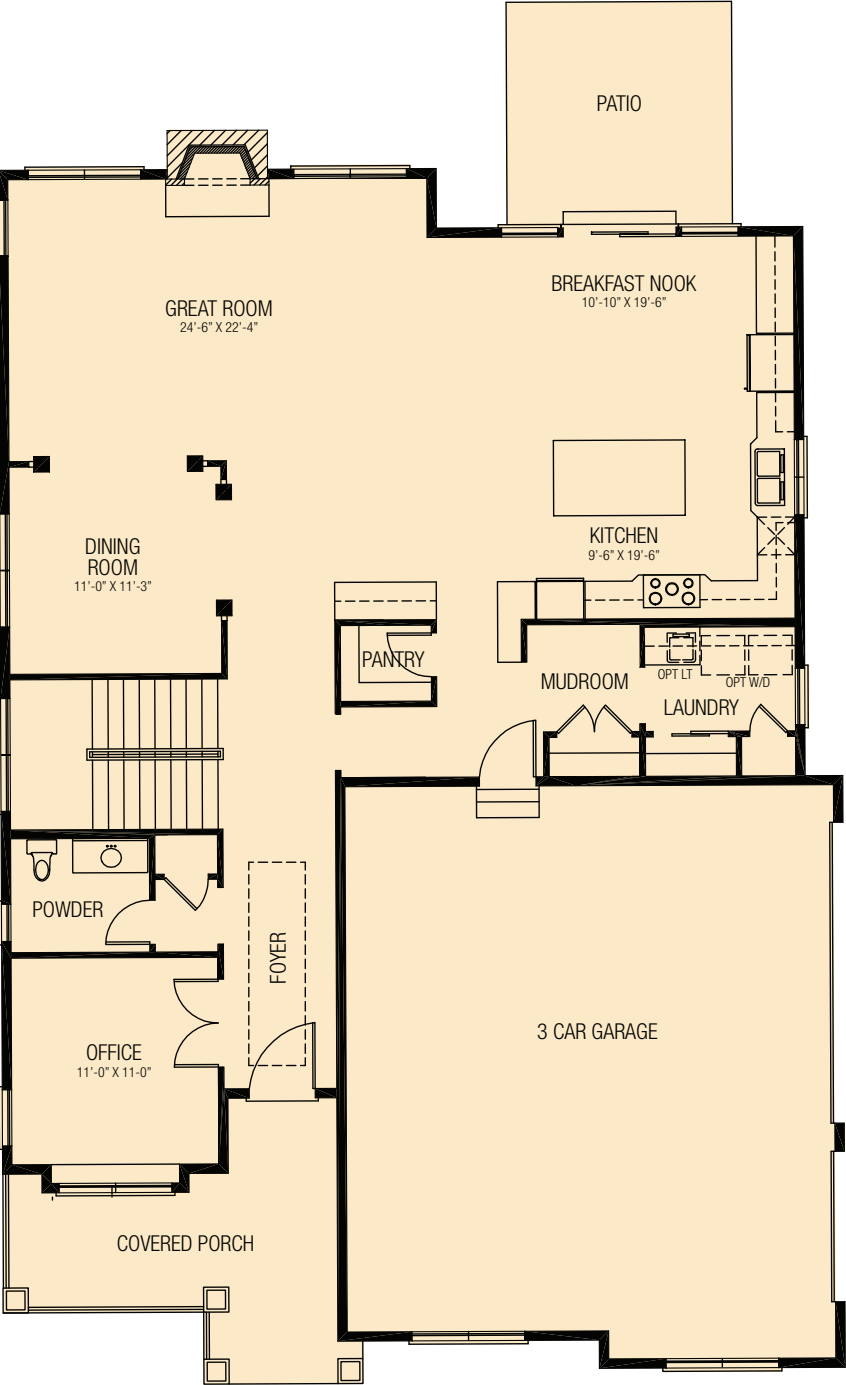
A SINGLE-FAMILY RESIDENCE WITH FOUR BEDROOMS
 AND THREE AND ONE-HALF BATHS.

WOODLEAF

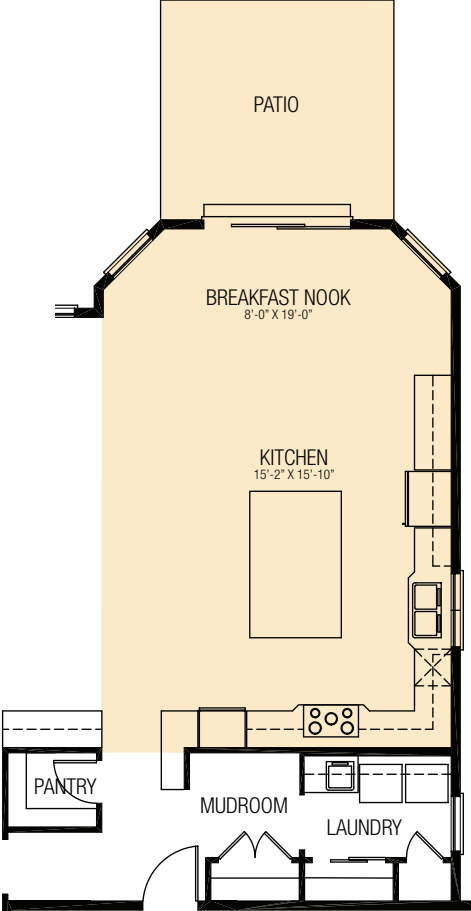
at The Sanctuary Club

THE WILLOW

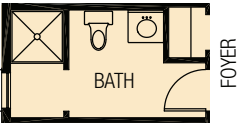
A SINGLE-FAMILY RESIDENCE WITH FOUR BEDROOMS AND THREE AND ONE-HALF BATHS.



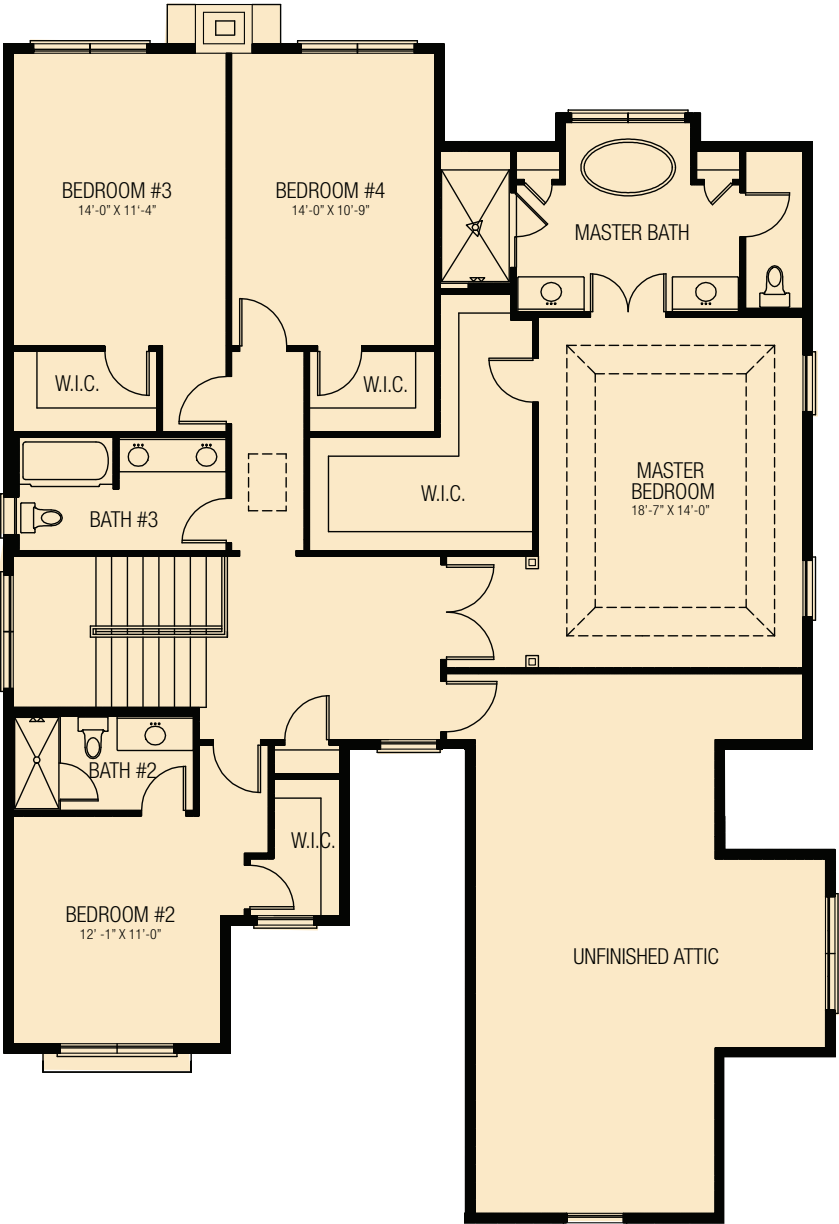
FIRST FLOOR PLAN



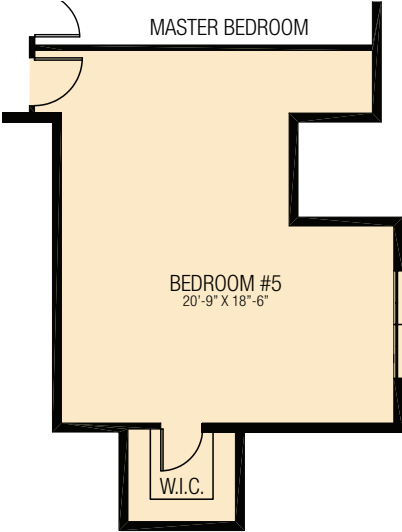
OPTIONAL EXPANDED
KITCHEN / BREAKFAST AREA



OPTIONAL FIRST
FLOOR FULL BATH



SECOND FLOOR PLAN



OPTIONAL BEDROOM #5

WOODLEAF
*at The
Sanctuary Club*

In a continuous effort to improve our product, Lexington Homes reserves the right to change, from time to time, specifications and dimensions. All dimensions shown are approximate. The depicted information is not warranted or guaranteed.



EXTERIOR B



EXTERIOR C



EXTERIOR D

WOODLEAF *at The Sanctuary Club*

23103 N. Sanctuary Club Drive, Kildeer, IL, 60047 • (847) 531-6300
www.woodleafsanctuaryclub.com

LexingtonHomes
LUXURY PROPERTIES

In a continuous effort to improve our product, Lexington Homes reserves the right to change, from time to time, specifications and dimensions. All dimensions shown are approximate. The depicted information is not warranted or guaranteed.

APRIL, 2015



JUNIPER

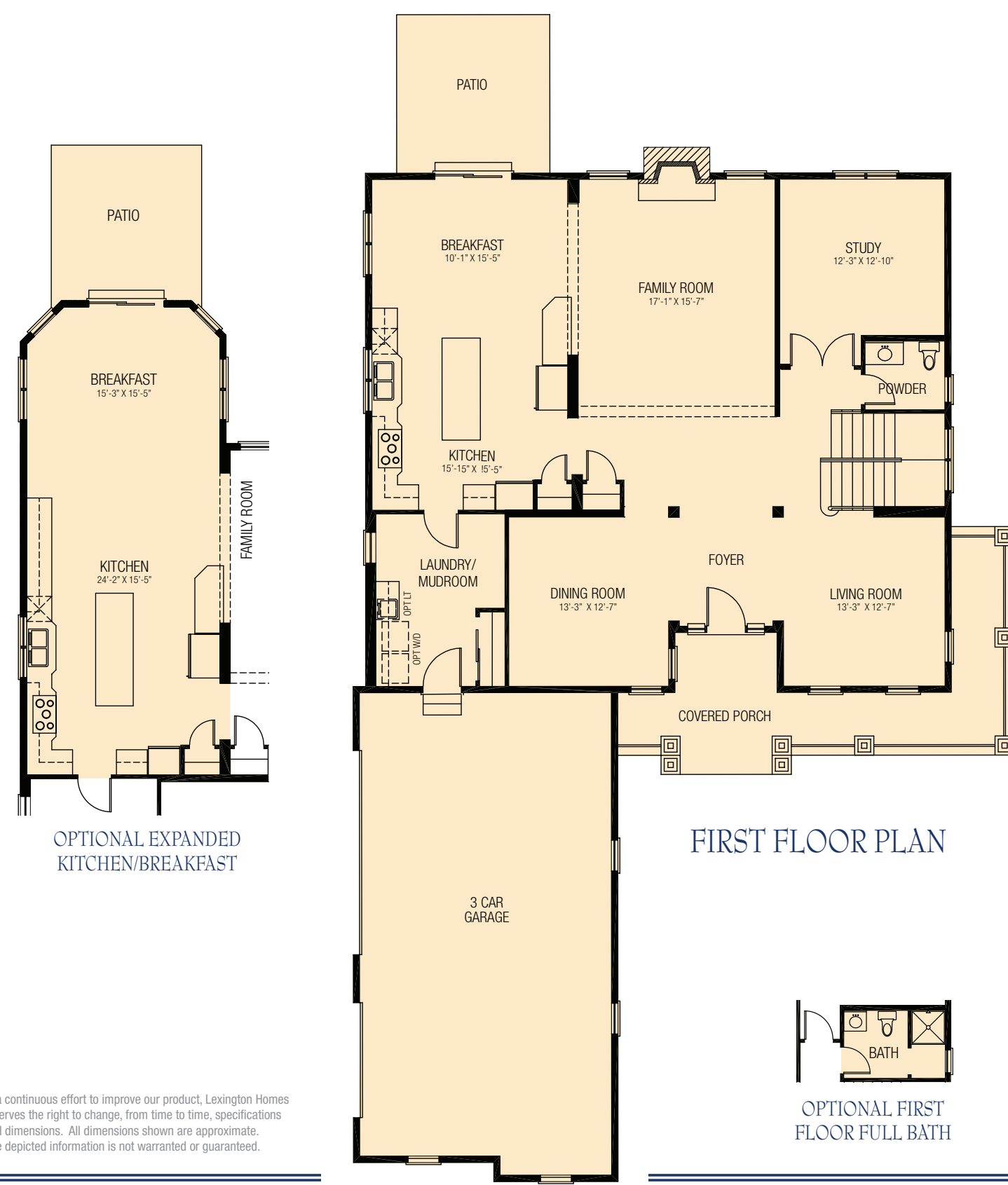


A SINGLE-FAMILY RESIDENCE WITH FOUR BEDROOMS
AND THREE AND ONE-HALF BATHS.

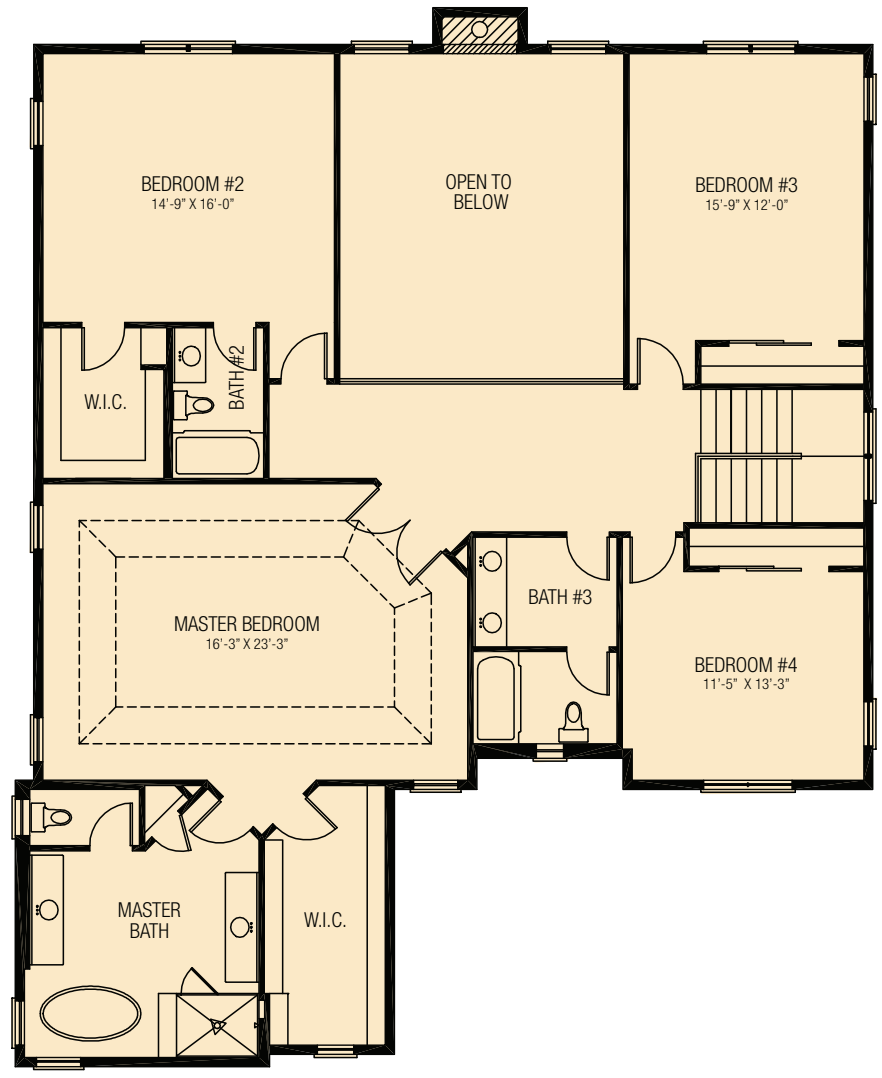
WOODLEAF *at The Sanctuary Club*

JUNIPER

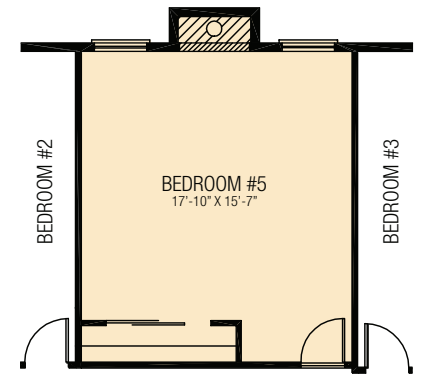
A SINGLE-FAMILY RESIDENCE WITH FOUR BEDROOMS
AND THREE AND ONE-HALF BATHS.



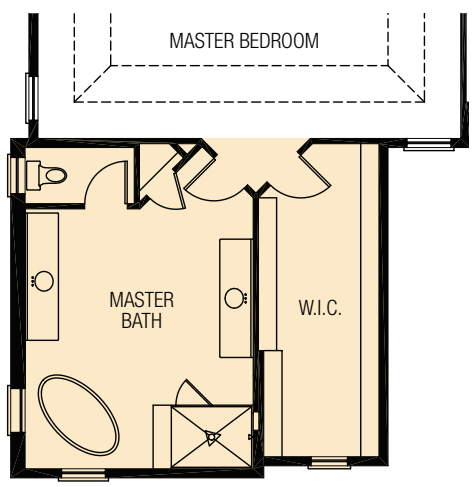
FIRST FLOOR PLAN



SECOND FLOOR PLAN



OPTIONAL BEDROOM #5



OPTIONAL EXPANDED MASTER BATH / W.I.C.

In a continuous effort to improve our product, Lexington Homes reserves the right to change, from time to time, specifications and dimensions. All dimensions shown are approximate. The depicted information is not warranted or guaranteed.

WOODLEAF
at The
Sanctuary Club