

Memorandum

Winnetka Park District

To: Ann Klaassen, Assistant Director of Community Development

From: Costa Kutulas, Director of Parks and Maintenance

Subject: Special Use Permit Review #1 – Centennial Park + Beach 255 Sheridan Road – (Case No. 24-08-SU) Review Responses (WPD)

We greatly appreciate the Village of Winnetka's thorough review of the documents submitted for the Special Use Permit Review for Centennial Park + Beach (225 Sheridan Road). The following responses are a direct result of your insightful comments.

The responses are being provided in order as they appeared on the April 22, 2024, memo regarding the project review comments. All drawings are numbered to the correlating question answer, as noted in the responses here.

If additional clarification is needed after the staff reviews the responses and you would like to meet to discuss it, please let me know, and I will be happy to schedule a meeting.

If no additional questions are needed, please let us know the next steps and meeting schedules for the next step in our project's Special Use Permit review.

Community Development Review Responses

1.) The written portion of the application indicates a special use permit is already in place for the existing park and beach. Do you have any record of such a special use permit being approved by the Village, such as an ordinance or resolution?

Response: The Park District was under the impression that there was a previous Special Use Permit submitted in 1995 when the Centennial Dog Beach was installed. We were unable to find the prior application. We now anticipate that this project will be submitted as a new Special Use Permit application based on conversations with village staff.

2.) The written narrative states that the proposed project includes "Emergency and maintenance vehicle access to the beach area". Please describe in what manner such access is being provided.

Response: The project allows for access from the parking lot through the park via a widened sidewalk (10') down the ADA ramp (10'6'') to the elevated boardwalk (12'6'') at

the toe of the bluff (elevation 587.5'- 589'), which then can be used to access the swimming beach on the north side of the pier structure either by stair access or ADA ramp access (10'6"). The Off-Leash Dog Beach can be accessed down the same path from the parking lot down to the boardwalk level (elevation 587.5'- 589'), then down an access stair (7') at the dog beach entrance or maintenance access on beach level (9') fencing that is parallel to the steel sheet piling through a double gate (8'). Emergency Personnel would be able to access either of these pathways as needed with their equipment (not an ambulance or firetruck), and maintenance personnel would be able to access these areas with small equipment for maintenance purposes.

3) The Special use standards narrative should also address how the requested exceptions meet the special use permit standards.

Response: We planned on presenting these standards to each Board or Commissions as part of our presentations. Please let me know if you need to review these ahead of those meetings.

4) Please provide detailed description of the proposed activities and uses that will occur in Centennial Park and Beach, including (a) on the dog beach, (b) on the "human" beach, including on the pier (c) on the slope impact area, as defined by Village Code Chapter 17.82, Steep Slope Regulations, and (d) on the entire tableland area of the park.

a. Provide a description of the types of activities that will occur in each of the four areas.

Response: (a) The off-leash dog beach is being proposed as a beach that residents & non-residents (paid pass holders) can recreate with their dogs off-leash in a beach environment. (b) the "human" beach is designed to provide recreational space for both residents and non-residents to enjoy the beach environment. Some of these activities could include swimming, sunbathing, sand castle building, beach walking, etc. (c) activities within the slope impact area, including an ADA walking path and stairs for access to and from the beach, or access to mid-bluff seating area and passive park space. A section in the mid-bluff (currently existing) will remain a passive park seating area for patrons to enjoy the beautiful view of the lake and environment. (d) the tableland area will be maintained as parkland, which includes sidewalks, seating nodes, and open green space for the community to enjoy.

b. When will each of the four areas be open to the public? Time of the year, days of the week, time of day, etc.

Response: (a) the off-leash dog beach is proposed to be open year-round as the current On-leash dog beach is operated from dawn till dusk. A pass to access the proposed off-leash dog beach will be required and can be obtained by paying the service fee and submitting veterinarian records. (b) the "human" beach will be open, similar to our other swimming beaches, from dawn to dusk, yearly, with

swimming days and lifeguards on staff through the summer months (passes will be required while the beach is open when it is staffed with lifeguards). (c) the slope area, the ADA walkway and staircases will be open year round from dawn till dusk. (d) the upper parkland will be open year-round from dawn to dusk.

c. Which areas would require a pass to access? Please provide details regarding the passes, such as who will be able to secure a pass, is a fee required, how does one secure a pass, and other operational details related to each type of pass.

Response: Of the four areas noted, only two will require a pass, and all passes are offered to residents and non-residents with a slight difference in cost. (a) the offleash dog beach will require a pass. The pass can be acquired by completing a registration form at the WPD Administration Building. This pass is to ensure that all off-leash dog pass holder dogs are current with their vaccination records and pay for the key fobs and upkeep of the dog beach itself. (b) the "human" beach will also require a pass when the beach is open and staffed with lifeguards. Typically, from late May through early September (depending on staff availability) from 9 am till dusk. The pass can be secured on-site the day of or ahead of time at the WPD Administration Building.

d. Regarding each of the beach areas, would Park District personal (e.g., lifeguards, security, etc.) be on site?

Response: the "Human" Summing Beach would be the only site to staff lifeguards during the swimming season. Typically, from late May through early September (depending on staff availability) from 9 am till dusk. We also provide additional overnight security for the lakefront beaches during the beach season. The security measure is budgeted from year to year and open for review by the Park Board requiring approval of funding to support this initiative.

e. How does one get into and out of the dog park? The beach to the north of the pier?

Response: The dog beach is secured with an electronic gate system, accessible to individuals who register for an off-leash dog beach pass (Similar to the system in place today). The beach to the north, or the "human" beach, would be open, as noted previously, to anyone year round except for the swimming season hours. Then, the beach will be staffed with a beach attendant who will monitor access to those who have a beach pass.

f. Will there be a set of rules for use of any other of the four areas? Is so, please provide what those are?

Response: The rules for any of the sites would be the same that are in-place now for each use. Those rules can be found on the Winnetka Park Districts website with the link below. <u>https://www.winpark.org/beaches-parks/beaches/passes/</u>

g. Regarding the dog beach, are there any other applicable State, County, etc. regulations which the dog beach must comply (e.g. fencing requirements, leash requirements, etc.)? If so, what are they, and please provide a narrative regarding how the proposed dog beach complies?

Response: The Winnetka Park District would follow the current Cook County Department of Animal and Rabies Control and is looking to gain clarification on how Ordinance No. 04-O-44, § 6,11-3-2004 would be interpreted for an off-leash dog park which is on Lake Michigan. Similar requirements exist at other municipal off-leash dog beaches in Cook County. Our proposed design has fencing with a two-gate leash-up area surrounding three sides of the dog beach (similar to other municipal off-leash dog beaches in Cook County). Pass holders would be required to submit vaccination records and pay a yearly fee before receiving their passes.

h. For what parks and recreation activities will the tableland be used? Passive recreational activities or active recreational activities? Please describe.

Response: as noted previously in question 4)a. the tableland area will be maintained as parkland, which includes sidewalks, seating nodes, and open green space for the community to enjoy. The space is not designed to be formally programmed, but just like any open park space, if community members wanted to use the space for more of an "active recreation," i.e., playing frisbee or whiffle ball as an example, staff would not prohibit that type of pick-up play. Currently no programming is anticipated for the upper parkland.

i. Please provide any other details regarding the operational aspects for the four proposed areas of Centennial Beach and Park.

Response: Centennial Beach is open and accessible for beach walkers who would approach the site from the beach level.

j. Will the proposed improvements and use of the park and beach increase the usage of the park and beach from its current activity level? If so, how will the existing onsite parking accommodate the increased usage?

Response: The proposed developments are not anticipated substantially increase park usage as they primarily consist of improvements to public accessibility of the existing park and beach amenity spaces on the site and improvements to existing uses of the park and beach. Existing parking will remain as is and be provided on a first come first served basis for users. The Park District can accommodate additional parking at Elder Lane Park.

5. Explain in the written portion of the application what is meant by "bluff restoration".

Response: For the purposes of this project, bluff restoration refers to the process of removing targeted invasive species on the bluff (steep slope) areas of the site and

establishing new native vegetation. Our management and restoration plans aim to rehabilitate and diversify the plant communities in these areas to help stabilize the bluff, prevent erosion, protect and preserve the site, and restore native habitats. Our team has identified invasive and non-native tree species for removal in order to create space and sunlight for the successful planting of native trees and ground-plane vegetation. The bluff restoration plans further identify targeted invasive shrub and herbaceous species for removal. Removal and re-vegetation practices will follow best practices and industry standards as well as protocols and considerations unique to this site for slope stabilization. Trees to be removed from the bluff areas will be cut flush with the surface and treated in place with their stumps and root mass to remain to ensure slope stability. New native vegetation planting plan utilizes carefully selected native vegetation that is well adapted to the site with fibrous root systems to hold the soil and slope in place. All areas of the bluff restoration planting will be seeded with a native cover crop, protected with a straw blanket, and enhanced with native plugs planted through the blanket. Any areas of the bluff disturbed for construction activities would be further restored with soil, plantings, and a decomposable yet durable erosion control mat.

6. Clarify access through the dog beach for the public traversing the beach.

Response: Public access is not provided through the dog beach area but it is provided behind the dog beach area along the west and south shorelines. Notations have been added to the plan sheet C137 to indicate public access across the beach.

7. You must designate slope impact area, which includes the steep slope zone and slope transition area, on a topographic plan sheet, and provide the necessary cross sections to support these designations. Please see Engineering comments.

Response: The Plan Sheet and Cross Sections are noted in drawings CS-6 – CS-10.

8. Once you define the steep slope zone, please describe as specifically as possible the requested exceptions (e.g., stairs (walkway) greater than five feet in width and landings greater than 50 square feet; any retaining walls being installed that are not for slope stabilization, such as for any new seating area within the steep slope zone, etc.)

Response: The steep slope zone is identified on the plan sheet CS-6 and a chart of nonconforming elements is provided on the Overall Plan Sheet C137 to clarify elements requiring exceptions to build in the steep slope zone and within the 50' set back from the front yard ordinary high water mark.

9. The concrete wall identified in View 2 on Sheet 102 is not included elsewhere on the plans. Please clarify.

Response: The concrete wall in question is actually an existing steel groin that runs along the southern edge of Centennial Beach. It appears to be concrete due to the color rendering for View 2 on Sheet C102.

10. Though the proposed work is for a portion of the property, for the special use permit application a proposed site plan for the entire property should be provided, so that the proposed improvements can be evaluated in the context of the full site.

Response: Sheet C101, provided with the original submittal, included all the elements. If additional images are needed, please let me know.

11. Provide a tree preservation plan and a landscape plan, including a list of proposed plant materials.

Response: Tree preservation plan is provided, see sheet C136. Landscape plan and Restoration Notes are provided, see sheets C139 and C149.

12. Provide a signed and sealed copy of the topographic/bathymetric survey by Terra Technology Land Surveying, Inc.

Response: A signed topographic/bathymetric survey by Terra Technology Land Surveying, Inc. will be delivered to the department of community development.

13. The plat of survey or topography needs to include: a. Lot area measured to the ordinary high water mark (OHWM); and b. Representation of the toe of the bluff.

Response: Updated plat of survey for Centennial includes lot measurements from the OHWM included. (b) The toe of the bluff is represented on Centennial Park Plat, which notes the toe of the bluff, including the steep slope zone and slope transition area, on sheet CS-6.

14. Without a plat of survey representing the OHWM and the toe of the bluff as defined by recently adopted Village Ordinance MC-01-2024 (a copy of which is attached), staff is not able to determine where the required front yard setback of 50 feet is located on the site. The zoning review cannot be completed without this information. Once you have demarcated the front lot line, as specially as possible identify the structures that will require a zoning variation from the front yard setback standard, and the justification for it.

Response: Please reference sheets CS-6 and C137 for this information.

15. The site plan rendering identifies an element to be removed with a gold dashed line. Is that the southernmost existing steel sheet pile? Would the northern steel sheet pile remain?

Response: The item noted for removal with a dotted gold line is one of the existing steel sheet pile groin, which is located near the middle of the beach. This steel will be removed, and a new steel sheet piling will be installed to create the pier element. This is the northernmost existing steel sheet piling owned by the WPD for Centennial Beach.

16. Provide details of the proposed ornamental fencing and the proposed dog fence (height, material, color), including the height of the fence on the breakwater.

Response: Handrail and fencing layout plan is provided, see sheet C140. Additional handrail and fencing details are provided, see sheets C143-C145.

17. Sheet C101 shows the fence for the dog park encroaching onto the "neighboring" property to the south. Please explain in your resubmittal why.

Response: The southern steel sheet piling runs from WPD property and is an existing WPD element that is in place and functioning. The fencing was added to the existing steel, as shown since this is a current WPD-maintained element to provide protection and a strong base for the fencing to attach to.

18. How will the fence for the park beach be constructed? The plan sheet shows only a fence, while the renderings show what appears to be a fence installed on top of a concrete wall. How tall will the dog fence (and any wall on which it may be installed) be from the existing grade?

Response: This portion of the fence, shown on the handrail and fencing plan (sheet C140), will be mounted to the existing sheet pile wall. Posts will be welded directly to the existing sheet pile wall cap. The fence will be set 5' above the sand profile and contour down, always maintaining a minimum elevation difference of 5' from the sand to the top of the fence as it projects east into Lake Michigan.

19. Clearly label all elements of the plan on all plan sheets (e.g. the landing between the walkway and the boardwalk, the structure immediately to the south of this landing, the purpose of gate to the south of "Relocated Dog Relief Station", etc.).

Response: Labels are provided on updated plans, see sheets C137.

20. Is there a way for someone to walk along the lake from the north edge of the beach to the south edge of the beach, or vice versa, without using stairs?

Response: No. Ramps are only provided to the swimming beach area to the north, but a public access staircase is provided on the south of the boardwalk to accommodate the public traversing the beach. As someone walks off of WPD property south, they would need to use stairs installed per the approved State and Federal permits for residents south of Centennial Park.

21. Please provide details (materials, finishes, colors, design etc.) of all proposed improvements (e.g. retaining walls, railings, fences, boardwalk, pilings, outcroppings, lighting, groin materials, etc.). so that the Zoning Board of Appeals will have a better understanding of the need for the required relief (variations and exceptions).

Response: Details for sheet piles, groin materials, and retaining walls are provided on the engineer's drawings. Details, materials, and cut sheets for site elements and improvements are provided on sheets C141-C148.

22. Fully dimension the plans. Including but not limited to the walks, boardwalk, ramp, width of pier, distance between the proposed dog beach fence and the new stone groin on the neighboring property.

Response: Fully dimensioned layout plan is provided, see sheet C138.

23. Provide details of proposed lights and identify all the proposed light fixtures on the plans.

Response: Low-level bollard light locations are provided on the plans, see sheet C137. Light fixture cut sheets are provided on sheet C147.

24. Are lights proposed for the pedestrian walk to the boardwalk?

Response: Low-level bollard lights are strategically provided at transition points along the public ADA access ramp to the beach at the staircase at the bottom of the ramp where it transitions to the boardwalk. Additional lighting is provided at critical points along the boardwalk on the west side of the boardwalk cast onto the walking surface. The park district does not want to encourage use of the park after hours but still provide a safety lit area should anyone need to access the beach after dark.

25. Provide details on how the boardwalk would be constructed and what it would be constructed of.

Response: Boardwalk structure details are provided on the engineer's drawings. Details for the material and finish of the boardwalk are provided on sheets C142.

Engineering Review Comment Responses

1. Per the recently adopted steep slope ordinance, a copy of which is attached, you must demarcate the location of the slope impact area, which includes the steep slope zone and the slope transition Page 4 area, in plan view and provide cross sections every 25 feet. If you have any questions, please reach out to the Engineering Department. Submittal must also provide information supporting how conceptually the design of the proposed plan within the slope impact area meets the Development Standards of Section 17.82.050.

Response: The Plan Sheet and Cross Sections are noted in drawings CS-6 – CS-10.

2. Provide plan sheets showing sheet pile bulkhead/shoreline layout and detail section plans for major components. This is necessary to better understand the design and impact of the boardwalk, ADA ramps, stairs, etc. Also, to better understand the beach that is being created and its impact, show plan sheets for the sand fill limits and the amount of sand to be brought in would be helpful to evaluate the proposed design of the overall improvements.

Response: The Plan Sheets for these cross sections are still in development and will be shared once completed.

3. Recommend that proposed 7-foot-wide pathway be continued to the circular vehicular island to create consistent accessibility and improved drop off/pick up.

Response: Updated per Request, increased to 10' to accommodate maintenance equipment.

 Proposed breakwater elevation will allow for wave action over the top of the proposed walkway, consideration should be given on how to improve safety at this location. Consideration should also be given as to eliminating accessibility for pedestrians to walk onto the stone groin rocks.

Response: We are proposing adding additional signage and a gate as needed to secure the pier with adverse weather conditions.

5. Will electrical service be required for the dog park FOB system or lights? If so, plans should highlight these locations and possible transformer locations.

Response: Electric for the dog beach gate and bollard lighting is required. The power distribution boxes are anticipated to be located on the bluff above an elevation of 591' or greater. Electrical Plans are being finalized and can be sent to the Village of Winnetka Engineering Department upon request.

6. Does the Park District plan on adding pedestrian lights along the pathway from the parking lot to the beach access, or will lights be installed along the boardwalk?

Response: At this time, no lighting is proposed running along the pathway from the parking lot to the top of the ADA access walkway. Low-level bollard lights are strategically provided at transition points along the public ADA access ramp to the beach at the staircase at the bottom of the ramp where it transitions to the boardwalk. Additional lighting is provided at critical points along the boardwalk on the west side of the boardwalk cast onto the walking surface. The park district does not want to encourage use of the park after hours but still provide a safety lit area should anyone need to access the beach after dark.

7. Park District should coordinate with the Police Department on placement of additional security cameras throughout the site.

Response: Currently no security cameras are proposed. Staff can have a discussion with Police if there is a requirement.

 Should the Council approve the requested exceptions for the Steep Slope ordinance, Engineering Department will still require detailed analysis of geotechnical and structural review for proposed walkway, retaining walls, board walk, and other proposed improvements within the slope impact area.

Response: Will provide upon request.

9. Engineering Department will require steep slope stabilization planting plan.

Response: The restoration planting design takes into account the need for slope stabilization both in the plantings being specified and through additional design measures including seed blanket and erosions control mat as described in Community Development Review Comment Response #5. Cut sheets are provided for the blanket and erosion control mat, see supplemental information attached.

10. If any trees are proposed to be removed as part of the proposed improvements coordination with the Village Forester is required at this time. Tree mitigation will be considered as part of final approval.

Response: Tree removals and preservation plan is provided with tree mitigation chart located on sheet C136. A portion of required replacements are shown on the Landscape Plan for restoration objectives, see sheet C139. It is the park district's intention to balance restoration objectives with the community's interest to preserve views to the lake.

11. Proposed fence around dog park, specifically along the southern end of the dog area, will need to be placed far enough away from the existing steel groin and new stone groin on neighboring property to allow for ample safe passage between the properties.

Response: The proposed dog beach fence is to be located on the existing steel groin to the south, offset 6' min. width from the new installed stone groin at the south neighbor property, as shown on sheet C138.

12. The new ramps are in conflict with two existing private storm sewers. The layout and renderings indicate the sewers will be removed. It also appears there is not a clear plan to replace the drainage function these provided. This could end up in debris and sheet flow onto the ramp and over the back of the retaining wall. Consider adding a drainage system to capture runoff up stream of the retaining wall.

Response: This is currently being reviewed/designed with the project engineers and can be sent to the Village of Winnetka Engineering Department upon request.

Coastal Engineer Review Comment Responses:

1. The proposed improvements appear to improve access for the public and public safety operations. However, the boardwalk terminated at the North end is unclear in the information provided. Please clarify the north end in more detail.

Response: The termination of the north section of the boardwalk was chosen to give enough space to protect the ADA beach ramp, and space for patrons to have an area to view the beach and lake without having to go down to the beach itself. We anticipate connecting this boardwalk to Elder Lane Beach as part of a future phase.

 Elevation of proposed pier (585' IGLD) seems justifiable since it is for pedestrian access. As conceptually submitted, this meets the "minimally necessary to achieve the intended and proper Page 5 purpose" requirements in the lakefront construction ordinance. However, the proposed pier will be frequently overtopped by waves and the concrete promenade should be detailed accordingly.

Response: WPD received the comment.

3. Proposed pier extends deeper/ further lakeward than existing steel sheet pile groin, will impact the shoreline shape, and should improve the shoreline/bluff protection in the immediate vicinity. The beach cells should be prefilled to minimize impacts to longshore sediment transport. I would expect the permit application to include an analysis of the

impacts to sediment transport and how the proposed shape of the beach fill was determined.

Response: WPD received the comment.

4. Overall, this plan set is more conceptual and includes less technical design information to comment further. These comments do not waive any future permitting requirements for lakefront construction ordinance or steep slope ordinance reviews.

Response: WPD received the comment.

5. Referring to 17.82.060, A, (8): I would not waive any of the required plans given the amount of development in the steep slope zone.

Response: WPD received the comment.

Fire Department Comment Responses:

1. Provide a clear, smooth, paved path (concrete walk) from parking lot to beach access.

Response: The proposed access route from parking lot to beach will meet the Fire Departments request.

2. Provide a knox box or other approved emergency access for the secured dog beach gate.

Response: Will address this access need with the both Fire and Police Departments.

3. Provide minimum 42" clear path between ornamental dog beach fencing and rock wall on the southern portion of the beach property.

Response: The proposed dog beach fence is to be located on the existing steel groin to the south, offset 6' min. width from the new installed stone groin at the south neighbor property, as shown on sheet C138.

Police Department Comment Responses:

- 1. In addition to Fire Department comments 1 and 3, the Police Department requests two additional improvements:
 - a. Appropriate lighting for areas of the beach property for evening hours; and

Response: Low-level bollard lights are strategically provided at transition points along the public ADA access ramp to the beach at the staircase at the bottom of the ramp where it transitions to the boardwalk. Additional lighting is provided at critical points along the boardwalk on the west side of the boardwalk cast onto the walking surface. The park district does not want to encourage use of the park after hours but still provide a safety lit area should anyone need to access the beach after dark.

b. Installation/updating of security cameras that best capture entry/exit, areas of concern at the beach, etc.

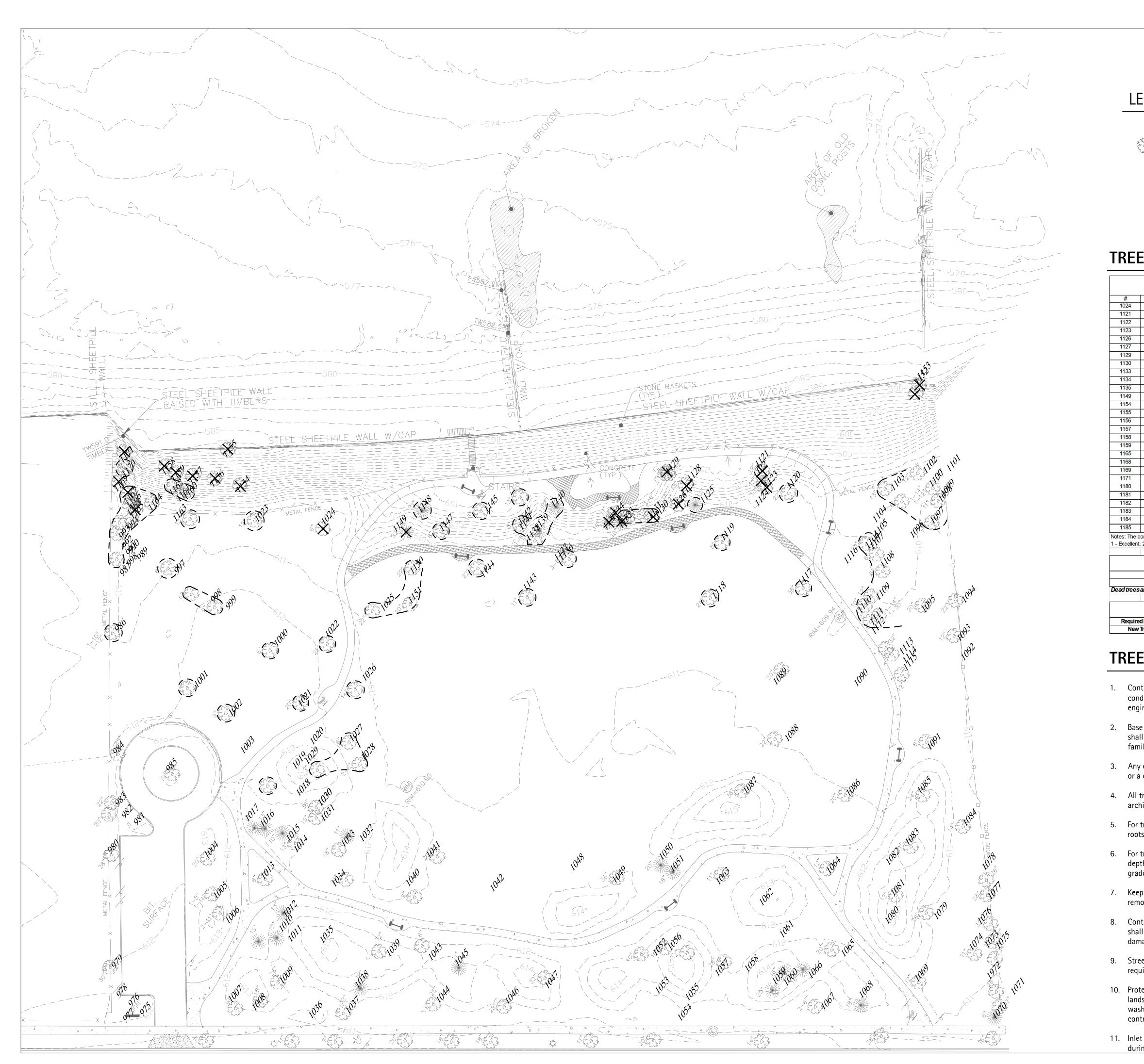
Response: Currently no security cameras are proposed. Staff can have a discussion with Police if there is requirement.

Water & Electric Department Comment Responses:

No comments to review

Response: WPD received the comment.

END



	Existing Trees to Remain
×	Existing Tree to be Removed
	Tree Protection Fencing, typ.

TREE REMOVAL LIST

	Tree Removals - Centennial Beach						
_	Caliper	Common Name	Species	Condition 2	Notes		
7 Tuliptree		and second and second second second	Liriodendron tulipifera	2			
	11.75	Black Locust	Robinia pseudoacacia	-			
		Black Locust	Robinia pseudoacacia	3			
	12	Black Locust	Robinia pseudoacacia	4			
	13.75	Black Locust	Robinia pseudoacacia	3	forked at 3' with co-leaders		
	15.75	Black Locust	Robinia pseudoacacia	4			
	12.5	Black Locust	Robinia pseudoacacia	3	forked at 3' with co-leaders		
	18	Black Locust	Robinia pseudoacacia	3			
	18.25	Austrian Pine	Pinus nigra	3			
	11.75	Black Locust	Robinia pseudoacacia	3			
	10.25	Austrian Pine	Pinus nigra	3			
	19	Austrian Pine	Pinus nigra	4			
	13	Norw ay Maple	Acer platanoides	2			
	35	Black Willow	Salix nigra	5	fallen over uprooted, cut off at w all		
11.75 Norw ay Maple		Norw ay Maple	Acer platanoides	3			
7.25 Norw ay Maple		Norw ay Maple	Acer platanoides	2			
11 Siberian Em		Siberian Em	Ulmus pumila	6	snapped off at 8'		
8 Norw ay Maple		Norw ay Maple	Acer platanoides	3			
17 Mulberry		Mulberry	Morus spp.	4			
8.5 Boxelder Maple		Boxelder Maple	Acer negundo	3			
	9	Green Ash	Fraxinus pennsylvanica	6	dead		
	24	Boxelder Maple	Acer negundo	5	on w ooden w all		
	6	Mulberry	Morus spp.	3			
	7.25	Mulberry	Morus spp.	3			
	6.75	Norw ay Maple	Acer platanoides	2			
	6	Norw ay Maple	Acer platanoides	2			
	7	Norw ay Maple	Acer platanoides	2	forked at base with a 5" co-leader		
	7.25	Tree-of-heaven	Ailanthus altissima	3			
			ed on a six (6) point scale 4-Fair to Poor, 5-Poor, 6-I		ng the best and six (6) being the w orst.		
			Total Quantity of Trees	Total Caliper			
			iotal quantity of fields	Inches			
	Trees to be Removed		11 and 1	269.5			
	Dead	Trees to be Removed	4	79			

	ces to be removed	20	200.0
Dead Ti	rees to be Removed	4	79
sare not factored into the total numbe		umberofreplacement t	rees.
		Total Quantity of Trace	Total Caliper
		Total Quantity of Trees	Inches
ed Replacemer	nt Trees (3" caliper)	30	90
			100 A.V. 1
Trees Provide	d (To be Confirmed)	9	36

TREE REMOVAL NOTES

1. 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.

2. Base information for these plans was taken from engineer's site survey. Contractor shall verify all dimensions and locations of existing and proposed features, and familiarize themselves with any obstacles encumbering the work of this project.

3. Any existing tree surveys or locations for these plans were prepared by the engineer or a certified arborist. See survey for more information.

4. All tree removals shall be tagged and confirmed by the contractor with the landscape architect and owner.

5. For tree removals in restoration areas, cut off flush with finished grade and leave roots in place so as not to disturb slope.

6. For tree removals outside of restoration areas, grind out stumps to a minimum of 18" depth and remove all roots prior to installation of proposed materials. Bring to finish grade with soil fill per specifications.

7. Keep all areas clean, neat, and orderly at all times. Legally dispose of all materials removed from the site per local codes and regulations.

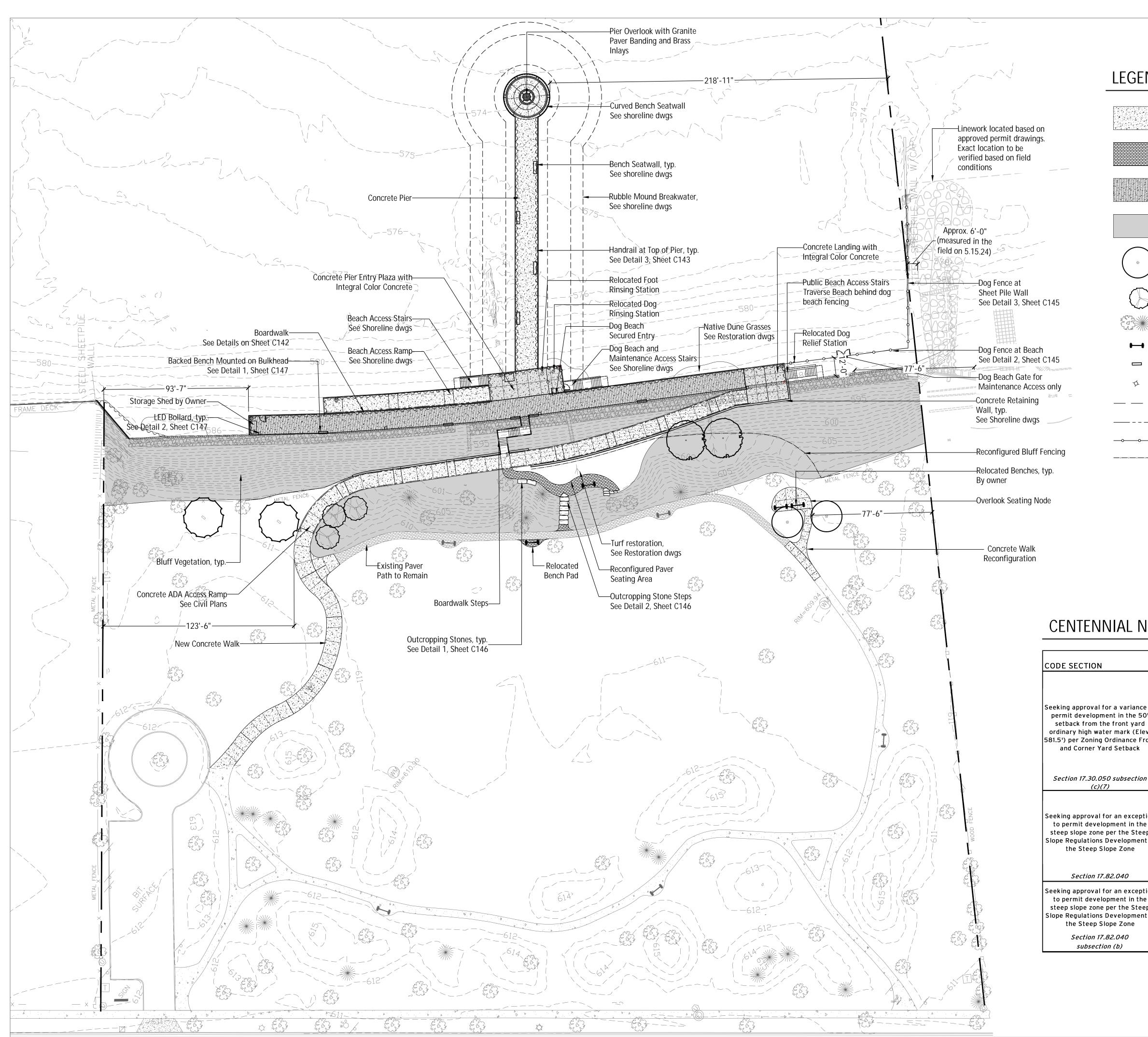
8. Contractor shall limit all work and disturbance to within designated project areas. It shall be the responsibility of the contractor to restore to the original condition any damage or disturbance outside these limits.

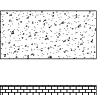
9. Streets, sidewalks, and adjacent property shall be protected throughout the work as required by local codes and regulations and as approved by the city.

10. Protect structures, utilities, sidewalks, pavements, fencing, furnishings, trees, and landscaping from damage caused by settlement, lateral movement, undermining, washouts, and other hazards created by site improvements. If any damage occurs, contractor shall repair to original condition at no additional cost.

11. Inlet filters are required at all existing catch basins and manholes within project limit during construction period. See civil plans.

RED BARN Design & Engineering, S.C. Image: Construction of the state of
Consultants THE AKOTA AK
Special Use Permit 05/23/24
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale 0' 15' 30' (In Feet) I Inch = 30 Ft.
Scale I Inch = 30 Ft.
Drawing Title Tree Preservation and Removals Plan
Sheet No. C136





Concrete Walks, typ.

Salvaged and Reinstalled Unit Pavers, typ.



H

¢



Bluff Restoration, typ. See Restoration Notes.

Proposed Shade Tree

Proposed Understory Tree

Existing Trees to Remain

Existing Bench to be Relocated

Backed Bench mounted on bulkhead

Bollard, typ.

— — Handrail Type A

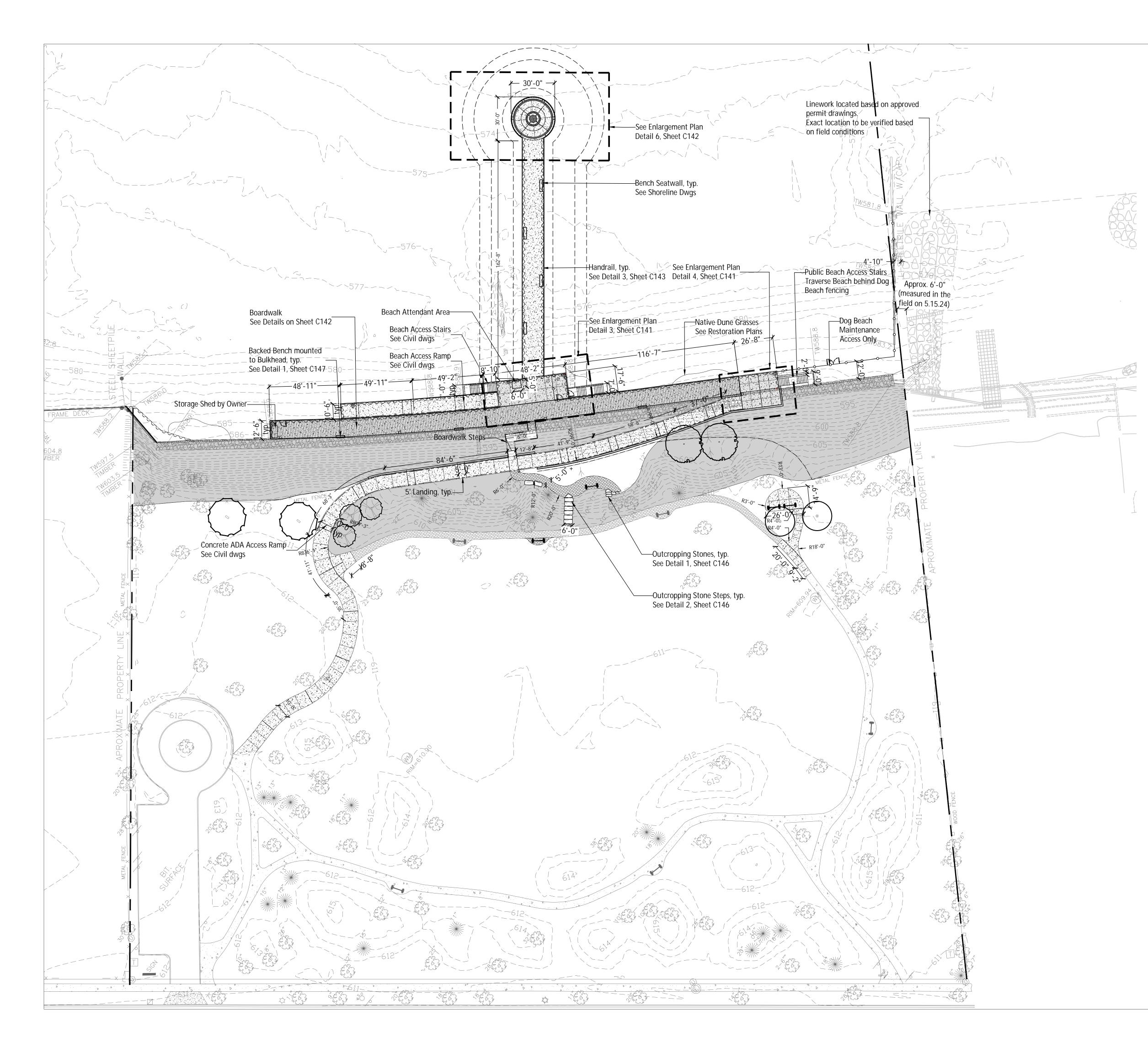
→ — Dog Beach Fencing

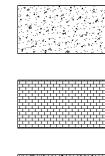
-x - x - x - x - x Ornamental Fencing, to match existing

CENTENNIAL NON-CONFORMING ELEMENTS

	NON-CONFORMING	
	ELEMENTS	RATIONALE
		Structural framework for beach access and
	Steel sheet pile bulkhead	boardwalk
		Primary shore protection per coastal
variance to	Steel Sheet piling repairs	engineering analysis
in the 50'	Boardwalk (elev. 589.0 to	
ont yard	587.5)	Accessibility and shoreline protection
ark (Elev.	ADA beach access ramp	ADA universal design
nance Front	Pier Structure	Swimming Beach stablization and entablement
etback		of dog beach geometry
	Beach access stair	Site connectivity
	Dog beach	Recreational asset
bsection		Environmental best practices per restoration
	Beach native dune grasses	ecologists
	Walkways and Sidewalks	ADA universal design and site connectivity
	ADA pedestrian &	
n exception	maintenance ramp	ADA universal design
nt in the	Staircase to park (top of	
the Steep	bluff to beach)	Site connectivity
elopment in	Outcropping stone steps	Recreational asset and site connectivity
Zone	Seating nodes and bench	
	pads	Recreational asset
	Bluff native	Environmental best practices per restoration
940	restoration/revegetation	ecologists
n exception		Structural framework for beach access and
nt in the	Steel sheet pile bulkhead	boardwalk
the Steep		
elopment in		Primary shore protection per coastal
Zone	Steel Sheet piling repairs	engineering analysis
	Access ramp walls	Required per civil engineering
940		
ソ		

RED BARN
Design & Engineering, S.C.
Hard P
6750 Woodland Drive
Waunakee Wisconsin 53597 p. 608.849.2042
c. 608.843.1870 redbarnde@tds.net
Consultants
THE
LAKOTA
GROUP.
1 East Wacker Drive
Suite 2700 Chicago, Illinois 60601
p 312.467.5445 f 312.467.5484 thelakotagroup.com
thelakotagroup.com ssued for Rev. Date
Village of Winnetka Special Use Permit 05/23/24
Project Title:
Site Improvements
Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District
Winnetka, IL
Graphic Scale
0' 15' 30'
(In Feet) 1 Inch = 30 Ft.
Scale 1 Inch = 30 Ft.
Drawing Title
Overall Site Plan
Sheet No.
C137





H

Concrete Walks, typ.

Salvaged and Reinstalled Unit Pavers, typ.

Boardwalk, typ.

Bluff Restoration, typ. See Restoration Notes, Sheet C149

Proposed Shade Tree

Proposed Understory Tree

Existing Trees to Remain

Existing Bench to be Relocated

Backed Bench mounted on bulkhead

Bollard, typ.

— — Handrail Type A

— − − − Handrail Type B
→ Dog Beach Fencing

RED BARN Design & Engineering, S.C.
₩ ₽ ₩₽
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants
THE LAKOTA GROUP. 1 East Wacker Drive
Suite 2700 Chicago, Illinois 60601 p 312.467.5445
f 312.467.5484 thelakotagroup.com
Issued for Rev. Date
Special Use Permit 05/23/24
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
0' 15' 30' (In Feet) 1 Inch = 30 Ft.
Scale 1 Inch = 30 Ft.
Drawing Title Layout Plan
Sheet No. C138



Concrete Walks, typ.

Salvaged and Reinstalled Unit Pavers, typ.

Boardwalk, typ.

Bluff Restoration, typ. See Restoration Notes, Sheet C149

Proposed Shade Tree

Proposed Understory Tree

Existing Trees to Remain

Existing Bench to be Relocated

Backed Bench mounted on bulkhead

Bollard, typ.

——––– Handrail Type B

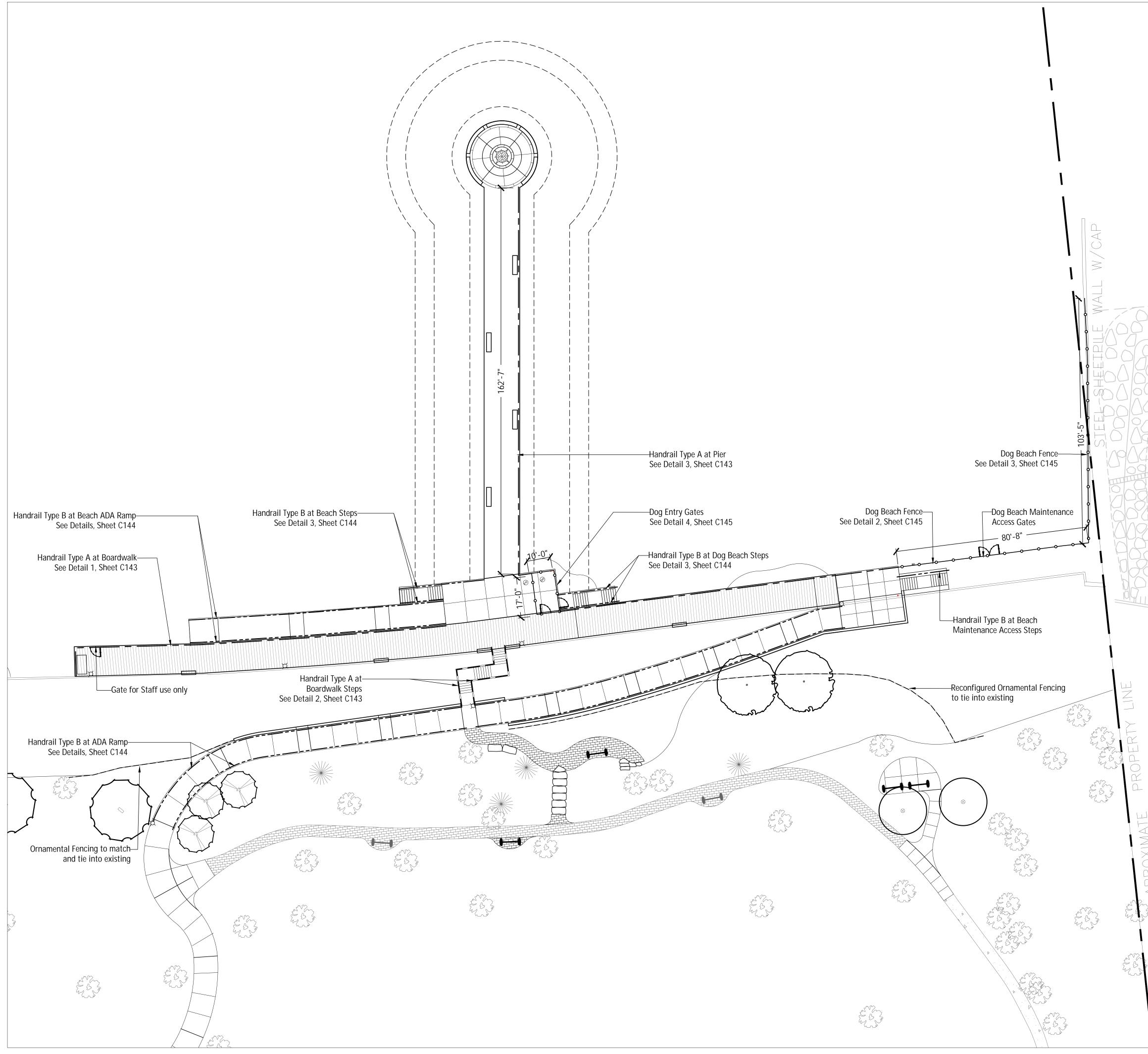
— Dog Beach Fencing

PLANT SCHEDULE

YMBOL	QTY	BOTANIC NAME	COMMON NAME	SIZE	SPACING
	DEES				
CO 3	2	Celtis occidentalis	Common Hackberry	4" caliper	B&B
LT 3	2	Liriodendron tulipifera	Tulip Tree	4" caliper	B&B
QM 3	2	Quercus macrocarpa	Bur Oak	4" caliper	BEtB
NAMENTA	L TREES	5			
	-				

CAR 3 3 Carpinus caroliniana American Hornbeam 3" caliper B&B

RED BARN Design & Engineeri	A Drive osin 53 042 870	e
Consultants THE LAKO LAKO GROU 1 East Wacker Drive Suite 2700 Chicago, Illinois 60 p 312.467.5445 f 312.467.5484 thelakotagroup.com Issued for Village of Winnetka Special Use Permit	601	
Project Title:		
Site Improvements Centennial Park Winnetka, IL		
Prepared For:		
Winnetka Park Distric Winnetka, IL	ct	
Graphic Scale 0' 15' (In Feet) 1 Inch = 30 Scale 1 Inch = 30		
Drawing Title Landscape Plan		
Sheet No. C139		

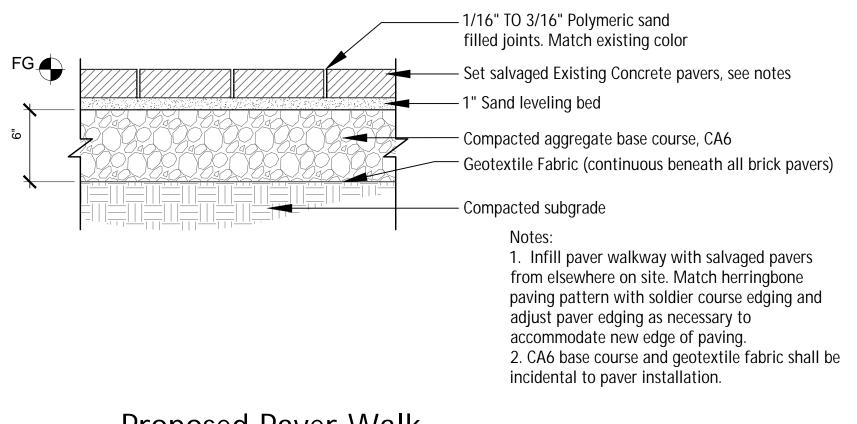


	Handrail Type A See Details, Sheet C143
	Handrail Type B See Details, Sheet C144
	Dog Beach Fencing See Details, Sheet C145
XXXXX	Ornamental Fencing, to match existing

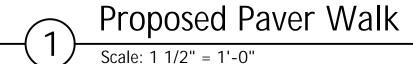
RED BARN Design & Engineering, S.C.
₽ ₽
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants THE THE AND AND AND AND AND AND AND AND AND AND
ssued for Rev. Date
Special Use Permit 05/23/24
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale 0' 10' 20' (In Feet) 1 Inch = 20 Ft.
Scale 1 Inch = 20 Ft.
Drawing Title Handrail and Fencing Plan
Shoot No
Sheet No. C140

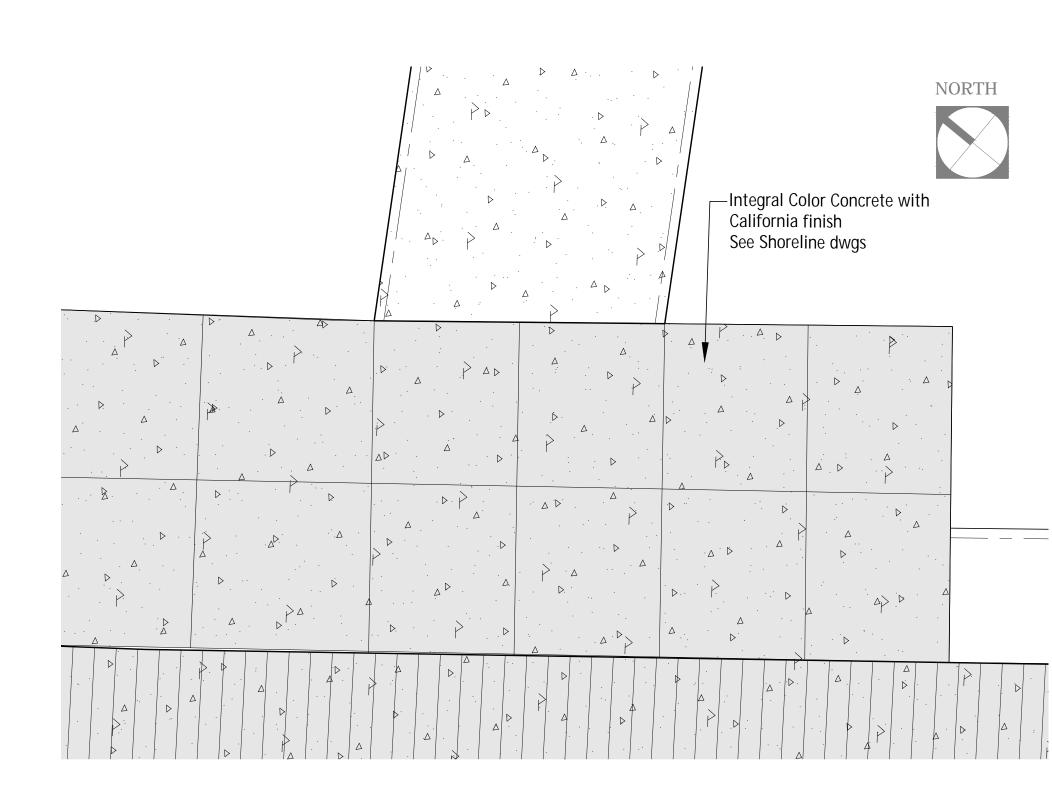


Existing Site Pavers to be salvaged and re-used. Engraved Pavers to be stockpiled and relocated at Owner's direction.

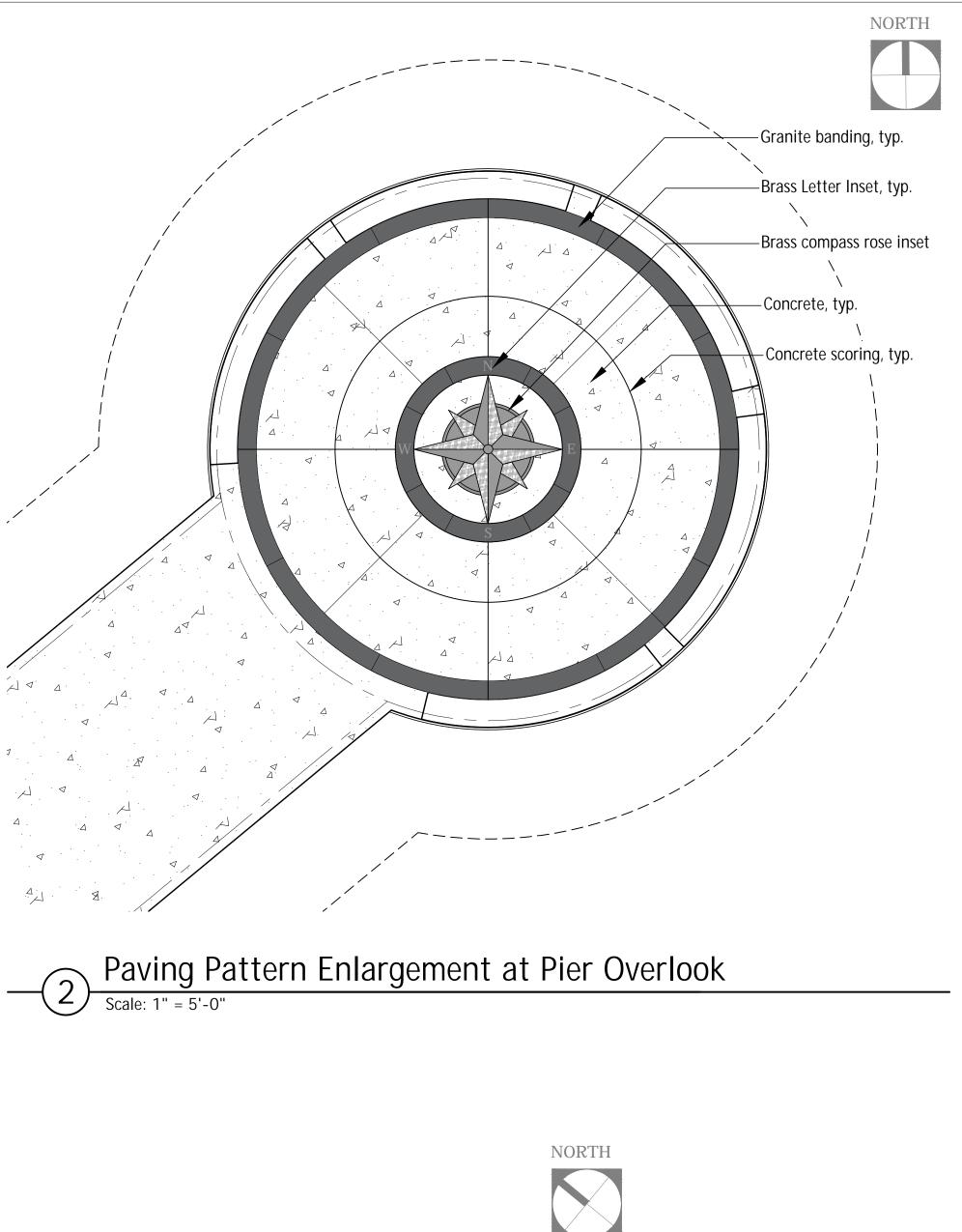


d-unit-paving





- 3 Paving Pattern Enlargement at Pier Scale: 1" = 5'-0"



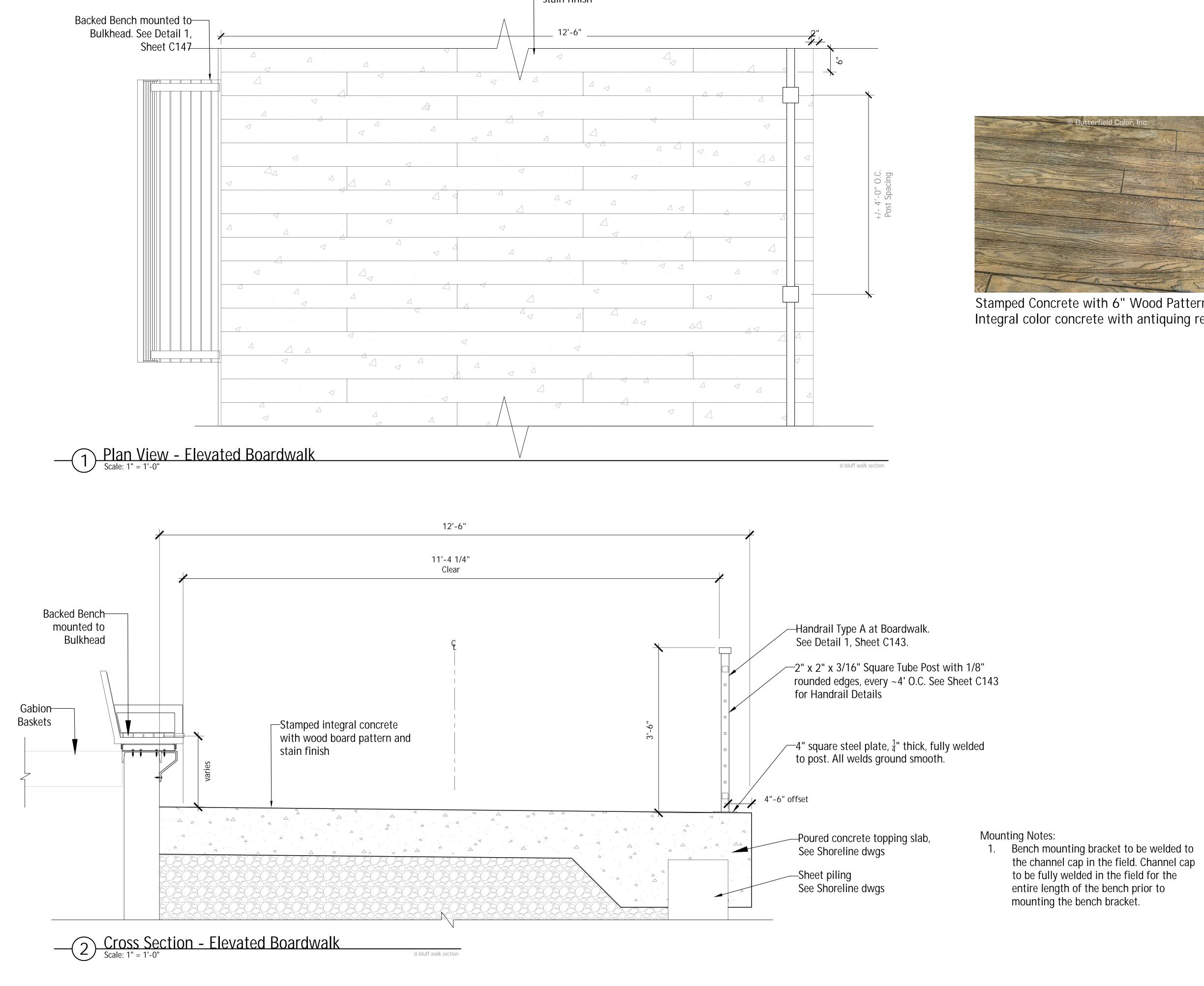
Integral Color Concrete with California finish See Shoreline dwgs

· D· · A				
	· · ·			
			Δ Δ.	
			· · · · · · ·	
. ľ.	· · · Δ ·			
			· >	·
		Δ. ·		
			· ·	
	Δ	· · · · · · · · · · · · · · · · · · ·		
	· · ·		· · · ·	Γ.Δ
	\triangleright		\triangleright^{Δ} .	
			·. ·	· · ·
	Δ.			
				· · 🖗 · ·
· · ·		· .	· Δ ·	
			· · ·	
	. Δ			\rightarrow
	· · ·	· .		
P 1	· · · ·		Δ	
	· · · ·			
▷ .	· Þ 🛛 .			· · · · · · · · · · · · · · · · · · ·
	<u> </u>			
	, · · · · · · · · · · · · · · · · · · ·		· Δ.	· .
				. >
	Δ.			
	Δ .	· .		.' : Δ
		ν.	· V	

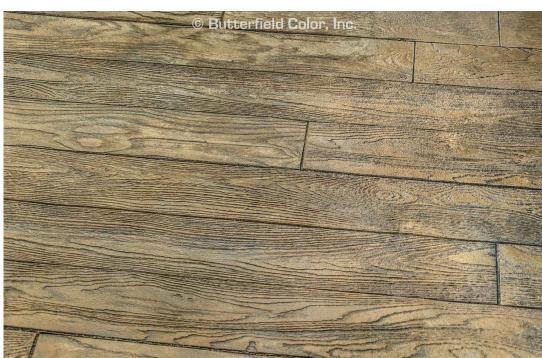
Paving Pattern Enlargement at Ramp Scale: 1" = 5'-0"

· Δ >			
•			
	<u> </u>		
2			
ŀ₿.			
۰ ۱			
· ·			
Þ			
\geq			
Þ			
4			
•			

RED BARN Design & Engineering, S.C.
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants THE LAKOTA LAKOTA GROUP . 1 East Wacker Drive Suite 2700 Chicago, Illinois 60601 p 312.467.5445 f 312.467.5484 thelakotagroup.com
Issued for Rev. Date Village of Winnetka
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
Scale None Drawing Title
Hardscape Details
Sheet No. C141

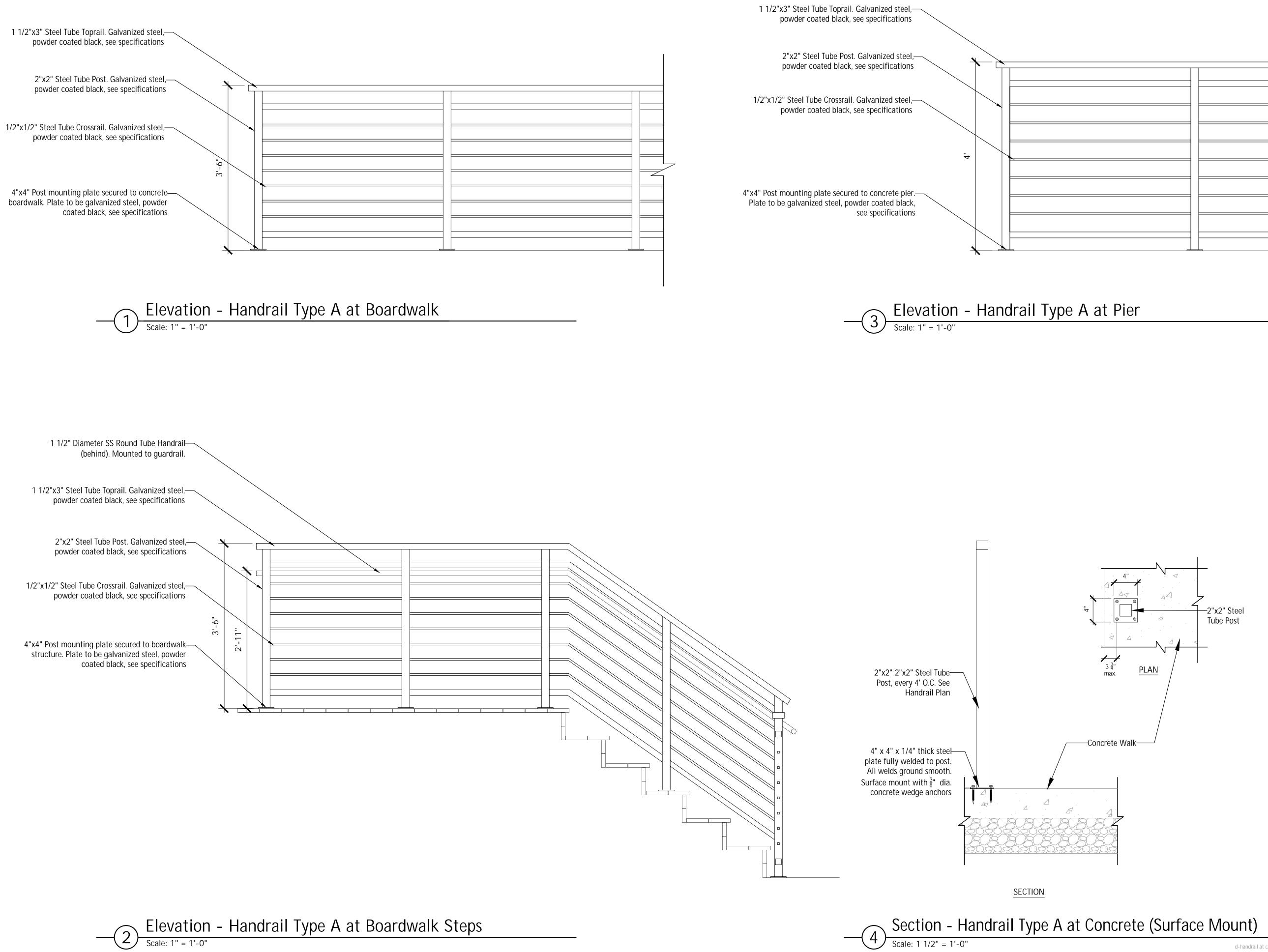


Stamped integral concrete with wood board pattern and stain finish



Stamped Concrete with 6" Wood Pattern Integral color concrete with antiquing release agent

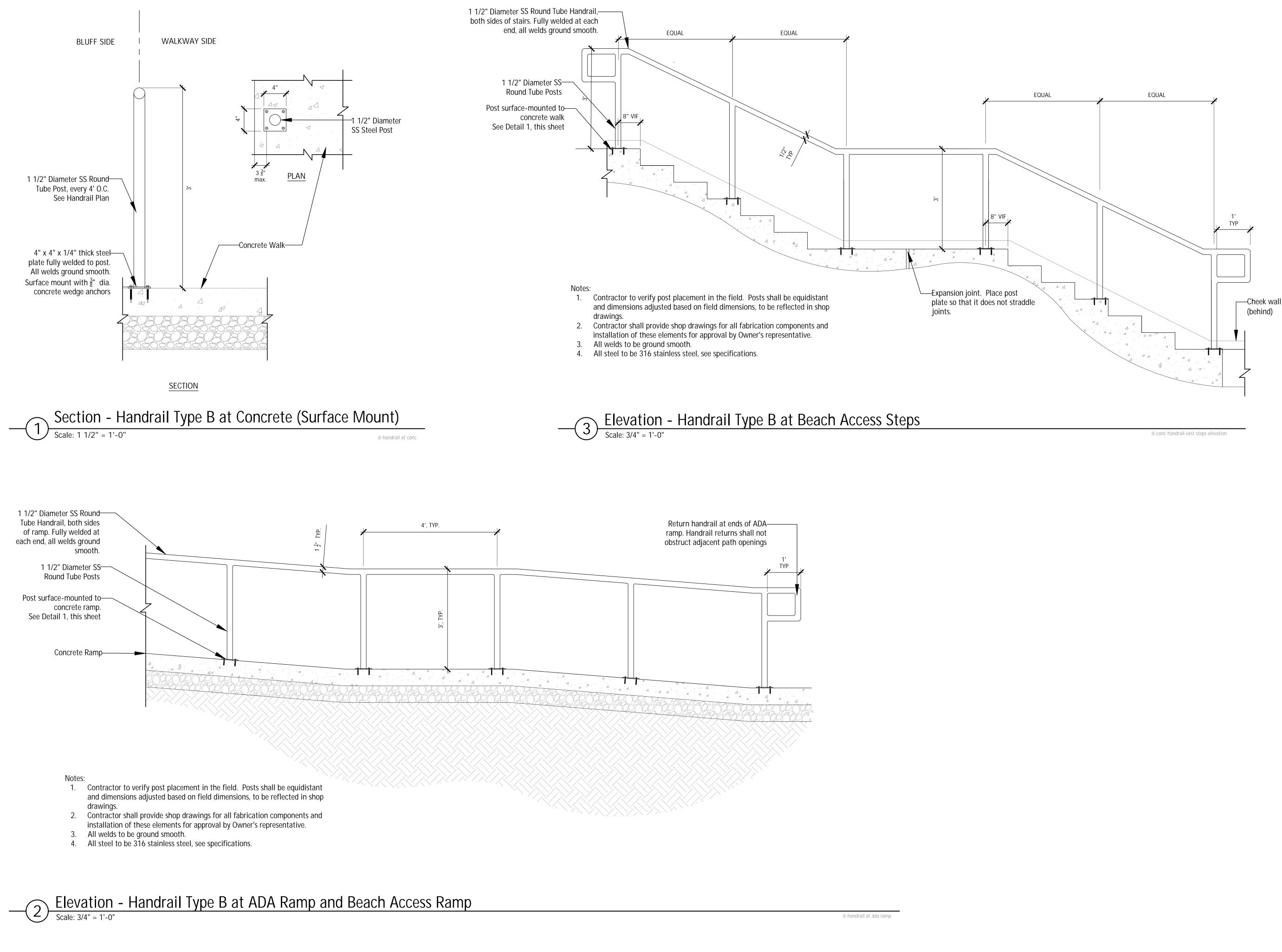
RED BARN Design & Engineering, S.C.
N ³ F
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants THE FACTOR CONSTRAINED FOR CONSTRA
Special Use Permit 05/23/24
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
None Scale
Drawing Title Boardwalk Details
Sheet No. C142



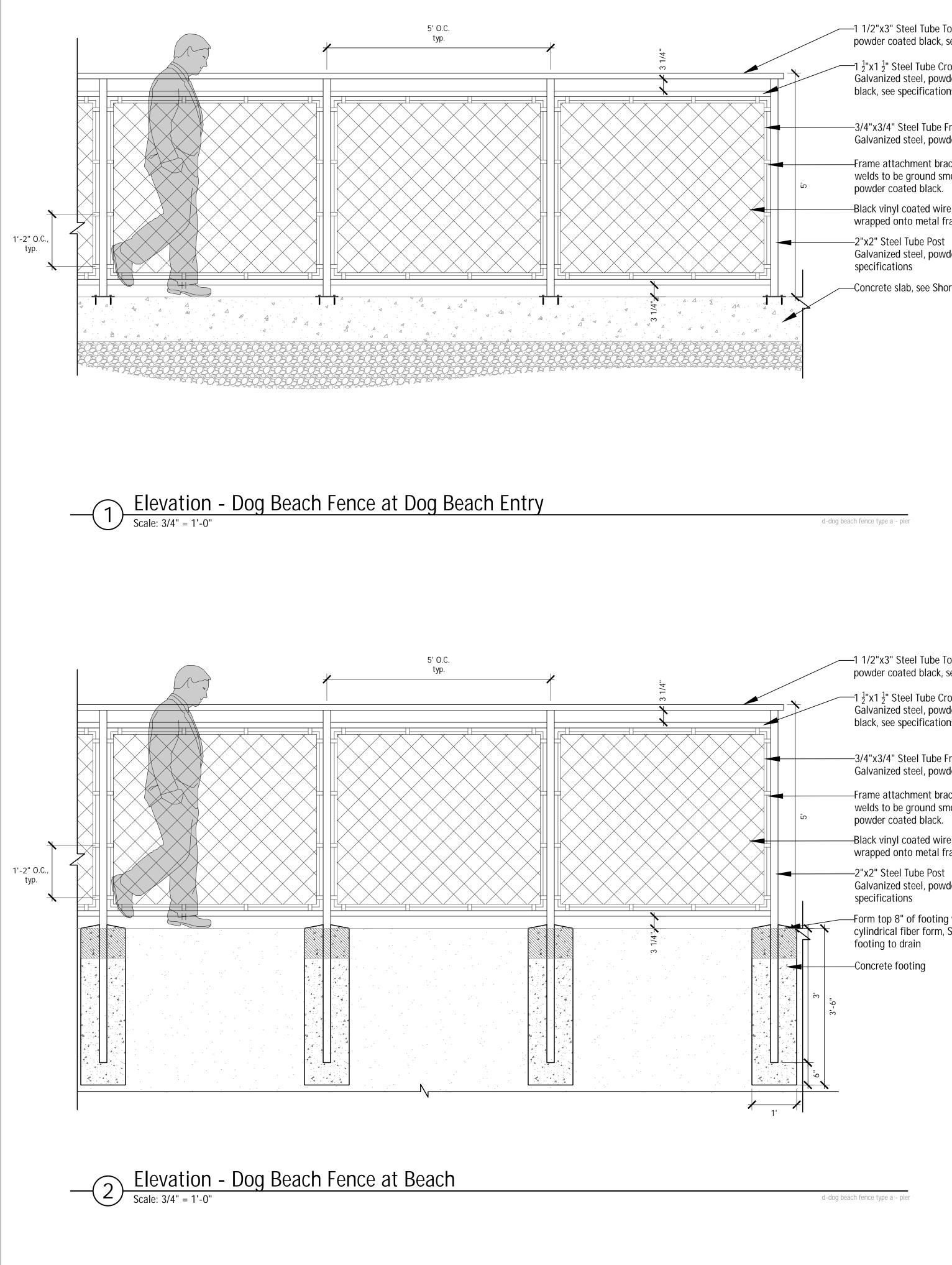
	ŀ		
	F		
	F		
		<u> </u>	\nearrow
2			
	F		
	Ī		
	 t		
		_	

d-handrail at conc

RED BARN Design & Engineering, S.C.
N ^D F
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042
c. 608.843.1870 redbarnde@tds.net
Consultants THE LAKOTA
GROUP. 1 East Wacker Drive Suite 2700 Chicago, Illinois 60601 p 312.467.5445 f 312.467.5484 thelakotagroup.com
Issued forRev. DateVillage of Winnetka
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
Scale None Drawing Title Handrail Details
Sheet No. C143

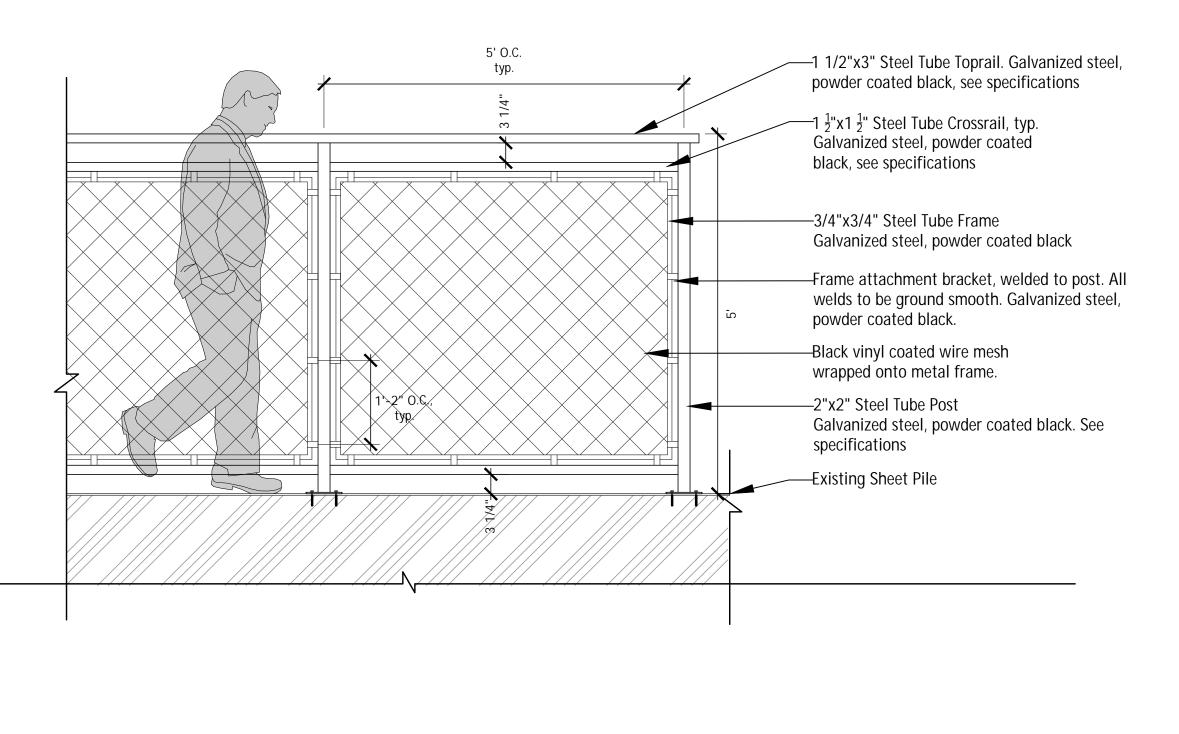


RED BARN Design & Engineering, S.C.
ND T
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants THE THE ACTORNAL ACTORNAL
/illage of Winnetka
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
`colo
Scale None Drawing Title
Handrail Details
boot No
Sheet No. C144



-1 1/2"x3" Steel Tube Toprail. Galvanized steel, powder coated black, see specifications 1¹/₂"x1¹/₂" Steel Tube Crossrail, typ. Galvanized steel, powder coated black, see specifications —3/4"x3/4" Steel Tube Frame Galvanized steel, powder coated black -Frame attachment bracket, welded to post. All welds to be ground smooth. Galvanized steel, powder coated black. -Black vinyl coated wire mesh wrapped onto metal frame. —2"x2" Steel Tube Post Galvanized steel, powder coated black. See specifications

-Concrete slab, see Shoreline dwgs





-1 1/2"x3" Steel Tube Toprail. Galvanized steel, powder coated black, see specifications

-1 $\frac{1}{2}$ "x1 $\frac{1}{2}$ " Steel Tube Crossrail, typ. Galvanized steel, powder coated black, see specifications

—3/4"x3/4" Steel Tube Frame Galvanized steel, powder coated black

-Frame attachment bracket, welded to post. All welds to be ground smooth. Galvanized steel, powder coated black.

-Black vinyl coated wire mesh wrapped onto metal frame.

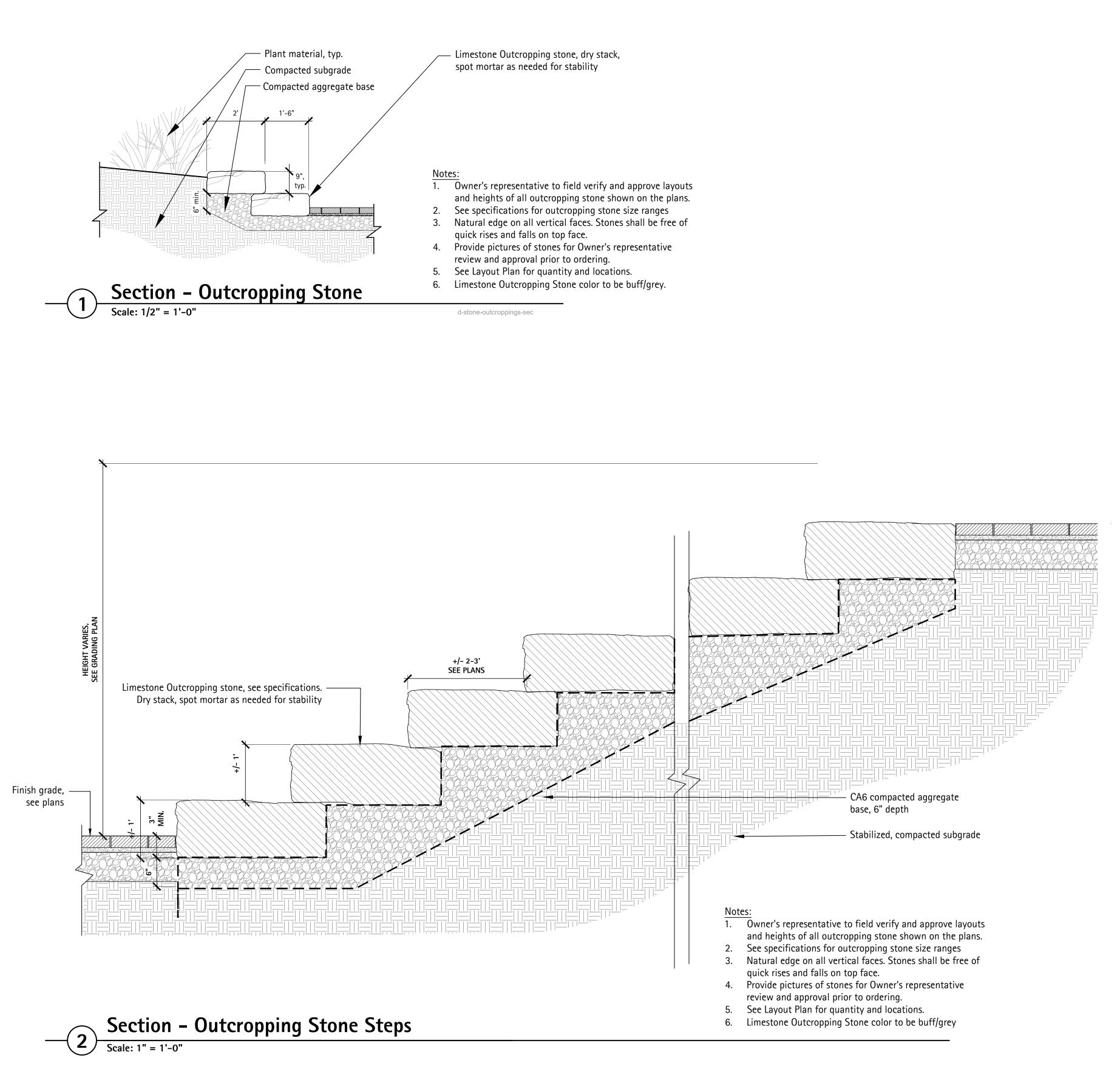
Galvanized steel, powder coated black. See specifications

-Form top 8" of footing with a cylindrical fiber form, Slope top of footing to drain

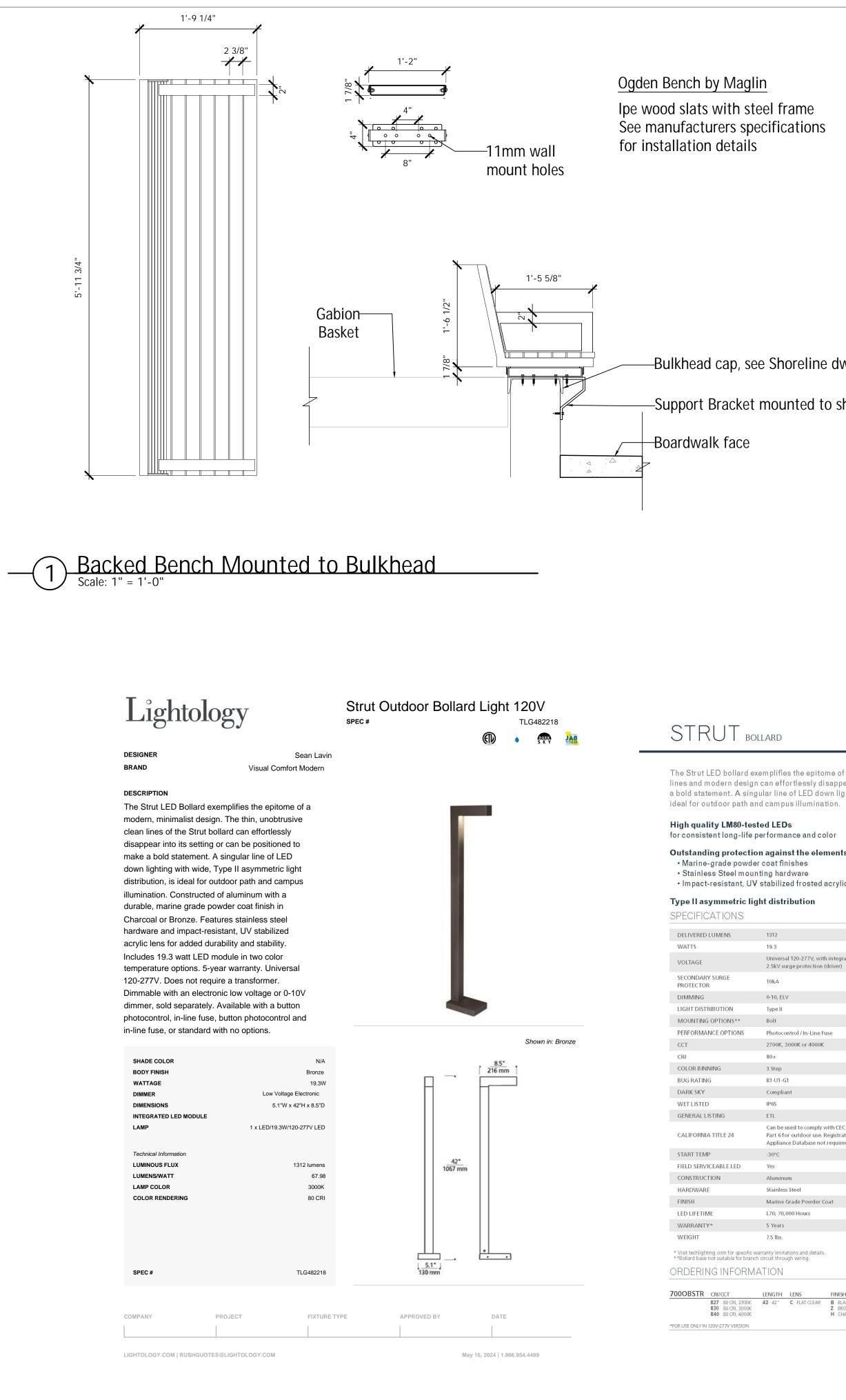
—Concrete footing

d-dog beach fence type a - pier

RED BARN Design & Engineeri	d Drive nsin 53597 042 870
Consultants THE LAKO GROU 1 East Wacker Drive Suite 2700 Chicago, Illinois 60 p 312.467.5445 f 312.467.5484 thelakotagroup.com	P. 601
Issued for Village of Winnetka Special Use Permit	Rev. Date 05/23/24
Project Title: Site Improvements Centennial Park Winnetka, IL	
Prepared For: Winnetka Park Distri Winnetka, IL Graphic Scale	ct
Scale None	
Drawing Title Fencing Details	
Sheet No. C145	



RED BARN Design & Engineer 6750 Woodlar Waunakee Wisco p. 608.849. c. 608.843. redbarnde@	nd Drive 2042 1870	e
THE LAKO GROU 1 East Wacker Driv Suite 2700 Chicago, Illinois 6 p 312.467.5445 f 312.467.5484 thelakotagroup.co	JP ve 0601 m	
ssued for /illage of Winnetka		Date
Special Use Permit		05/23/24
Project Title:		
Site Improvements Centennial Park Winnetka, IL		
, , <u>, ,</u>		
Prepared For:		
Winnetka Park Distr	rict	
Winnetka, IL		
Graphic Scale		
None None		
Drawing Title		
Furnishings		
heet No.		
C146		



Bollard Light



–Bulkhead cap, see Shoreline dwgs

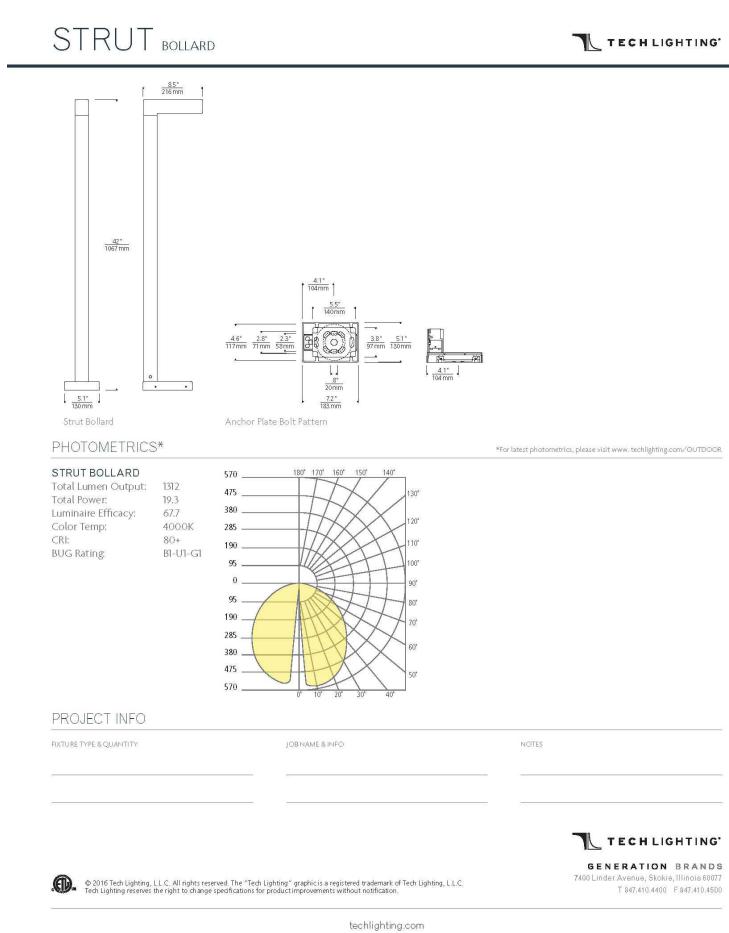
-Support Bracket mounted to sheet piling

TECH LIGHTING

The Strut LED bollard exemplifies the epitome of a modern, minimalist aesthetic. The clean lines and modern design can effortlessly disappear into the setting or be positioned to make a bold statement. A singular line of LED down light with controlled Type II distribution is

patriai	ra camp	us munnia	uon.				
	ted LEE performa)s ance and co	lor				
powde el mour	r coat fi nting hai			ing			
tric lig	jht disti	ribution					
NS							
	1312						
	19.3						
	Univers	al 120-277V, with urge protection (ent			
	10kA						
	0-10, EL	V					
t.	Type II						
S * *	Bolt					101	
ons	Photoco	ontrol / In-Line Fu	lse				
	2700K,	3000K or 4000K					
	80+						
	3 Step						
	B1-U1-0	i1					
	Complia	ant					
	IP65					10	
	ETL						
1	Part 6 f	used to comply v or outdoor use. F ice Database not	Registration with			-	
	-30°C						
ED.	Yes				STRUT BOLL	ARD	STRUT BOLLAI
	Alumin	um			shown in bror		shown in charcoa
	Stainles	s Steel					
	Marine	Grade Powder C	oat				
	L70; 70,	000 Hours					
	5 Years						
	7.5 lbs.						
r specific w e for brancl	arranty limit n circuit thro	ations and details. ugh wiring.					
ORM/	ATION						
	LENGTH	LENS	FINISH	VOLTAGE	DISTRIBUTION	OPTIONS	
RI, 2700K RI, 3000K RI, 4000K	42 42"	C FLAT CLEAR	B BLACK. Z BRONZE H CHARCOAL	UNV 120V-277V	2 TYPE 2 DISTRIBUTION	NONE PC BUTTON PHOTOCONTR LF IN-LINE FUSE" PCLF BUTTON PHOTOCONTR	
ersion.						NGER: BOTTON PHOTOCONIK	oc o infline fuse

techlighting.com



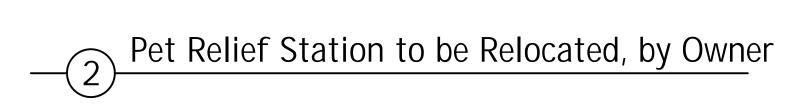
	MODELNUMBER
2 IN	OGM1900-B1-SS6-WLRLR
	OGM1900-MS4
1	OGM1900-BCA1
	DATE:
	DATE: 3/26/2024
	SHEET: 1 OF 3
	I UF 3

TECH LIGHTING

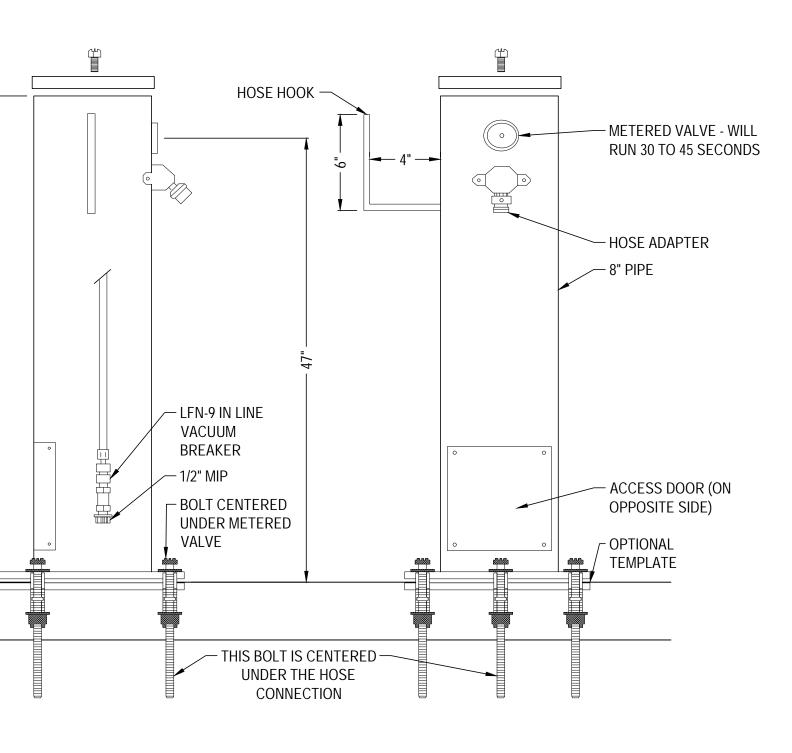
TECHLIGHTING GENERATION BRANDS 7400 Linder Avenue, Skokie, Illinois 60077 T 847.410.4400 F 847.410.4500

RED BARN Design & Engineering, S.C.
ND F
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants THE LAKOTA GROUP . 1 East Wacker Drive Suite 2700 Chicago, Illinois 60601 p 312.467.5445 f 312.467.5484
thelakotagroup.com
Issued for Rev. Date Village of Winnetka
Project Title:
Site Improvements Centennial Park Winnetka, IL
Prepared For:
Winnetka Park District Winnetka, IL
Graphic Scale
Scale None Drawing Title Furnishings
Sheet No. C147

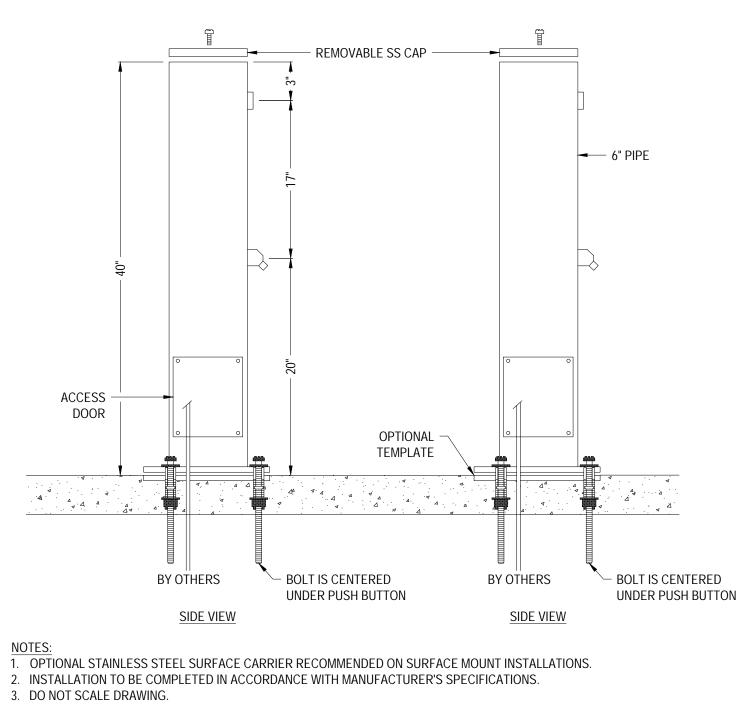




Model 505 SM Rinse Station by Most Dependable Fountains, Inc.



Model 525 SM Foot Tower by Most Dependable Fountains, Inc.





4. THIS DRAWING IS INTENDED FOR USE BY ARCHITECTS, ENGINEERS, CONTRACTORS, CONSULTANTS AND DESIGN PROFESSIONALS

FOR PLANNING PURPOSES ONLY. THIS DRAWING MAY NOT BE USED FOR CONSTRUCTION. 5. ALL INFORMATION CONTAINED HEREIN WAS CURRENT AT THE TIME OF DEVELOPMENT BUT MUST BE REVIEWED AND APPROVED BY

- THE PRODUCT MANUFACTURER TO BE CONSIDERED ACCURATE.
- 6. CONTRACTOR'S NOTE: FOR PRODUCT AND COMPANY INFORMATION VISIT www.CADdetails.com/info AND ENTER REFERENCE NUMBER 3354-10.12.

MODEL 525 SM FOOT TOWER SHOWN W/ OPTIONAL 6" SS SURFACE CARRIER

Powder coated finish. Color to be Chrome



Waunakee p. 60 c. 60	Voodland D Wisconsin 08.849.2042 08.843.1870 onde@tds.n	53597 2
Consultants THE LAK GRC I East Wack Suite 2700 Chicago, Illin p 312.467.5 f 312.467.5 thelakotagro Issued for Village of Winnetka Special Use Permit	KOT DUF er Drive nois 6060 5445 484 oup.com	D
Project Title: Site Improveme Centennial Park Winnetka, IL		
Prepared For: Winnetka Park Winnetka, IL	District	
Graphic Scale		
Scale None Drawing Title Furnishings		

RESTORATION NOTES

Invasive and Noxious Species Treatment - 1.24 ac.

- 1. The Bluff Restoration Zone has steep, irregular slopes and a relatively dense understory with some significant stands of invasive shrubs, trees, and vines. The native herbaceous plant community here is not particularly well established throughout most portions of this zone. There are small clusters of native spring ephemeral species that should be avoided during late-winter and early-spring target species treatment applications.
- 2. Target non-native and invasive species are to be treated within the limits of the restoration project area as shown on the plan.
- 3. Only non-native tree and shrub species with DBH < 8" are to be removed/treated as part of this project. Exceptions to the size class limit apply to invasive and highly aggressive species noted in the target species list.
- 4. All tree, shrub, and vine greater than 1' in height shall have their stumps cut to a height less than or equal to 2"above the ground surface.
- 5. All cut stumps will be treated with an herbicide containing glyphosate as an active ingredient and applied at the manufacturer's recommended rate for dormant stump treatment. If the area of treatment is within 50' of the lakeshore, an herbicide approved for aquatic use shall be used. Cut stumps will be treated within 30 minutes of cutting.
- 6. Any cut stumps that are not treated within the specified time limit, or cut to the correct height, should be recut and treated.
- 7. Trees, shrubs, and vines less than 1' in height shall receive a foliar treatment once the leaves have fully emerged.
- 8. Target woody species removal and cut stump treatment will be conducted during the winter of 2024/2025. Woody and herbaceous target species foliar treatments to begin in spring of 2025.
- 9. Quantity and timing of herbicide treatments will be dependent upon species to be controlled and should follow industry standard practices and herbicide manufacturer's recommendations to achieve an 80% reduction in target species cover by the end of the 2025 growing season.
- 10. Supplemental seeding and planting to be conducted in accordance with the Restoration Notes and Drawings.

Bluff Restoration Zone -27,726 sq. ft.

- 1. Plant material shall be obtained from a nursery that specializes in native plant production and is
- produced from material sourced from within 250 miles of the site. 2. Plugs shall be at least 2" in diameter and 5" deep and be grown in either a 38- or 50- cell propagation tray.
- 3. Install plant plugs on 18" centers in offset rows (triangular pattern) throughout the bluff restoration zone following 2025 herbaceous species herbicide applications. Plants should be installed in individual species clusters of 5-7 plants.
- 4. Plant installation should occur during typical perennial planting windows. If installation is to be performed during the dry summer months, the contractor will irrigate as needed to promote the successful establishment of the plant material.
- 5. A cover crop of seed oats should be spread at a rate of 35 lbs./acre following the plug installation.

Dune Grass Planting Zone -680 sq. ft.

- 1. This zone is currently open sand that is adjacent to construction activities.
- 2. Install bare root plants on 8" centers in offset rows (triangular pattern) throughout the dune grass restoration zone in the spring or fall following the conclusion of construction activities. The bare root plants should be planted 10" or more beneath the surface.
- 3. In planting areas with slopes 3H:1V or greater, the area shall be covered with a single layer of a biodegradable double-net straw blanket, such as BioNet® S150BN® or similar product. Blanket shall be anchored using 6" wooden stakes, such as an Eco-stake. Installation should follow the manufacturer's recommendations for the site conditions.
- 4. All bare root plants should be inspected prior to installation, any moldy or rotted plants shall be discarded. Installation of this type of plant material is unlikely to survive.

Turf Restoration Zone – 25,551 sq. ft.

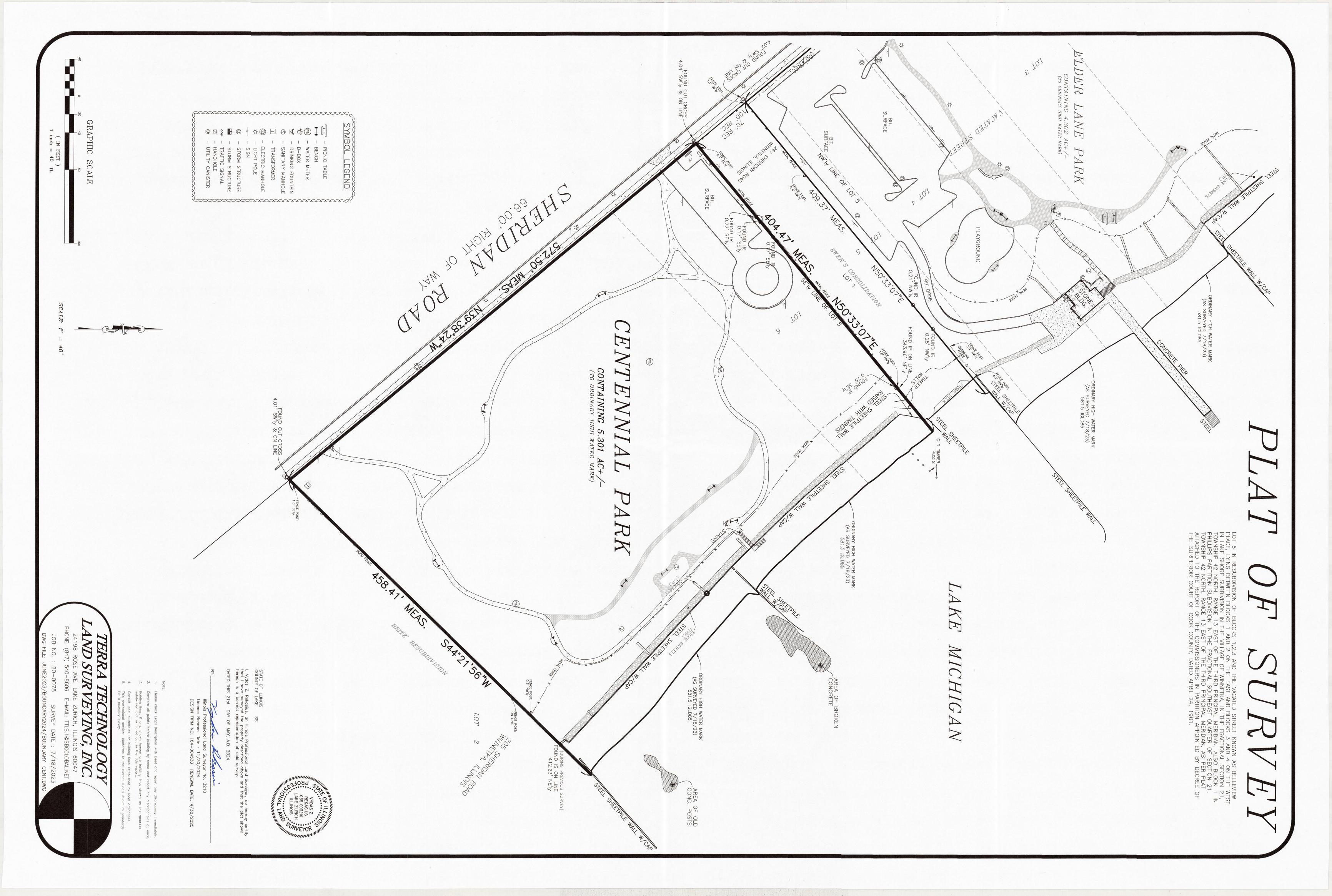
- 1. Prior to seeding, the area shall be tilled to a depth of 4" and any branches, rocks, or debris greater than 2" in diameter shall be removed.
- 2. A general-purpose turf mix will be selected that matches the existing turf growing in the park and installed per the manufacturer's recommendations for the selected installation method.
- 3. Seed shall be applied with either a broadcaster or hydraulically. If applied with a broadcast method, half the seed shall be installed while working in one direction. The second half of seed shall be applied while going in a direction perpendicular to the first pass to ensure 100% coverage of the site. The area should be lightly rolled or raked after seeding to ensure adequate seed to soil contact.
- 4. Following seed installation, the seeded area shall be covered with either straw or hydraulic mulch. Straw should be applied at 2 tons/acre and crimped or anchored in place. Hydraulic mulch should be paper- or wood-based and applied at the manufacturer's rate for the site conditions.
- 5. Seeded areas shall be irrigated by the contractor during the establishment period until a dense and consistent stand of grass is established.

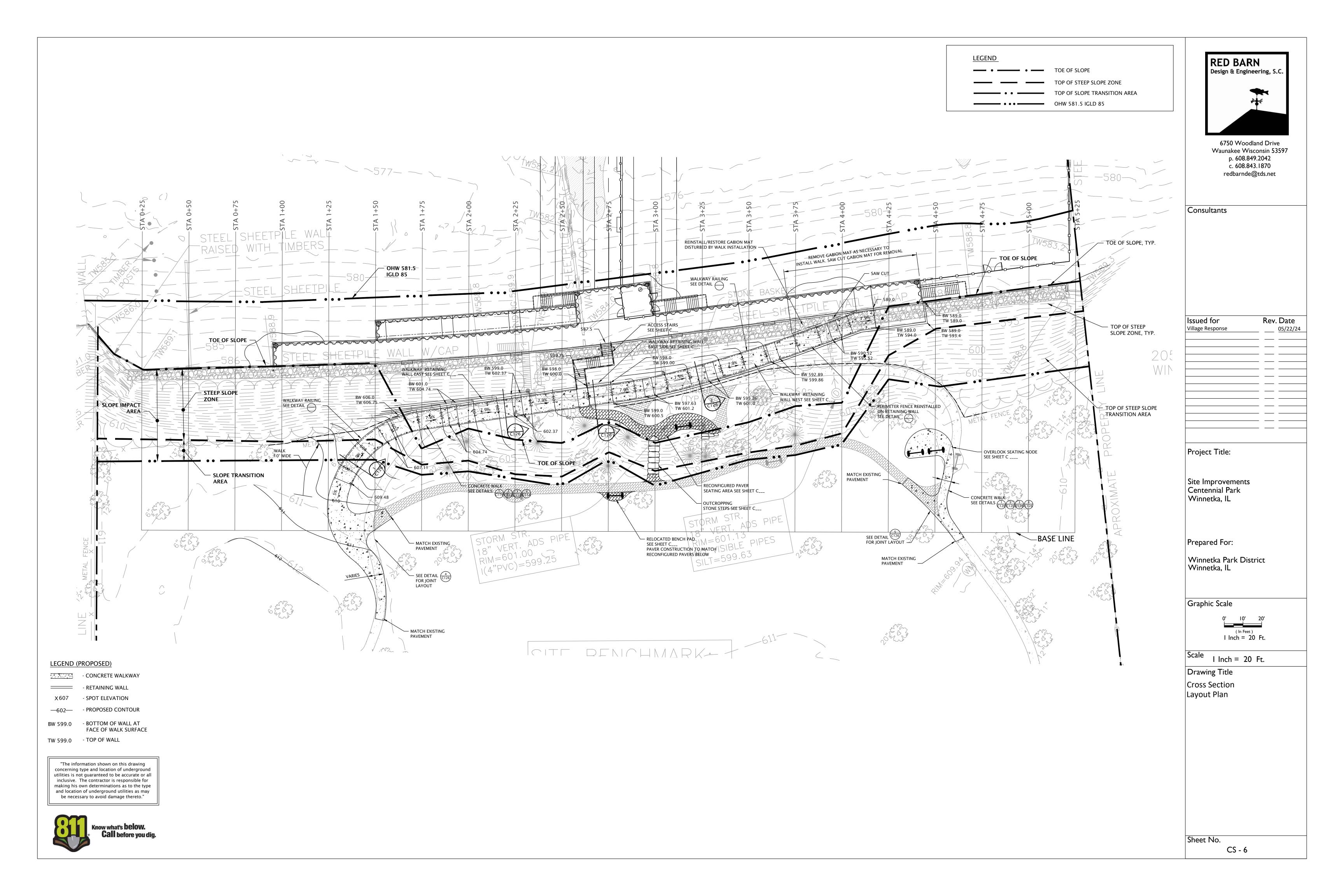
Bluff Restoration Zone Planting List							
Centennial Park							
Species	Common Name	Plug Amount					
Asclepias tuberosa	Butterfly weed	1432					
Calamovilfa longifolia	Sand Reed Grass	2046					
Elymus virginicus	Virginia Wild Rye	2046					
Euphorbia corollata	Flowering Spurge	818					
Helianthus occidentalis	Western sunflower	614					
Monarda fistulosa	Wild bergamot	1227					
Panicum virgatum	Switch grass	1227					
Penstemon hirsutus	Hairy beard-tongue	409					
Schizachyrium scoparium	Little Bluestem	2046					
Symphyotrichum ericoides	Heath Aster	818					
Symphyotrichum sericeum	Silky aster	409					
Symphyotrichum shortii	Short's Aster	409					
Verbena stricta	Hoary vervain	409					
	Total	13910					

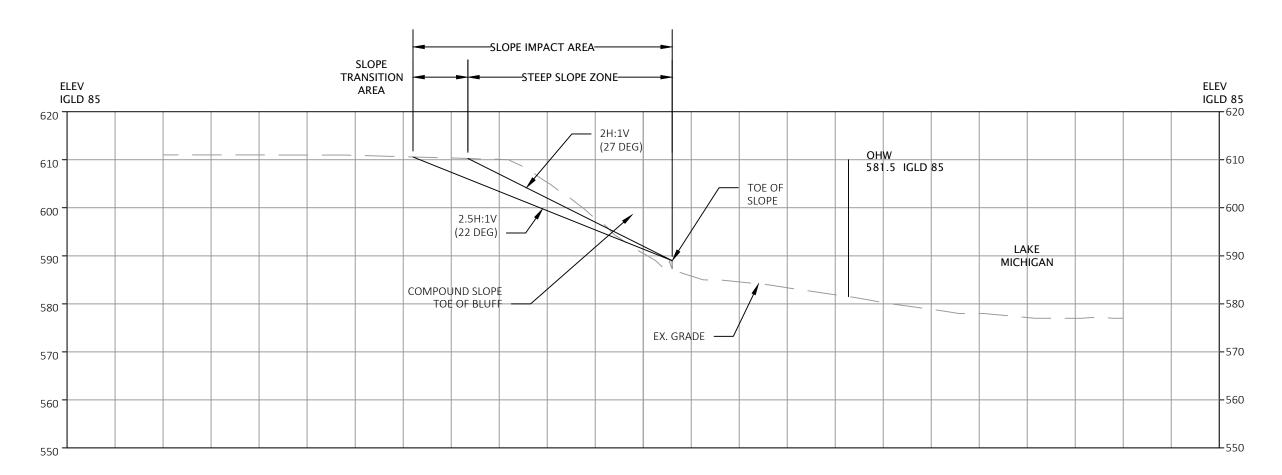
Dune Grass Restoration Zone Planting List							
Centennial Park							
Species	Common Name	Bare Root Amount					
Ammophila breviligulata	Marram Grass	173					

Species	Common Name	Tree Remov Size Limit (I		
Assessed		Applicable)		
Acer platanoides	Norway Maple	≤8" DBH		
Ailanthus altissima	Tree-of-Heaven	All Sizes		
Alliaria petiolata	Garlic Mustard			
Arctium minus	Common Burdock			
Artemisia vulgaris	Common Mugwort			
Berberis thunbergii	Japanese Barberry			
Celastrus orbiculatus	Asian Bittersweet			
Centaurea stoebe	Spotted Knapweed			
Cirsium arvense	Canada Thistle			
Conium maculatum	Poison hemlock			
Dipsacus spp.	Teasel			
Elaeagnus umbellata	Autumn Olive			
Euonymus alatus	Winged Euonymus	All Sizes		
Euonymus fortunei	Winter creeper			
Hedera spp.	lvy			
Humulus japonicus	Japanese Hop			
Leymus arenarius	European Lyme Grass			
Ligustrum spp.	Privet	All Sizes		
Lonicera japonica	Japanese honeysuckle			
Lonicera spp.	Bush honeysuckles	All Sizes		
Lotus corniculatus	Bird's Foot Trefoil			
Lysimachia nummularia	Moneywort			
Lythrum salicaria	Purple Loosestrife			
Melilotus spp.	Sweet Clover			
Morus alba	White Mulberry	All Sizes		
Pastinaca sativa	Wild Parsnip			
Phalaris arundinacea	Reed Canary Grass			
Phragmites australis	Common Reed			
Reynoutria spp.	Knotweed			
Rhamnus cathartica	Common Buckthorn	All Sizes		
Rhus typhina	staghorn sumac	≤4" DBH		
Robinia pseudoacacia	Black Locust	All Sizes		
Rosa multiflora	Multiflora Rose			
Securigera varia	Crown Vetch			
Solidago sempervirens	Seaside Goldenrod			
Typha spp.	Cattail			
Ulmus pumila	Siberian Elm	All Sizes		
Vinca spp.	Periwinkle			
Vitis spp.	Grapevines			
	egion's commonly encountered r his list.	noxious and invas		

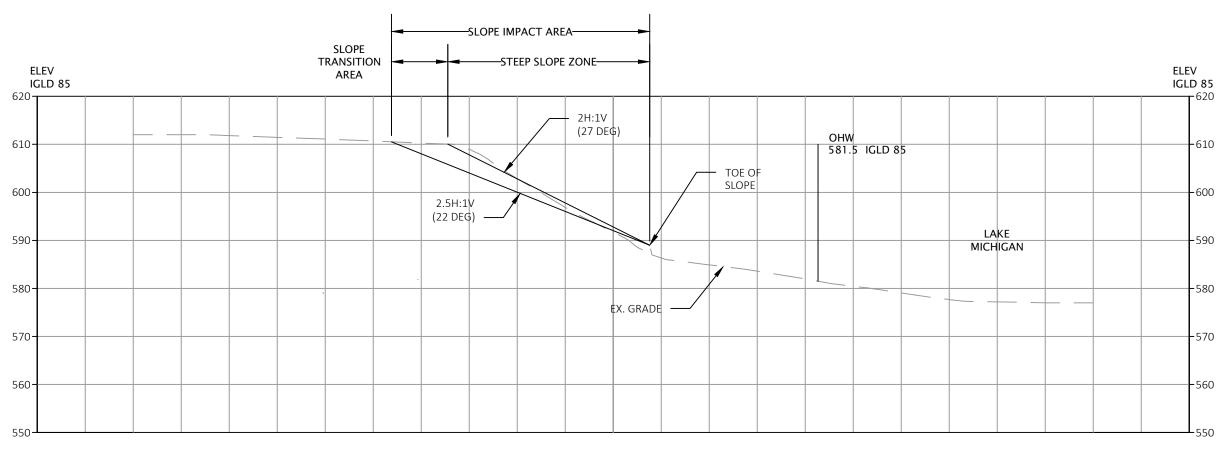
RED BARN Design & Engineering, S.C.
6750 Woodland Drive Waunakee Wisconsin 53597 p. 608.849.2042 c. 608.843.1870 redbarnde@tds.net
Consultants
ENVIRONMENTAL CONSULTANTS 200 West 22nd Street Suite 220 Lombard, Illinois 60148 p. 630.705.1762 f. 630.495.3740
ssued for Rev. Date /illage of Winnetka
Project Title: Site Improvements Centennial Park Winnetka, IL Prepared For: Winnetka Park District Winnetka, IL
Graphic Scale
Scale None Drawing Title Restoration Notes
Sheet No. C149

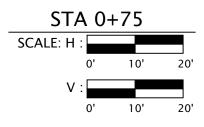


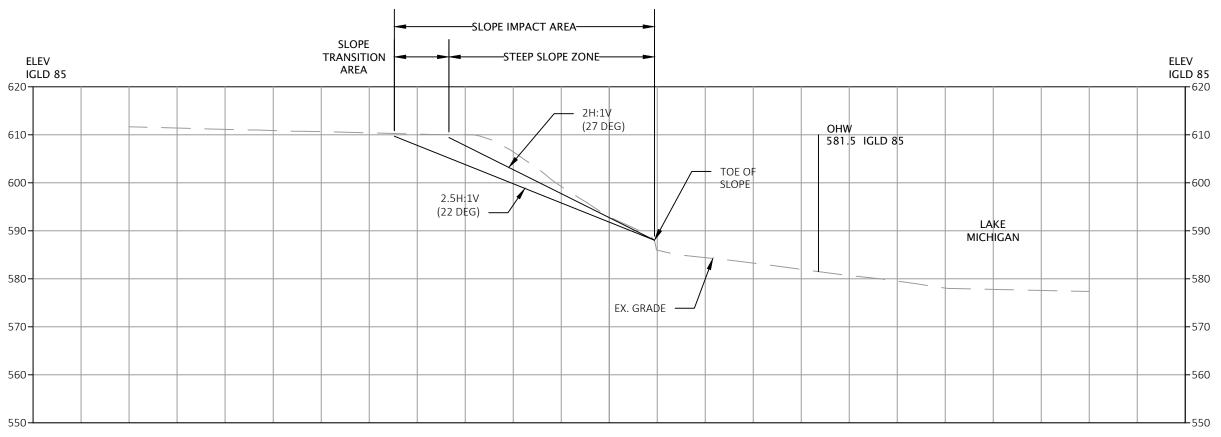


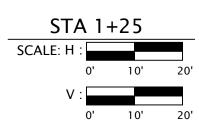


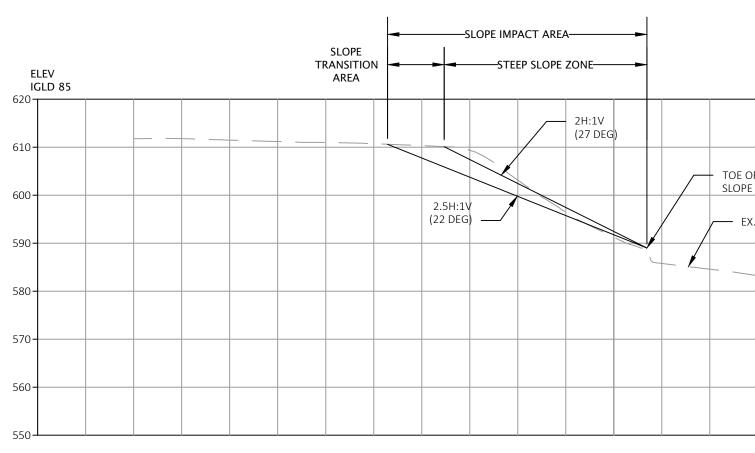


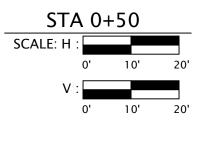


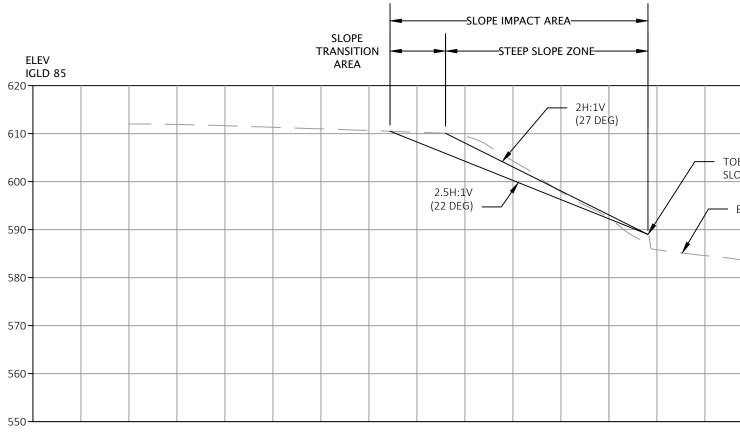


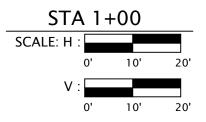


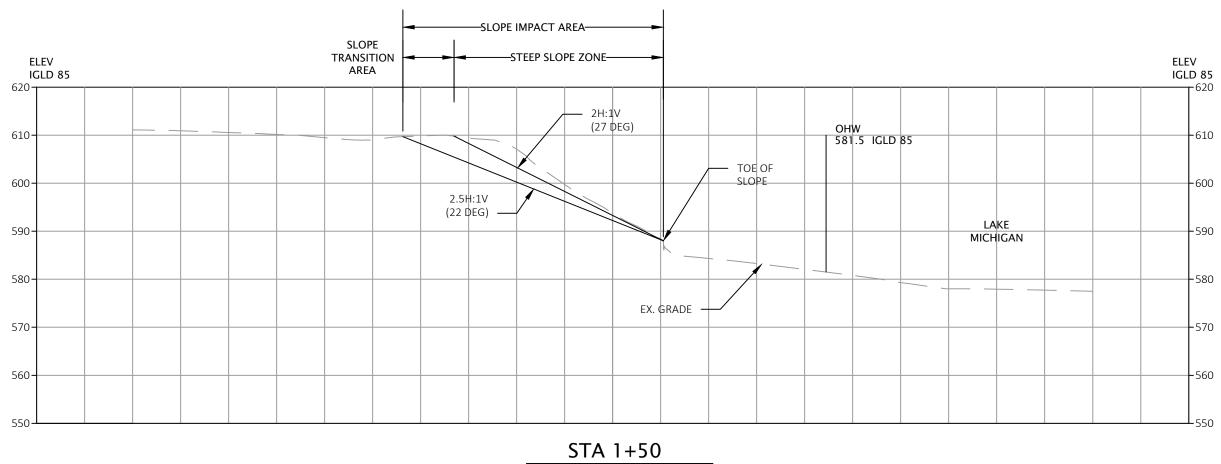


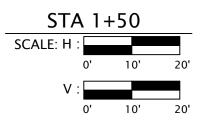








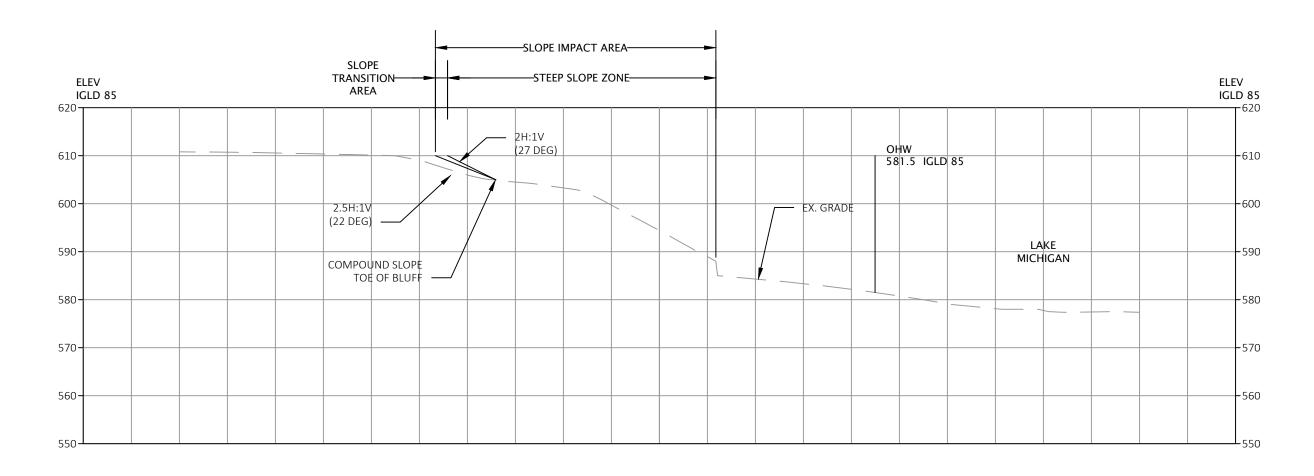




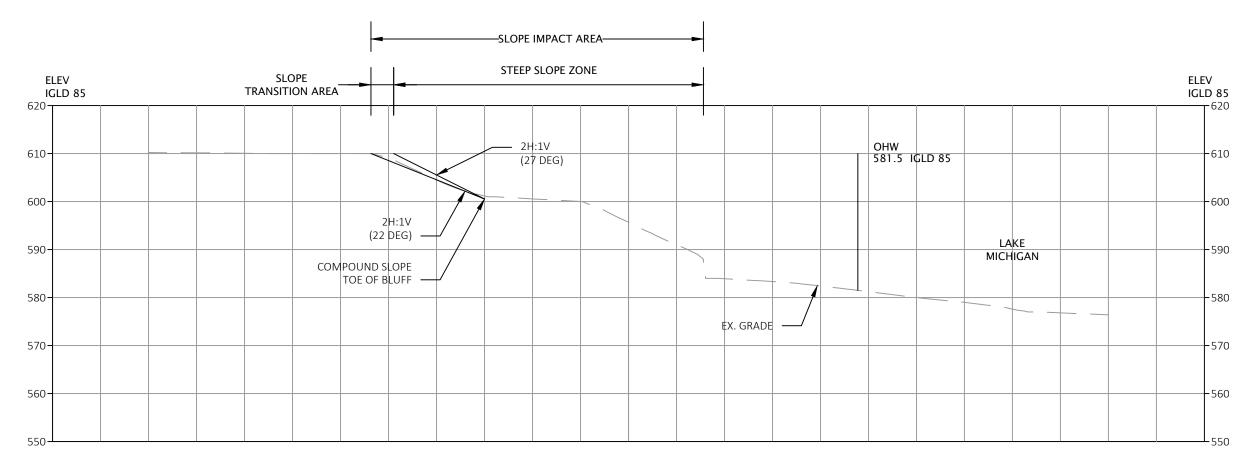
RED BARN Design & Engineering, S.C.						
Consultants						
Issued for Rev. Date						
Village Response 05/22/24						
Project Title:						
Site Improvements Centennial Park Winnetka, IL						
Prepared For:						
Winnetka Park District Winnetka, IL						
Graphic Scale						
0' 10' 20' (In Feet) I Inch = 20 Ft.						
Scale I" = 20'						
Drawing Title						
Cross Sections						
Sheet No. CS -7						

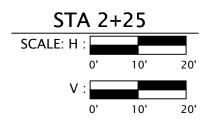
	ELEV IGLD 85
OHW 581.5 IGLD 85	610
DF E	600
X. GRADE	
	550

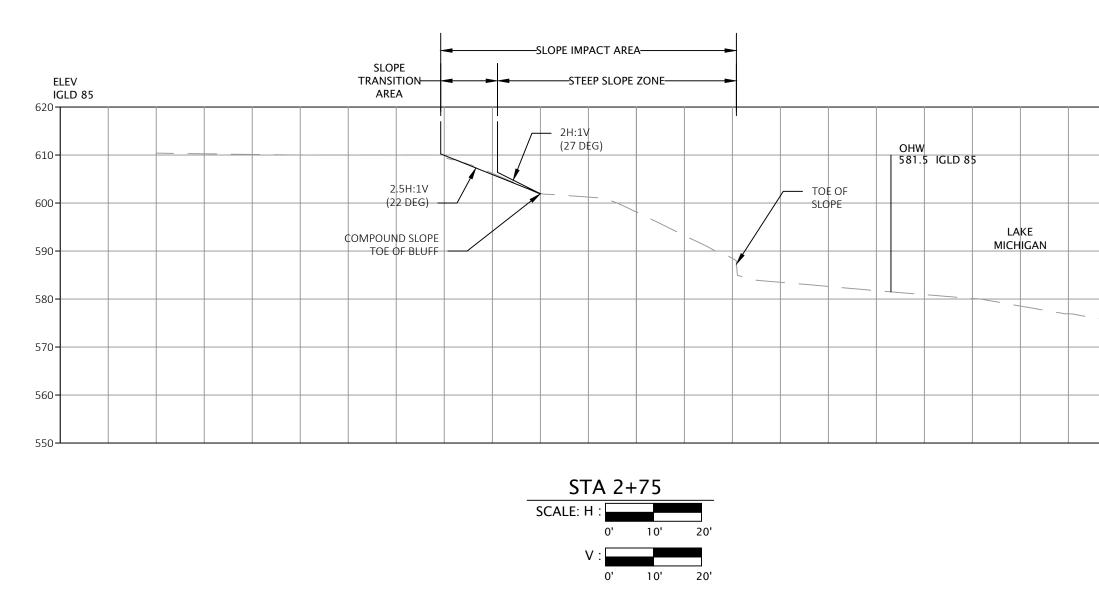
					 		 	ELE IGL	EV D 85
			OHW 581.5	IGLD 85					-610
DE OI OPE	F								-600
EX.	GRADE				LA MICH	KE IGAN			-590
		1			 				-580
									-570
									-560
									550

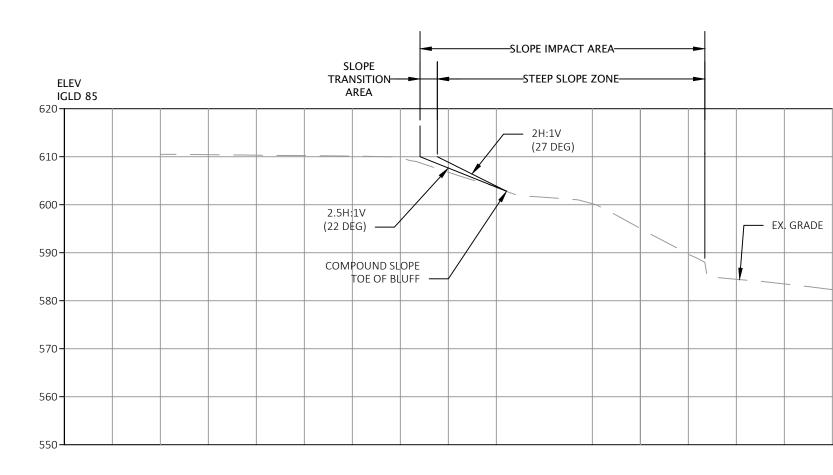


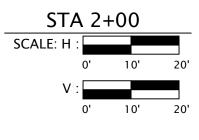


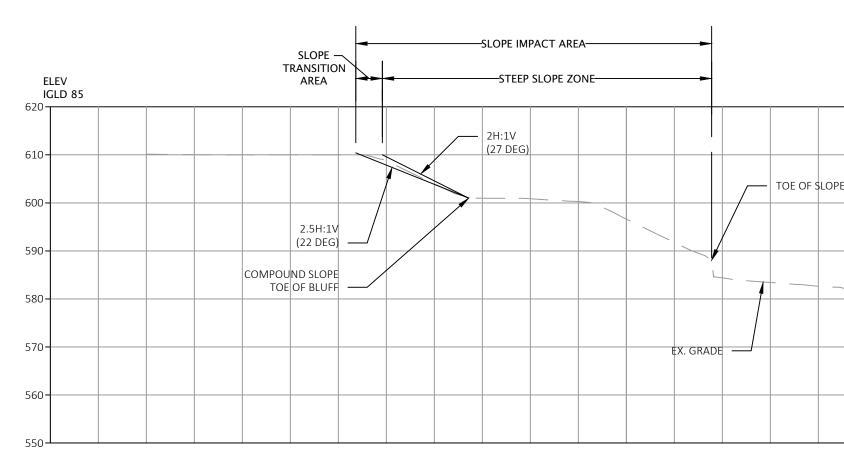


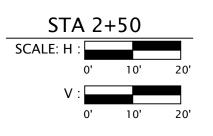


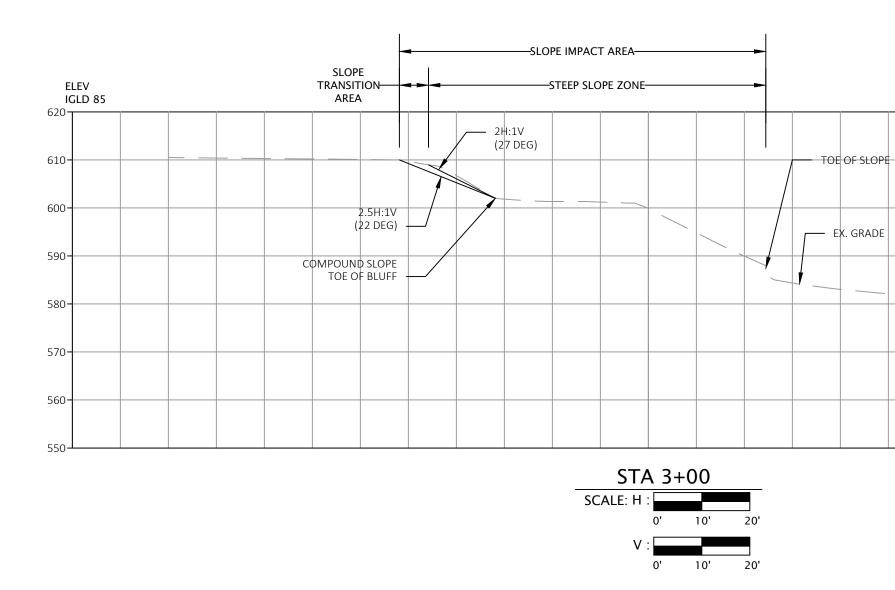


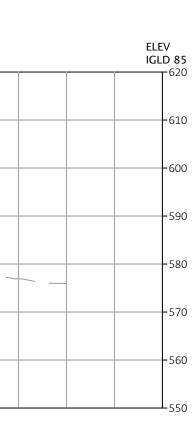












				,	,	,	ELE IGL	.V D 85
	OHW 581.5 I							-610
	581.5	GLD 85						
				KE				-600
			MICH	IIGAN				-590
								-580
								-570
								-560
								-550
							ELE IGL	₩ D 85 r 620
	OLINY							
E	581.5	IGLD 85						-610
								-600
				L MIC	AKE HIGAN			-590
								-580
								-570
								-560
								-550
							-	7.7
							ELE IGL	D 85
SLOPE		OHW 581.5	IGLD 85					-610

-600

-590

-580

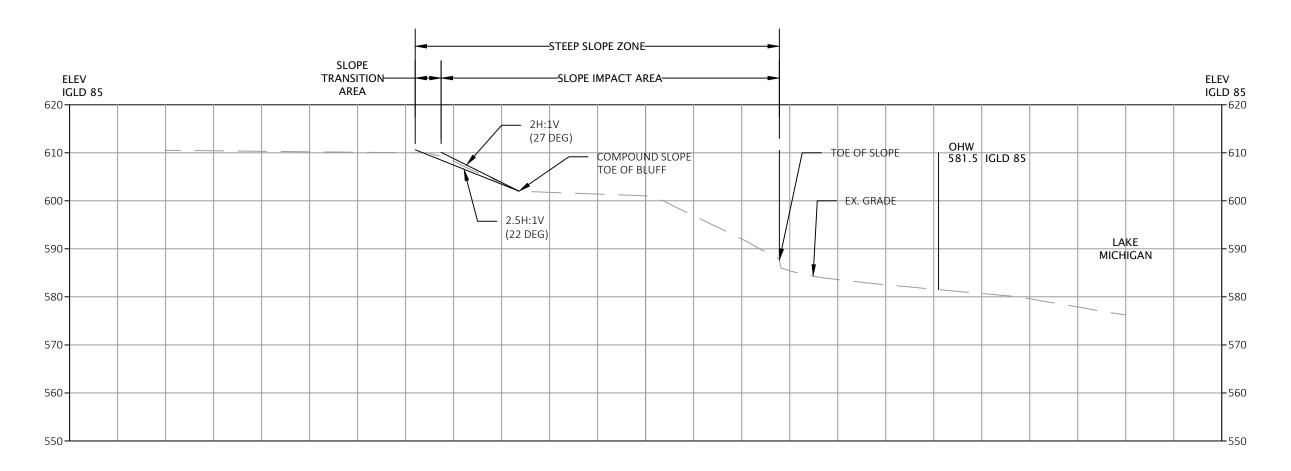
-570

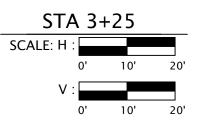
-560

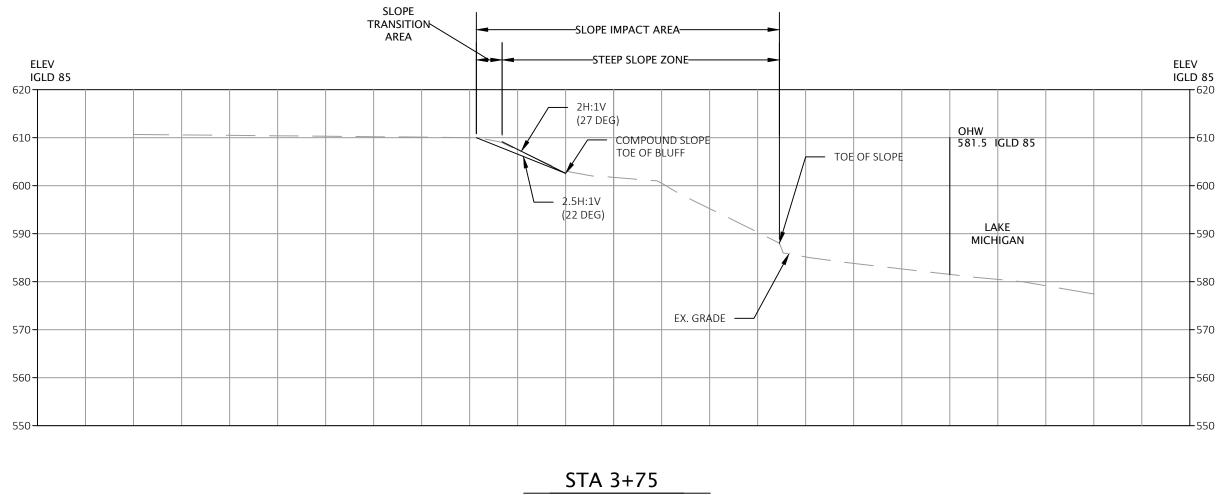
LAKE MICHIGAN

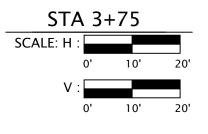
	**	Æ	
M	6750 Woodlan Vaunakee Wiscon p. 608.849.2 c. 608.843.1 redbarnde@t	nsin 53597 2042 870	
Consulta	Ints		
Issued fo Village Respo		Rev. Da	te 22/24
Project T	Fitle:		
Site Impr Centenn Winnetk			
Prepared	l For:		
Winnetk Winnetk	a Park Distric a, IL	ct	
Graphic	Scale		
	0' 10' 2 (In Feet) 1 Inch = 20 1	20' ⊒ Ft.	
Scale	" = 20'		
Drawing Cross Se	Title		
	-		
Sheet No	о. CS - 8		

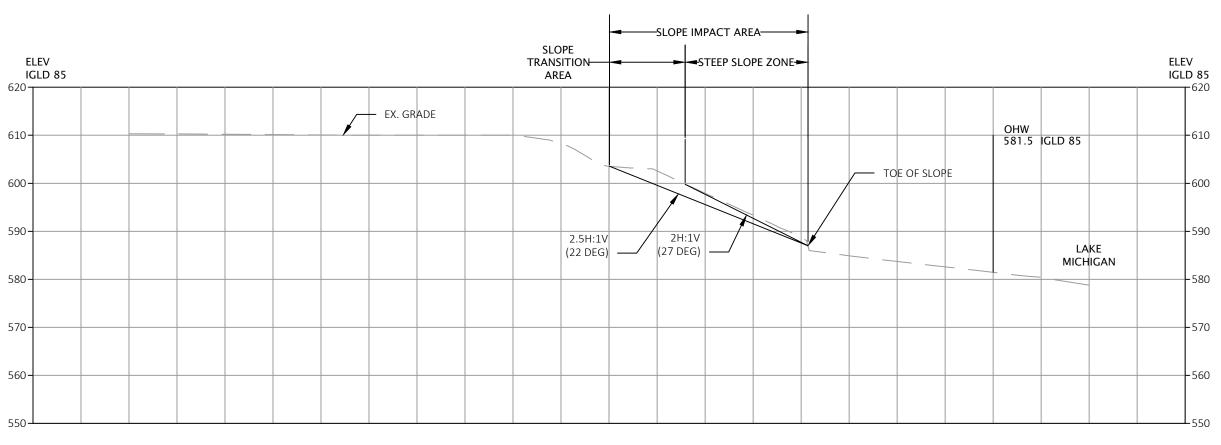
RED BARN Design & Engineering, S.C.



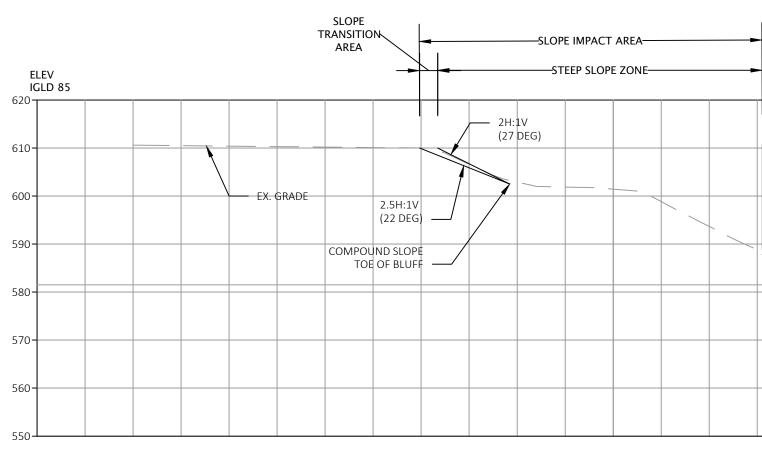


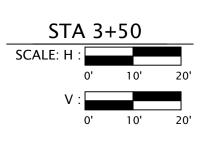


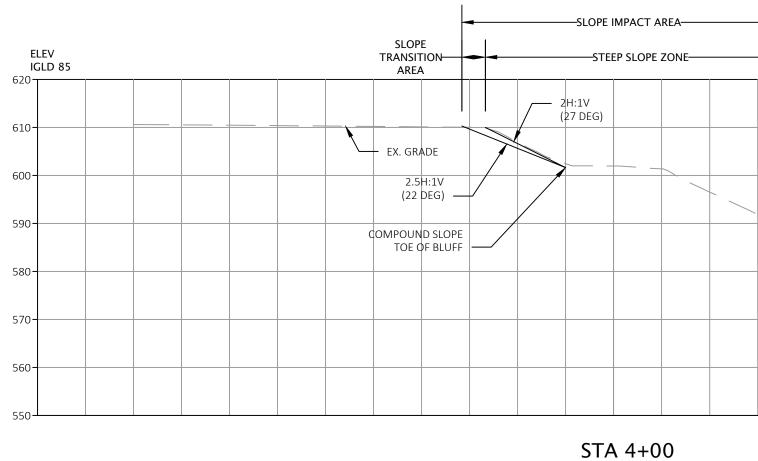


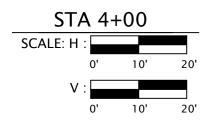


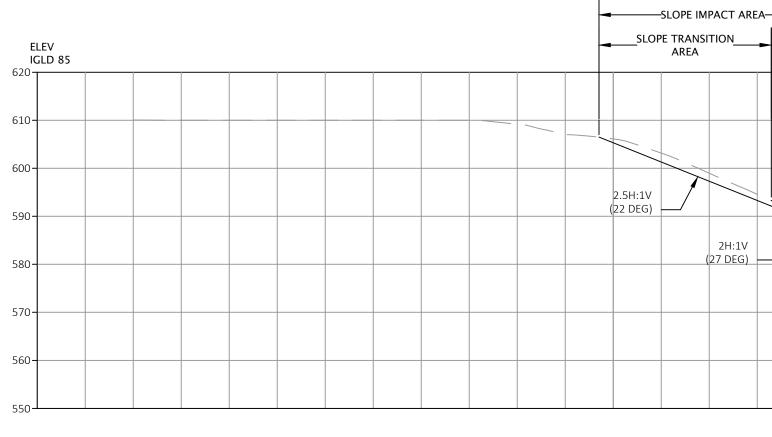
STA 4+25							
SCALE: H :							
	0'	10'	20'				
V :							
	0'	10'	20'				

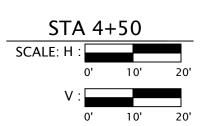










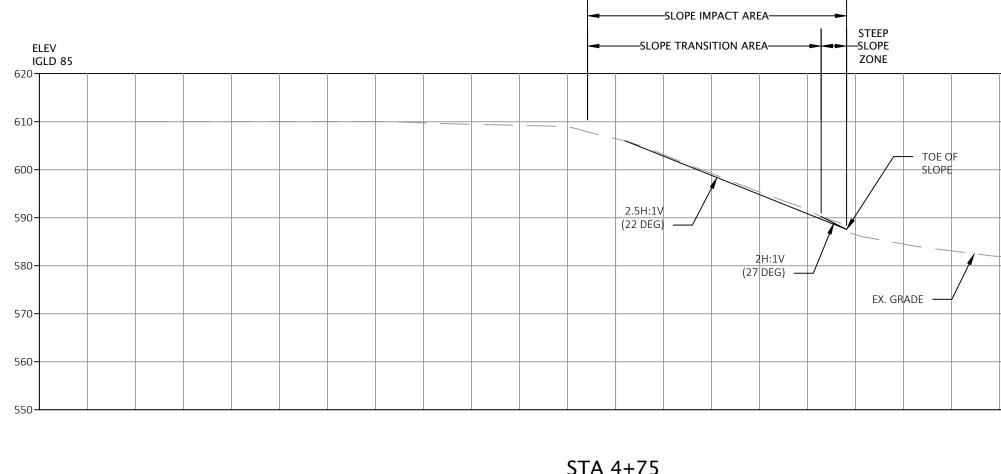


-							ELEV IGLD 85
1				OHW 581.5 K			
	то	E OF SLOP	E				
				LA MICH	KE IGAN		
							550

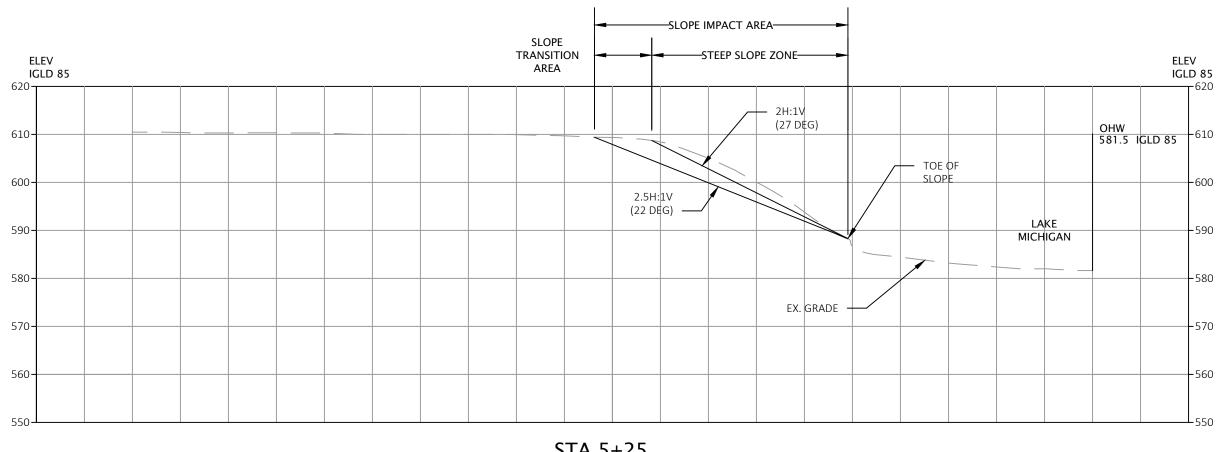
-	-	1		1			 ELEV IGLD 85
				OHW 581.	5 IGLD 8	5	-610
		— тое о	F SLOPE				
				ľ	LAKE /ICHIGAN		- 590
							550

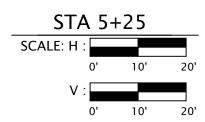
EA-	STEI SLOI ZON	PE								EV LD 85
				TOP			 OHW 581.5	IGLD 85		620
				TOE	OF SLOPE		 			-600
			_				 	LAKE MICHIGAN	1	-590
			EX	. GRADE	_/					-570
							 			-560

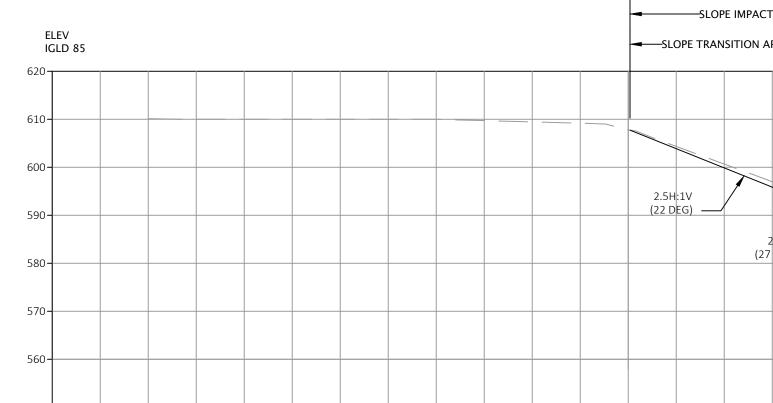
RED BARN Design & Engineering, S.C. Image: Construction of the state of the
Consultants
Issued for Rev. Date Village Response 05/22/24
Project Title: Site Improvements Centennial Park Winnetka, IL
Prepared For: Winnetka Park District Winnetka, IL
Graphic Scale 0' 10' 20' (In Feet) I Inch = 20 Ft. Scale I'' = 20'
Drawing Title Cross Sections Sheet No. CS -9

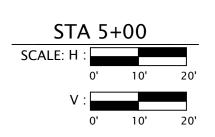


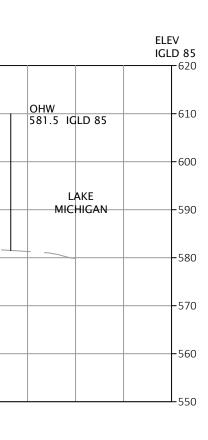












ACT AREA	-			
AREA STEEP SLOPE ZONE	-			ELEV IGLD 85
				620
			OHW 581.5 IGLD 85	610
		DE OF OPE		-600
			LAKE	
2H:1V (27 DEG)			MICHIGAN	580
EX. GRADE				570
1	1	1		550

RED BARN Design & Engineering, S.C. Fredering Fredering				
Consultants				
Issued for Rev. Date Village Response 05/22/24				
Project Title: Site Improvements Centennial Park Winnetka, IL				
Prepared For: Winnetka Park District Winnetka, IL				
Graphic Scale 0' 10' 20' (In Feet) I Inch = 20 Ft.				
Scale I" = 20' Drawing Title Cross Sections				