

AGENDA PLANNING COMMISSION MEETING MAPLE PLAIN CITY HALL March 06, 2025 6:00 PM

- 1. CALL TO ORDER
- 2. ADOPT AGENDA
- 3. CONSENT AGENDA
 - A. Minutes for Approval from Month 12-05-2024
- 4. NEW BUSINESS
 - A. Kwik Trip- Site Plan, CUP, Plat
 - B. Comfort Haven- 1520 Wyman Ave- CUP & Site Plan
- 5. OTHER BUSINESS
- 6. ADJOURNMENT

MINUTES MAPLE PLAIN PLANNING COMMISSION MEETING MAPLE PLAIN CITY HALL December 5th, 2024

1. CALL TO ORDER

Chair Jared Betterman called the meeting to order at 6:02 pm. Present were Planning Commissioners Stephen Shurson, Mike Melton, Adam Ruhland, and Nick Altavilla.

Absent: Planning Commissioner Mardelle DeCamp

Also Present: Councilmember Connie Francis, City Planner Mark Kaltsas, and Asst. City Administrator Kevin Larson.

2. ADOPT THE AGENDA

Motion by Commissioner Melton, seconded by Commissioner Shurson, to adopt the agenda. Motion passed 5-0.

3. APPROVAL OF MINUTES

03.A 11-07-24 PC Minutes

Motion by Commissioner Shurson, seconded by Commissioner Melton, to approve the minutes as presented. Motion passed 5-0.

4. NEW BUSINESS

A. City to consider the development of 102 apartment units at 1741 Budd Ave. (PID No. 24-118-24-34-0080)

- a. City Planner Kaltsas summarized the status of the application. The developer is unresponsive and, unless the developer asks for an extension, the application timeline will expire.
- b. Motion to recommend denial of the application if the applicant does not ask for an extension and recommends that the planning commission must approve the application prior to the City Council approval by Commissioner Shurson, seconded by Commissioner Altavilla. Motion passed 5-0.

B. Conditional Use Permit to Allow Automobile Sales on the Property Located at 5839 US Highway 12

a. City Planner Kaltsas summarized the request for a conditional use permit for an automobile dealer license. Discussed the history of the property and discovered that there was not a record of a CUP or the designation for industrial property. The owner wants to get all of the licensing documents in order. Discussed the land survey, the residential concerns and railroad lease.

- b. Concerns: lighting needs to be addressed, storage area surfacing and the need for parking striping/accessible spaces.
- Motion to open public hearing by Commissioner Melton, seconded by Commissioner Shurson. Motion passed 5-0. Public hearing opened at 6:54
- d. No speakers came forward.
- Motion to close public hearing by Commissioner Melton, seconded by Commissioner Shurson. Motion passed 5-0. Public hearing opened at 6:55
- f. Motion to make the recommendation delineation of sales/storage, parking spot striping, compliant cutoff lighting, any changes in sales/storage area must need an amendment to the CUP, by Commissioner Altavilla, seconded by Commissioner Ruhland. Motion passed 5-0.

5. COMMISSION REPORT AND OTHER BUSINESS

6. ADJOURN

Motion by Melton, seconded by Altavilla, to adjourn. MOTION PASSED 5-0. Meeting adjourned at 7:04 p.m.

I, the undersigned, Kevin Larson, Assistant City Administrator in and for the City of Maple Plain, Minnesota, do hereby certify that the above and foregoing is a true and correct copy of the minutes.

Respectfully submitted by:

Kevin Larson Assistant City Administrator

City of Maple Plain

Request for Site Plan Review, Conditional Use Permits and Preliminary and Final Plat to Allow the Construction of a New Convienence Retail Store, Fuel Station, Car Wash and Associated Site Improvements for the Property Located on Gateway Boulevard

То:	Planning Commission
From:	Mark Kaltsas, City Planner
Meeting Date:	March 7, 2025
Applicant:	Emily Helwig
Owner:	Kwik Trip, Inc.
Location:	Gateway Blvd. (PID No. 25-118-24-11-0040)

Request:

Emily Helwig (Applicant) and Kwik Trip, Inc. (Owner) request that the City consider the following actions for the property located between Gateway Blvd. and Highway 12 without an address (PID No. 25-118-24-11-0040):

- a. Site plan review to consider the development of a new Kwik Trip Convenience Store, Fuel Station and Car Wash.
- b. A conditional use permit to allow the fuel station and car wash.
- c. Preliminary and final plat to allow the existing Outlot to be converted into a buildable lot.
- d. A conditional use permit to allow a sign(s) that do not meet all applicable requirements of the City's sign ordinance. The applicant has submitted a full sign package specific to the requested use of the property.

Property/Site Information:

The property is located along the south north of State Highway 12 between CSAH 29 and Howard Ave. and just south of Gateway Blvd. The subject property is located within the Mixed Use – Gateway District. This property was established as an Outlot at the time that Cassia developed their building and site improvements. property has the following characteristics:

Property Information: PID No. 25-118-24-11-0040 Zoning: *Mixed Use - Gateway* Comprehensive Plan: *Mixed-Use* Acreage: <u>+</u>2.6 *Acres*

Aerial Photograph



Discussion:

The applicant approached the City about the possibility of developing the property and constructing a new convenience store, fuel station, car wash associated site improvements. All commercial and industrial development is required to go through the site plan review process. Site plan review requires the review of the Planning Commission and City Council. The City shall consider the proposed site plan and subsequent effects relating to evaluation criteria established in the City's ordinance.

153.045 INTENT AND PROCEDURE

(I) Evaluation criteria. The Planning Commission and City Council shall evaluate the effects of the proposed site plan. This review shall be based upon, but not be limited to, compliance with the City Comprehensive Plan, provisions of this chapter (Design Guidelines and City Engineering Requirements).

In addition to site plan review, it was noted that the city considers fuel stations and car washes to be conditional uses in the MU-G zoning district. The applicant is seeking a conditional use permit to allow the fuel station and car wash. In order for the applicant to purchase and develop the property it will also be necessary to consider approval of a preliminary and final plat that will accomplish the subdivision of the Outlot into a buildable lot with the remainder staying as an Outlot.

The applicant is proposing to construct a one-story, 9,000 SF convenience store building and a 1,787 SF car wash on the subject property. The proposed building would need to comply with the City's design standards for commercial buildings in the MU-G zoning district. In addition to the buildings and site improvements, the applicant is proposing to construct an off-street parking area to support the proposed use. The parking area would consist of 57 off-street parking spaces. The following summarizes the parking, setback and architectural standards for the proposed use.

Parking is required in accordance with the city's zoning ordinance. Please note that the east bank of spaces is labeled as having nine (9) spaces but there are only eight (8) on the plan. The city does not provide a specific parking requirement for convenience stores or modern motor fuel stations. The city's ordinance notes retail requirements as 1 space per 250 SF of the building GFA. While this is an acceptable requirement, I would consider using 5 spaces per 1,000 SF of the building GFA (total of 51 spaces required). This would generate similar numbers to the total parking spaces proposed. Using both standards, the proposed plans appear to meat applicable parking requirements.

REQUIRED

Motor Fuel Station: 4 spacesConvenience Store: 1 space per 250 GFA (9,070 SF/250 = 37)Car Wash:1 spaceTOTAL:42 spaces

PROVIDED

35 spaces
2 spaces
20 spaces
57 spaces

Architectural Guidelines:

First Floor (primary elevation):

- 60% openings, window, doors, fenestration, (~60% proposed)
 - 35% wood, brick, stone, hardie board siding (100% brick)

• 5% other materials

The applicant is proposing a new commercial structure that incorporates many of the architectural aspects and building materials in an attempt to meet the intent of the City's design guidelines for the Mixed-use Gateway district. The applicant has proposed a combination of glass windows and doors and brick for the entirety of the building facade. The sides and rear of the building would be 100% brick siding with some windows as shown. The City will need to determine if the proposed building is consistent with the intent of the design guidelines.

Setbacks Required:

Minimum Lot Size: 6,000 SF Minimum Lot Width: 100 feet Front Yard Setback: 5 feet Side Yard Setback Building: 20-foot setback Rear Yard Setback: 20 feet minimum Parking Setback: 10 feet from collector streets, 50 feet from Highway 12, 5-foot side yard (commercial)

Setbacks Proposed:

Minimum Lot Size: 113,256 SF Minimum Lot Width: 750+ Front Yard Setback: 16 feet Side Yard Setback Building: 92 feet (east) +130 feet (west) Rear Yard Setback: 59 feet Parking Setbacks: 50+ feet from Highway 12 and 5 feet from Gateway Blvd.

Parking Space Design:

Minimum Parking Space Width: 9 feet Minimum Parking Space Length: 20 feet Minimum Parking Aisle Width: 25 feet

Site Layout and Design:

The plans include a car wash that will have an entrance on the south side of the building. It is anticipated that this car wash will have a high demand and usage due to it being the only one in the area. Staff would recommend that the applicant explore a way to provide designated stacking (striped line and signage) along the south side of the parking lot to avoid cars waiting behind designated parking spaces (see below). Staff is working on this issue with the applicant.



Landscape Plan:

The proposed landscape plan indicates five (5) serviceberries along the north side of the building. As a result of the boulevard tree being removed to accommodate the new drive aisle entrance, it is recommended that one of the serviceberries be replaced with a shade tree (see location below).



Police/Fire/Engineering

The Maple Plain Fire Department has reviewed the plans and has the following comments:

- 1. Please indicate the location of the FDC on the site/utility plans.
- 2. Please indicate the location of the mechanical room on the site/utility plans.
- The Fire Chief has noted that an additional fire hydrant would be needed to adequately protect this property given the proposed layout and use. MPFD would like to have a hydrant installed in the island shown below (pink circle).



Storm Water Management, Grading and Drainage:

The City's engineer has reviewed the plans and provided comments relating to the proposed development. There were minor comments provided that will be addressed by the applicant. It should be noted that the applicant will be constructing a new proposed stormwater basin as a part of the site development. The wet retention basin proposed has been sized adequately to limit peak runoff rates to existing and provide water quality treatment. Any additional conditions required as a result of the city's final review will be incorporated into the conditions of approval should the site plan be approved. The applicant will be required to obtain Minnehaha Creek Watershed District (MCWD) approval.

Lighting:

There are several areas along the north property line/Gateway Blvd. where footcandles exceed 1.0 which is the maximum permitted. The lighting plan will need to be revised to conform to applicable requirements. The city is working with the applicant to obtain all cut sheets for all proposed light fixtures. Based on review of the cut sheets, additional comments may be provided.

Preliminary and Final Plat:

The applicant is proposing to plat the property so that the property can be conveyed and developed. The city had purposefully left this property intact as a single Outlot when the Gateway of Maple Plain plat was established in 2019. Leaving the property as a single Outlot allows the property to eventually be split into a single or multiple parcels at a future date depending on the buyer. The proposed replat of this Outlot will establish a new Lot 1, Block 1 and Outlot A. The city has noted several additional D&U easements that will need to be added to the preliminary and final plat.

Car Wash and Fuel Station CUP:

The applicant is proposing to construct a fuel station and car wash along with the convenience store. Both uses require a conditional use permit. The proposed location of the fuel station and car wash in the mixed-use zoning district and directly adjacent to Highway 12, help to mitigate any potential impacts associated with the proposed use. The city has identified this property as being suitable for convenience services, goods and highway visible retail. The city has also reviewed the car wash and noted that the use is compatible with the site. The proposed entrance to the car wash is internal to the site and located adjacent to Highway 12. This will limit any potential issues relating to its compatibility with or impacts to the surrounding land uses.

Sign Package:

The applicant has submitted a full sign package for consideration by the city. The applicant is seeking the following signs:

Free Standing Sign: Located on CSAH 29. The city allows free standing signs to be a maximum of 80 SF with a maximum height of 20 feet. The applicant is proposing a changeable copy 13-foot-tall free-standing sign that has 75 SF of sign area. The sign is proposed to have a 5' tall brick bass that will match the brick of the proposed buildings. The proposed sign is an electronic message sign. Electronic message signs have the following additional requirements.

- Electronic message signs shall be limited to digital text and graphics; video messages are prohibited.
- Text messages shall contain a limited number of words to allow passing motorists to read the message with minimal distraction. Graphic images and static text shall have a minimum duration of five seconds before changing to another display.
- Message duration adjacent to state or county roadways shall comply with state and county requirements. Electronic message signs shall be calculated within the required signs allotment of the zoning district they are placed in, unless approved as part of a signs package.
- Electronic message signs shall occupy no more than 25 percent of the total signs area.

The city noted that the applicant is seeking a conditional use to allow the electronic message area to exceed the maximum of 25%. In addition to the criteria for granting a conditional use in by section 10-482, the city

has criteria specifically relating to granting a conditional use for a sign that exceeds the applicable requirements. Those criteria are provided below.

Signs allowed by a conditional use permit.

- a. A conditional use permit for the adjustment to the height, area, or location of a sign within any district may be approved by the City Council if the following criteria are met:
 - 1. There are site conditions that require a sign deviation from the district standards to allow the sign to be reasonably visible from a street;
 - 2. The sign deviation will allow a sign of exceptional design or style that will enhance the area or that is more consistent with the architecture and design of the site; or
 - 3. The sign deviation will not result in a sign that is inconsistent with the purpose of the zoning district in which the property is located.
- b. In addition to the criteria for approval as specified within the procedures for conditional use permits by section 10-482, the following standards shall also be taken into account:
 - 1. Placement of any electronic message sign could be considered within residential zoning districts where appropriate to surrounding land uses.
 - 2. The sign placement, height, or design does not create a safety hazard with regards to, from, or on a public street or roadway.
 - 3. The sign placement, height, or design does not create a safety problem or negatively affect adjoining properties or use.
 - 4. Considerations shall be given to the possible adverse effects of the proposed conditional use permit and satisfactorily address any additional requirements that may be necessary to reduce such adverse effects. The City's judgment shall be based upon, but not limited to, the following factors:
 - (i) The geographical area involved.
 - (ii) The character of the surrounding area.
 - (iii) The demonstrated need for such conditional use permit.

Pylon Sign: Located on Highway 12. The city allows one pylon sign for a gas station to be a maximum of 64 SF with a maximum height of 30 feet. The applicant is proposing a 20-foot-tall pylon sign that has 63 SF of sign area and is 20 feet tall. The sign is proposed to be mounted on a black painted pole. The proposed sign is an electronic message sign (see conditional use permit criteria above).

Wall Signs: Located on three (3) sides of the convenience store and one (1) side of the car wash. The total square footage permitted for each wall sign is 10% of the total wall area that it is attached. The size of the proposed wall signs varies, but all were found to meet applicable square footage requirements. Note that all proposed wall signs are individual letters and proposed to be internally illuminated. The city has discussed this provision before and noted that signs are encouraged to be backlit where possible, and to avoid internal lighting and neon signs. Box-lit signs are not permitted in the Gateway.

Canopy Signs: Located on the canopy of the fuel station. The applicant is proposing three (3) canopy signs that will be internally illuminated "Kwik Trip" signs along with an LED lit red strip down the middle of the canopy on all four sides. Each of the canopy signs are 36 SF. Canopies are considered their own structure for the purposes of signs as noted in the ordinance.

There are several considerations that should be made by the city relating to the proposed sign package:

- The proposed use is unique to the city and located within the MU-G zoning district. There are not many locations throughout the city that would accommodate a convenience store and fuel station.
- The property does have some visibility limitations due to the existing building located to the southeast
 of the proposed building. Not having full corner visibility from the Highway was noted as a limitation
 to this site by the applicant.
- The remainder of the site signs (smaller directional and building) proposed by the applicant meets applicable requirements.
- The city will need to review the criteria for granting the conditional use permit to allow the larger electronic message signs and internally illuminated signs.

Additional Considerations:

Staff will be seeking direction and feedback relating to the proposed application for a new convenience store, fuel station and car wash. The city has worked with the applicant for several years to find a suitable location for this use along Highway 12. The proposed location does work for the applicant and the city but does have some limitations as a result of the limited visibility.

- The plat has been submitted to Hennepin County and MNDOT for review and comment. Any comments provided will need to be addressed prior to City Council review and approval.
- The applicant is proposing to have outdoor storage between the fuel pumps. The city will want to
 understand how this will be maintained, how long products can/will be displayed and if there is a way to
 establish a requisite organization to the outdoor storage. More information will be discussed at the
 meeting relating to the outdoor storage.
- The city noted that the sidewalk surrounding the building should connect with the city's sidewalk on Gateway Blvd. It was noted by the applicant that there are grade issues that may prevent this connection. The city is continuing to work on this issue with the applicant.

Neighbor Comments:

The City has not received any verbal or written comments at the time this report was prepared.

Recommendation:

Staff is seeking direction from the Planning Commission relating to the requested Preliminary and Final Plat, Site Plan Review and Conditional Use Permit Should the Planning Commission recommend approval of the requested actions to the City Council, the following findings and conditions should be included:

- 1. The proposed site plan, conditional use permit and preliminary and final plat meets all applicable conditions, criteria and restrictions stated in the City of Maple Plain Zoning and Subdivision Ordinance.
- 2. Prior to City Council consideration of the application, the following items shall be completed by the applicant:
 - a. The Applicant shall revise the plans as necessary to accommodate all known or additional comments made by the City, including Fire Department comments, engineering comments, Planning Commission, and staff comments.
 - b. The applicant shall receive all applicable approvals from all outside agencies with authority over this site including:
 - MCWD
 - MNDOT
 - Hennepin County
- 3. The approval of the development and sign plan shall be in accordance with the approved plans. Any changes, expansions or alterations to the building, site and signage shall require the review and approval of the City.
- 4. The Applicant shall pay for all costs associated with the City's review of the site plan review and variance.

Attachments:

- 1. Application
- 2. Survey
- 3. Site Plan Package
- 4. Preliminary Plat
- 5. Building Elevations
- 6. Sign Package
- 7. City Review Letter



City of Maple Plain 5050 Independence St P.O. Box 97 Maple Plain, MN 55359 Office: (763) 479-0515 Fax: (763) 479-0519

ZONING & LAND USE APPLICATION

	APPL	ICANT II	NFORMATION		
Applicant Name Emily Helwig			Company, if applicable Kw	ik Trip, Inc.	
Address 1813 Kramer St			Phone Number (608)-791-7	443	
City, State, Zip La Crosse, WI, 54603			Email ehelwig@kwiktrip.com		
Are you the owner of the property?	Yes.	🛛 No.	(If not, property owner informat	tion is required.)	
Owner Name Norbert Villamil			Company if applicable Mapl	- Plain Catoway [
Address 300 Lindawood Lane			Phone Number 612 742 260	a Plain Galeway i	-properties Li
City State Zip Weyzete MN 55201			Email parbyillamil@amail.com	4	
City, State, Zip Wayzata, Min 55591	_				
Applicant Signature Imili Selute			Owner Signature (Willa	mil	
Date 1-8-2025 /			Date 1-8-2025		
()	PRO	JECT IN	FORMATION		
Site Address or Property Identification I	Number	25-118	3-24-11-0040		
Type of Request (Check all that apply.)	Foo	Escrow			
Anneal Administration Desision	¢250	¢250	-		
Appear Administration Decision	\$250	\$250	-		
Concept Plan Review	\$500				
Residential Application	Fee	Escrow	Commercial Application	Fee	Escrow
	100	LSOION		100	230101
Conditional Use Permit	\$750	\$1500	Conditional Use Permit	\$1500	\$3000
	\$750	\$1500		\$1500	\$3000
Site Plan	\$750	\$1500	Site Plan	\$1500	\$3000
Minor Subdivision	\$750	\$1500	Minor Subdivision	\$1500	\$3000
	\$750	\$1500 \$1500		\$1500 \$1500	\$3000
	\$750 ¢750	\$1500 ¢1500		\$1500 \$1500	\$3000
	\$750 ¢750	\$1500 ¢1500		\$1500 ¢4500	\$3000 ¢2000
	\$75U	\$1500 ¢4500		\$1500	\$3000
	\$750	\$1500		\$1500	\$3000
	\$400	\$1000		\$200	\$3000
Residential/Commercial			Grading and Execution		
Planning and Zoning Application	Fee	Escrow	Bark Fees and Signs	Fee	Escrow
			Fark i ees and Signs		
Proliminary Plat	\$1000	\$3000	- <100 Cubic Vards	N/C	
	\$1000	\$3000		\$500	
	\$1000 \$1000	¢2000		\$300 \$1000	*See below
Comprehensive Plan Amendment	\$1000 ¢1000	\$3000 ¢2000	Dight of Way Darmit	\$1000 \$250	\$1000
	\$1000	\$3000 ¢2000		\$Z00	φ1000
	\$1500 ¢750	\$3000 \$2000	Derk Dedication Fee	10% of land	
	φ <i>1</i> 50	φ3000			
			Residential	value 01	
				development	
			Park Dedication Fee	100/ of land	
			Other		
			Other		
				development	
			Signage Permanent	\$250	
				φ230 \$25	
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*Escrow or surety bond in amount of 150% of land alteration costs

** Minimum of 3,750 per unit and maximum of \$8,000 per unit

Brief Project Narrative / Overview (Use additional paper if necessary. Please be thorough.)
Construction of a new Kwik Trip convenience store with a fueling canopy with 8 Multi-Product Dispensers. Construction
of a detached 1-bay carwash.

NOTICE TO APPLICANT

The Maple Plain City Code guides and enables development activities within the City by ensuring proper and wellcoordinated projects. The land use application is the mechanism that allows the City to examine proposed land uses to ensure compatibility with the City Codes, design and development standards, and the surrounding land uses and natural environments. The review is intended to ensure positive growth for the community.

All applications are reviewed individually and are evaluated based on their own merit. Each land use request has an associated checklist of required items. Applicants are encouraged to participate in the City's pre-application workshop prior to submitting a formal land use application. The workshop is an opportunity to informally discuss the conceptual idea of the proposed project in an effort to reduce delays. Participation in the pre-application process does not provide approval, or guarantee of approval, of the project. The City shall not accept plans, drawings or other information related to the project except upon submittal of a formal application. The City reserves the right to reject an incomplete application.

APPLICATION FEE STATEMENT

All expenses pertaining to project reviews are the responsibility of the applicant. Planning review deposits and other applicable fees must be paid when submitting land use applications and accompanying materials. All fees, which are set annually by City ordinance, help cover costs incurred by the City to review the application. The City of Maple Plain often uses consulting firms to assist in the review of projects. City staff and consultant review costs are billed hourly; all other costs are billed at cost. Applicants shall be billed directly for incurred expenses upon receipt by the City. The City reserves the right to request an applicant to submit a development escrow in advance of the formal project review.

Please refer to the City's Fee Schedule for information on planning review fees and deposits, and other applicable costs.

By signing this form, the applicant recognizes his/her responsibility for any and all fees associated with the land use application from project review through to construction and release of financial guarantees for an approved project. All fees associated with a project that is denied or withdrawn remain the sole responsibility of the applicant and shall be paid upon receipt of invoice.

I hereby understand the fee statement and responsibilities associated with this land use application:

Applicant Signature Date 1-8-2025 Owner Signature Date 1-8-2025

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REVIEW REQUIREMENTS

Minnesota State Statute 15.99 requires local governments to review an application within 15 business days of its submission to determine if an application is complete and/or if additional information is required to complete the review. Once complete, a formal 60-day review period begins. The City has the ability to extend the review period an additional 60 days, if necessary, due to insufficient information or scheduling difficulties.

Please review the corresponding checklist that goes with the request as all materials are required unless waived by the City. All applications must be received by the deadline(s) attached hereto. Failure to submit by the date shown may result in a delay of the review by the Planning Commission and City Council.

Section 4, Item A.

DEADLINES

Planning Commission meetings are held on the first Thursday of the month at 6:00 P.M.
All applications are due 30 days prior to meeting.

OFFICE USE ONLY			
Арр	lication Type	Review Deadline	
		15 Business Days:	
		60 Day Review:	
		120 Day Review:	
Fee	s Collected	Received by	
	Application Fee Collected:	Name:	
	Escrow: \$	Signature:	
	Total Receipt: \$	Date:	
Rec	eipt	Application Complete	
	Receipt Number(s)	Are there any missing materials?	
		If yes, was the application accepted?	
L			

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MAPLE
PLAIN
INC 1912

City of Maple Plain 5050 Independence St P.O. Box 97 Maple Plain, MN 55359 Office: (763) 479-0515 Fax: (763) 479-0519

SITE PLAN CHECKLIST & PROCEDURE

Section 4, Item A.

APPLICATION REQUIREMENTS

The following materials are required in order for each application to receive consideration. The City reserves to waive certain requirements. An application that is missing materials may not be accepted.					
 Completed Land Use Application and pay all applicable fees. All materials as required by City Zoning Code regarding Site Plans. Certified survey of property (8 full size, 10 reduced) plus CAD and PDF electronic files. Written narrative of outlining project and purpose of request. Wetland report by Certified Wetland Specialist. 					
ScaleExistiFour-SpeciGradiLocatSoil b	 Scaled site plan showing dimensions & distances Existing & proposed property conditions (page 2) Four-sided architectural plans and elevations Specifications for exterior finishes Grading, erosion control & drainage plans (page 2) Location of fire suppression, if applicable Soil borings, if applicable 				
	APPROVALS &		IITS		
Project applica time for agency re watershed district	Project applications may require review and comment from the following agencies. Applicants should allow for enough time for agency review. The City encourages applicants to contact each state and county agency and the appropriate watershed district prior to submitting formal application to understand agency requirements. City of Maple Plain City of Maple Plain Hennepin County City of Transportation City of Maple Plain City of				
Upon completi	on of the formal review period, the following pe	ermits m	ay be required for an approved project. The City,		
Building Permit Hennepin County Right of Way Permit Demolition Permit MnDOT Right of Way Permit Excavation & Grading Permit Minnehaha Creek Watershed District Permit Right of Way Permit Pioneer-Sarah Creek Watershed Commission Sewer Availability Charges (SAC) MnPCA Storm Water (NPDES) Construction Permit Water Availability Charge (WAC) Wetland Conservation Act requirements					
NOTICE TO APPLICANT					
 In order to receive consideration, the applicant must complete a number of steps. 1. Meet with City staff to discuss the proposed use, whether permitted or conditional, obtain a land use application packet, and schedule a pre-application meeting. 2. Assemble information outlining the request. 3. Submit a completed application packet, including all materials as required by City Zeping Code related to the type. 					

- Submit a completed application packet, including all materials as required by City Zoning Code related to the typ of request, to City Hall by the dates noted on the Land Use Application.
 Dertained in the region process by effective code related to the typ
- Participate in the review process by attending City staff and public meetings.
 Attend all Public Hearings, and Planning Commission and City Council meetings.

By law, the City of Maple Plain must notify adjacent property owners of proposed projects that may impact their properties. This notification is mailed to property owners within 350 feet of the project area at least 10 days prior to the public hearing. A Certified List of Property Owners will be compiled by the City of Maple Plain.

Section 4, Item A.

Drawings of Existing & Proposed Conditions should include:

- gross and net acreages of the proposed development
- location, width and name of all existing streets and highway, public property, railroad, utility rights of way, & easements within the proposed development
- location and size of existing buildings & infrastructure (water, sewer and storm sewer lines)
- wetlands, wooded areas & other natural features
- tree inventory, including trees to be removed & saved
- layout of proposed streets, rights of way and appropriate street information
- layout proposed sidewalks, trails and pedestrian ways
- location and dimension of all easements
- minimum building setback lines.

Grading & Erosion Control & Drainage Plans must show the following:

- existing & proposed topography
- existing natural features, such as trees, wetlands, ponds, swales, drainage channels, etc.
- existing and proposed storm sewer facilities
- proposed storm water improvements
- flood elevations based on a 100-year flood plain
- spot elevations & directional arrows representing drainage patterns
- wetland delineation & mitigation plan at 2:1 ratio

ACKNOWLEDGEMENT

By signing this form, the applicant hereby acknowledges the receipt of the checklist and procedure for the project to be submitted for consideration. It is the responsibility of the applicant to submit all required materials. All permit requests should be submitted in a timely manner so as not to cause project delays.

Applicant Signature	Owner Signature
Date	Date 1-8-2025



Store Engineering

PHONE 608-793-5555 **FAX** 608-781-8960

1626 Oak St., P.O. Box 2107 La Crosse, WI 54602

www.kwiktrip.com

January 2025

City of Maple Plain Mark Kaltsas

RE: Kwik Trip 1775 Maple Plain New Construction

Dear Mr. Kaltsas:

This letter is intended to accompany the submittal for our application to the City of Maple Plain for the requested conditional use permit, plat, site plan and sign plan review. Kwik Trip request a conditional use permit for automobile fuel service and carwash.

Kwik Trip, Inc. is proposing the construction of a convenience store with 8 dispenser fueling canopy, detached carwash and detached dumpster enclosure. Included in the submittal is the is the application, civil plans, stormwater calculations, elevations, and sign plan.

Operations

The requested hours of operation will be 24 hours for all uses. The type of products that will be sold will be similar to that of our existing stores throughout the mid-west: fresh produce, bakery and dairy, hot and cold food and beverages, fresh meat and groceries, tobacco products, lotto, convenience store merchandise, alcohol, gasoline, diesel, E-85, ice and propane. The outside merchandising of products is being requested next to the store (two ice chests and one propane cage) and underneath the proposed main canopy. To ensure that the freshest products are sold in our stores, we request that daily deliveries be allowed.

Buildings, Architecture and Site Design

The architectural elements in this state-of-the-art building consist of a full brick cladding, standing seam metal roof, store front aluminum openings and stucco accents. Extensive landscaping, modern storm water facilities, monument and wall signage, customer and employee parking, concrete paving with curb and gutter are also included in the overall site design.

OUR MISSION

To serve our customers and community more effectively than anyone else by treating our customers, co-workers and suppliers as we, personally, would like to be treated, and to make a difference in someone's life.

Investment in the City

This project will be a multi-million-dollar investment in the City of Maple Plain. Not only in the physical improvements and development, but also an investment of approximately 25 to 30 new permanent jobs in the City. The projected payroll here is estimated to be approximately \$500,000 annually.

Community Partner

We pride ourselves in being an asset in the communities where we are located. Families can walk or ride their bikes to our stores. Retirees on fixed income can access fresh groceries like milk, eggs, bread and fruit just steps from their car. We take pride in giving back to the communities we serve with charitable donations and by partnering with local non-profits. Kwik Trip would be happy to provide any additional information or answer any questions or concerns the City of Osseo may have with our submittal. Please feel free to call or email with any questions you may have.

Sincerely,

Emily Helwig Project Manager Store Engineering <u>ehelwig@kwiktrip.com</u> 608-791-7443



KWIK TRIP STORE #1775

PERMIT SET

<u>CITY OF MAPLE PLAIN</u> HENNEPIN COUNTY, MINNESOTA



CIVIL ENGINEER

CARLSON ENGINEERING, INC. DANIEL WILKE 3890 PHEASANT RIDGE DR NE, #100 BLAINE, MN 55449 PHONE: 952-346-3864 EMAIL: dwilke@carlsonmccain.com

SITE DESIGNER

CARLSON ENGINEERING, INC. DANIEL WILKE 3890 PHEASANT RIDGE DR NE, #100 BLAINE, MN 55449 PHONE: 952-346-3864 EMAIL: dwilke@carlsonmccain.com

SURVEYOR

CARLSON ENGINEERING, INC. THOMAS BALLUFF 3890 PHEASANT RIDGE DR NE, #100 BLAINE, MN 55449 PHONE: 763-489-7916 EMAIL: tballuff@carlsonmccain.com

TITLE SHEET EXISTING CONDITIONS SURVEY DEMO PLAN SITE KEYNOTE PLAN SITE CIRCULATION PLAN SITE DIMENSION PLAN GRADE PLAN GRADE PLAN STORM SEWER PLAN STORM SEWER NOTES & DETAILS UTILITY PLAN UTILITY PLAN UTILITY NOTES SITE PLAN DETAILS SITE PLAN DETAILS SITE PLAN DETAILS EROSION CONTROL PLAN EROSION CONTROL PLANS EROSION CONTROL DETAILS
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<u>PLAN KEYNO</u>	DTES			
1. LANDSCAPE AREA	. SEE SHEET L1.			
2. 30" HEIGHT, 6" DI 6/C500.	IAMETER CONCRETE	FILLED PIPE	BOLLARD.	SEE DETAIL
3. 36" HEIGHT, 6" D 7/C500.	IAMETER CONCRETE	FILLED PIPE	BOLLARD.	SEE DETAIL
4. CONCRETE ISLAND	WITH 6" EXPOSURE	WITH FUEL	DISPENSER	. DISPENSE

- PER OWNER. 5. 4" CONCRETE WALK.
- 6. OUTDOOR MERCHANDISING.
- 7. MATCH EXISTING CURB & GUTTER/SIDEWALK/PAVEMENT.
- 8. TRANSFORMER LOCATION.
- 9. TOTE SCREENING WALL. SEE ARCHITECTURAL PLANS.
- 10. PVC IRRIGATION SLEEVE UNDER PAVEMENT. VERIFY WITH IRRIGATION PLAN FOR EXACT SIZE AND LOCATION BEFORE INSTALLATION.
- 11. BIKE RACK PER OWNER.
- 12. PYLON SIGN.
- 13. 6" INTEGRAL CONCRETE WALK/CURB.
- 14. SITE AREA LIGHT WITH CONCRETE BASE PER DETAIL 5/C500.
- 15. PICNIC TABLE PER OWNER.
- 16. CONCRETE VALLEY GUTTER PER DETAIL 13/C500.
- 17. "FREE AIR" COMPRESSOR PER OWNER. PROVIDE SIGNAGE PER OWNER.
- 18. AUTO VACUUM PER OWNER ON CONCRETE ISLAND WITH 6" EXPOSURE. PROVIDE TRASH CONTAINER PER OWNER.
- 19. CARWASH KEYPAD PER OWNER. PROVIDE TRASH CONTAINER PER OWNER.
- 20. FUEL TANKS VENT STAND PER OWNER (LOCATED WITHIN FUELING CANOPY) 21. MONUMENTS SIGN.
- 22. PEDESTRIAN RAMP.









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KWIK T P.O. BOX 1626 OAU LA CROS PH. (608 FAX (608	RIP, Inc. (2107 (STREET SSE, WI 54602 (781-8988 (781-8960) (CARL ENGINEE	-2107 SON RING	
TEL 763.489-7900 \ FAX 763.489.7959 \ CARLSON-ENGINEERING.COM I hereby certify that this plan, specification or report was prepared by me or under my direct supervision and that I am a duly Licensed Professional Engineer under the laws of the State of Minnesota. Name: Daniel J. Wilke, P.E. Signature: Date: 1/15/25 License #:53182			
SITE KEYNOTE PLAN	CONVENIENCE STORE #1775 WITH 1-BAY DETACHED CARWASH	BAKER PARK ROAD & GATEWAY BLVD MAPLE PLAIN, MINNESOTA	

 DRAWN BY
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 SCALE
 GRAPHIC

 PROJ. NO.
 11109-00

 DATE
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 SHEET
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3890 PHEASANT TEL	RIDGE DRIVE NE, SUITE 100 763.489-7900 \ FAX 763.489 CARLSON-ENGINEERING.CC	SON RING , BLAINE, MN 55449 9.7959 \ DM
I hereby cer was prepare and that I a under the la Name: Signatur Date: <u>1/</u>	tify that this plan, specified by me or under my di m a duly Licensed Professor ws of the State of Minnessor Daniel J. Wilke, P.E e: <u>Den 2006</u> 15/25 License #:53	ication or report rect supervision ssional Engineer sota. E.
SITE DIMENSION PLAN	CONVENIENCE STORE #1775 WITH 1-BAY DETACHED CARWASH	BAKER PARK ROAD & GATEWAY BLVD MAPLE PLAIN, MINNESOTA
SCALE PROJ. NO. DATE SHEET	1775 (<u>GRAPHIC</u> 11109-00 2025-01-15 C181





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STORM SEWER SCHEDULE			
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CB-107	24"x 36"	R-3067-V	
CBMH-106	48" DIA.	R-3067-VB	
CB-105	24"x 36"	R-3067-VB	
CBMH-104	60" DIA.	R-3067-VB	
CBMH-103	48" DIA.	R-3067-V	
CBMH-102	60" DIA.	R-3067-V	
*CBMH-101	48" DIA.	R-3067-VB	

* INSTALL 24R SNOUT OIL & DEBRIS STOP AS MANUFACTURED BY BMP, INC. ON OUTLET PIPE.



 BENCHMARK

 1. Hennepin County Control Point No. 4915 (Station Name KEGN) - Elevation 1001.17 ft (NAVD88)

 2. Minnesota Department of Transportation Geodetic GSID Station No. 11751 (MnDot Name SLAUG MNDT) - Elevation 990.926 ft.



(NAVD88)



5	TORM DRAINAGE:		tops of th board mat
•	Unless otherwise indicated, use reinforced, precast, concrete maintenance holes and catchbasins conforming to ASTM C478, furnished with water stop rubber gaskets and precast bases. Joints for all precast maintenance hole sections shall have confined, rubber "O"—ring gaskets in accordance with ASTM C443. These joints are normally used in sewers to hold infiltration and exfiltration to a practical minimum and are adequate for hydrostatic heads up to 30'. The inside barrel diameter shall not be less than 48 inches.	21.	Install all point in th When conr and grade work.
2.	Install catchbasin castings RIM EL	22.	Line ponds
	as shown.	23.	Clean sedi
5.	All joints and connections in the storm sewer system shall be aastight or watertight. Use flexible compression joints to		

- make watertight connections to manholes in accordance with Minnesota Rules part 4714.0719.6. Where permitted by the administrative authority, approved resilient rubber seals or waterstop gaskets may be used in order to make watertight connections to manholes, catchbasins, and other structures. Use Fernco "Concrete Manhole Adaptors" or "Large Diameter Waterstops", Press-Seal "Waterstop Grouting Rings", or approved equal. Cement mortar joints alone are not allowed unless making repairs or connections to existing lines having such joints.
- 4. The building sewer starts 2 feet outside of the building. See Uniform Plumbing Code (UPC) part 715.1. Material installed within 2 feet of the building must be of materials approved for use inside of or within the building.
- 5. The exterior storm water piping must comply with the following requirements: (A) Double wyes may not be used for drainage fittings in the horizontal position (see Minnesota Rules, Chapter 4714, Section 310.5), because proper pipe slope cannot be maintained on both of the lateral branches. (B) Changes in direction in drainage piping must be made by appropriate use of wyes and bends (see Minnesota Rules, Chapter 4714, Section 706.0). When connecting any vertical drop to a horizontal run, use a wye and a 1/8 bend (45 deg), or a sanitary combo. A sanitary combo is a combination wye and a 1/8 bend combined in a single fitting. The reason is to form a long radius bend in order to insure that the waste is directed in the downstream direction as it enters the horizontal run. Tees are not allowed where the direction of flow changes from either vertical to horizontal or horizontal to horizontal.
- <u>PVC Pipe (Outside of the Building)</u>: Use solid-core, Schedule 40 Polyvinyl Chloride (PVC) Plastic Pipe for all designated PVC storm sewer services outside of the building. The PVC pipe shall meet or exceed the industry standards and requirements as set forth by the American Society for Testing and Materials (ASTM) D1785 and D2665. Fittings must comply with ASTM D1866, D2665, or F794. Joints must be approved mechanical or push-on utilizing an elastomeric seal. Use of solvent cement joints is allowed for building services. Solvent cement joints in PVC pipe must include use of ASTM F656 purple primer and cement in accordance with Uniform Plumbing Code (UPC), part 605.13.2. Pipe with solvent cement joints shall be joined with PVC cement conforming to ASTM D2564. The installation must comply with ASTM D2321, which requires open-trench installation on a continuous granular bed.
- Cleanouts: Install cleanouts on all roof drains. Cleanouts shall be installed at every wye, sweep, and bend. Install cleanouts on all storm sewer services in accordance with UPC part 719.0 and 1101.12. The distance between cleanouts in horizontal piping shall not exceed 100 feet for pipes 4-inch and over in size. Cleanouts shall be of the same nominal size as the pipes they serve. Include frost sleeves and concrete frame and pipe support. Install a meter box frame and solid lid (Neenah R–1914–A, or approved equal) over all cleanouts. Provide cleanouts at the base of the roof leader connections at the gas island pump stations.
- <u>Fittings</u>: Provide directional fittings for the storm piping serving the gas island pump stations. All changes in direction
 of flow in drain piping shall be made by the appropriate use of 45 degree wyes, long or short sweep quarter bends, sixth, eighth, or sixteenth bends, or by a combination of these or other equivalent fittings.
- 9. RCP: Reinforced concrete pipe (RCP) and fittings shall conform to ASTM C76, Design C, with circular reinforcing for the class of pipe specified. Use Class IV RCP for pipes 21" and larger. Use Class V RCP for pipes 18" and smaller. Joints shall be made up of concrete surfaces with a groove on the spigot for an O-ring rubber gasket (also referred to as a confined O-ring type joint) in accordance with ASTM C361. These joints are normally used in gravity sewers where exceptional tightness is required. This type of joint provides excellent inherent water tightness in both the straight and deflected position and meets all the joint requirements of ASTM C443.
- 10. <u>RC Aprons</u>: Install a reinforced concrete apron on the free end of all daylighted RCP storm sewer pipes. Tie the last three sections (including apron) of all daylighted RCP storm sewer with a minimum of two tie bolt fasteners per joint. This requirement applies to both upstream and downstream pipe inlets and outlets. For concrete culverts, tie all joints. Ties to be used only to hold the pipe sections together, not for pulling the sections tight. Nuts and washers are not required on inside of 675 mm (27 inch) or less diameter pipes.
- 11. <u>Grates on horizontal pipes</u>: Install safety-trash grates on all horizontal inlets/outlets greater than 6 inches in diameter. The grates shall be placed so that the rods or bars are not more than 3 inches downstream of the inlet/outlet. Rods or bars shall be spaced so that the openings do not permit the passage of a 6-inch sphere.
- <u>Testing</u>: Test all portions of storm sewer that are within 10 feet of buildings, within 10 feet of buried water, lines, within 50 feet of water wells, or that pass through soil or water identified as being contaminated in accordance with the Minnesota Rules part 4714.1109 and UPC part 1109.0. Test all flexible storm sewer lines for deflection after the sewer line has been installed and backfill has been in place for at least 30 days. No pipe shall exceed a deflection of 5%. If the test fails, make necessary repairs and retest.
- 13. Draintile: In accordance with Minnesota Rules part 4714.1102.5, use perforated polyvinyl chloride PVC (ASTM D2729) or corrugated polyethylene PE (ASTM F405) on all draintile 3-inches to 6-inches in diameter. **Install draintile with high** permittivity circular knit polymeric filament filter sock per ASTM D6707-01. MnDot 3733 Type I sewn seam non-woven fabric shall not be used. Draintile pipe directly connected to the storm sewer is classified as storm sewer. Draintile inlet elevations to the catch basins must be above the storm sewer outlet elevations.
- 14. Use Neenah R-3067-DR/DL casting with curb box, or approved equal, on CB #1, CB#2, CB#4 and CB #5. Casting shall include the "NO DUMPING. DRAINS TO RIVER." environmental notice. 15. Use Zurn Z886 trench drain model 8606N with black acid resistant epoxy coated ductile grate - Class C for proposed
- trench drain. 16. Use Neenah Foundry Co. R-1642 casting with self-sealing, solid, type B lid, or approved equal, on all storm sewer maintenance holes. Covers shall bear the "Storm Sewer" label.
- 17. Trace Wire: Install locating wires on all conductive and non-conductive storm sewer, sanitary sewer, and water lines in accordance with the Minnesota Rural Water Association (MRWA) Trace Wire Specification Guide and Details (www.mrwa.com/PDF/TracerWireSpecGuideFinalweb9.pdf). Use #12 HDPE-insulated copper-clad steel wire rated for underground service. The color of the insulating jacket shall be as follows: ground=red, storm sewer=green, sanitary sewer=areen, and water lines=blue. Install the wire on the bottom side of the pipe below the spring line. Fasten the wire to the pipe with tape or plastic ties at 5' intervals. Do not wrap the trace wire around the corresponding utility. o not connect the trace wire to existing conductive utilities. Use Copperhead Dryconn 3—Way or Locking Snake Bite connectors rated for underground direct bury applications or approved equal at all crossings or service connections Twist on connectors are not allowed. Trace wire must be properly grounded at all dead ends and services. Install grade-level/in-ground trace wire access boxes and drive-in magnesium grounding anodes at all dead ends, services, and fire hydrants. Trace wire access boxes shall be color coded as follows: storm sewer=green, sanitary sewer=green, and water lines=blue.
- 18. Detectable Warning Tape: Install detectable underground warning tape directly above all underground utilities at a depth of 457 mm (18 inches) below finished grade, unless otherwise indicated. Underground warning tape shall be 3-inches wide with a minimum 5.0 mil overall thickness. Tape shall be manufactured using a 0.8 mil clear virgin polypropylene film, reverse printed and laminated to a 0.35 mil solid aluminum foil core, and then laminated to a 3.75 mil clear virgin polyethylene film. The aluminum backing makes underground assets easy to find using a non-ferrous locator. Tape shall be printed using a diagonally striped design for maximum visibility and meet the APWA Color-Code standard for identification of buried utilities. Use Pro-Line Safety Products (www.prolinesafety.com) detectable marking tape or approved equal.
- 19. Install anti-seepage diaphragms at the locations indicated on the plan in accordance with MNDOT Standard Specification 2501 and MNDOT Standard Plate No. 3146C.
- 20. The minimum depth of cover for building and canopy roof drain leaders without insulation is 5 feet. Insulate roof drain leaders at locations where the depth of cover is less than 5 feet. Provide a minimum insulation thickness of 2 inches. The insulation must be at least 4 feet wide and centered on the pipe. Install the insulation boards 6 inches above the

he pipes on mechanically compacted and leveled pipe bedding material. Use high density, closed cell, rigid aterial equivalent to DOW Styrofoam HI-40 plastic foam insulation. I pipe with the ASTM identification numbers on the top for inspection. Commence pipe laying at the lowest the proposed sewer line. Lay the pipe with the bell end or receiving groove end of the pipe pointing upgrade. ecting to an existing pipe, uncover the existing pipe in order to allow any adjustments in the proposed line before laying any pipe. Do not lay pipes in water or when the trench conditions are unsuitable for such

- s with 2' thick impervious clay liner per detail.
- diment and debris from sewers, sumps and stormwater basins prior to final owner acceptance.
- 24. Televise all existing lines prior to connection.
- 25. Provide a final storm water management report that will serve to verify that the intent of the approved storm water management design has been met. The report shall include record drawings, measurements, and photographic evidence of the as-built storm water management system. The report shall substantiate that all aspects of the original design have been adequately provided for by the construction of the project.
- 26. Install finger drains at each and every proposed catchbasin (see detail). Finger drains around catch basin inlets shall not be installed below the crown of the storm drain piping.

<u>HDPE REQUIREMENTS:</u>

- 1. Install dual-wall, smooth interior, corrugated high-density polyethylene (HDPE) pipe at locations indicated on the plan. High-density polyethylene (HDPE) storm sewers must meet ASTM F714 (see Minnesota Rules, Chapter 4714 and Installation Standard 1). 2. Dual-wall, smooth interior, corrugated high-density polyethylene (HDPE) pipe shall conform to the requirements of AASHTO M252 for pipe sizes 4-inch to 10-inch diameter. Dual-wall, smooth interior, corrugated high-density polyethylene (HDPE) pipe shall conform to the requirements of ASTM F2306 (virgin PE material) for pipe sizes 12-inch to 60-inch diameter.
- 3. All fittings must comply with ASTM Standard D3212.
- 4. Water-tight joints must be used at all connections (including structures) in conformance with ASTM F2510.
- 5. HDPE pipe connections into all concrete structures must be made with water tight materials utilizing Nyoplast "Manhole Adaptors" along with Press-Seal or Kor-N-Seal "Watertight Connector", Cast-A-Seal "Precast Watertight Connector", or approved equals. Where the alignment precludes the use of the above approved watertight methods, Conseal 231 WaterStop sealant, or approved equal will only be allowed as approved by the Administrative Authority.
- be coupled in order to provide water-tight joints.
- 7. Perform deflection tests on all HDPE pipe after the sewer lines have been installed and backfill has been in place for at least 30 days. No pipe shall exceed a deflection of 5%. If the test fails, make necessary repairs and perform the test again until acceptable. Supply the mandrel for deflection testing. If the deflection test is to be run using a rigid ball or mandrel, it shall have a diameter equal to 95% of the inside diameter of the pipe. The ball or mandrel shall be clearly stamped with the diameter. Perform the tests without mechanical pulling devices.



6. Lay all HDPE pipe on a continuous granular bed. Installation must comply with ASTM D2321. All sections of the corrugated HDPE pipe shall

ENKAMAT TRM OR

APPROVED EQUAL

BASIN 10













GENERAL:

- Existing boundary, location, topographic, and utility information shown on this plan is from a field survey by Carlson Mccain, Inc. dated 8/7/24. The Engineer is not responsible for inaccuracies related to the survey information.
- Perform all construction work in accordance with State and Local requirements.
- Perform all construction activity in accordance with the Minnesota Pollution Control Agency GENERAL STORMWATER PERMIT FOR CONSTRUCTION ACTIVITY issued August 1, 2023 and all subsequent amendments thereto.
- Comply with all applicable local, state, and federal safety regulations. Comply with the work safety practices specified by the Occupational Safety and Health Administration (OSHA). OSHA prohibits entry into "confined spaces." such as manholes and inlets (see 29 CFR Section 1910.146), without undertaking certain specific practices and procedures. Bench or slope sidewalls in order to provide safe working conditions and stability for the placement of engineered fill. Perform excavations in accordance with the requirements of O.S.H.A. 29 CFR, Part 1926, Subpart P, Excavations. The Contractor is responsible for naming the "Competent Individual" in accordance with CFR 1926.6. Sloping or benching for excavations areater than 20 feet deep must be approved by a reaistered professional engineer (www.osha.gov).
- Safety is solely the responsibility of the Contractor, who is also solely responsible for the construction means, methods, techniques, sequences or procedures, and for safety precautions and programs in connection with the Work.
- The Engineer shall not have control over, charge of, or responsibility for the construction means, methods, techniques, sequences or procedures, or for safety precautions and programs in connection with the Work. The Engineer's review shall not constitute approval of safety precautions or of any construction means, methods, techniques, sequences, or procedures.
- Examine all local conditions at the site, and assume responsibility as to the grades, contours, and the character of the earth, existing conditions, and other items that may be encountered during excavation work above or below the existing grades. Review the drawings, specifications, and geotechnical report covering this work and become familiar with the anticipated site conditions.
- Refer to the architectural plans for building and stoop dimensions, site layout and dimensions, pavement sections and details, striping, and A licensed surveyor shall perform construction staking. The Contractor shall provide and be responsible for the staking. Verify all plan and
- detail dimensions prior to construction staking. Stake the limits of walkways and curbing prior to valvebox, maintenance hole, and catchbasin installation. Adjust valvebox and maintenance hole locations in order to avoid conflicts with curb and gutter. Adjust catchbasin locations in order to align properly with curb and gutter
- Provide temporary fences, barricades, coverings, and other protections in order to preserve existing items to remain, and to prevent injury or damage to person or property. Provide all traffic control required in order to construct the proposed improvements. Traffic control design and associated government approvals are the responsibility of the Contractor. Comply with local authorities and the latest version of the Minnesota Manual on Uniform Traffic Control Devices (MMUTCD), including the Field Manual for Temporary Traffic Control Zone Layouts. If the temporary traffic control zone
- affects the movement of pedestrians, provide adequate temporary pedestrian access and walkways. If the temporary traffic control zone affects an accessible and detectable pedestrian facility, maintain accessibility and detectability along the alternate pedestrian route in accordance with the provisions for pedestrian and worker safety contained in Part 6 of the MMUTCD Connect to existing sanitary sewer MH's by coredrilling. Connect to existing storm sewer MH's by either sawcutting or coredrilling. Use saws or drills that provide water to the blade. Meet all City standards and specifications for the the connection. Reconstruct inverts after
- before beginning construction to ensure that service connections do not cut into maintenance access structure joints or pipe barrel joints. Completely remove existing concrete and masonry structures that are located within the proposed building and future building expansion areas. All other existing sewer and watermain pipes that are to be abandoned shall either be removed, or completely filled with sand or controlled low strength material (CLSM) also known as flowable concrete fill. Bulkhead ends of the pipe segment to be decommissioned with concrete. All other existing sanitary sewer and storm sewer structures that are to be abandoned in place shall be abandoned as follows: (1) remove castings, rings, and top sections, (2) bulkhead any pipe openings, (3) break two 4-inch diameter holes in the barrel at the bottom of the

installation. Use water stop gaskets in order to provide watertight seals when penetrating a structure wall with a pipe. Take measurements

- structures for drainage and cover the holes with geotextile filter fabric, and (4) fill the structures with sand or CLSM. Testing and Inspections: All plumbing installations, including water and sewer services, must be tested and inspected in accordance with the requirements of the Minnesota Plumbing Code (Minnesota Rules Chapter 4714). Coordinate testing and inspection with the State Health Department and the City Public Works Department. No drainage or plumbing work may be covered prior to completing the required tests and
- Coordinate building utility connection locations at 2 ft. out from the proposed building with the interior Plumbing Contractor prior to construction. Verify water and sewer service locations, sizes, and elevations with the Mechanical Engineer prior to construction. Coordinate construction and connections with the Mechanical Contractor.
- The subsurface utility information shown on this plan is utility Quality Level D. This quality level was determined according to the guidelines of CI/ASCE 38-02, entitled "Standard Guideline for the Collection and Depiction of Existing Subsurface Utility Data" by the FHA. The locations of existing utilities shown on this plan are from record information. The Engineer does not guarantee that all existing utilities
- are shown or, if shown, exist in the locations indicated on the plan. It is the Contractor's responsibility to ascertain the final vertical and horizontal location of all existing utilities (including water and sewer lines and appurtenances). Notify the Engineer of any discrepancies. The Contractor is solely responsible for all utility locates. Contact utility companies for locations of all public and private utilities within the
- work area prior to beainning construction. Contact GOPHER STATE ONE CALL at (651) 454-0002 in the Minneapolis/St. Paul metro area, or 1-800-252-1166 elsewhere in Minnesota for exact locations of existing utilities at least 48 working hours (not including weekends and holidays) before beginning any construction in accordance with Minnesota Statute 216D. Obtain ticket number and meet with representatives of the various utilities at the site. Provide the Owner with the ticket number information. Gopher State One Call is a free service that locates municipal and utility company lines, but does not locate private utility lines. Use an independent locator service or other means in order to obtain locations of private utility lines including, but not limited to, underground electric cables, telephone, TV, and lawn sprinkler
- Pothole to verify the positions of existing underground facilities at a sufficient number of locations in order to assure that no conflict with the proposed work exists and that sufficient clearance is available. Where existing gas, electric, cable, or telephone utilities conflict with the Work, coordinate the abandonment, relocation, offset, or support of
- the existing utilities with the appropriate local utility companies. Coordinate new gas meter and gas line installation, electric meter and electric service installation, cable service, and telephone service installation with the local utility companies. When working near existing telephone or electric poles, brace the poles for support. When working around existing underground utilities that become exposed, provide sufficient support in order to prevent excessive stress on the existing piping. The location and preservation of
- existing underground utilities is solely the responsibility of the Contractor. Temporary support systems are the responsibility of the Contractor, who is also solely responsible for the construction means, methods, techniques, sequences or procedures, and for safety precautions and programs in connection with the temporary support systems. Temporary eting, bracing, anchorages, excavation support walls, directional boring, auger

jacking, soil stabilization, and other methods of protecting existing improvements.

- Arrange for and secure suitable disposal areas off-site. Dispose of all excess soil, waste material, debris, and all materials not designated for salvage. Waste material and debris includes trees, stumps, pipe, concrete, asphaltic concrete, cans, or other waste material from the construction operations. Obtain the rights to any waste area for disposal of unsuitable or surplus material either shown or not shown on the plans. All work in disposing of such material shall be considered incidental to the work. All disposal must conform to applicable solid waste disposal permit regulations. Obtain all necessary permits at no cost to the Owner
- Store and protect existing site features that need to be removed and replaced in connection with the Work. Replace damaged or stolen site features at no additional cost to the Owner.
- Straight line saw—cut existing bituminous or concrete surfacing at the perimeter of pavement removal areas. Use saws that provide water to the blade. Do not allow the slurry produced by this process to be tracked outside of the immediate work area or discharged into the sewer system. Tack and match all connections to existing bituminous pavement.
- Relocate overhead power, telephone, and cable lines as required. Seal and report any existing unused on-site wells and septic systems in accordance with Minnesota Department of Health (MDH) requirements. Provide the MDH with a Well and Boring Sealing Record, or certify in writing that there are no unused wells on the property.
- All materials required for this work shall be new material conforming to the requirements for class, kind, grade, size, guality, and other details specified herein or as shown on the Plans. Do not use recycled or salvaged aggregate, asphaltic pavement, crushed concrete, or scrap shinales. Unless otherwise indicated, the Contractor shall furnish all required materials and labor in order to perform the construction in accordance with the construction documents, specifications, and regulatory agencies.
- Reconstruct driveways and patch street to match existing pavement section and grade. Sod right-of-way. Restore the public right-of-way at temporary construction entrance locations. Replace any concrete curb and gutter, bituminous pavement, sidewalk, or vegetative cover damaged by the construction activity. Restore damaged turf with sod within the public right—of—way. The work area shown is general and may need to be adjusted in the field.
- . Cut turf edges in order to allow for a uniform straight edge at locations where new sod meets existing turf. No jagged or uneven edges are allowed. Remove topsoil as required at joints between existing and new turf in order to allow the surface of the new sod to be flush with the existing.
- Document existing conditions (photographs, video, field survey, etc.) in order to enable restoration to match existing conditions and in order to ensure that restored areas have positive drainage similar to existing conditions. Provide positive drainage away from buildings at all times. Provide and maintain temporary drainage throughout construction until the
- permanent drainage system and structures are in place and operational. Install temporary ditches, piping, pumps, or other means as necessary in order to insure proper drainage at all times. Provide low points at building pads or roadways with positive outfalls. Do not block drainage from or direct excess drainage to adjacent property. Protect all structures and landscaping not labeled for demolition from damage during construction. Provide protective coverings and
- enclosures as necessary to prevent damage to existing work that is to remain. Existing work to remain may include items such as trees, shrubs, lawns, sidewalks, drives, curbs, utilities, buildings and/or other structures on or adjacent to the site. Provide temporary fences and barricades as required for the safe and proper execution of the work and the protection of persons and property. Provide building surveys and seismic monitoring in locations where demolition, excavation, underpinning, pile driving, compacting, or similar work is to be performed adjacent to or in the vicinity of existing structures. Return any on-site or off-site areas disturbed directly or indirectly due to construction to a condition equal to or better than the existing condition.
- . Protect sub grades from damage by surface water runoff. 4. Full design strength is not available in bituminous pavement areas until the final lift of asphalt is compacted into place. Protect pavement
- areas from overloading by delivery trucks, construction equipment, and other vehicles. When sawing or drilling concrete or masonry, use saws that provide water to the blade. Do not allow the slurry produced by this process to be tracked outside of the immediate work area or discharged into the sewer system.
- Adjust all public and private structures including curb stops, valve boxes, maintenance hole castings, catchbasin castings, cleanout covers, and similar items to finished grade. Comply with the requirements of each structure's owner. Structures being reset in paved areas must meet the owner's requirements for traffic loading.
- 2% maximum slope in all directions in handicapped accessible parking areas. 2% maximum cross slope and 5% maximum longitudinal slope on all sidewalks.
- . Install all pipe with the ASTM identification numbers on the top for inspection. Commence pipe laying at the lowest point in the proposed sewer line. Lay the pipe with the bell end or receiving groove end of the pipe pointing upgrade. When connecting to an existing pipe, uncover the existing pipe in order to allow any adjustments in the proposed line and grade before laying any pipe. Do not lay pipes in water or when the trench conditions are unsuitable for such work.
- Obtain and pay for all permits, tests, inspections, etc. required by agencies that have jurisdiction over the project including the NPDES permit from the State. The Contractor is responsible for all bonds, letters of credit, or cash sureties related to the work. Execute and inspect work in accordance with all local and state codes, rules, ordinances, or regulations pertaining to the particular type of work involved. Measure pipe lengths from center-of-structure to center-of-structure, or to the end of aprons.
- Obtain permits from the City for work in the public right-of-way.
- 2. Refer to the geotechnical report by the Soils Engineer for dewatering requirements
- Test boring data shown on the plans were accumulated for designing and estimating purposes. Their appearance on the plan does not constitute a guarantee that conditions other than those indicated will not be encountered.
- The minimum depth of cover for building and canopy roof drain leaders without insulation is 5 feet. Insulate roof drain leaders at locations where the depth of cover is less than 5 feet. Provide a minimum insulation thickness of 2 inches. The insulation must be at least 4 feet wide and centered on the pipe. Install the insulation boards 6 inches above the tops of the pipes on mechanically compacted and leveled pipe bedding material. Use high density, closed cell, rigid board material equivalent to DOW Styrofoam HI-40 plastic foam insulation.
- Insulate utility lines at locations indicated on the plans. Provide a minimum insulation thickness of 4 inches. The insulation must be at least 4 feet wide and centered on the pipe. Install the insulation boards 6 inches above the tops of the pipes on mechanically compacted and leveled pipe bedding material. Use high density, closed cell, rigid board material equivalent to DOW Styrofoam Highload 40 Polystyrene Insulation. Individual insulation board dimensions typically measure 4' wide by 8' long by 2" thk.

- 46. Construct sanitary sewer, watermain, and storm sewer utilities in accordance with the City Engineer's Association of Minnesota Standard Specifications sections 2600, 2611, and 2621 dated 2013, or the latest revised edition.
- hereon does not extend to any such safety systems that may nor or hereafter be incorporated into these plans. The construction contractor and/or local regulations.
- 48. Existing utilities shown on this plan are located as accurately as possible. However, the Engineer does not guarantee that all utilities are Il utilities which may be affected by the construction.
- 49. Trace Wire: Install locating wires on all conductive and non-conductive storm sewer, sanitary sewer, and water lines in accordance with the sewer=green, sanitary sewer=green, and water lines=blue.
- approved equal.
- 51. See architectural for building waterproofing and foundation drainage.
- pavement locations. 53. Place $#4 \times 2'-0''$ tie bar at 3' on center in all concrete curb and autter.
- and related structures. Location ties shall be to permanent landmarks or buildings.
- 55. Test reports required for project close-out include, but are not limited to: density test reports, bacteriological tests on the water system, pressure tests on the water system, leak tests on the sewer system, and deflection tests on all HDPE pipe
- road user shall be removed or obliterated to be unidentifiable as a marking as soon as practical. Pavement marking obliteration shall remove the non-applicable pavement marking material, and the obliteration method shall minimize pavement scarring. Painting over existing pavement markings with black paint or spraying with asphalt shall not be accepted as a substitute for removal or obliteration.
- nbination of air blasting, water blasting, and grinding. Provide a dust control system and remove accumulated sand or other materials. Collect, haul, and dispose of dust or residue from removals.
- WATER DISTRIBUTION SYSTEM:
- 2. CITY REQUIRES A MINIMUM OF 48 HOURS NOTICE PRIOR TO ANY WATER SHUTDOWN.
- water line within 10-feet of the crossing.
- as required. Include costs to lower water lines in the base bid.
- M-12, or using appropriate chlorine test kits.
- 7. All water supply piping connected to municipal water main must have a 150 psi minimum pressure rating. Rules part 4714,0604 and UPC part 604.0.)
- 10. Polyvinyl Chloride (PVC) Building Water Services must comply with ASTM D1785, ASTM D2241, or AWWA C900; pressure rated for water (See
- 11. Polyvinyl Chloride (PVC) Watermain: Use AWWA C900 for all PVC watermain furnished with integral elastomeric bell and spigot joints; and hydrants.
- device hardware shall be ANSI 304 stainless steel, or approved equivalent.
- 13. Watermain Valves: At all valve locations which require a 12" or smaller valve, install gate valves which are of the compression resilient
- urb stop locations. Stationary rod is required on all curb stops. Use Mueller Company Mark II Oriseal No. H—15154N curb stop, or approved equal, and stainless steel stem rod.
- ANSI 304 stainless steel, or approved equivalent 16. Do not connect new watermain to existing until the new water main is pressure tested and disinfected.
- follows: storm sewer=green, sanitary sewer=green, and water lines=blue.
- approved equal.

- and fittings with watertight plugs when work is not in progress. Keep the interior of all pipes clean and remove any dirt or debris from joint surfaces after the pipes have been lowered into the trench. Install all valves plumb and located according to the plans.
- least 4 feet wide and centered on the pipe. Install the insulation boards 6 inches above the tops of the pipes on mechanically compacted and leveled pipe bedding material. Use high density, closed cell, rigid board material equivalent to DOW Styrofoam Highload 40 Polystyrene Insulation. Individual insulation board dimensions typically measure 4' wide by 8' long by 2" thk.

SANITARY SEWER:

47. These plans, prepared by Carlson McCain, LLC., do not extend to or include systems pertaining to the safety of the construction contractor or its employees, agents, or representatives in the performance of the work. The seal of Carlson McCain's registered professional engineer

shall prepare or obtain the appropriate safety systems which may be required by U.S. Occupational Safety and Health Administration (OSHA)

shown, or if shown are in the exact locations indicated on the plan. It is the Contractor's responsibility to ascertain the final vertical and horizontal location of all existing utilities (including municipal water and sewer lines and appurtenances) and to notify the owners of the utilities a minimum of 48 working hours before starting construction in a given area, requesting location in the field, as exact as possible, of

Minnesota Rural Water Association (MRWA) Trace Wire Specification Guide and Details (www.mrwa.com/PDF/TracerWireSpecGuideFinalweb9.pdf) Use #12 HDPE-insulated copper-clad steel wire rated for underground service. The color of the insulating jacket shall be as follows: red, storm sewer=green, sanitary sewer=green, and water lines=blue. Install the wire on the bottom side of the pipe below the spring line. Fasten the wire to the pipe with tape or plastic ties at 5' intervals. Do not wrap the trace wire around the corresponding utility. Do not connect the trace wire to existing conductive utilities. Use Copperhead Dryconn 3-Way or Locking Snake Bite connectors ated for underground direct bury applications or approved equal at all crossings or service connections. Twist on connectors are not allowed Trace wire must be properly arounded at all dead ends and services. Install arade-level/in-around trace wire access boxes and drive-in magnesium grounding anodes at all dead ends, services, and fire hydrants. Trace wire access boxes shall be color coded as follows: storm

50. Detectable Warning Tape: Install detectable underground warning tape directly above all underground utilities at a depth of 457 mm (18 nches) below finished grade, unless otherwise indicated. Underground warning tape shall be 3-inches wide with a minimum 5.0 mil overall thickness. Tape shall be manufactured using a 0.8 mil clear virgin polypropylene film, reverse printed and laminated to a 0.35 mil solid aluminum foil core, and then laminated to a 3.75 mil clear virgin polyethylene film. The aluminum backing makes underground assets easy to find using a non-ferrous locator. Tape shall be printed using a diagonally striped design for maximum visibility and meet the APWA Color-Code standard for identification of buried utilities. Use Pro-Line Safety Products (www.prolinesafety.com) detectable marking tape or

52. Place #3 rebar at 3' on center in all 6" thick concrete pavement locations. Place #4 rebar at 4' on center in all 8" thick concrete

54. Record as-built information as construction progresses or at appropriate construction intervals. Secure and deliver to the Owner as-built information showing locations, top, and invert elevations of maintenance holes, catchbasins, cleanouts, inlet and outlet pipes, valves, hydrants,

56. Removing Markings: Markings that are no longer applicable for roadway conditions or restrictions and that might cause confusion for the

57. Completely remove marking from locations shown on the plan in accordance with MnDOT Standard Specification Section 2102. Use one or a

1. Bring all site utilities to 2' outside of the building line with the exception of the water service. Extend water service into the building and up to the flange for the water meter. Do not install PVC water service pipe under or within any building, structure, or part thereof.

3. Separation of Water and Sewer: Construct sewer and water services in accordance with Minnesota Rules, part 4714.0721 and Uniform lumbing Code (UPC) parts 720.0 and 721.0. Provide a minimum horizontal separation of 10 feet between all water and sewer lines, including manholes, catch basins, storm sewer, sanitary sewer, draintile, or other potential sources for contamination. Measure the separation distance from the outer edge of the pipe to the outer edge of the contamination source (outer edge of structures, piping, etc.) At water and sewer crossings, the bottom of the water pipe located within ten feet of the point of crossing must be at least 12-inches above the top of the sewer. When this is not feasible, the sewer pipe material must be approved for use inside of or within a building in accordance with the requirements of Minnesota Rules part 4714.0701 and UPC part 701.0. No joints or connections are allowed on the

4. Watermain Depth: Maintain 8-feet of cover over the top of the water lines to the finished grade. Verify elevation of proposed and existing water lines at all utility crossings. Install the water lines at greater depths in order to clear storm sewers, sanitary sewers, or other utilities

5. Disinfection: Disinfect all completed watermains in accordance with AWWA Standard C651. If the tablet or continuous feed methods are used, disinfect using with water that contains at least 50 ppm of available chlorine in accordance with Minnesota Rules, part 4714.0609 and UPC part 609.9. Do not use the tablet method on solvent-welded plastic or on screwed-joint steel pipe because of the danger of fire or explosion from the reaction of the joint compounds with the calcium hypochlorite. Retain the treated water in the pipeline for at least 24 hours. Measure the chlorine residual at the end of the 24 hour period. The free chlorine residual must be at least 10 mg/l measured at any point in the line. Measurement of the chlorine concentration at regular intervals shall be in accordance with Standard Methods, AWWA

Testing: Pressure test and perform bacteriological tests on all water lines under the supervision of the City Public Works Department. tify the City at least 24 working hours prior to any testing. Pressure test the water system in accordance with the UPC part 609.4. Pressurize the waterline to a water pressure of 1034-kPa (150-psi) gauge pressure (measured at the point of lowest elevation) by means of a pump connected to the pipe in a satisfactory manner. Do not add water to the watermain in order to maintain the required pressure ing the water main pressure testing. Minnesota Department of Labor and Industry: The test section of pipe shall withstand the test without leaking for a period of not less than 15 minutes. <u>Minnesota Department of Health</u>: The watermain shall be pressure tested at 150-psi for at least two hours with not more than a 2-psi pressure drop during the last hour of the test.

8. Copper tube for water services must comply with ASTM B88 and shall have a weight not less than Type L (in accordance with Minnesota

9. Ductile iron pipe (DIP) water services must comply with AWWA C151/ANSI A21.51 or AWWA C155/ANSI A21.15 (See Minnesota Rules part 4714.0604 and UPC part 604.0.). Use Thickness Class 52 DIP with push-on joints. Use petroleum resistant gaskets, Nitrile (NBR), or approved equal. Use only ANSI 304 stainless steel bolts and nuts on all watermain fittings, valves, and hydrants. The exterior of ductile iron pipe shall be coated with a layer of arc-sprayed zinc per ISO 8179. The interior cement mortar lining shall be applied without asphalt seal coating. Polyethylene encasement is required on all ductile iron pipe. Use V-Bio Enhanced Polyethylene Encasement or approved equal.

Minnesota Rules part 4714.0604 and UPC part 604.0.). Do not install PVC water service pipe under or within any building, structure, or part

inimum pressure Class 150; dimension ratio not greater than 18; laying length 20 feet. Use EBAA Iron, Inc., "Series 2000 PV Megalug," or approved equal for restraint on C900 PVC watermain. Use only ANSI 304 stainless steel bolts and nuts on all watermain fittings, valves

12. Use mechanical joint restraint devices for joint restraint on all watermain bends having a vertical or horizontal deflection of 22-1/2 degrees or greater, all valves, stubs, extensions, tees, crosses, plugs, all hydrant valves, and all hydrants in accordance with City requirements. Use "Series 1100 Megalug" manufactured by EBAA Iron Inc., Eastland, Texas, or approved equal, installed in accordance with manufacturer's recommendations for restraint on Ductile Iron Pipe. Restraining devices are to have epoxy coating or approved equivalent. Restraining

seated (CRS) type. Use American Flow Control's Series 2500 Ductile Iron Resilient Wedge Gate Valve, or approved equal. Gate valves shall conform to AWWA C509. Install cast iron valve boxes conforming to ASTM A48 at each valve location. Valve boxes shall be the three-piece type with 5-1/4" shafts. Use Tyler 6860-G with No. 6 base, or equivalent. Valve boxes shall have at least 6" of adjustment above and below finished arade. Drop covers on valve boxes shall be round and bear the word "WATER" cast on the top. Use Tyler 6860-G "Stayput" covers with extended skirt, or equivalent. All valve hardware shall be ANSI 304 stainless steel, or approved equivalent. 14. Curb Valves and Boxes: Use Mueller H-10334 extension type curb box with Minneapolis pattern base, or approved equal, at all 🖥 through 2"

15. Fire hydrants shall be in accordance with the requirements of the local municipality. Do not connect hydrant drains to sanitary sewers or storm sewers. Do not locate hydrants within 10 feet of sanitary sewers or storm sewers. When placing fire hydrants in locations where the groundwater table is less than 8 feet below the ground surface, plug the hydrant drain holes and equip the hydrants with a tag stating the reed for pumping after use. Maintain a 3-foot clear space around the circumference of all fire hydrants. All hydrant hardware shall be

17. Trace Wire: Install locating wires on all conductive and non-conductive storm sewer, sanitary sewer, and water lines in accordance with the Minnesota Rural Water Association (MRWA) Trace Wire Specification Guide and Details (www.mrwa.com/PDF/TracerWireSpecGuideFinalweb9.pdf) Use #12 HDPE-insulated copper-clad steel wire rated for underground service. The color of the insulating jacket shall be as follows: around=red, storm sewer=areen, sanitary sewer=areen, and water lines=blue. Install the wire on the bottom side of the pipe below the spring line. Fasten the wire to the pipe with tape or plastic ties at 5' intervals. Do not wrap the trace wire around the corresponding utility. Do not connect the trace wire to existing conductive utilities. Use Copperhead Dryconn 3—Way or Locking Snake Bite connectors rated for underground direct bury applications or approved equal at all crossings or service connections. Twist on connectors are not allowed. Trace wire must be properly grounded at all dead ends and services. Install grade-level/in-ground trace wire access boxes and drive-in magnesium grounding anodes at all dead ends, services, and fire hydrants. Trace wire access boxes shall be color coded as

18. Detectable Warning Tape: Install detectable underground warning tape directly above all underground utilities at a depth of 457 mm (18 inches) below finished arade, unless otherwise indicated. Underground warning tape shall be 3-inches wide with a minimum 5.0 mil overall thickness. Tape shall be manufactured using a 0.8 mil clear virgin polypropylene film, reverse printed and laminated to a 0.35 mil solid aluminum foil core, and then laminated to a 3.75 mil clear virgin polyethylene film. The aluminum backing makes underground assets easy to find using a non-ferrous locator. Tape shall be printed using a diagonally striped design for maximum visibility and meet the APWA Color-Code standard for identification of buried utilities. Use Pro-Line Safety Products (www.prolinesafety.com) detectable marking tape or

19. Threaded hose connections including hose bibbs and hydrants must include a back flow prevention device in accordance with Minnesota Rules, part 4714.0603 and UPC part 603.0. Wall hydrants must meet ASSE Standard 1019 (see Table 603.2). Where permitted by the administrative authority, wall hydrants may utilize non-removable ASSE 1052 backflow preventers or non-removable ASSE 1011 vacuum breakers and provision is made to protect from freezing (see Minnesota Rules, Chapter 4714, Sections 603.5.7, 312.6, and 301.1.2).

20. All newly installed or replacement pipes, pipe fittings, plumbing fittings and fixtures, including backflow preventers, that are installed on potable water systems or systems that are designed to distribute water for potable use, are required to meet the Reduction of Lead in Drinking Water Act, which establishes a maximum lead content of 0.25 percent by weighted average of the wetted surfaces. Solder and flux for potable water systems shall contain less than 0.2 percent lead. Joints must include non-corrosive non-toxic paste-type flux complying with ASTM B813 (see Minnesota Rules, Chapter 4714, Section 605.3.4). See Minnesota Rules, part 4714.0604 and UPC part 604.11. 21. Do not exceed the manufacturer's specifications for curvature of pipe and deflection at pipe joints. Securely close all open ends of pipe

22. Insulate the watermain at locations indicated on the plans. Provide a minimum insulation thickness of 4 inches. The insulation must be at

1. Unless otherwise indicated, use reinforced, precast, concrete maintenance holes conforming to ASTM C478, furnished with precast bases. Sanitary sewer maintenance holes shall be supplied with pre-formed inverts and flexible neoprene sleeve connections for all lateral lines 375 mm (15 inches) in diameter or less, unless otherwise indicated. Joints for all precast maintenance hole sections shall have confined, rubber "O"-ring gaskets in accordance with ASTM C443. These joints are normally used in sewers to hold infiltration and exfiltration to a practical minimum and are adequate for hydrostatic heads up to 30'. The inside barrel diameter shall not be less than 48 inches.

2. All joints and connections in the sewer system shall be gastight or watertight. Use flexible compression joints to make watertight connections to manholes in accordance with Minnesota Rules part 4714.0719.6. Where permitted by the administrative authority, approved resilient rubber joints or waterstop aaskets must be used in order to make watertight connections to manholes and other structures. Use Fernco "Concrete Manhole Adaptors" or "Large Diameter Waterstops", Press-Seal "Waterstop Grouting Rings", or approved equal. Cement mortar joints are permitted <u>only</u> for repairs or connections to existing lines having such joints.

3. The building sewer starts 2 feet outside of the building. See Uniform Plumbing Code (UPC) part 715.1. Material installed within 2 feet of the building must be of materials approved for use inside of or within the building. 4. The exterior sanitary sewer piping must comply with the following requirements: (A) Double wyes may not be used for

drainage fittings in the horizontal position (see Minnesota Rules, Chapter 4714, Section 310.5). Proper pipe slope cannot be maintained on both of the offset branches. (B) Changes in direction in drainage piping must be made by appropriate use of wyes and bends (see Minnesota Rules, Chapter 4714, Section 706.0). Tees are not allowed where the direction of flow changes from either vertical to horizontal or horizontal to horizontal.

5. Pipe: Use solid-core, Schedule 40 Polyvinyl Chloride (PVC) Plastic Pipe for all designated PVC sanitary sewer services outside of the building. The PVC pipe shall meet or exceed the industry standards and requirements as set forth by the American Society for Testing and Materials (ASTM) D1785 and D2665. Fittings must comply with ASTM D1866. D2665. or F794. Joints must be approved mechanical or push-on utilizing an elastomeric seal. Use of solvent cement joints is allowed for building services. Solvent cement joints in PVC pipe must include use of ASTM F656 purple primer and cement in accordance with Uniform Plumbing Code (UPC), part 605.13.2. Pipe with solvent cement joints shall be joined with PVC cement conforming to ASTM D2564. The installation must comply with ASTM D2321, which requires open-trench installation on a continuous aranular bed.

6. Cleanouts: Install cleanouts on all sanitary sewer services in accordance with UPC part 719.0 and 1101.12. The distance tween cleanouts in horizontal piping shall not exceed 100 feet for pipes 4-inch and over in size. Cleanouts shall be of the same nominal size as the pipes they serve. Include frost sleeves and concrete frame and pipe support. Install a meter box frame and solid lid (Neenah R-1914-A, or approved equal) over all cleanouts.

7. Testing: Pressure test all sanitary sewer lines in accordance with the Minnesota Rules parts 4714.0712 and 4714.0723 and parts 712.0 and 723.0. Test all flexible sanitary sewer lines for deflection after the sewer line has been installed and backfill has been in place for at least 30 days. No pipe shall exceed a deflection of 5%. If the test fails, make necessary

8. Install flexible watertight frame/chimney seals on all sanitary sewer maintenance holes in order to seal the outside of the nney from the cast iron frame down to the cone. The seal shall be a continuous seamless band made of high quality EPDM (Ethylene Propylene Diene Monomer) rubber with a minimum thickness of 65 mils. Use Internal/External Adapter Seal as manufactured by Adaptor, Inc. (www.adaptorinc.com/wp-content/uploads/2019/04/ADAP_IEManholeSeal.pdf), Infi-Shield Uni-band one piece molded sealing system as manufactured bySealing Systems, Inc. (www.ssisealingsystems.com), or approved

9. Use Neenah Foundry Co. R-1642 casting with self-sealing, solid, type B lid, or approved equal, on all sanitary sewer maintenance holes. Covers shall bear the "Sanitary Sewer" label.

10. <u>Trace Wire</u>: Install locating wires on all conductive and non-conductive storm sewer, sanitary sewer, and water lines in accordance with the Minnesota Rural Water Association (MRWA) Trace Wire Specification Guide and Details (www.mrwa.com/PDF/TracerWireSpecGuideFinalweb9.pdf). Use #12 HDPE-insulated copper-clad steel wire rated for underground service. The color of the insulating jacket shall be as follows: ground=red, storm sewer=green, sanitary sewer=green, and water lines=blue. Install the wire on the bottom side of the pipe below the spring line. Fasten the wire to the pipe with tape or plastic ties at 5' intervals. Do not wrap the trace wire around the corresponding utility. Do not connect the trace wire to existing conductive utilities. Use Copperhead Dryconn 3-Way or Locking Snake Bite connectors rated for underground direct bury applications or approved equal at all crossings or service connections. Twist on connectors are not allowed. Trace wire must be properly grounded at all dead ends and services. Install grade-level/in-ground trace wire access boxes and drive—in magnesium grounding anodes at all dead ends, services, and fire hydrants. Trace wire access boxes shall be color coded as follows: storm sewer=green, sanitary sewer=green, and water lines=blue.

11. Detectable Warning Tape: Install detectable underground warning tape directly above all underground utilities at a depth of 457 mm (18 inches) below finished grade, unless otherwise indicated. Underground warning tape shall be 3-inches wide with a minimum 5.0 mil overall thickness. Tape shall be manufactured using a 0.8 mil clear virgin polypropylene film, reverse printed and laminated to a 0.35 mil solid aluminum foil core, and then laminated to a 3.75 mil clear virain polyethylene film. ne aluminum backing makes underground assets easy to find using a non-ferrous locator. Tape shall be printed using a diagonally striped design for maximum visibility and meet the APWA Color-Code standard for identification of buried utilities. Use Pro-Line Safety Products (www.prolinesafety.com) detectable marking tape or approved equal.

12. The minimum depth of cover for sanitary sewer without insulation is 5 feet. Insulate sanitary sewer services at locations where the depth of cover is less than 5 feet. Provide a minimum insulation thickness of 4 inches. The insulation must be at least 4 feet wide and centered on the pipe. Install the insulation boards 6 inches above the tops of the pipes on mechanically compacted and leveled pipe bedding material. Use high density, closed cell, rigid board material equivalent to DOW Styrofoam Highload 40 Polystyrene Insulation. Individual insulation board dimensions typically measure 4' wide by 8' long by 2" th

13. Install all pipe with the ASTM identification numbers on the top for inspection. Commence pipe laying at the lowest point in the proposed sewer line. Lay the pipe with the bell end or receiving groove end of the pipe pointing upgrade. When connecting to an existing pipe, uncover the existing pipe in order to allow any adjustments in the proposed line and grade before laying any pipe. Do not lay pipes in water or when the trench conditions are unsuitable for such work.

14. All saddle tee or wye fittings must provide an integrally molded pipe stop in the branch for positive protection against service pipe insertion beyond the inside of the sewer main pipe wall.

15. Terminate all new sewer stubs with a water-tight gasketed cap properly braced in order to withstand the infiltration-exfiltration test. Install grade-level/in-ground trace wire access boxes and drive-in magnesium grounding anodes at the end of all stubs.

16. Televise all existing lines prior to connection.













GENERAL INFORMATION MINNESOTA'S CONSTRUCTION STORMWATER PERMIT IS AN EXTENSION OF THE NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM STORMWATER PROGRAM, WHICH IS PART OF THE FEDERAL CLEAN WATER ACT. REGULATED PARTIES MUST DEVELOP A STORMWATER POLLUTION PREVENTION PLAN (SWPPP). THE SWPPP PROVIDES INFORMATION ON THE EXISTING AND PROPOSED SITE CONDITIONS, CONTROL MEASURES FOR STORMWATER POLLUTION PREVENTION BEFORE, DURING AND AFTER CONSTRUCTION, INSPECTION, MAINTENANCE AND INFORMATION RELATED TO THE PERMANENT STORMWATER MANAGEMENT SYSTEM. THE SWPPP SHALL BE KEPT ON SITE AT ALL TIMES DURING ACTIVE CONSTRUCTION.

PROJECT INFORMATION

PROJECT NAME: CONVENIENCE STORE 1775 WITH DETACHED CARWASH PROJECT LOCATION: MAPLE PLAIN, HENNEPIN COUNTY, MINNESOTA PROJECT OWNER: KWIK TRIP, INC.

RESPONSIBLE PARTIES THE OWNER MUST IDENTIFY A PERSON KNOWLEDGEABLE AND EXPERIENCED IN THE APPLICATION OF EROSION

PREVENTION AND SEDIMENT CONTROL BMP'S WHO WILL OVERSEE THE IMPLEMENTATION OF THE SWPPP, AND THE INSTALLATION, INSPECTION AND MAINTENANCE OF THE EROSION PREVENTION AND SEDIMENT CONTROL BMP'S.

SITE MANAGER: EMILY HELWIG - KWIK TRIP INC.

TRAINING DOCUMENTATION: CONSTRUCTION SITE MANAGEMENT (5/31/25 EXPIRATION) - UNIVERSITY OF MN

EXISTING SITE CONDITIONS

THE SITE IS LOCATED IN THE SOUTHWEST QUADRANT OF THE INTERSECTION OF BAKER PARK ROAD AND GATEWAY BOULEVARD IN MAPLE PLAIN, HENNEPIN COUNTY, MINNESOTA. THE SITE IS BOUNDED ON THE NORTH BY GATEWAY BOULEVARD, ON THE WEST BY UNDEVELOPED COMMERCIAL PROPERTY, ON THE SOUTH BY COMMERCIAL PROPERTY AND US HIGHWAY 12, AND ON THE EAST BY BAKER PARK ROAD. THE SITE IS CURRENTLY UNDEVELOPED GRASSLAND.

THE PROPOSED SITE BOUNDARY CONSISTS OF 2.637 ACRES. A DRAINAGE BOUNDARY OF 2.729 ACRES WILL BE CONSIDERED FOR THIS ANALYSIS, WHICH INCLUDES RUN-ON AREAS OUTSIDE THE SITE BOUNDARY. THE EXISTING SITE CURRENTLY CONTAINS 0.0 ACRES OF IMPERVIOUS SURFACES. THERE ARE 0.009 ACRES OF IMPERVIOUS SURFACE WITHIN THE DRAINAGE BOUNDARY, BUT OUTSIDE OF THE SITE BOUNDARY.

THE SITE HAS A MILDLY ROLLING TOPOGRAPHY GENERALLY SLOPING TO THE SOUTH, WITH SLOPES GENERALLY RANGING FROM 0.5% TO 33% OVER THE DEVELOPED AREA. ELEVATIONS AT THE SITE RANGE FROM 998 ALONG CENTER OF THE NORTH PROPERTY LINE, DOWN TO ABOUT 990 IN THE DRAINAGE DITCHES LOCATED IN THE SOUTHERN AND WESTERN SIDES OF THE SITE. STORMWATER FROM THE SITE GENERALLY DRAINS OVERLAND TO THE CULVERTS LOCATED ON THE SOUTHERN AND WESTERN EDGES OF THE SITE, STORMWATER NORTH OF THE

NORTH PROPERTY LINE FLOWS TO THE TRUNK SEWER SYSTEM ON GATEWAY BOULEVARD. STORMWATER FLOWING WEST AND SOUTH FLOWS TO A LARGE WETLAND COMPLEX SOUTH OF US HIGHWAY 12. THE REMAINING STORMWATER FLOWS TO REGIONAL PONDING FOR GATEWAY BOULEVARD.

PROPOSED SITE CONDITIONS

KWIK TRIP, INC. PLANS ON DEVELOPING THE SITE INTO A CONVENIENCE STORE WITH A FUELING CANOPY, A DETACHED SINGLE BAY CARWASH, AND ASSOCIATED PARKING AND DRIVE LANES. DURING CONSTRUCTION, APPROXIMATELY 2.5 ACRES WILL BE DISTURBED. AFTER THE SITE IS CONSTRUCTED, THE DRAINAGE BOUNDARY WILL CONTAIN APPROXIMATELY 1.519 ACRES OF IMPERVIOUS SURFACE. THERE WILL BE APPROXIMATELY 1.510 ACRES OF NEWLY CREATED OR RECONSTRUCTED IMPERVIOUS SURFACE, WHICH INCLUDES DRIVEWAY ENTRANCES.

STORMWATER FROM THE MAJORITY OF THE IMPERVIOUS AREAS ONSITE SITE, INCLUDING ALL FUELING AREAS, WILL BE COLLECTED IN STORM SEWER AND ROUTED TO THE PROPOSED STORMWATER POND. ALL OTHER DRAINAGE AREAS WILL MOSTLY MAINTAIN EXISTING DRAINAGE ROUTES.

SOIL INFORMATION

IN SEPTEMBER OF 2024, BRAUN INTERTEC DRILLED NINE SOIL BORINGS TO APPROXIMATE NEAR SURFACE SOILS. THE BORINGS INDICATE THAT NEAR SURFACE SOILS CONSIST PRIMARILY OF SANDY LEAN CLAY AND CLAYEY SAND. THESE SOILS GENERALLY FALL WITHIN THE HYDROLOGIC SOIL GROUP (HSG) "D".

GROUNDWATER WAS FOUND TO BE PRESENT IN BORING ST-6 AT ELEVATION 987.5'. GROUNDWATER WAS NOT FOUND IN ANY OTHER BORINGS.

WETLAND CONSIDERATIONS

THERE ARE NO KNOWN WETLANDS ONSITE. STORMWATER RECEIVING WATERS

STORMWATER FROM THE MAJORITY OF THE DEVELOPED PORTION OF THE SITE, INCLUDING ALL FUELING AREAS, WILL BE COLLECTED IN STORM SEWER AND ROUTED TO THE EXISTING STORMWATER POND FOREBAY. ALL REMAINING AREAS NOT COLLECTED BY STORM SEWER WILL FLOW TO THE EXISTING POND VIA OVERLAND FLOW. THE POND OUTLETS TO A REGIONAL POND LOCATED EAST OF THE SITE ACROSS AKRON AVENUE.

SPECIAL/IMPAIRED WATER CONSIDERATIONS

PAINTER CREEK IS LOCATED APPROXIMATELY 0.7 MILES SOUTH OF THE SITE AND IS AN IMPAIRED WATER. LAKE INDEPENDENCE IS LOCATED APPROXIMATELY 1 MILE NORTH OF THE SITE AND IS ALSO AN IMPAIRED WATER. BMPS INCLUDE: IMMEDIATE STABILIZATION OF EXPOSED SOIL AREAS, AND COMPLETE STABILIZATION WITHIN SEVEN (7) CALENDAR DAYS AFTER CONSTRUCTION ACTIVITY IN THAT PORTION OF THE SITE TEMPORARILY OR PERMANENTLY CEASES, AND TEMPORARY SEDIMENTATION BASINS FOR COMMON DRAINAGE AREAS OF FIVE (5) ACRES OR MORE.

STORMWATER MANAGEMENT PLAN

PER MCWMC, 1 INCH OF RUNOFF FROM THE NEW IMPERVIOUS SURFACE AREA OF THE SITE SHALL BE ABSTRACTED ONSITE. THE PROPOSED NEW IMPERVIOUS SURFACE AREA IS 1.510 ACRES. AS SUCH, THE REQUIRED ABSTRACTION VOLUME IS 0.126 ACRE FEET.

DUE TO CLAYEY SOIL CONDITIONS ONSITE AND THE PRESENCE OF FUELING AREAS, INFILTRATION IS NOT FEASIBLE FOR THIS SITE. ALSO DUE TO THE FLAT NATURE OF THE SITE, THERE IS NOT ENOUGH DROP IN ELEVATION TO OUTLET A FILTRATION SYSTEM. THEREFORE, THE ONLY WAY TO MEET THE VOLUME ABSTRACTION ON THIS SITE IS THROUGH SOIL AMENDMENTS. ALL ONSITE PERVIOUS AREAS INDICATED ON THE GRADE PLAN WILL RECEIVE THE FOLLOWING SOIL AMENDMENTS:

1. THE TOP 8-INCHES OF SOIL WILL CONSIST OF COMPOST MIXED SOIL THAT WILL INCLUDE NATIVE SOILS MIXED WITH 2-INCHES OF APPROVED COMPOST. 2. THE UNDERLYING 4-INCHES OF SOIL WILL BE RIPPED PRIOR TO THE PLACEMENT OF THE 8-INCHES OF COMPOST/SOIL MIX.

APPROXIMATELY 0.276 ACRES OF PERVIOUS AREA WILL RECEIVE SOIL AMENDMENTS. WHICH, AT 0.5-INCHES OF CREDIT OVER 0.276 ACRES, COUNTS AS 0.138 ACRES OF ABSTRACTION WHICH MEETS THE REQUIREMENTS.

PRETREATMENT FOR THE STORMWATER POND WILL BE PROVIDED BY A SUMP MANHOLES EQUIPPED WITH A SNOUT OIL/WATER/DEBRIS SEPARATOR.

THE MPCA CONSTRUCTION STORMWATER PERMIT REQUIRES SITES TO PROVIDE A WATER QUALITY VOLUME OF 1-INCH OF RUNOFF FROM NEWLY CREATED IMPERVIOUS SURFACES. THE PROPOSED SITE WILL REDUCE IMPERVIOUS SURFACE BY APPROXIMATELY 1.510 ACRES. AS SUCH, THE REQUIRED WATER QUALITY VOLUME IS 0.126 ACRE FEET.

THE WET DETENTION BASIN HAS BEEN DESIGNED TO MPCA WET SEDIMENTATION BASIN STANDARDS. A 10-FOOT BENCH AT THE NORMAL WATER LEVEL WAS NOT PROPOSED, DUE TO THE BENCH REDUCING THE PERMANENT POOL VOLUME BELOW NURP REQUIREMENTS.

PRIOR TO START OF CONSTRUCTION THE FOLLOWING STORMWATER POLLUTION PREVENTION MEASURES SHALL BE IMPLEMENTED PRIOR TO

CONSTRUCTION. REFER TO GRADING AND EROSION CONTROL PLANS FOR LOCATIONS. 1. SILT FENCE

SILT FENCE SHALL BE INSTALLED AT THE LIMIT OF GRADING ON ANY FILL SLOPE. ADDITIONAL SILT FENCE MAY BE REQUIRED IN CUT SLOPE AREAS. SILT FENCE SHALL ALSO BE INSTALLED AROUND ANY INFILTRATION / FILTRATION PRACTICE.

- 2. ROCK CONSTRUCTION ENTRANCE ROCK CONSTRUCTION ENTRANCES SHALL BE INSTALLED AT THE FIELD ENTRANCES TO THE SITE.
- 3. CATCH BASINS ALL CATCH BASINS SHALL BE PROTECTED WITH INLET PROTECTION DEVICES APPROVED BY THE LOCAL GOVERNING UNIT. THESE SHALL INCLUDE, BUT ARE NOT LIMITED TO, WIMCO PROTECTION DEVICES, INFRASAFE PROTECTION DEVICES, FILTER FABRIC, BIO ROLLS AND STRAW BALES.

DURING CONSTRUCTION THE FOLLOWING STORMWATER POLLUTION PREVENTION MEASURES SHALL BE IMPLEMENTED DURING CONSTRUCTION. REFER TO GRADING AND EROSION CONTROL PLANS FOR LOCATIONS.

- 1. PHASED GRADING TO THE EXTENT POSSIBLE, GRADING SHALL BE PHASED TO MINIMIZE THE AMOUNT OF DISTURBED AREAS DURING SITE CONSTRUCTION.
- 2. TRACKED SEDIMENT ANY SEDIMENT TRACKED FROM THE SITE ONTO THE STREET SHALL BE REMOVED IMMEDIATELY UPON DETECTION. THE ROCK CONSTRUCTION ENTRANCE SHALL BE INSPECTED AND REPAIRED IF INUNDATED WITH SEDIMENT.

- 3. STOCKPILES DITCHES.
- 4. TOPSOIL DISTURBED AREAS, EXCLUDING PROPOSED STREETS AND PARKING AREAS.
- 5. RESTORATION CONTROL BLANKET AND/OR SOD WITHIN 7 DAYS.
- 6. SLOPES
- 7. DRAINAGE DITCHES BE COMPLETED WITHIN 24 HOURS OF CONNECTING TO A SURFACE WATER.
- 8. PIPE OUTLETS OF CONNECTION TO A SURFACE WATER.
- 9. CATCH BASINS INFRASAFE PROTECTION DEVICES, FILTER FABRIC, BIO ROLLS AND STRAW BALES.
- 10. DUST APPLICATION.
- 11. DEWATERING CONTROL AND ENERGY DISSIPATION.
- 12. CONSTRUCTION MATERIALS AND DEBRIS IN DUMPSTERS AND REMOVED FROM THE SITE AS NECESSARY.
- 13. CHEMICALS MATERIAL SAFETY DATA SHEETS AVAILABLE.
- 14. SPILLS AND CONTAMINATION DUTY OFFICER AT 800-422-0798.
- 15. CONCRETE WASHOUT AREA INSTALL A SIGN INDICATING THE LOCATION OF THE WASHOUT FACILITY.

POST CONSTRUCTION

- PERENNIAL VEGETATIVE COVER. AREAS NOT REQUIRING SOD OR EROSION CONTROL BLANKET SHALL BE SEEDED AND MULCHED.
- BE SUFFICIENTLY CLEANED OUT TO RETURN THE BASIN TO DESIGN CAPACITY. SEDIMENT MUST BE STABILIZED TO PREVENT IT FROM BEING WASHED BACK INTO THE BASIN OR CONVEYANCES DISCHARGING OFF-SITE OR TO SURFACE WATERS.
- INCLUDES, BUT IS NOT LIMITED TO, SILT FENCE, TREE FENCE AND CATCH BASIN INLET PROTECTION DEVICES.

SWPPP DRAWING UPDATES STAGING AREA(S), FUELING AREA(S), ETC. WHEN THEIR RESPECTIVE LOCATIONS ARE KNOWN.

INSPECTIONS & RECORD KEEPING STORMWATER POLLUTION PREVENTION INSPECTIONS SHALL OCCUR ONCE EVERY SEVEN (7) DAYS DURING ACTIVE CONSTRUCTION AND WITHIN 24 HOURS AFTER A RAINFALL EVENT GREATER THAN 0.5 INCHES IN 24 HOURS. INSPECTIONS MAY BE CEASED DURING FROZEN GROUND CONDITIONS. WHERE WORK HAS BEEN SUSPENDED DUE TO FROZEN GROUND CONDITIONS, THE REQUIRED INSPECTIONS AND MAINTENANCE MUST TAKE PLACE WITHIN 24 HOURS AFTER RUNOFF OCCURS AT THE SITE OR PRIOR TO RESUMING CONSTRUCTION, WHICHEVER COMES FIRST. DURING THE COURSE OF CONSTRUCTION, IT MAY BE DETERMINED THAT ADDITIONAL STORMWATER POLLUTION PREVENTION MEASURES MAY BE NEEDED, OR CERTAIN MEASURES ARE NOT PRACTICAL TO INSTALL. IN THESE CASES, AN AMENDMENT TO THE SWPPP SHALL BE MADE, AND SUPPORTING REASONS SHALL BE DOCUMENTED IN THE SWPPP.

- 1. THE EXCAVATOR IS RESPONSIBLE FOR ALL EROSION CONTROL INSPECTIONS.
- 2. RECORD NAME OF INSPECTOR AND DATE AND TIME OF INSPECTION.
- 3. RECORD RAINFALL AMOUNT SINCE MOST RECENT INPSECTION.
- TRACKING.
- 5. INSPECT SITE FOR EXCESSIVE EROSION AND SEDIMENT ACCUMULATION.
- SEDIMENTATION AND MALFUNCTIONING. B. INSPECT FLARED END SECTIONS FOR EROSION AND SEDIMENTATION.
- EROSION AND SEDIMENTATION.
- SEDIMENT BEING DEPOSITED BY EROSION.
- 7. INSPECT STABILIZED AREAS FOR EROSION.
- AND SEDIMENTATION CONTROL MEASURES ARE SUFFICIENT. 9. RECORD RECOMMENDED AMENDMENTS TO THE SWPPP.
- INSPECTION.
- MONTH.

MAINTENANCE

THE OWNER/CONTRACTOR IS RESPONSIBLE FOR THE OPERATION, INSPECTION AND MAINTENANCE OF ALL STORMWATER POLLUTION PREVENTION MEASURES FOR THE DURATION OF THE PROJECT. THE FOLLOWING GUIDELINES SHALL BE USED TO DETERMINE NECESSARY REPAIRS, MAINTENANCE AND/OR REPLACEMENT OF THE

STOCKPILES SHALL BE PLACED IN AN AREA THAT WILL MINIMIZE THE NEED FOR RELOCATION. IF A STOCKPILE WILL REMAIN IN PLACE FOR AN EXTENDED PERIOD OF TIME, STABILIZATION MEASURES SHALL BE IMPLEMENTED, INCLUDING BUT NOT LIMITED TO, SEEDING AND SILT FENCING. TEMPORARY STOCKPILES MUST HAVE SILT FENCE OR OTHER EFFECTIVE SEDIMENT CONTROLS AND CANNOT BE PLACED IN SURFACE WATERS, INCLUDING STORMWATER CONVEYANCES SUCH AS CURB AND GUTTER SYSTEMS, CONDUITS OR

UPON GRADING COMPLETION, A MINIMUM OF 4 INCHES OF TOPSOIL SHALL BE PLACED OVER ALL

ALL DISTURBED AREAS NOT ACTIVELY WORKED SHALL BE RESTORED WITH SEED AND MULCH, EROSION

IN ORDER TO MAINTAIN SHEET FLOW AND MINIMIZE RILLS AND/OR GULLIES, THERE SHALL BE NO UNBROKEN SLOPE LENGTH OF GREATER THAN 75 FEET FOR SLOPES WITH A GRADE OF 3:1 OR STEEPER.

THE NORMAL WETTED PERIMETER OF ANY TEMPORARY OR PERMANENT DRAINAGE DITCH THAT DRAINS WATER FROM THE SITE, OR DIVERTS WATER AROUND THE SITE, MUST BE STABILIZED WITHIN 200 LINEAL FEET FROM THE PROPERTY EDGE, OR FROM THE POINT OF DISCHARGE TO ANY SURFACE WATER. STABILIZATION MUST

PIPE OUTLETS MUST BE PROVIDED WITH TEMPORARY OR PERMANENT ENERGY DISSIPATION WITHIN 24 HOURS

ALL CATCH BASINS SHALL BE PROTECTED WITH INLET PROTECTION DEVICES APPROVED BY THE LOCAL GOVERNING UNIT. THESE SHALL INCLUDE, BUT ARE NOT LIMITED TO, WIMCO PROTECTION DEVICES,

CONSTRUCTION DUST SHALL BE CONTAINED TO THE EXTENT POSSIBLE. IF THE SITE BECOMES EXCESSIVELY DUSTY, APPROPRIATE MEASURES SHALL BE TAKEN TO REDUCE DUST BEING TRANSPORTED FROM THE SITE. DUST CONTROL MEASURES INCLUDE, BUT ARE NOT LIMITED TO, WATERING AND CALCIUM CHLORIDE

DEWATERING ACTIVITIES SHALL BE CONDUCTED WITH AND APPROVED BY THE LOCAL GOVERNING UNIT. IF THERE WILL BE ANY DEWATERING OR BASIN DRAINING THAT MAY HAVE TURBID OR SEDIMENT LADEN DISCHARGE, THE WATER MUST BE DISCHARGED TO A TEMPORARY OR PERMANENT SEDIMENTATION BASIN ON THE PROJECT SITE WHENEVER POSSIBLE. APPROPRIATE BMPS SHALL BE USED FOR EROSION AND SEDIMENT

CONSTRUCTION MATERIALS SHALL BE STORED IN AN ORDERLY MANNER AND IN AN AREA THAT WILL MINIMIZE CONFLICTS WITH OTHER CONSTRUCTION ACTIVITIES. CONSTRUCTION DEBRIS SHALL BE CONTAINED

CHEMICALS SHALL BE STORED IN A SAFE AREA IN SEALED CONTAINERS WITH THE ORIGINAL LABELING AND

IF FUEL, OIL OR A HAZARDOUS CHEMICAL IS SPILLED OR DETECTED DURING CONSTRUCTION ACTIVITIES, ALL APPROPRIATE AGENCIES SHALL BE IMMEDIATELY NOTIFIED, INCLUDING, BUT NOT LIMITED TO, THE MINNESOTA

PERMITTEES MUST PROVIDE EFFECTIVE CONTAINMENT FOR ALL LIQUID AND SOLID WASTES GENERATED BY WASHOUT OPERATIONS (E.G., CONCRETE, STUCCO, PAINT, FORM RELEASE OILS, CURING COMPOUNDS AND OTHER CONSTRUCTION MATERIALS) RELATED TO THE CONSTRUCTION ACTIVITY. PERMITTEES MUST PREVENT LIQUID AND SOLID WASHOUT WASTES FROM CONTACTING THE GROUND AND MUST DESIGN THE CONTAINMENT SO IT DOES NOT RESULT IN RUNOFF FROM THE WASHOUT OPERATIONS OR AREAS. PERMITTEES MUST PROPERLY DISPOSE LIQUID AND SOLID WASTES IN COMPLIANCE WITH MPCA RULES. PERMITTEES MUST

WHEN THE SITE HAS BEEN COMPLETELY CONSTRUCTED, THE SITE MUST UNDERGO FINAL STABILIZATION. FINAL STABILIZATION OCCURS WHEN ALL OF THE GRADING, INFRASTRUCTURE AND BUILDING ACTIVITIES HAVE BEEN COMPLETED. TO ACHIEVE FINAL STABILIZATION, THE FOLLOWING MEASURES SHALL BE COMPLETED 1. ALL DISTURBED AREAS WITHOUT PERMANENT IMPERVIOUS SURFACES SHALL BE STABILIZED BY A UNIFORM

2. SEDIMENT FROM CONVEYANCES AND TEMPORARY SEDIMENTATION BASINS THAT ARE TO BE USED AS PERMANENT WATER QUALITY MANAGEMENT BASINS SHALL BE CLEANED OUT. SEDIMENTATION BASINS SHALL

3. WHEN STABILIZED VEGETATION HAS BEEN ESTABLISHED OVER 70 PERCENT OF THE PERVIOUS SURFACE AREA, ALL SYNTHETIC TEMPORARY EROSION AND SEDIMENT CONTROL MEASURES SHALL BE REMOVED. THIS

UPDATE SWPPP DRAWING FOR LOCATIONS OF CONSTRUCTION DUMPSTER, PORTABLE TOILET, EQUIPMENT

4. INSPECT ROCK CONSTRUCTION ENTRANCES FOR SEDIMENTATION. INSPECT ADJACENT STREETS FOR SEDIMENT

A. INSPECT SILT FENCE AND OTHER TEMPORARY EROSION AND SEDIMENT CONTROL DEVICES FOR EROSION,

C. INSPECT PONDS, INFILTRATION BASINS, TEMPORARY SEDIMENTATION BASINS AND ALL OTHER BMP'S FOR D. INSPECT SURFACE WATERS, INCLUDING DRAINAGE DITCHES AND CONVEYANCE SYSTEMS FOR EVIDENCE OF

6. INSPECT SITE AND ADJACENT PROPERTIES FOR CONSTRUCTION DEBRIS, TRASH AND SPILLS.

8. RECORD RECOMMENDED REPAIRS, MAINTENANCE AND/OR REPLACEMENTS REQUIRED TO ENSURE EROSION

10. RECORD REPAIRS, MAINTENANCE AND/OR REPLACEMENTS THAT WERE COMPLETED SINCE THE LAST

NOTE: FOR AREAS THAT HAVE UNDERGONE FINAL STABILIZATION, INSPECTIONS CAN BE REDUCED TO ONCE PER

EROSION AND SEDIMENTATION CONTROL MEASURES.

1. ROCK CONSTRUCTION ENTRANCES SHALL BE REPAIRED OR REPLACED IF THE ROCK BECOMES INUNDATED WITH SEDIMENT AND/OR EXCESSIVE SEDIMENT IS BEING TRACKED FROM THE SITE. SEDIMENT TRACKED ONTO ADJACENT STREETS SHALL BE REMOVED. MEASURES SHALL BE TAKEN IMMEDIATELY UPON DISCOVERY.

2. SILT FENCE SHALL BE REPAIRED OR REPLACED WHEN SEDIMENT REACHES 1/3 THE HEIGHT OF THE SILT FENCE, THE SILT FENCE IS DAMAGED AND/OR THE SILT FENCE BECOMES NONFUNCTIONAL. MEASURES SHALL BE TAKEN WITHIN 24 HOURS OF DISCOVERY.

3. CATCH BASIN INLET PROTECTION DEVICES SHALL BE CLEANED WHEN SEDIMENT REACHES 1 THE HEIGHT OF THE SEDIMENT TRAP AND/OR REPAIRED OR REPLACED IF THE DEVICE BECOMES NONFUNCTIONAL. MEASURES SHALL BE TAKEN WITHIN 72 HOURS OF DISCOVERY.

4. FLARED END SECTIONS SHALL BE CLEANED IF DEBRIS IS RESTRICTING FLOW OR IF SEDIMENT HAS ACCUMULATED AT THE OUTLET. IF A FLARED END SECTION BECOMES NONFUNCTIONAL OR DAMAGED, IT SHALL BE REPAIRED OR REPLACED. MEASURES SHALL BE TAKEN WITHIN 72 HOURS OF DISCOVERY.

5. IF SEDIMENT IS OBSERVED OFF-SITE OR NEAR SURFACE WATERS, THE SOURCE OF SEDIMENT SHALL BE DETECTED AND ADDITIONAL MEASURES SHALL BE IMPLEMENTED. THE PERMITEE(S) SHALL COORDINATE SEDIMENT RETRIEVAL FROM SURFACE WATERS WITH ALL APPROPRIATE AGENCIES. MEASURES SHALL BE TAKEN WITHIN 7 DAYS OF DISCOVERY.

6. PONDS, INFILTRATION BASINS, TEMPORARY SEDIMENTATION BASINS AND ALL OTHER BMP'S SHALL BE CLEANED IF DEBRIS IS PRESENT AND/OR EXCESSIVE SEDIMENTATION HAS OCCURRED. TEMPORARY AND PERMANENT SEDIMENTATION BASINS MUST BE DRAINED AND THE SEDIMENT REMOVED WHEN SEDIMENT HAS FILLED THE BASIN TO 1/2 THE STORAGE VOLUME. NO SEDIMENT SHALL BE ALLOWED TO ACCUMULATE IN INFILTRATION BASINS. MEASURES SHALL BE TAKEN WITHIN 72 HOURS OF DISCOVERY.

NOTICE OF TERMINATION

THROUGHOUT THE PROJECT.

THE PERMITEE(S) MUST SUBMIT A NOTICE OF TERMINATION (NOT) TO THE MPCA WITHIN 30 DAYS AFTER FINAL STABILIZATION IS COMPLETE, OR ANOTHER OWNER/OPERATOR (PERMITEE) HAS ASSUMED CONTROL OVER ALL AREAS OF THE SITE THAT HAVE NOT UNDERGONE FINAL STABILIZATION.

QUANTITIES THE FOLLOWING TABLE PROVIDES ESTIMATED QUANTITIES FOR STORMWATER POLLUTION PREVENTION

ITEM	UNIT	ESTIMATED QUANTITY
ROCK ENTRANCE	EA.	1
SILT FENCE	IF	825

NLET PROTECTION EA. 11

TURF ESTABLISHMENT | AC. | 1.0

SWPPP DESIGN CERTIFICATION	SWPPP
I, Dan Wilke, hereby certify that I have completed designer SWPP- Erosion and Stormwater Management	l hereby (Stormwat Certificat
Certification Program <u>My certification expires May 2026</u>	<u>signed</u> expiratior



INSTALLER CERTIFICATION	SWPPP INSPECTOR CERTIFICATION
certify that I have completed Installer SWPP- Erosion and ter Management ion Program	l hereby certify that I have completed Inspector SWPP- Erosion an Stormwater Management Certification Program
1	signed expiration












	SCH	EDULE											
ור	CODE	ΟΤΥ			SIZE		SYMBOL	CODE	ΟΤΥ			SIZE	CONTAINER
52	CODL	QII										OIZE	
3 —							SHRUBS						
Ĵ								BCB	8	Aronia melanocarpa `Autumn Magic`	Autumn Magic Black Chokeberry	#5 Cont.	
)	RM	3	Acer rubrum `Northwood`	Northwood Red Maple	2" Cal.	B&B							
كر								SSC	15	Clethra alnifolia `Hummingbird`	Summersweet	#5 Cont.	
			Betula nigra Clump Form, 2" Cal Equivalent	River Birch Multi-Trunk	8` Ht.								
	RB	3				B&B	(.)	RTD	9	Cornus sericea `Alleman`s Compact`	Dwarf Red Twig Dogwood	#5 Cont.	
													+
2								DBH	17	Diervilla Ionicera	Dwarf Bush Honeysuckle	#5 Cont.	
, ł	wo	2	Quercus bicolor	Swamp White Oak	2" Cal.	B&B							
كمم							$\left \left\{ \cdot \right\} \right $	CWH	4	Hamamelis virginiana	Common Witch Hazel	#5 Cont.	
<u> </u>													
	BI	1	Tilia americana `Boulevard`	Boulevard Linden	2" Cal.	B&B	(•)	ABH	3	Hydrangea arborescens `Annabelle`	Annabelle Hydrangea	#5 Cont.	
Į							- (·)	NBS	4	Physocarpus opulifolius `Seward` TM	Summer Wine Seward Ninebark	#5 Cont.	
EROU	<u>S TREES</u>	-1											
Y Margare								SPG	10	Spiraea x bumalda `Goldflame`	Goldflame Spirea	#5 Cont.	
B	BF	6	Abies balsamea	Balsam Fir	6` Ht.	B&B							
EVERGREEN SHRUBS								T		1			
	вн	5	Picea glauca densata	Black Hills Spruce	е, н .	B&B		GVB	33	Buxus x 'Green Velvet'	Green Velvet Boxwood	#5 Cont.	
MIN				Diack Tillis Spruce	υ Πt.	DQD							
NV Cher								JSG	21	Juniperus chinensis `Sea Green`	Sea Green Juniper	#5 Cont.	
ALL ALL	WP	7	Pinus strobus	White Pine	6, Hi	B&B							
ANNA ANA	VVF	1					$ \bigcirc$	JLG	6	Juniperus horizontalis `Limeglow`	Limeglow Juniper	#5 Cont.	
11 11.													
MENTA		5		1			GRASSES						
			Amelanchier x grandiflora `Autumn Brilliance` Clump Form, 1.5" Cal Equivalent	Autumn Brilliance Serviceberry	7` Ht.	B&B	SUULUE	KEG	71	Calamagrostis x acutiflora `Karl Foerster`	Feather Read Grass	#3 Cont	
12	SB	5					BUNNE	RFG	71		reallier need Grass	#3 Cont.	
\leq								PDS	24	Sporobolus beterolenis	Prairie Dropseed	#2 Cont	
7	CA	3	Malus x `Prairifire`	Prairifire Crabapple	1 5" Cal	B&B		FD3	24			#3 Cont.	
\mathcal{A}					1.5 Cal.								
							<u>ا د د الا المالم</u>	, 		Hemerocallis x `Baja`			
$\left(\right)$	JL	3	Syringa reticulata `Ivory Silk`	Ivory Silk Japanese Tree Lilac	1.5" Cal.	B&B		DLB	52	Red Flowers	Baja Daylily	#1 Cont.	
Y			White Flowers				بىر			Hemerocallis x `Stella De Oro`			
							}• {	DLS	35	Yellow / Gold Flowers	Stella De Oro Daylily	#1 Cont.	
								VERS					
SCAPE QUANTITIES							.0.0.0	ROCK	2,467 sf	Rock Mulch	1.5" Trap Rock Mulch	4" Depth	
								1					
							+ <u>-</u> <u>-</u>	SOD	13,977 sf	Turf Sod Bluegrass	Kentucky Bluegrass	sod	
								1		Type L- Turf Seed Mix			
							$\begin{array}{cccccccccccccccccccccccccccccccccccc$	TI	10,457 sf	Refer to notes for acceptable seeding methods	MnDOT Seed Mix 25-151	seed	
							+ + + + + + + + + + + + + + + + + + + +	+		Seeding Rate 180 lb/ac			
								ТІІ	7,856 sf	Refer to notes for acceptable seeding methods	MnDOT Seed Mix 33-261	seed	
										Seeding Rate 52.0 lb/ac			
								тш	9,808 sf	Refer to notes for acceptable seeding	MnDOT Seed Mix 35-241	seed	

Refer to notes for acceptable seeding 19,808 ST methods. Seeding Rate 50.0 lb/ac

LANDSCAPE SPECIFICATIONS

TREE PROTECTION. ALL TREES NOT SPECIFICALLY NOTED OR MARKED ON SITE FOR REMOVAL SHALL REMAIN PROTECTED AND UNDISTURBED DURING CONSTRUCTION. TREE PROTECTION SHALL EXTEND TO THE DRIP LINE, WITHIN WHICH NO CONSTRUCTION ACTIVITY, MATERIAL STORAGE, OR VEHICLE PARKING SHALL BE PERMITTED. TREE PROTECTION FENCING SHALL BE ERECTED PRIOR TO CONSTRUCTION START PER PLANS OR AS DIRECTED BY OWNER/LANDSCAPE ARCHITECT AND SHALL CONSIST OF 4' TALL HEAVY DUTY ORANGE CONSTRUCTION FENCING WITH 6' STEEL FENCE POSTS SPACED 6' O.C. MAX.

2. EROSION CONTROL. REFER TO CIVIL PLAN SHEETS FOR STORMWATER POLLUTION PREVENTION PLAN (SWPPP), AND TEMPORARY AND PERMANENT STORMWATER BMPS, INCLUDING SILT FENCE, BIO-ROLLS, INLET PROTECTION, EROSION CONTROL BLANKETING, DUST CONTROL, SWEEPING AND ROCK CONSTRUCTION ENTRANCE. ALL DISTURBED AREAS SHALL RECEIVE PERMANENT STABILIZATION IN ACCORDANCE WITH THE LANDSCAPE PLAN WITHIN 7 DAYS AFTER CONSTRUCTION ACTIVITY IN THE DISTURBED AREA HAS CEASED. IN THE EVENT PERMANENT STABILIZATION CANNOT BE IMPLEMENTED WITHIN 7 DAYS, TEMPORARY STABILIZATION BMPS MUST BE IMPLEMENTED WITHIN 7 DAYS USING.

3. <u>CLEARING AND GRUBBING.</u> CONTRACTOR SHALL BE RESPONSIBLE FOR CLEARING AND GRUBBING ALL AREAS INDICATED AS BEING DISTURBED OR OTHERWISE SHOWN ON PLANS. CLEARING AND GRUBBING SHALL INCLUDE REMOVAL AND DISPOSAL OF ALL TREES, STUMPS, BRUSH, GRASS, ROOTS AND OTHER ORGANIC MATERIAL AT AN APPROVED OFF-SITE DISPOSAL LOCATION.

4. SOIL PREPARATION. REFER TO GEOTECHNICAL REPORT FOR ANY REQUIRED SOIL CORRECTIONS, AMENDMENTS OR ADDITIONAL INFORMATION (IF APPLICABLE). EXISTING TOPSOIL SHALL BE STRIPPED FROM ALL DISTURBED AREAS AND STOCKPILED IN AN APPROVED LOCATION FOR E-SPREAD. ALL AREAS WHERE SOIL HAS BEEN COMPACTED BY CONSTRUCTION ACTIVITY AND THAT ARE INDICATED TO BE SODDED, SEEDED OR PLANTING BED SHALL BE DE-COMPACTED TO A MINIMUM DEPTH OF 12 INCHES BY SOIL RIPPING, TILLING OR OTHER APPROVED SOIL LOOSENING METHOD.

5. <u>TOPSOIL MATERIAL.</u> ALL EXISTING, AMENDED OR IMPORTED TOPSOIL SHALL MEET THE REQUIREMENTS OF MNDOT TOPSOIL TYPE A. A MINIMUM 4 INCH DEPTH OF TOPSOIL SHALL BE PLACED ON ALL AREAS TO BE SODDED OR SEEDED. A MINIMUM 12 INCH DEPTH OF TOPSOIL SHALL BE PLACED WITHIN ALL PLANTING BED AREAS. ALL TOPSOIL SHALL BE FINE GRADED, RAKED AND DRAGGED TO PROVIDE A SMOOTH, UNIFORM SURFACE. TOPSOIL GRADES SHALL BE WITHIN .1 FEET OF INDICATED FINISHED GRADE AND SHALL BE TRUE TO GRADIENTS SHOWN ON PLANS. REFER TO CIVIL PLAN SHEETS FOR FILTRATION BASIN SOIL REQUIREMENTS.

6. <u>SEEDING AND TURF ESTABLISHMENT.</u> CONTRACTOR SHALL OBTAIN OWNER/LANDSCAPE ARCHITECT'S APPROVAL OF FINAL GRADES AND TOPSOIL PREP PRIOR TO SEEDING. APPLY 12-12-12 GRANULAR STARTER FERTILIZER AT A RATE OF 250 LBS PER ACRE PRIOR TO SEEDING .. SEEDS SHALL BE SOWED IN 2 PERPENDICULAR PASSES, EACH PASS AT ONE-HALF THE INDICATED RATE, VIA BROADCAST SPREADER, DROP SEEDER OR DRILL SEEDER. FOLLOWING SEED APPLICATION, INSTALL TYPE 3N EROSION CONTROL BLANKET ON ALL SLOPES GREATER THAN 4:1. IN ALL OTHER AREAS, APPLY HYDROMULCH COVER (MUST BE A SEPARATE OPERATION FROM SEEDING) AT A TARGETED DRY WEIGHT RATE OF 3500 LBS PER ACRE. SOIL SHALL BE KEPT MOIST DURING ESTABLISHMENT WITH ADDITIONAL RE-SEEDING AS NECESSARY TO ACHIEVE A HEALTHY, UNIFORM STAND OF GRASS, FREE OF WEEDS AND WITH COVERAGE EXCEEDING 75% IN ANY 10'x10' AREA PRIOR TO FINAL ACCEPTANCE.

SODDING. CONTRACTOR SHALL OBTAIN OWNER/LANDSCAPE ARCHITECT'S APPROVAL OF FINAL GRADES AND TOPSOIL PREP PRIOR TO SODDING. APPLY 12-12-12 GRANULAR STARTER FERTILIZER AT A RATE OF 250 LBS PER ACRE PRIOR TO SODDING AND ROLL TOPSOIL TO CREATE A UNIFORM SURFACE FOR LAYING SOD. SOD SHALL NOT BE CUT MORE THAN 24-HOURS IN ADVANCE OF INSTALLATION. CONTRACTOR SHALL KEEP SOD MOIST FOR A MINIMUM OF 30 DAYS AND SHALL BE RESPONSIBLE FOR MAINTAINING THE SOD UNTIL FINAL

8. <u>PLANT MATERIAL.</u> ALL PLANTING STOCK SHALL CONFORM TO THE "AMERICAN STANDARD FOR NURSERY STOCK," ANSI-Z60, LATEST EDITION, OF THE AMERICAN ASSOCIATION OF NURSERYMEN, INC. AND SHALL CONSTITUTE MINIMUM QUALITY REQUIREMENTS FOR PLANT MATERIALS. OWNER/LANDSCAPE ARCHITECT RESERVE THE RIGHT TO REJECT ANY PLANTS WHICH ARE DEEMED UNSATISFACTORY BEFORE, DURING, OR AFTER INSTALLATION. NO SUBSTITUTION OF PLANT MATERIAL SHALL BE ACCEPTED UNLESS APPROVED IN WRITING BY THE OWNER/LANDSCAPE ARCHITECT PRIOR TO INSTALLATION.

9. <u>PLANT MATERIAL SUBSTITUTIONS.</u> ALL REQUESTS FOR PLANT SUBSTITUTIONS SHALL BE MADE IN WRITING TO THE OWNER/LANDSCAPE ARCHITECT AND MUST BE APPROVED BY THE CITY.

10. PLANT INSTALLATION AND ESTABLISHMENT. REFER TO STANDARD PLANTING DETAILS. CONTRACTOR SHALL STAKE TREE LOCATIONS FOR APPROVAL BY OWNER/LANDSCAPE ARCHITECT PRIOR TO PLANTING. ANY PLANT MATERIAL WHICH DIES, TURNS BROWN, OR DEFOLIATES (PRIOR TO TOTAL ACCEPTANCE OF THE WORK) SHALL BE PROMPTLY REMOVED FROM THE SITE AND REPLACED WITH MATERIAL OF THE SAME SPECIES, QUANTITY, AND SIZE.

- BE INSTALLED WITHIN 48-HOURS OF PLANT INSTALLATION.
- EXTRUDED IN STANDARD LENGTHS, WITH 9-INCH STEEL ANGLE STAKES.

- BEFORE FINAL ACCEPTANCE.
- MATERIAL.

11. MULCH MATERIAL. DOUBLE SHREDDED HARDWOOD MULCH OR ROCK MULCH AS INDICATED ON PLANS. ALL MULCH SHALL BE CLEAN AND FREE OF NOXIOUS WEEDS, SOIL, OR OTHER DELETERIOUS MATERIAL, AND SHALL BE INSTALLED OVER A NON-WOVEN GEOTEXTILE FABRIC (INCIDENTAL) OR OTHER APPROVED WEED BARRIER TO A MINIMUM SETTLED DEPTH OF 4". MULCH SHALL BE HELD BACK FROM PLANT STEMS/TRUNKS A MINIMUM OF 3". WOOD MULCH SHALL BE PLACED AROUND INDIVIDUAL TREES TO A 4' MINIMUM DIAMETER. MULCH SHALL

12. LANDSCAPE EDGING. INSTALL LANDSCAPE EDGING BETWEEN ALL MULCH AREAS AND TURF. EDGING SHALL BE COMMERCIAL GRADE BLACK POLYETHYLENE OR VINYL EDGING, 0.1 INCH THICK BY 5 INCHES DEEP, V-LIPPED BOTTOM, HORIZONTALLY GROOVED, 1-INCH ROUND TOP,

13. IRRIGATION. DESIGN, FURNISH AND INSTALL A COMPLETE UNDERGROUND IRRIGATION SYSTEM FROM APPROVED POINT(S)-OF-CONNECTION WITHIN THE SITE COVERING ALL TURF AND PLANTING AREAS AS SHOWN ON THE LANDSCAPE PLAN. INCLUDES FLOW/PRESSURE TESTING, PLANS WITH DESIGN CALCULATIONS, AS-BUILT DRAWINGS, LABOR, MATERIALS, EQUIPMENT, AND SERVICES FOR THE TESTING, ADJUSTING, RETESTING AND READJUSTING AS REQUIRED TO PLACE THE SYSTEM IN AN APPROVED OPERATING CONDITION. THE IRRIGATION SYSTEM SHALL INCLUDE THE DESIGN AND INSTALLATION OF THE FOLLOWING: PIPING, METER AND BACKFLOW ASSEMBLIES, SPRINKLER HEADS, CABINETS, VALVES AND VALVE BOXES, CONTROLLERS, CONTROL WIRING, FITTINGS, ELECTRICAL CONNECTIONS, QUICK-COUPLERS, ALL OTHER NECESSARY ACCESSORIES, SYSTEM MANUALS, 1-YEAR MAINTENANCE PERIOD INCLUDING 1 FALL WINTERIZATION AND 1 SPRING START-UP. IRRIGATION PLANS TO BE PREPARED BY A QUALIFIED IRRIGATION DESIGNER AND SUBMITTED TO OWNER/LANDSCAPE ARCHITECT FOR APPROVAL.

14. MAINTENANCE, MAINTENANCE SHALL BEGIN IMMEDIATELY AFTER EACH PORTION OF THE WORK IS IN PLACE. PLANT MATERIAL SHALL BE PROTECTED AND MAINTAINED UNTIL THE INSTALLATION OF THE PLANTS IS COMPLETE, INSPECTION HAS BEEN MADE, AND PLANTINGS ARE ACCEPTED EXCLUSIVE OF THE GUARANTEE. MAINTENANCE SHALL INCLUDE MOWING, TRIMMING, WATERING, FERTILIZING, WEED AND PESTICIDE CONTROL, MULCHING, REMOVAL OF DEAD MATERIALS, RE-SETTING PLANTS TO PROPER GRADE AND KEEPING PLANTS IN A PLUMB POSITION. AFTER ACCEPTANCE. THE OWNER SHALL ASSUME MAINTENANCE RESPONSIBILITIES, HOWEVER, THE CONTRACTOR SHALL RETAIN RESPONSIBILITY FOR ALL PLANT MATERIAL THROUGH THE COMPLETION OF THE WARRANTY PERIOD.

15. WATERING. UPON ESTABLISHMENT OF SEED AND INSTALLATION OF PLANTS, CONTRACTOR SHALL MAINTAIN A WATERING SCHEDULE WHICH WILL THOROUGHLY WATER ALL PLANTS AND TURF AREAS A MINIMUM OF ONCE A WEEK. MORE FREQUENT WATERING MAY BE REQUIRED DURING PERIODS OF HOT, DRY WEATHER. CONTRACTOR SHALL MAKE THE NECESSARY ARRANGEMENTS FOR WATER. IN THE ABSENCE OF PERMANENT IRRIGATION, TEMPORARY IRRIGATION, TREE WATERING BAGS, OR HAND-WATERING ARE ACCEPTABLE.

16. NATIVE PLANT ESTABLISHMENT. THIS PROJECT INCLUDES ONE OR MORE NATIVE PLANT SEED MIXES CONSISTING OF A VARIETY OF GRASSES, SEDGES AND FLOWERING FORBS. BECAUSE THESE PLANTS TYPICALLY HAVE A LONGER GERMINATION PERIOD, A COVER CROP SPECIES IS REQUIRED TO PROVIDE TEMPORARY COVER AND STABILIZATION. MAINTENANCE OF THESE SEEDED AREAS IS CRITICAL DURING THE FIRST SEVERAL YEARS TO ESTABLISH A SUCCESSFUL NATIVE PLANT COMMUNITY. SEEDED AREAS SHALL BE MOWED / WEED-WHIPPED TO A HEIGHT OF 6-10 INCHES IN MID-JULY AND EARLY SEPTEMBER DURING THE FIRST 2-3 YEARS OF ESTABLISHMENT. IN ADDITION, ALL NON-NATIVE SPECIES / WEEDS SHALL BE SPOT SPRAYED NO LESS THAN 3 TIMES A YEAR WITH HERBICIDE BY A LICENSED APPLICATOR. RE-SEEDING AS NECESSARY SHALL OCCUR IN MAY. A NATIVE PLANT COMMUNITY SHALL BE CONSIDERED SUCCESSFULLY ESTABLISHED NO SOONER THAT 3 YEARS AFTER INITIAL SEEDING - ONCE THE COVER CROP HAS BEEN SUFFICIENTLY REPLACED BY NATIVE PLANTS AND THE AREA IS FREE OF ALL NON-NATIVE AND INVASIVE SPECIES. AT THIS TIME, MAINTENANCE CAN BE REDUCED TO MOWING / WEED-WHIPPING TO A HEIGHT OF 6-10 INCHES ONCE A YEAR IN EARLY SEPTEMBER AND SPOT SPRAYING OF HERBACIDE ONLY AS NEEDED. REFER TO MNDOT SEEDING MANUAL FOR ADDITIONAL INFORMATION ON PLANTING, ESTABLISHING AND MAINTAINING NATIVE SEED MIXES.

17. FINAL ACCEPTANCE. UPON SUBSTANTIAL COMPLETION OF THE WORK, CONTRACTOR SHALL REQUEST FINAL ACCEPTANCE OF THE WORK IN WRITING BY THE OWNER/LANDSCAPE ARCHITECT. IF ANY WORK IS FOUND TO BE INCOMPLETE OR UNSATISFACTORY IN THE OPINION OF THE OWNER/LANDSCAPE ARCHITECT, A WRITTEN PUNCH LIST WILL BE PREPARED LISTING ALL ITEMS THAT REQUIRE COMPLETING OR CORRECTING

18. WARRANTY. ALL PLANTS, MATERIALS AND WORKMANSHIP SHALL BE GUARANTEED FOR TWO (2) YEARS FROM THE DATE OF FINAL ACCEPTANCE, UNLESS OTHERWISE SPECIFIED. THE GUARANTEE SHALL COVER THE FULL COST OF REPLACEMENT INCLUDING LABOR AND





- UNDERGROUND FUEL TANK TO EDGE OF POLE BASE.
- 3) CONTRACTOR SHALL POLE MOUNT FIXTURE 6'-0" FROM BACK OF CURB TO EDGE OF POLE

- P13L LSI LIGHTING: MRS-LED-18L-SIL-3-UNV-50-70CRI-WHT-IL
- P1F LSI LIGHTING: MRS-LED-18L-SIL-FT-UNV-50-70CRI-WHT
- P1FL LSI LIGHTING: MRS-LED-18L-SIL-FT-UNV-50-70CRI-WHT-IL

POLE SHALL BE RATED FOR ~ WIND SPEED OF 125MPH



LED LIGHT MOUNTED UNDER FUEL CANOPIES





















TRASH ENCLOSURE - FRONT ELEVATION



TRASH ENCLOSURE - SIDE ELEVATION



SANDSTONE VINYL BOARD



1 FRONT ELEVATION



Section 4, Item A.



KWIK TRIP, Inc. P.O. BOX 2107 1626 OAK STREET LA CROSSE, WI 54602-2107 PH. (608) 781-8988 FAX (608) 781-8960

8 MPD





STORE ELEVATION

SCALE: 3/32" = 1'-0"



STORE ELEVATION

SCALE: 3/32" = 1'-0"







STORE ELEVATION

SCALE: 3/32" = 1'-0"



STORE ELEVATION

SCALE: 3/32" = 1'-0"



LOGO DETAIL - SIGN #03

SCALE: 1/2" = 1'-0"





DESERT SAND (TAN) LETTERS



ENTER ELEVATION

SCALE: 3/32" = 1'-0"





SIDE ELEVATION SCALE: 3/32" = 1'-0"



EXIT ELEVATION SCALE: 3/32" = 1'-0" 11'-3"



LOGO DETAIL - SIGN #04

SCALE: 1/2" = 1'-0"



CANOPY ELEVATION

SCALE: 3/32" = 1'-0"



CANOPY ELEVATION

SCALE: 3/32" = 1'-0"







CANOPY ELEVATION

SCALE: 3/32" = 1'-0"



CANOPY ELEVATION

SCALE: 3/32" = 1'-0"





GENERAL SPECIFICATIONS

ROOM SIGNS Qty: 3 total (different copy on each) Size: per art Material: white sign blank Finish: cut vinyl

to install.





5" WHITE VINYL ADDRESS LETTERS ON GLASS DOOR AS SHOWN ABOVE (VERIFY ACTUAL NUMBERS WITH PROJECT MANAGER)

> **INFORMATIONAL SIGNS C & D** SCALE: 1 1/2" = 1'-0"

ADDRESS SIGN A

SCALE: 3/4" = 1'-0"

DOUBLE SIDED DIRECTIONAL SIGN WEST SIDE

8'-0" KT GRAPHIC 2'-0" INSERT "SIGN F" BLACK ALUMINUM FRAME



BLACK ALUMINUM FRAME



INFORMATIONAL SIGNS F & G

SCALE: 1/2" = 1'-0"

Install along with various signs for same site, crew to give to KT trim guys





EAST SIDE









RED & BLACK VINYL ON LIGHT BEIGE ALUMINUM 1'-4"H X 3'-0"W X 4'-6"T= 4.00 SQ FT





NON-LIT DIRECTIONAL SIGN RED & BLACK VINYL ON LIGHT BEIGE ALUMINUM 1'-4"H X 3'-0"W X 4'-6"T= 4.00 SQ FT

DIRECTIONAL SIGN #13

SCALE: 3/4" = 1'-0"



DIRECTIONAL SIGN #14

SCALE: 3/4" = 1'-0"



Qty: 2 Size: 18"x12" Pole Size: Pole Material: Pole Finish: Install: HAGL: OAH:

GENERAL SPECIFICATIONS

18"x12" ALUMINUM SIGN

Material: Standard white blank Finish: cut vinyl graphics





P.O. BOX 2107 1626 OAK STREET LA CROSSE, WI 54602-2107 PH. (608) 781-8988 FAX (608) 781-8960

#21 KWIK TRIP FREESTANDING MONUMENT SIGN

#22 KWIK TRIP FREESTANDING PYLON SIGN

SEE ATTACHED ARTWORK

SEE ATTACHED ARTWORK



Section 4, Item A.

SINGLE SIDED NON-LIT DIRECTIONAL SIGN



SCALE: NTS

8"x8" BASE PLATE



NOTES:

_

- Sign vendor to anchor sign/s to concrete pad
- Sign vendor to anchor signs with (4) 3/8" x 4" lags & shield anchors. Use stainless steel hardware _
- Stainless steel flat washers may be used under base plate as needed to shim sign to be plumb _
 - Concrete Pad installed by others (Kwik Trip/Kwik Star Concrete Vendor)

- Concrete Pad to be 5"x 36"x 36" - Center of footing to be installed 48" from face of curb



DIRECTIONAL SIGN BASE PLATE

SCALE: 1 1/2" = 1'-0"



KWIK TRIP, Inc. P.O. BOX 2107 1626 OAK STREET LA CROSSE, WI 54602-2107 PH. (608) 781-8988 FAX (608) 781-8960

PROJECT: Store- All Stores Date - 08/31/2023

DESCRIPTION: All Directional signs will have a single post per the detail above

SCB #1



Section 4, Item A.

*To make the best use of standard sized materials and control costs the size of the finished product may vary slightly.



*Colors on sketch are only a representation, actual color of finished product may differ from this sketch. *To make the best use of standard sized materials and control costs the size of the finished product may vary slightly.

Section 4, Item A.



5050 INDEPENDENCE STREET | P.O. BOX 97 | MAPLE PLAIN, MN 55359 Ph: (763) 479-0515 | Fax: (763) 479-0519 | www.mapleplain.com

February 10, 2025

Emily Helwig, Project Manager Kwik Trip 1626 Oak St., P.O. Box 2107 La Crosse, WI 54602

RE: Kwik Trip Preliminary/Final Plat and Site Plan Review

Dear Emily:

The city has completed a review of your application for Site Plan Review and Preliminary/Final Plat for the property generally located at 4855 Gateway Blvd. The city has prepared a detailed review of your submittal. Please review and if requested, make any revisions and or provide additional information. It is anticipated that your application will initially be considered by the City's Planning Commission on Thursday, March 6th, 2025, at 6:00 pm.

The City offers the following comments:

Site Plan/Preliminary Plat

- 1. The City has submitted the plans to Hennepin County and MNDOT for review.
- 2. The city finds that the proposed site plan layout meets applicable requirements. The city noted that the eight (8) parking spaces located to the east of the building create a "dead end" without a means for vehicle turnaround. The city is concerned that vehicles will attempt to go around the building to park or exit the site. If all spaces are occupied, there is not a way to exit without backing out of the area. It is recommended that a designated space be striped and or provided for vehicle turn around. In addition, it is recommended that a sign indicating no exit be provided near the southwest corner of the building.
- 3. Parking is required in accordance with the city's zoning ordinance. Please note that the east bank of spaces is labeled as having nine (9) spaces but there are only eight (8) on the plan. The city does not provide a specific parking requirement for convenience stores or modern motor fuel stations. The city's ordinance notes retail requirements as 1 space per 250 SF of the building

GFA. While this is an acceptable requirement, I would consider using 5 spaces per 1,000 SF of the building GFA (total of 51 spaces required). This would generate similar numbers to the total parking spaces proposed. Using both standards, the proposed plans appear to meat applicable parking requirements.

REQUIRED

Motor Fuel Station: 4 spacesConvenience Store: 1 space per 250 GFA (9,070 SF/250 = 37)Car Wash:1 spaceTOTAL:42 spaces

PROVIDED

Standard Stalls	35 spaces
Accessible	2 spaces
Fuel Canopy	20 spaces
TOTAL:	57 spaces

4. The plans include a car wash that will have an entrance on the south side of the building. It is anticipated that this car wash will have a high demand and usage due to it being the only one in the area. Staff is trying to determine if there is a way to provide designated stacking (striped line and signage) along the south side of the parking lot to avoid cars waiting behind designated parking spaces (see below). Please review and let's discuss possible solutions.



- 5. It is recommended that the proposed sidewalk around the building perimeter and the sidewalk in the boulevard be connected (see below).
- 6. It is recommended that a pedestrian crosswalk be stripped (consistent with drive aisles along Gateway Blvd. see below).



- 7. There are several areas along the north property line/Gateway Blvd. where footcandles exceed 1.0 which is the maximum permitted. Please review the lighting plan and revise proposed plans to conform.
- 8. Please provide cut sheets for all proposed light fixtures. Based on review of the cut sheets, additional comments may be provided.

Architectural Plans/Building Materials

9. The City has adopted the Maple Plain Design Guidelines. The guidelines provide general direction and information pertaining to permitted architecture, building materials and other similar design standards. The guidelines provide specific requirements for commercial building architecture and general guidelines for residential development. The City has reviewed the proposed building materials and architecture and believes that it meets the intent of the City's Design Guidelines.

Landscape Plan/Tree Preservation

10. The proposed landscape plan indicates five (5) serviceberries along the north side of the building. As a result of the boulevard tree being removed to accommodate the new drive aisle entrance, it is recommended that one of the serviceberries be replaced with a shade tree (see location below).



Police/Fire/Engineering

- 11. The Maple Plain Fire Department has reviewed the plans and has the following comments:
 - i. Please indicate the location of the FDC on the site/utility plans.
 - ii. Please indicate the location of the mechanical room on the site/utility plans.
 - iii. The Fire Chief has noted that an additional fire hydrant would be needed to adequately protect this property given the proposed layout and use. MPFD would like to have a hydrant installed in the island shown below (pink circle).



12. Please see the attached review letter and SWPPP Checklist provided by the City's Engineer and dated February 7, 2025.

<u>Sign Plans</u>

13. Sign plans are being reviewed, and comments will be provided in separate review letter.

Please let me know if you have any questions regarding any recommendations/comments or would like additional information.

Sincerely,

Mark Kaltsas, Planner City of Maple Plan

CC: Jacob Kolander, City Administrator Matt Bauman, City Engineer Gary Kroells, West Hennepin Public Safety Director Rick Denneson, Maple Plain Fire Chief

ATTACHMENTS: Engineering Memo



Real People. Real Solutions.

Section 4, Item A.

Suite 200 Chaska, MN 55318-1172

> Ph: (952) 448-8838 Fax: (952) 448-8805 Bolton-Menk.com

February 7, 2025

City of Maple Plain Attn: Jacob Kolander, City Administrator 5050 Independence Street Maple Plain, MN 55359

RE: Site Plan Review Kwik Trip Engineering Review #1

Dear Mr. Kolander:

As requested, Bolton & Menk, Inc. has completed an engineering review of the documents submitted for the above-referenced project. We offer the following comments for your consideration:

- 1. Modify the east entrance to include pedestrian ramps on each side of the driveway, increase the walk thickness for ramp areas to 6-inches, and recommend connecting the existing walkway to the walk around the building perimeter for pedestrians.
- 2. One wet retention basin is proposed to provide stormwater runoff management. The following must be considered regarding stormwater management:
 - a. Per City requirements, the proposed stormwater management system must limit proposed peak runoff rates to that of existing for the 2, 10, and 100 year – 24h hour events. Also, per the City's NPDES MS4 requirements, the system must treat the water quality volume, calculated as 1" times the sum of new and fully reconstructed impervious surface.
 - b. Due to site runoff coming from areas where vehicle maintenance and fueling occur, infiltration of the water quality volume is not required. The wet retention basin proposed has been sized adequately to limit peak runoff rates to existing and provide water quality treatment.
- 3. Final Plans must include a SWPPP meeting current NPDES requirements. See attached checklist for complete requirements.
- 4. The following permits will need to be provided conditional to City approval:
 - a. NPDES Construction Stormwater Permit
 - b. MCWD Permit
 - c. MnDOT Access/Work in ROW Permit
- 5. The condition of the adjacent street should be reviewed by the City and Contractor prior to any work and verified with video or pictures. Any damage to the street after work commences should be deemed to be caused by the Contractor and the Owner's responsibility to repair.
- 6. The condition of the existing storm sewer in adjacent areas should be documented prior to

[/]Private/var/folders/2w/g9qr_wzd5sj803_0kz6gj2pw0000gn/T/com.microsoft.Word/AcrFolder/49DE5934-957A-4291-9DC8-5621B5688014-42855-00080E0D385C5B03/0AD21ACB1E93A533177D6B68B0975F17B.docx Bolton & Menk is an equal opportunity employer.

any work. Any sediment deposited in the sewer after construction begins should be deemed to be the responsibility of the Contractor and be removed at the Contractor's expense prior to final site approval.

- 7. Work in the public right of way and connection to utilities must be coordinated with the City. A minimum 24-hour prior notice must be provided. Bituminous pavement shall be saw-cut, and concrete removed to the joint to provide clean match lines. Removal limits shall be marked by the City prior to any work.
- 8. Perimeter erosion control must be installed by the Contractor and inspected by the City prior to any other work. The Contractor must provide a minimum of 24 hours' notice prior to inspection.
- 9. The plans will need to be reviewed by the Fire Chief to verify hydrant, valve, and fire connections are adequately provided.
- 10. The applicant will be required to submit a Maintenance Agreement for all stormwater management structures and facilities. The agreement must define maintenance responsibilities following completion of project, specify types and frequencies of inspection and maintenance activities, designate who will conduct inspection and maintenance activities, and outline reporting requirements. The Agreement must be written in favor of the City and be recorded with the Final Plat.
- 11. Drainage and Utility Easements must be provided as follows:
 - a. Overall stormwater management facilities, including access routes, used to meet regulatory requirements.
 - b. All swales and piping providing drainage for multiple properties.
 - c. 5' along all side lot lines, unless adjacent to Development boundary.
 - d. 10' along all front lot lines, rear lot lines, and adjacent to Development boundary.
- 12. Record drawings must be provided upon completion of the project.

If you have any questions or comments, please contact me to discuss.

Sincerely,

Bolton & Menk, Inc.

atto Bauman

Matthew S. Bauman, P.E. Project Manager

City of Maple Plain

Request by Comfort Haven LLC for a Conditonal Use Permit and Site Plan Review to Allow the Re-use of the Existing Building as Assissted Living Care Facility on the Property Located at 1520 Wyman Ave.

To:	Planning Commission
From:	Mark Kaltsas, City Planner
Meeting Date:	March 7, 2024
Applicant:	Jon Gleisner (Applicant on behalf of Comfort Haven LLC)
Owner:	Cassia
Location:	1520 Wyman Ave.

Request:

Jon Gleisner (Applicant on behalf of Comfort Haven LLC) and Cassia (Owner) requests that the City consider the following actions for the property located at 1520 Wyman Ave. (PID No's. 25-118-24-22-0027 and 25-118-24-22-0114):

- a. A conditional use permit to allow an assisted living facility to be located within the existing building on the subject property.
- b. Site plan review to consider renovation of the existing building and grounds to accommodate the proposed use of the facility.

Property/Site Information:

The property is located at 1520 Wyman Ave. There are two parcels, the north parcel with a vacant building previously used for assisted and independent living and the south parcel which is vacant. The property has the following characteristics:

Property Information: **1520 Wyman Ave. - (PID No.s 25-118-24-22-0027 and 25-118-24-22-0114)** Zoning: *R-1, Single-Family Residential* Comprehensive Plan: *Low Density Residential* Acreage: 2.53 acres (north parcel), .99 (south parcel)





Comfort Haven LLC – Conditional Use Permit and Site Plan Review

Discussion:

The applicant is seeking consideration of a conditional use permit and site plan review to allow the reuse of the existing building and site located at 1520 Wyman Ave. The applicant is proposing to redevelop the existing building into a "Assisted Living Facility" that would have 39 assisted living units and 22 memory care units. The subject property is currently zoned R-1, Single-Family Residential. In 2024, the city adopted an ordinance amendment which established assisted living facility as a conditional use within the R-1 Single-Family Residential zoning district (see ordinance standards below).

153.007 DEFINITIONS.

Assisted Living Facility. A facility that provides sleeping accommodations and assisted living services to one or more adults. Assisted living facility does not include emergency shelters, nursing homes, hospitals, adult foster care and all other exemptions listed in MN Statute 144G.08 Subd 7.

153.025 R-1 SINGLE-FAMILY RESIDENTIAL DISTRICT. Sec. 10-539. "R-1" Single-Family Residential District.

(2) Assisted Living Facility.

a Minimum lot size 2.5 acres.

b. Maximum assembly size within the facility or outdoors shall not be more than 50 nonresidents and employees. Large assemblies (greater than 50 people), open houses and or public events and gatherings shall be individually considered and approved by the City Council. Application for these events shall be made a minimum of 45 days prior to the event.

c. Site plan in compliance with Section 153.04 is required. All improvements must be constructed and maintained in compliance with the approved site plan, the approved City resolution, and all applicable local, state, and federal rules and regulations.

d. The facility and its operation must be current, at all times, with any required local, state, and federal permits and licenses.

e. Use of the facility shall not be injurious or create a nuisance to adjoining neighborhoods.

f. Assisted living facilities which include dementia care can be approved by the City

Council as a part of the initial conditional use permit or by a conditional use permit addendum. g. City Council may impose additional conditions.

The former use of the property as an assisted and independent care facility was considered a legal, nonconforming use. The former use and its legal non-conforming status are no longer applicable as a result of the property not being used for approximately 3 years. In order for the City to consider the reuse of the facility it would need to consider and approve a conditional use permit allowing an assisted living facility in conformance with applicable standards. All commercial conditional use permits are also required to receive site plan review approval.

The existing property had historically been used as an assisted and independent care facility. The historic facility had 69 bed spaces in four different wings of the building along with a reception area, office space a chapel and kitchen area. The overall building is comprised of approximately 45,000 SF on one story. The applicant is proposing to reuse the existing space by making interior and exterior renovations. The proposed use of the building will be a licensed assisted care living facility with some memory care. The proposed use will consist of 39 assisted living units and 22 memory care units. Interior renovations will

include the reconfiguration of some of the interior rooms, security upgrades, HVAC modifications and upgrades, and interior cosmetic changes. The proposed exterior renovations include painting and tuckpointing the exterior of the building, parking lot resurfacing and striping, the addition of a new ingress/egress and looped drive off of Wyman, reduction of parking lot width off of Bryant, general landscape maintenance and some additional plantings and signage.

The City consider will need to consider a conditional use permit and site plan review to allow the propsoed reuse of the existing building and subject site. The City has reviewed the propsoed reuse and provided a detailed analysis of the plans submitted. The applicant has responded to the initial review of the application by the City (review letter and applicant repsonse included as an attachment to this report). The City has reviewed the repsonses and revised plans for Planning Commission and City Council consideration. The City also has established criteria relating to the consideration of a conditional use permit as follows:

Applicable Standards for Considering Granting a Conditional Use Permit

(F) Conditional use permit criteria. The Planning Commission shall review the conditional use permit for its conformance with the City Code and shall not recommend approval unless all the following conditions are met:

 That the conditional use will not be injurious to the use and enjoyment of other property in the immediate vicinity for the purposes already permitted;

(2) That the establishment of the conditional use will not impede the normal and orderly development and improvement of surrounding vacant property for predominant uses in the area;

(3) That adequate utilities, access roads, drainage, and other necessary facilities have been or are being provided;

(4) That adequate measures have been or will be taken to provide sufficient off-street parking and loading space to serve the proposed use;

(5) That adequate measures have been or will be taken to prevent or control offensive odor, fumes, dust, noise, and vibration, so that none of these will constitute a nuisance, and to control lighted signs and other lights in such a manner that no disturbance to neighboring properties will result;

(6) That proper facilities are provided which would eliminate any traffic congestion or traffic hazard which may result from the proposed use, and

(7) The proposed use is in compliance with this chapter and Comprehensive Plan of the city.

(G) Planning Commission consideration. The Planning Commission shall consider the request for a conditional use permit and hold a public hearing. The Planning Commission shall consider possible adverse effects of the proposed conditional use following the review criteria outlined in this section and create findings of fact based on its review of the conditional use.

(H) City Council consideration. The City Council shall consider the conditional use and recommendations of the Planning Commission and staff. The Council shall have the option of receiving additional testimony on the matter if they so choose. The Council shall either approve or deny the application, for which approval shall require passage by a 2/3 vote of the full City Council. If the conditional use is denied by the City Council, the reasons for the action shall be recorded in the Council proceedings and transmitted to the applicant.

(I) Revocation. The Planning Commission may recommend, and the City Council may direct, the revocation of any conditional use permit for cause upon determination that the authorized conditional use is not in conformance with the conditions of the permit or is in continued violation of City Codes, or other applicable regulations. The City Council or Planning Commission shall initiate an application and In addition to the conditional use permit criteria, the City has a requirement that all commercial development be reviewed and evaluated for compliance with the Comprehensive Plan, applicable codes and standards and other established design criteria.

153.045 INTENT AND PROCEDURE

(I) Evaluation criteria. The Planning Commission and City Council shall evaluate the effects of the proposed site plan. This review shall be based upon, but not be limited to, compliance with the City Comprehensive Plan, provisions of this chapter (Design Guidelines and City Engineering Requirements).

Staff has completed a detailed review of the proposed site and building plans. There are several comments that should be noted and further considered by the City during review of the application. Considerations are as follows:

Building and Architecture:

The applicant is proposing to use the existing facility but would like to make interior, exterior and site renovations. These include painting/siding and tuckpointing the exterior of the building, renovating the interior of the building to accommodate the proposed assisted living and memory care and site improvements further described below. The applicant has prepared a full set of plans relating to all proposed improvements.

Site Design:

The existing facility includes two paved parking areas, landscaping, lighting several detached accessory buildings and a trash enclosure. The applicant is proposing to construct a new ingress/egress off of Wyman Avenue (see area highlighted in red below). This area will add new parking spaces as well as allow for access around the entire building permitter. As a result of the new parking area, the applicant is proposing to reduce the width of the existing parking lot which will pull it away from the residential properties to the east. The proposed reduction in pavement will establish an approximate 10' buffer and setback to the adjacent residential properties to the east.


The City has generally established parking requirements for this type of use based on parking requirements for similar uses (i.e., Cassia). Staff reviewed various standards of practice relating to parking requirements for similar facilities as well as reviewed the more detailed staffing numbers provided by the applicant. Parking is generally recommended to be required and provided as follows:

Number of Units(type)	Required Stalls Per Number of Beds	Total Spaces
22 (Memory Care)	4 spaces + 1 space per 3 beds	11.33 spaces
39 (Assisted Living)	0.5 spaces per 1 unit	19.50 spaces
Staff Parking	Actual maximum number for staff overlap	29 spaces
	·	60 spaces

The proposed plans indicate a total of 61 parking spaces which includes 14 existing parking spaces in front of the building. It appears that the proposed parking will meet applicable requirements.

The existing parking lot is paved; however, the pavement is in poor condition and the striping is no longer visible or highly worn. The applicant is proposing to mill and overlay and restripe the parking spaces in accordance with the proposed site plan.

Site Lighting:

There is existing building and parking lot lighting in place. The City has noted that all parking should be brought into compliance with applicable standards. The applicant has prepared a photometric plan and provided the City with lighting cut-sheets for the proposed light fixtures. The City has reviewed the information and found that it is fully compliant with applicable standards. The maximum number of footcandles permitted at the property line is 0.5 footcandles. The applicant has been able to reduce the spill over of the proposed lighting to meeting this requirement.

Landscaping/Screening/Fencing:

The applicant is not proposing to make significant changes to the existing landscape outside of general maintenance and minor enhancements. There are two areas where new landscaping should be considered by the applicant. Several mature trees are being removed for the purpose of installing the new access drive and parking on the south side of the building. It was recommended that new deciduous trees be planted within the proposed islands or along the south side of the proposed parking lot. The applicant has added an ornamental tree to one of the proposed parking islands located along the south side of the building. It is also recommended that some landscaping be planted along the east and south sides of the new refuse enclosure located to the southeast of the building. The applicant has revised the plans to propose ornamental grasses around the perimeter of the enclosure. Staff would recommend a combination of the grasses with some larger evergreen trees/shrubs to more adequately screen the perimeter. Staff will be seeking additional direction from Planning Commission relating to the proposed landscaping. The City has reviewed the site and generally finds the existing landscape to be in keeping with the intent of the City's ordinances.

The City noted that the existing board on board fence located along the east property line is in poor condition. The applicant has noted that the fence will be replaced with a new board on board fence. Staff is seeking additional direction from the Planning Commission and City Council relating to the existing landscaping.

Trash Enclosure:

There is an existing dumpster enclosure located at the far south end of the drive aisle on the east side of the building. The City noted that the enclosure is not fully enclosed and that there were concerns presented to the City relating to the "beeping" associated with waste haulers backing up to the dumpster. The applicant is proposing to replace the existing trash enclosure with a new enclosure that meets applicable standards. Backing of a vehicle removing trash will be limited as a result of the new driveway connecting to the existing driveway and allowing movement around the entire building permitter.

Signage:

The applicant has reached out to the City relating to the signage but has not made an application relating to signage at this point. Any change in signage would need to be reviewed by the City and comply with all applicable standards. The City's sign ordinance addresses signage in the R-1 zoning district.

Fire/Public Safety:

Both Maple Plain Fire and West Hennepin Public Safety have been working on comments and have met with the applicants. The city has noted several key issues relating to the comments provided.

• The city's public safety and fire departments have been working on the establishment of base service levels associated with assisted living and memory care. The city is working to establish what those levels are for various types of calls for service. Once established, the city anticipates that it will enter into an agreement relating to the types of services provided and costs associated with each type of service above the base levels established. A condition has been added to the approval that addresses this issue. It

should be noted that this issue will be discussed with Council as its realm is generally outside of the Planning Commission's responsibility.

- Public Safety has noted that they will need to review the security system with the applicant as a condition of the approval.
- Fire is reviewing the location of the fire department connection and fire lanes and will provide additional feedback.

Stormwater/Engineering:

The city's engineer has reviewed the plans and provided comments. The applicant has provided the city with revised plans addressing all comments provided by the city engineer (see attached review letter and response).

There are several additional considerations that should be noted by the Planning Commission and City Council:

- The applicant is proposing to fence the existing courtyard with a 6' ornamental metal fence that will have a gate and lock to secure the area for residents.
- The applicant is proposing to replace the existing 6' tall wood fence located along the east property line with a new 6' tall wood fence.
- The applicant has noted that they have not located all mechanical equipment on the proposed plans as they have not gotten to that level of detail. They have noted that they will screen all mechanical equipment in accordance with the city's requirements. All new units are required to be screened using a 5' tall solid equipment surround constructed of materials similar to the existing building.
- No assemblies or gatherings will occur that include persons outside of the residents/clients of the facility.
- The City has prepared conditions of approval should the Planning Commission and City Council recommend/approve the requested applications. Staff would also be seeking any additional conditions/requirements/changes based on the discussion and direction of the Planning Commission and City Council.

The Planning Commission and City Council will need to find that the proposed use of the existing facility and associated property and site is consistent and compatible with the surrounding properties and the R-1 zoning district. In addition, the Planning Commission and City Council will need to find that the criteria established in the zoning ordinance (and included in this report) relating to granting a conditional use permit have been satisfied by the applicant. Staff is seeking direction relating to the requested applications which could include additional conditions, mitigation measures and revisions to the required plans and proposed conditions.

Neighbor Comments:

The City has not received and verbal or written comments regarding the proposed applications. \

Recommendation:

Staff is seeking a recommendation from the Planning Commission for the requested Text Amendment, Conditional Use Permit and Site Plan Review. Should the Planning Commission make a positive recommendation to the City Council, it is recommended that the following findings and conditions be included:

- 1. The proposed conditional use permit and site plan review meets all applicable conditions, criteria and restrictions stated in the City of Maple Plain Zoning and Subdivision Ordinance.
- 2. Prior to the City Council's review of the text amendment, conditional use permit and site plan review, the applicant shall complete the following items:
 - a. The Applicant shall address all comments made by the Planning Commission and City staff. Comments and recommendations made by the Planning Commission may result in revisions to the proposed site and related plans.
 - b. The applicant shall revise the site plan to address all comments made in this report.
 - c. The applicant shall prepare and submit for review a Construction Site Management plan which indicates location of the following:
 - i. Temporary parking for Contractor (not on streets)
 - ii. Dumpsters / Trash Receptacles
 - iii. Temporary Biffy
 - iv. Hazardous materials / Concrete Wash
- 3. The conditional use permit will include the following conditions:
 - a. The conditional use permit will be reviewed at least annually by the City to ensure conformance with the conditions set forth in the resolution.
 - b. All interior and exterior improvements shall be completed and maintained in accordance with the approved site and building plans/elevations attached hereto as **Exhibit B**. Improvements shall be made prior to final certificate of occupancy issuance.

- c. The conditional use permit will allow the applicant to have a maximum of 39 assisted living units and 22 memory care units.
- d. No signage is approved with the conditional use permit. Any new signage shall comply with all applicable standards of the City's ordinance, will require a sign permit and may require Planning Commission and City Council approval.
- e. All existing and proposed site and building lighting shall be brought into compliance and fully meet applicable City lighting standards.
- f. The use of the facility will be limited to the prescribed hours of operation as follows:
 - i. Public access (non-staff and visitors) shall be between the hours of 8:00 am 9:00 pm only (Sunday-Saturday).
 - ii. Deliveries shall be between the hours of 8:00 am and 6:00 pm only (Sunday-Saturday).
 - iii. Use of the grounds (outside of the interior courtyards) shall be between the hours of 8:00 am 10:00 pm only (Sunday-Saturday).
- g. No parking associated with the use of this facility shall be permitted on public roadways. All parking of staff, visitors and clients shall be within the designated off-street parking spaces.
- h. No future expansion of the existing principal building, accessory buildings and exterior spaces shall be permitted on the property without the further review and approval by the City through the conditional use permit amendment process.
- i. No assemblies, gatherings or similar events that includes more than 50 persons other than staff and current residents (clients) of the facility shall be permitted within the building or on the grounds.
- 4. The Applicant shall pay for all costs associated with the City's review of the conditional use permit and site plan review.
- 5. The property and its use shall comply, at all times, with all applicable local, state, and federal rules and regulations, including, but not limited to, Minn. Stat. ch. 144G.
- 6. The Applicant shall enter into an agreement with the City to memorialize the conditions of approval and service charges for emergency services. The City shall not issue any permits for the development of the property until it is provided with recording information for the agreement.
- 7. Unless otherwise expressly provided for in the agreement between the Applicant and the City, upon a violation of any of the above conditions, the City shall notify (owner/applicant/permit holder) of the violation and (owner/applicant/permit holder) shall pay a fee to the City, in an amount specified below, within 30 days of the mailing of the notice. Any unpaid fees related to a violation of this permit shall be certified to the City's tax roll in the (November) following the imposition of the fees. Imposition of this fee based on a violation of this permit shall not prohibit the City from taking any other action on the permit,

based on the same violation, including, but not limited to, revocation of the permit. Fees for violations of this permit shall be imposed as follows:

- 1. First violation: \$300
- 2. Second violation: \$400
- 3. Third violation: \$500 and automatic revocation hearing by City Council.
- 4. Fee amounts for any violations which occur subsequent to the third violation shall be determined by doubling the imposed fee of the most recent violation.

Attachments:

- 1. Application
- 2. Narrative
- 3. Staff Review Letter with Applicant Response
- 4. Existing Site Survey, Landscape Plan, Grading Plan and Site Plans
- 5. Proposed Site Plans and Exterior Plans (Exhibit B)
- 6. Proposed Lighting /Photometric Plan and Cut Sheets

Section 4, Item B.

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City of Maple Plain 5050 Independence St P.O. Box 97 Maple Plain, MN 55359 Office: (763) 479-0515 Fax: (763) 479-0519

ZONING & LAND USE APPLICATION

1993年1月1日,1993年1月1日,1993年1月1日 1993年1月1日 - 1993年1月1日 1993年1月1日 - 1993年1月1日 1993年1月1日 - 1993年1月1日 1995 1995 1995 1995 1995 1995 1995 19	APPL	ICANT II	FORMATION	制塑的物质内带			
Applicant Name JON GLEIST	IER		Company, if applicable Con	AFORT HAD	EN LLC		
Address 4207 QUAKER TRL NE Phone Number 612-600-6036							
City, State, Zip PRIOR LAKE, MN, 55372 Email Jonny gieis@ hotmail. Com							
Are you the owner of the property?'	Yes.	X No.	(If not, property owner informa	tion is required.)			
Owner Name Rob Dobl Company if applicable Cossia							
Address 7171 Ohms Lane Phone Number 952-855-5155							
City, State, Zip Edina, MN 55439			Email Bob.Dahl@cassial	ife.org	-		
				IN AA			
Applicant Signature for Chev-	-		Owner Signature	Hall			
Date 12-2/-24			Date 12/31/24				
	PRO	JECT IN	FORMATION				
Site Address or Property Identification	Number	152	O Wyman Avenue				
Type of Request (Check all that apply.)							
	Fee	Escrow	-				
Appeal Administration Decision	\$250	\$250					
Concept Plan Review	\$500			1 1			
Residential Application	Fee	Escrow	Commercial Application	Fee	Escrow		
Residential Application			Commercial Application				
Conditional Use Permit	\$500	\$1500	X Conditional Use Permit	\$1000	\$3000		
Interim Use Permit	\$500	\$1500	Interim Use Permit	\$1000	\$3000		
Site Plan	\$500	\$1500	Site Plan	\$1000	\$3000		
Minor Subdivision	\$500	\$1500	Minor Subdivision	\$1000	\$3000		
□ Variance	\$500	\$1500	Variance	\$1000	\$3000		
Rezoning	\$500	\$1500	Rezoning	\$1000	\$3000		
Text Amendment	\$500	\$1500	Text Amendment	\$1000	\$3000		
Vacation of Property	\$500	\$1500	Vacation of Property	\$1000	\$3000		
Home Occupation	\$200	\$1000	Sign Package	\$500	\$3000		
Pasidantial/Commercial	ľ						
Industrial/Office			Grading and Excavation				
Planning and Zoning Application	Fee	Escrow	Park Fees and Signs	Fee	Escrow		
		-					
Preliminary Plat	\$500	\$3000	<100 Cubic Yards	N/C			
Subdivision Application	\$500	\$3000	>100 Cubic Yards	\$500	12222-022-022		
	\$500	\$3000	>1000 Cubic Yards	\$1000	"See below		
Comprehensive Plan Amendment	\$500	\$3000	Right of Way Permit	\$250	\$1000		
Planned Unit Development Final Plat	\$1000	\$3000	Derli Derliestice Fee	100/ afland			
	\$500	\$3000	Park Dedication Fee-	10% of land			
	1		Residential	value of			
1				development-*			
			Park Dedication Fee	10% of land	1.1		
			Other	value of			
			Guior	development			
			Signage Permanent	\$250			
			Temporary Sign	\$25			

*Escrow or surety bond in amount of 150% of land alteration costs

** Minimum of 3,750 per unit and maximum of \$8,000 per unit

Brief Project Narrative / Overview (Use additional paper if necessary. Please be thorough.)

Comfort Haven LLC, an assisted living provider, is seeking to reopen the existing assisted living facility at 1520 Wyman Avenue. The facility requires renovation work, to meet current Minnesota assisted living licensure codes. Specifically, the license sought is for people aged 55 years or older who need some assistance with daily activities and housing, but do not require care in a nursing home.

Renovation will include remodeling the interior and exterior of the building and site. The extent of remodeling the interior will be to meet the current requirements defined in the Minnesota assisted living code. The extent of remodeling the exterior will include, but is not limited to, unifying the facades of the building(s) and updating them to better reflect the neighborhood s current visual qualities, and new landscaping/ground covers. The extent of the site work will include, but is not limited to, removing excessive growth around the building, creating a new access drive around the building, reducing the amount of parking spaces that face neighboring properties to the east, updating site lighting to mitigate light spilling over onto adjacent properties, and re-striping the existing west parking lot. - for more information see attached addendum provided by owner

NOTICE TO APPLICANT

The Maple Plain City Code guides and enables development activities within the City by ensuring proper and wellcoordinated projects. The land use application is the mechanism that allows the City to examine proposed land uses to ensure compatibility with the City Codes, design and development standards, and the surrounding land uses and natural environments. The review is intended to ensure positive growth for the community.

All applications are reviewed individually and are evaluated based on their own merit. Each land use request has an associated checklist of required items. Applicants are encouraged to participate in the City's pre-application workshop prior to submitting a formal land use application. The workshop is an opportunity to informally discuss the conceptual idea of the proposed project in an effort to reduce delays. Participation in the pre-application process does not provide approval, or guarantee of approval, of the project. The City shall not accept plans, drawings or other information related to the project except upon submittal of a formal application. The City reserves the right to reject an incomplete application.

APPLICATION FEE STATEMENT

All expenses pertaining to project reviews are the responsibility of the applicant. Planning review deposits and other applicable fees must be paid when submitting land use applications and accompanying materials. All fees, which are set annually by City ordinance, help cover costs incurred by the City to review the application. The City of Maple Plain often uses consulting firms to assist in the review of projects. City staff and consultant review costs are billed hourly; all other costs are billed at cost. Applicants shall be billed directly for incurred expenses upon receipt by the City. The City reserves the right to request an applicant to submit a development escrow in advance of the formal project review.

Please refer to the City's Fee Schedule for information on planning review fees and deposits, and other applicable costs.

By signing this form, the applicant recognizes his/her responsibility for any and all fees associated with the land use application from project review through to construction and release of financial guarantees for an approved project. All fees associated with a project that is denied or withdrawn remain the sole responsibility of the applicant and shall be paid upon receipt of invoice.

I hereby understand the fee statement and responsibilities associated with this land use application:

Applicant Signature Owner Signature 12/31/24 Date Date 12-21-24

REVIEW REQUIREMENTS

Minnesota State Statute 15.99 requires local governments to review an application within 15 business days of its submission to determine if an application is complete and/or if additional information is required to complete the review. Once complete, a formal 60-day review period begins. The City has the ability to extend the review period an additional 60 days, if necessary, due to insufficient information or scheduling difficulties.

Please review the corresponding checklist that goes with the request as all materials are required unless waived by the City. All applications must be received by the deadline(s) attached hereto. Failure to submit by the date shown may result in a delay of the review by the Planning Commission and City Council.

DEADLINES

Planning Commissioning meetings are held on the first Thursday of the month at 6:00 P.M. All applications are due 30 days prior to meeting.

OFFICEL	JSE ONLY
Application Type	Review Deadline
	15 Business Days:
	60 Day Review:
	120 Day Review:
Fees Collected	Received by
Application Fee Collected: \$	Name:
$\square \text{Fscrow: } \\ \$$	Signature:
Total Receipt: \$	Date:
Pacaint	Application Complete
Receipt Number(s)	Are there any missing materials?
	If yes, was the application accepted?
	,
	N
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City of Maple Plain 5050 Independence St P.O. Box 97 Maple Plain, MN 55359 Office: (763) 479-0515 Fax: (763) 479-0519

SITE PLAN CHECKLIST & PROCEDURE

APPLICATION REQUIREMENTS

The foll certain req	owing uireme	materials are required in order for each ap ents. An application that is missing materia	plicatio Is may	n to r not b	eceive consideration. The City reserves to waive e accepted.
	Comp All m Certif Writte Wetla	pleted Land Use Application and pay all ap aterials as required by City Zoning Code re fied survey of property (8 full size, 10 reduc en narrative of outlining project and purpose and report by Certified Wetland Specialist.	plicable garding ed) plu e of req	e fees g Site s CA juest.	Plans. D and PDF electronic files 2 PHYSICAL FULL SIZE AND PDF WERE REQUESTED
	Scale Existi Four- Spec Grad Loca Soil t	ed site plan showing dimensions & distance ing & proposed property conditions (page a -sided architectural plans and elevations difications for exterior finishes ling, erosion control & drainage plans (page tion of fire suppression, if applicable porings, if applicable	es 2) 9 2) N//	XXIXXXX	Parking plan Lighting plan Landscape plan Utility plan Tree Preservation plan Signage plan Storage & waste enclosure
		APPROVAL	.S & P	ERN	lits
Project time for ag watershed	applica jency r distric	ations may require review and comment fro eview. The City encourages applicants to o t prior to submitting formal application to u	om the contact ndersta	follov each nd ag	ving agencies. Applicants should allow for enough state and county agency and the appropriate gency requirements.
		City of Maple Plain Hennepin County MN Department of Transportation		MN Min Pio	Pollution Control Agency (NPDES) nehaha Creek Watershed District neer-Sarah Creek Watershed Commission
Upon c county, sta	omplet ate and	tion of the formal review period, the following other jurisdictional agencies each have a	ng pern review	nits m perio	ay be required for an approved project. The City, d for all permit requests.
		Building Permit Demolition Permit Excavation & Grading Permit Right of Way Permit Sewer Availability Charges (SAC) Water Availability Charge (WAC) Sign Permit		Her Mnl Min Pio Mnl We	nnepin County Right of Way Permit DOT Right of Way Permit Inehaha Creek Watershed District Permit neer-Sarah Creek Watershed Commission PCA Storm Water (NPDES) Construction Permit tland Conservation Act requirements
		NOTICE TO	O APP	LICA	TN
In orde 1. M pa 2. As 3. Su of 4. Pa 5. At	r to rec eet with acket, a ssembl ubmit a reques articipa tend al	ceive consideration, the applicant must con h City staff to discuss the proposed use, w and schedule a pre-application meeting. le information outlining the request. a completed application packet, including a st, to City Hall by the dates noted on the La te in the review process by attending City II Public Hearings, and Planning Commissi	nplete a hether j Il mater and Use staff an on and	ials a ials a App d put City	aber of steps. itted or conditional, obtain a land use application as required by City Zoning Code related to the type lication. plic meetings. Council meetings.

By law, the City of Maple Plain must notify adjacent property owners of proposed projects that may impact their properties. This notification is mailed to property owners within 350 feet of the project area at least 10 days prior to the public hearing. A Certified List of Property Owners will be compiled by the City of Maple Plain.

	Section 4, Item B.
ADDITIONAL INFORMATIOIN	
 Drawings of Existing & Proposed Conditions should include: gross and net acreages of the proposed development location, width and name of all existing streets and highway, public property, railroad, utility rights easements within the proposed development location and size of existing buildings & infrastructure (water, sewer and storm sewer lines) wetlands, wooded areas & other natural features tree inventory, including trees to be removed & saved layout of proposed streets, rights of way and appropriate street information layout proposed sidewalks, trails and pedestrian ways location and dimension of all easements minimum building setback lines. 	of way, &
 Grading & Erosion Control & Drainage Plans must show the following: existing & proposed topography existing natural features, such as trees, wetlands, ponds, swales, drainage channels, etc. existing and proposed storm sewer facilities proposed storm water improvements flood elevations based on a 100-year flood plain spot elevations & directional arrows representing drainage patterns wetland delineation & mitigation plan at 2:1 ratio 	* * * * * * *

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By signing this form, the applicant hereby acknowledges the receipt of the checklist and procedure for the project to be submitted for consideration. It is the responsibility of the applicant to submit all required materials. All permit requests should be submitted in a timely manner so as not to cause project delays.

Applicant Signature	n Gergan	Owner Signature	Phillip	
Date 12-21-24		Date 12/31/24		

: ;

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PROJECT SUMMARY & CARE MODEL PROPOSAL

Presented by

Jon Gleisner (Primary Contact) • Michael VonBank • Michael Appiah • Barbara Appiah

The Comfort Haven team is committed to the successful redevelopment and operation of the previous owner and operator. The new facility will be named Comfort Haven of Maple Plain.

To become a cornerstone of the community we understand our primary objective must be to meet the needs of the immediate neighborhood and the city. Our team of industry experts will deliver and operate an asset that will integrate with the surrounding neighborhood and the greater community.

SUMMARY OF FACILITY

When completed Comfort Haven of Maple Plain will provide 39 assisted living units and 22 memory care units. The business model provides accessibility for both private pay and state pay residents.

447 Egan Drive, Suite 100 Savage, MN 55378 (612) 298-4872



Senior Housing & Care Is Our Priority

OUR TEAM WILL INVEST NEARLY \$6 MILLION IN YOUR COMMUNITY

We will do this in collaboration with facility neighbors and city staff. We have carefully studied previous attempts at this project. Our approach will focus on alleviating historical challenges and improving the presence of this facility both aesthetically and operationally.

In our discussions with city staff and neighbors we understand the following items are of primary importance, each is followed by our intentional response and planned deliverable.

LIGHTING, PARKING & TRAFFIC FLOW

- East parking lot will be moved away from the property line.
- Cars will NOT be parking facing directly into neighboring properties.
- Adding improved lighting with less overspill by utilizing deflection panels directing light towards our facility not at neighbors.
- Adding a new fence to help eliminate lighting into neighboring properties.
- Adding a road around the building.
- Deliveries (food 2 x per week) and the refuse vehicle (1 x week) will no longer need to
 reverse out of the parking area.
- Adding additional parking to the south of the building.
 - Alleviate the need for on-street parking.
 - Compliance with the new Minnesota Dept of Health requirement of having a parking space for each resident totaling 61 parking spaces.

STAFF & RESIDENT TRAFFIC FLOW

- The Comfort Haven proposal is for a mix of assisted living (39 units) and memory care (22 units). This will require less staff to operate than the previous full-service skilled nursing facility.
- We expect residents and their visitors to come from within a 5 to 10-mile radius of the facility.
- Managed traffic flow will minimize staff driving in the surrounding neighborhood.

EXTERIOR

- Complete renovation of the exterior and overall site including:
 - New roof
 - New windows
 - New siding
 - New landscaping including a revitalized courtyard and garden area
 - New driveways & parking areas

EMERGENCY CALLS

 Emergency response calls for our other comparable facilities have been well below state averages, typically less than three calls per month.

447 Egan Drive, Suite 100 Savage, MN 55378 (612) 298-4872 Senio Is Ou www.c

Senior Housing & Care Is Our Priority

RESIDENT SAFETY AND RESPECT FOR NEIGHBORS

The experienced staff and leadership team of Comfort Haven of Maple Plain has developed a comprehensive service delivery model compliant with the State regulatory framework and based on decades of care experience. The plan demonstrates a commitment to safety, quality of life for the residents and respect for neighbors.

Secure Memory Care Units

Memory care residents will be housed in a secure unit. We will meet and exceed state
regulatory framework for residents with impaired memories. Elopement prevention and
safety will be paramount to all operational procedures.

Green Environment

 The new landscape package will provide an enhanced, green environment will significantly enhance the living conditions for all residents. Such environments can aid in the mental and emotional well-being of the elderly, especially those with memory issues, by providing calm and visually stimulating surroundings.

Wander Guard System

 Implementing a wander guide system for memory care residents is a proactive approach to monitor and alert staff if a resident strays from a safe area. This technology is crucial to elopement prevention and ensures quick response times, thereby enhancing resident safety.

Freedom for Assisted Living Residents

 Assisted Living residents will have the freedom to move in and out of the facility, reflecting the facility's compliance with state regulations that do not require locking Assisted Living units. A concierge will be employed 24/7 to manage sign-ins and signouts to maintain security while respecting residents' independence.

Thorough Admission Assessments

Success of the assisted living environment is predicated on proper screening. Extensive
admission assessments determine if a prospective client is suitable. This ensures that
only those capable of moving in and out of the facility unsupervised are allowed to do so.
Ongoing assessments will help in continuously evaluating the residents' needs and
capabilities, adjusting care levels as needed.

Elopement Policy

 The Comfort Haven elopement policy outlines step-by-step procedures to be taken in the event of an elopement incident. Staff are thoroughly trained on the policy and receive annual updates. The policy details preventive measures, staff responsibilities, and emergency response procedures to effectively manage an incident.

7447 Egan Drive, Suite 100 Savage, MN 55378 (612) 298-4872



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CARE MODEL

The Comfort Haven proposal is for a mix of assisted living (39 units) and memory care (22 units). The company currently operates 6 other care facilities and will provide references upon request.

Individualized care

Each resident receives a personalized care plan based on their specific needs and preferences.

 Activities of daily living (ADLs) support Staff assists with tasks like bathing, dressing, toileting, and eating as needed.

24/7 supervision

Trained staff are available around the clock to monitor residents and respond to emergencies.

- Private living spaces
 Residents typically live in their own apartments or rooms within the facility.
- Common areas and social activities
 Communal spaces are provided for socializing, dining, and participating in organized
 activities like games, exercise classes, and outings.
- On-site healthcare services
 Access to basic medical care, including medication management and coordination with
 outside healthcare providers.
- Housekeeping and laundry services
 Assistance with routine household chores like cleaning and laundry.
- Meal plans

Three meals per day are provided, often with dietary options to accommodate individual needs.

Regulations

Assisted living facilities are subject to state regulations governing the services we can provide and the qualifications of our staff.

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RESPONSIVE & EXPERIENCED LEADERSHIP

The Comfort Haven leadership and ownership team combines decades of professional experience in senior care facility construction and service delivery.

Dr. Michael Appiah, MPA, MBA

Founder of 3MB Health Homecare & Assisted Living, Health Helper's Staffing and 3MB Management Consultants. Dr. Appiah is a distinguished leader whose career spans business, finance, healthcare, and ministry. He has devoted his life to integrating faith, professional excellence, and service to his community, particularly focusing on guiding entrepreneurs and organizations in ethical and sustainable growth.

Barbara Appiah, MNA, BSN, RN, CNA

Seasoned healthcare professional in the nursing and healthcare industry. Barbara currently serves as Director of Nursing at The Kenwood in Minneapolis. She leads a dedicated team of nursing professionals committed to delivering quality, patient-centered care.

Michael VonBank

Nearly two decades of assisted living and memory care facility ownership and operation. These properties include Waterville Assisted Living & Memory Care (47 residents), Traditions of Montgomery Assisted Living & Memory Care Facility (39 residents) and Comfort Haven Assisted Living of Prior Lake (5 Bedroom Assisting Living Facility opening soon). Traditions of Montgomery was newly constructed under the leadership of Mr. VonBank.

Jonathan Gleisner

Over three decades of experience in construction and business leadership. Mr. Gleisner has a BS in Accounting from Minnesota State University Mankato. His construction experience includes residential and commercial, new construction and redevelopment. He owns and operates several high-density living facilities.

47 Egan Drive, Suite 100 Savage, MN 55378 (612) 298-4872



Senior Housing & Care Is Our Priority

COMFORT HAVEN MAPLE PLAIN, MN 55359

PROJECT TEAM

OWNER

COMFORT HAVEN LLC 7447 EGAN DRIVE SUITE #100 SAVAGE, MN 55378 JON GLEISNER 612-600-6036 JONNYGLEIS@HOTMAIL.COM

DESIGN/BUILDER

TBD

ARCHITECT OF RECORD

SPERIDES REINERS ARCHITECTS, INC. 6442 CITY WEST PARKWAY SUITE #300 EDEN PRAIRIE, MN 55344 ERIC REINERS 952-996-9662 ERIC@SRA-MN.COM

MECHANICAL / PLUMBING

ELECTRICAL

TBD

LANDSCAPE ARCHITECT

CIVIL SITE GROUP 5000 GLENWOOD AVENUE GOLDEN VALLEY,MN 55422 DAVID KNAEBLE 612-615-0060 DKNAEBLE@CIVILSITEGROUP.COM

STRUCTURAL ENGINEER

TBD

CIVIL ENGINEER

CIVIL SITE GROUP 5000 GLENWOOD AVENUE GOLDEN VALLEY, MN 55422 DAVID KNAEBLE 612-615-0060 DKNAEBLE@CIVILSITEGROUP.COM

FOOD SERVICE CONSULTANT

-

GENERAL NOTES

- A. STUD FRAMING EXTENDED TO STRUCTURE ABOVE SHALL HAVE 3" X 3 5/8" GALVANIZED STUD TRACK AT TOP. STUD FRAMING SHALL BE 3/4" FROM TOP OF TRACK AND HAVE NO MECHANICAL FASTENING TO ALLOW FOR 3/4" DEFLECTION.
- B. VERIFY ALL EXISTING CONDITIONS, DIMENSIONS, AND ALIGNMENT OF WALLS. BRING ANY DISCREPANCIES TO THE ARCHITECTS ATTENTION PRIOR TO FABRICATION/ CONSTRUCTION BEGINS.
- C. CONTRACTOR TO INSTALL EQUIPMENT PER MANUFACTURER'S REQUIREMENTS.
- D. HOLD 1/2" CLEARANCE BETWEEN FLOOR AND GYPSUM BOARD. FILL GAP BETWEEN BOTTOM EDGE OF GYPSUM BOARD AND FLOOR WITH SEALANT. STRIKE SEALANT SMOOTH AND FLUSH WITH FACE OF PARTITION. REMOVE EXCESS SEALANT FROM PARTITION AND FLOOR.
- E. CHANGES IN FLOOR MATERIALS SHALL BE LOCATED AT THE CENTERLINE OF THE DOOR LEAF OR AS SHOWN ON THE FLOOR/ FINISH PLAN.
- F. VERIFY LOCATION OF ACCESS PANELS WITH MECHANICAL AND ELECTRICAL DRAWINGS FOR ACCESS TO MECHANICAL AND ELECTRICAL ITEMS.
- G. SEAL PENETRATIONS IN FIRE RATED ASSEMBLIES AND SMOKE BARRIERS TO MEET REQUIRED RATINGS. UTILIZE UL APPROVED METHODS.
 H. PROVIDE FIRE TREATED BLOCKING AS REQUIRED TO SUPPORT ALL CABINETS,
- REQUIRED TO SUPPORT ALL CABINETS, SHELVES, BUILT-INS, EQUIPMENT OR ACCESSORIES. COORDINATE WITH VENDOR DOCUMENTS WHERE SUCH CONDITIONS APPLY.
- I. DURING CONSTRUCTION, AREA SHALL BE KEPT CLEAN AND ORDERLY.
 J. LIGHTING, EXIT LIGHTING INFORMATION, ELECTRICAL, DATA AND TELEPHONE
- INFORMATION SHOWN ARE FOR ELECTRICAL CONTRACTORS REFERENCE ONLY. CONTRACTOR SHALL ENSURE COORDINATION OF ELECTRICAL ITEMS WITH BUILDING CONSTRUCTION AND EQUIPMENT AND SHALL OBTAIN THE NEEDED INFORMATION TO PROVIDE A COMPLETE AND WORKING INSTALLATION.
- K. CONSTRUCTION SHALL BE IN ACCORDANCE WITH STATE AND LOCAL CODES.
- L. PROVIDE GFI ELECTRICAL OUTLETS AT LOCATIONS REQUIRED BY CODE.



PROJECT IMAGE



SHEET	SHEET NAME	CITY SUBMITTAL 01-04-2024
GENERA	AL	
A000	TITLE SHEET	
SURVEY	·	
V1.0	ALTA / NSPS LAND TITLE SURVEY	
~ <i>//</i> .		
21.0	REMOVALS PLAN	
02.0		
C3.0		
C5.0		
00.0	DETAILO	
1.0	OVERALL LANDSCAPE PLAN & NOTES	
L1.1	LANDSCAPE PLAN ENLARGEMENT	
L1.2	LANDSCAPE PLAN ENLARGEMENT	
L1.3	LANDSCAPE PLAN ENLARGEMENT	
		I
SW1.0	SWPPP - EXISTING CONDITIONS	
SW1.1	SWPPP - PROPOSED CONDITIONS	
SVV1.2		
5001.3		
	ECTURAL	
4040	SITE PLAN	
4040.1	CONSTRUCTION SITE MANAGEMENT PLAN	
4300	ELEVATIONS	
4301	EXTERIOR MATERIAL PALETTE	
	1	
РНОТОМ	METRICS	
	SITE PHOTOMETRIC	

SHEET INDEX

KEY PLAN



1" = 100'-0"



2/12/2025 1:27:48 PM



Ш П П		
	SMH - Rim=1030.00 Inv=1019.55 SITE BM	
	6" CIP (Per Rec.)	
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030_64	PID: 2511824220082 Address: 1509 Prairieland Avenue Owner: Kevin & Barbara Rose	
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1" SPR		
1030.63 ×	PID: 2511824220012 Address: 1459 Prairieland Avenue Owner: Nancee Louise Nystrom	011
	Found 1/2 Inch Open Iron Pipe	
) 15	BLOCK FMC	
e Street hberg		

DESCRIPTION OF PROPERTY SURVEYED

Parcel A:

Parcel B:

Lots 1, 2, 3 and the North 96 feet of Lot 4, Block 1, Maski's Maple Plain, Hennepin County, Minnesota.

Lot 5 and that part of Lot 4 lying South of the North 96 feet thereof, Block 1; The North 34 feet of Lots 6, 7 and 8, Block 1; All in Maski's Maple Plain, Hennepin County, Minnesota.

Abstract Property

GENERAL SURVEY NOTES

- 1. Bearings are based on the Hennepin County Coordinate System (1986 Adjustment).
- 2. Elevations are based on the NGVD 29 Datum. Site Benchmark is the top nut of the fire hydrant located in the northeast quadrant at the intersection of Bryant Street and Pioneer Avenue, as shown hereon. Elevation = 1031.30 3. We have shown the location of utilities to the best of our ability based on observed evidence together with evidence from the following sources: plans
- obtained from utility companies, plans provided by client, markings by utility companies and other appropriate sources. We have used this information to develop a view of the underground utilities for this site. However, lacking excavation, the exact location of underground features cannot be accurately, completely and reliably depicted. Where additional or more detailed information is required, the client is advised that excavation may be necessary. Also, please note that seasonal conditions may inhibit our ability to visibly observe all the utilities located on the subject property.

ALTA/NSPS LAND TITLE SURVEY NOTES (numbered per Table A)

- 1. Monuments placed and/or found at all major corners of the boundary of the surveyed property as shown hereon.
- 2. Site Address: 1520 Wyman Avenue, Maple Plain, Minnesota 55359.
- 3. This property is contained in Zone X (area determined to be outside the 0.2% annual chance floodplain) per Flood Insurance Rate Map, Community Panel
- No. 27053C0143F, effective date of November 4, 2016.
- 4. The Gross land area is 153,328 +/- square feet or 3.520 +/- acres.
- 7. (a) Exterior dimensions of buildings at ground level as shown hereon.
- visibly observed all site features located on the subject property. 9. No striped parking stalls were observed on the subject property while conducting the fieldwork.
- 13. The names of the adjoining owners of the platted lands, as shown hereon, are based on information obtained from the Hennepin County Interactive Property map.

SURVEY REPORT

- 1. This map and report was prepared with the benefit of a Commitment for Title Insurance issued by Land Title, Inc. as agent for Stewart Title Guaranty Company, File No. 685764, dated October 9, 2023. We note the following with regards to Schedule B II Exceptions of the herein referenced Title Commitment:
- a. Item no.'s 1-13 are not survey related.

ALTA CERTIFICATION

To: Elim Homes, Inc., a Minnesota non-profit corporation; Haven Homes, Inc., a Minnesota non-profit corporation; River Oaks at Maple Plain Real Estate, LLC; Land Title, Inc.; and Stewart Title Guaranty Company: This is to certify that this map or plat and the survey on which it is based were made in accordance with the 2021 Minimum Standard Detail Requirements for ALTA/NSPS Land Title Surveys, jointly established and adopted by ALTA and NSPS, and includes Items 1, 2, 3, 4, 7(a), 8, 9, and 13 of Table A thereof. The fieldwork was completed on 12-12-2023.

Dated this 22nd day of December, 2023.

Rory L. Synstellen Minnesota License No. 44565 rory@civilsitegroup.com





Linetype & Symbol Legend

— Е — —	ELECTRIC LINE	Α	AIR CONDITIONER
ее	ELECTRIC LINE (RECORD)	С	CABLE TV BOX
F	FIBER/COMM. LINE	Ē	ELECTRIC MANHOLE
FF	FIBER/COMM. LINE (RECORD)	ET	ELECTRIC TRANSFORMER
G	GASMAIN	Ð	ELECTRICAL METER
GG	GASMAIN (RECORD)	Ē	FIBER/COMM. MANHOLE
— он ——	OVERHEAD UTILITIES	D.	POWER POLE
>	SANITARY SEWER	\downarrow	GUY WIRE
>>	SANITARY SEWER (RECORD)	G	GAS METER
>>	STORM SEWER	l Nov1	GAS MANHOLE
>>	STORM SEWER (RECORD)		
T	TELEPHONE LINE	ه	SEWER CLEAN OUT
TT	TELEPHONE LINE (RECORD)	Ő	
w	WATERMAIN		
ww	WATERMAIN (RECORD)	ড্য	STORM MANHOLE
x	CHAINLINK FENCELINE	\ominus	CATCH BASIN
	WOODEN FENCELINE	\triangleleft	FLARED END SECTION
oo	GUARDRAIL	T	TELEPHONE BOX
Δ	ACCESS RESTRICTION	\bigcirc	TELEPHONE MANHOLE
4 - 1		8	TRAFFIC SIGNAL
	CONCRETE SURFACE	V	HYDRANT
		Ă	FIRE CONNECTION
	PAVER SURFACE	Ø	POST INDICATOR VALVE
	BITUMINOUS SURFACE	₩ ∇	
			WATER VALVE
	GRAVEL/LANDSCAPE		VVELL
	SURFACE		

G RO Civil Engineering • Surveying • Landscape Architectu 5000 Glenwood Avenue Golden Valley, MN 55422 612-615-0060 civilsitegroup.com Ð J Φ 8. Substantial features observed in the process of conducting the fieldwork as shown hereon. Please note that seasonal conditions may inhibit our ability to Δ σ É >3 0 N S I HEREBY CERTIFY THAT THIS SURVEY. PLAN, OR REPORT WAS PREPARED BY ME OR UNDER MY DIRECT SUPERVISION AND THAT I AM A DULY LICENSED LAND SURVEYOR UNDER THE LAWS OF THE STATE OF MINNESOTA. RORY L. SYNSTELIEN DATE 12-22-2023 LICENSE NO. 44565 QA/QC FIELD CREW DC DRAWN BY REVIEWED BY ☑ UTILITY VAULT UPDATED BY UTILITY MANHOLE ELECTRICAL OUTLET H HAND HOLE BOLLARD ◦∽ FLAG POLE VICINITY MAP FT FUEL TANK டீ HANDICAP SYMBOL 🛱 LIGHT POLE MAIL BOX - SIGN CONIFEROUS TREE SITE * DECIDUOUS TREE SB SOIL BORING FOUND IRON MONUMENT O SET OR TO BE SET IRON MONUMENT REVISION SUMMARY O CAST IRON MONUMENT DATE DESCRIPTION ROJECT NO.: 23443.00 ALTA/NSPS LAND TITLE SURVEY COPYRIGHT 2023 CIVIL SITE GROUP

Section 4. Item B.

COMFORT HAVEN MAPLE PLAIN, MINNESOTA **ISSUED FOR: PERMIT SUBMITTAL**

	PROJECT CONTAC	CTS
	NAME & ADDRESS	CONTACT
CIVIL ENGINEER	CIVIL SITE GROUP 5000 GLENWOOD AVE GOLDEN VALLEY, MN 55422	DAVE KNAEBLE 612-615-0060 DKNAEBLE@CIVILSITEGROUP.COM
LANDSCAPE ARCHITECT	CIVIL SITE GROUP 5000 GLENWOOD AVE GOLDEN VALLEY, MN 55422	ROB BINDER 612-615-0060 RBINDER@CIVILSITEGROUP.COM
PROPERTY OWNER/DEVELOPER	COMFORT HAVEN LLC 4207 QUAKER TRAIL NE PRIOR LAKE, MN 55372	JON GLEISNER 612-600-6036 JONNYGLEIS@HOTMAIL.COM
ARCHITECT	SPERIDES REINERS ARCHITECTS 6442 CITY WEST PARKWAY #300 EDEN PRAIRIE, MN 55344	ANDREW ALTSTATT 952-996-9662 ANDREWA@SRA-MN.COM
SURVEYOR	CIVIL SITE GROUP 5000 GLENWOOD AVE GOLDEN VALLEY, MN 55422	RORY SYNSTELIEN 612-615-0060 RORY@CIVILSITEGROUP.COM



ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

			@	Section 4, Item B.
		Civil Engineering ° Surveying ° Landscape Architecture 5000 Glenwood Avenue Golden Valley, MN 55422		
		PR-0	MINART'S AND	
Bigger Bigger IHEREBY CERTIFING THAT THIS PLANS SPECIFICATION, OR REPORT WAS MINNESSOTA. Juid J. Knaeble DATE O2114/25 LICENSE NO. 48776 ISSUE/SUBMITTAL SUBMITTAL DATE DESCRIPTION 02114/25 CITY SUBMITTAL DATE DESCRIPTION 02114/25 DATE DESCRIPTION 02114/25 DESCRIPTION		COMPORT HAVEN MAPLE PLAIN, MN COMFORT HAVEN LLC		COMFORT HAVEN LLC 4207 QUAKER TRAIL NE, PRIOR LAKE, MN 55372
PROJECT MANAGER DAVID KNAEBLE		LO ON PREPARED SUPERVIS LICENSED UNDER TH DATE 02/14/ ISSUE/S DATE 02/14/25	CERTIFY THA CATION, OR RE BY ME OR UNE SION AND THAT PROFESSION, HE LAWS OF TI MINNESOTA Aud J. Knae /25LICENSI UBMITTAL S DESC CITY SUBMITTAL	UNDO T THIS PLAN, EPORT WAS DER MY DIRECT T I AM A DULY AL ENGINEER HE STATE OF AL ble E NO. 48776 SUMMARY RIPTION
CONTACT NUMBER 612-615-0060 DRAWN BY ZH REVIEWED BY DK PROJECT NUMBER 2343.01 REVISION SUMMARY DATE DESCRIPTION SHEET INDEX MBER SHEET TITLE	SHEET INDEX JMBER SHEET TITLE C0.0 TITLE SHEET C1.0 REMOVALS PLAN	PROJECT MANAGER CONTACT NUMBER DRAWN BY REVIEWED BY PROJECT NUMBER REV DATE	DAVID KNAEBLE 612-615-0060 ZH DK 23443.01 /ISION SUM DESC	MARY
C1.0 REMOVALS PLAN C2.0 SITE PLAN C3.0 GRADING PLAN C4.0 UTILITY PLAN C5.0 DETAILS L1.0 OVERALL LANDSCAPE PLAN L1.1 LANDSCAPE ENLARGEMENT L1.2 LANDSCAPE ENLARGEMENT L1.3 LANDSCAPE ENLARGEMENT L1.4 LANDSCAPE DETAILS	C1.0 REMOVALS PLAN C2.0 SITE PLAN C3.0 GRADING PLAN C4.0 UTILITY PLAN C5.0 DETAILS L1.0 OVERALL LANDSCAPE PLAN L1.1 LANDSCAPE ENLARGEMENT L1.2 LANDSCAPE ENLARGEMENT L1.3 LANDSCAPE ENLARGEMENT L1.4 LANDSCAPE DETAILS		TITL	E SHEET
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SHEET NUMBER SHEET TITLE



REMOVAL NOTES:



Owner: D & N Rodg

PID: 251182422008 Address: 1475 Prair

ALLOSERVICESI&S Kunz

UTILITIES PER UTILITY

COMPANY AND/OR

L.G.U. STANDARDS

Open Iron Pipe

PID: 2511824220012 Address: 1459 Prairieland Aver **Owner: Nancee Louise Nystrom**

Found 1/2 Inch Open Iron Pipe

1. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

3. REMOVAL OF MATERIALS NOTED ON THE DRAWINGS SHALL BE IN ACCORDANCE WITH MNDOT, STATE AND LOCAL

4. REMOVAL OF PRIVATE UTILITIES SHALL BE COORDINATED WITH UTILITY OWNER PRIOR TO CONSTRUCTION ACTIVITIES. 5. EXISTING PAVEMENTS SHALL BE SAWCUT IN LOCATIONS AS SHOWN ON THE DRAWINGS OR THE NEAREST JOINT FOR

6. REMOVED MATERIALS SHALL BE DISPOSED OF TO A LEGAL OFF-SITE LOCATION AND IN ACCORDANCE WITH STATE AND

7. ABANDON, REMOVAL, CONNECTION, AND PROTECTION NOTES SHOWN ON THE DRAWINGS ARE APPROXIMATE. COORDINATE WITH PROPOSED PLANS.

8. EXISTING ON-SITE FEATURES NOT NOTED FOR REMOVAL SHALL BE PROTECTED THROUGHOUT THE DURATION OF THE

9. PROPERTY LINES SHALL BE CONSIDERED GENERAL CONSTRUCTION LIMITS UNLESS OTHERWISE NOTED ON THE DRAWINGS. WORK WITHIN THE GENERAL CONSTRUCTION LIMITS SHALL INCLUDE STAGING, DEMOLITION AND CLEAN-UP OPERATIONS AS WELL AS CONSTRUCTION SHOWN ON THE DRAWINGS.

10. MINOR WORK OUTSIDE OF THE GENERAL CONSTRUCTION LIMITS SHALL BE ALLOWED AS SHOWN ON THE PLAN AND PER CITY REQUIREMENTS. FOR ANY WORK ON ADJACENT PRIVATE PROPERTY, THE CONTRACTOR SHALL OBTAIN WRITTEN PERMISSION FROM THE ADJACENT PROPERTY OWNER PRIOR TO ANY WORK.

11. DAMAGE BEYOND THE PROPERTY LIMITS CAUSED BY CONSTRUCTION ACTIVITY SHALL BE REPAIRED IN A MANNER APPROVED BY THE ENGINEER/LANDSCAPE ARCHITECT OR IN ACCORDANCE WITH THE CITY.

12. PROPOSED WORK (BUILDING AND CIVIL) SHALL NOT DISTURB EXISTING UTILITIES UNLESS OTHERWISE SHOWN ON THE DRAWINGS AND APPROVED BY THE CITY PRIOR TO CONSTRUCTION.

13. SITE SECURITY MAY BE NECESSARY AND PROVIDED IN A MANNER TO PROHIBIT VANDALISM, AND THEFT, DURING AND AFTER NORMAL WORK HOURS, THROUGHOUT THE DURATION OF THE CONTRACT. SECURITY MATERIALS SHALL BE IN

14. VEHICULAR ACCESS TO THE SITE SHALL BE MAINTAINED FOR DELIVERY AND INSPECTION ACCESS DURING NORMAL OPERATING HOURS. AT NO POINT THROUGHOUT THE DURATION OF THE CONTRACT SHALL CIRCULATION OF ADJACENT STREETS BE BLOCKED WITHOUT APPROVAL BY THE CITY PRIOR TO CONSTRUCTION ACTIVITIES.

15. ALL TRAFFIC CONTROLS SHALL BE PROVIDED AND ESTABLISHED PER THE REQUIREMENTS OF THE MINNESOTA MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MMUTCD) AND THE CITY. THIS SHALL INCLUDE, BUT NOT BE LIMITED TO, SIGNAGE, BARRICADES, FLASHERS, AND FLAGGERS AS NEEDED. ALL PUBLIC STREETS SHALL REMAIN OPEN TO TRAFFIC AT ALL TIMES. NO ROAD CLOSURES SHALL BE PERMITTED WITHOUT APPROVAL BY THE CITY.

16. SHORING FOR BUILDING EXCAVATION MAY BE USED AT THE DISCRETION OF THE CONTRACTOR AND AS APPROVED BY THE OWNERS REPRESENTATIVE AND THE CITY PRIOR TO CONSTRUCTION ACTIVITIES.

17. STAGING, DEMOLITION, AND CLEAN-UP AREAS SHALL BE WITHIN THE PROPERTY LIMITS AS SHOWN ON THE DRAWINGS AND MAINTAINED IN A MANNER AS REQUIRED BY THE CITY.

18. ALL EXISTING SITE TRAFFIC/REGULATORY SIGNAGE TO BE INVENTORIED AND IF REMOVED FOR CONSTRUCTION SHALL

19. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

OWNER INFORMATION

4207 QUAKER TRAIL NE PRIOR LAKE, MN 55372 JONNYGLEIS@HOTMAIL.COM

	<u>. </u>		
P <i>/7/7/7/7/7/7/7</i> /7/7	REMOVAL OF PAVEMENT AND ALL BASE		
	MATERIAL, INCLUDING BIT., CONC., AND		
	GRAVEL PVMTS.		
г -	FULL DEPTH PAVEMENT RECLAMATION		
${{{\boldsymbol{\vdash}}}} = = = = = = = = = = = = = = = = = $			
		PROJECT MANAGER	DAVID KNAEBLE
	CONSTRUCTION LIMITS	CONTACT NUMBER	612-615-0060
		DRAWN BY	ZH
	PROPERTY LINE	PROJECT NUMBER	23443.01
	REMOVE CORD AND GUITER. IF IN	RE	VISION SUMM
			DESCR
	GOVERNING UNIT.	DATE	
1	TREE PROTECTION	2/2/2024	ADDENL
	TREE REMOVAL - INCLUDING ROOTS AND STUMPS		
X			
	Know what's below . $1" = 30'-0"$		
	<u>15'-0" 0 30'-0"</u>		



COPYRIGHT 2023 CIVIL SITE GROUP



			FENCING	SCHEDUL	E	
LOCATION	TYPE	HEIGHT	MAKE	MODEL	FINISH	REMARKS
EAST PROPERTY LINE	MATCH EXISTING FENCE	MATCH EX.	MATCH EX.	MATCH EX.	MATCH EX	TO MATCH EXISTING FENCE IN MATERIAL, HEIGHT, SIZE, LOCATION, COORDINATE WITH OWNER
COURTYARD FENCE	ORNAMENTAL METAL	6'	AMERISTAR FENCING	MONTAGE	BLACK	MAKE, MODEL & COLOR FOR REFERENCE ONLY. <u>PROVIDE GATE AND</u> LOCK
	PROVIDE SHOP DRAW	INCS FOR AL	COMPONENTS MANUE		FERENCE	

IE: SEE DETAILS, PROVIDE SHOP DRAWINGS FOR ALL COMPONENTS. MANUF. PROVIDED FOR REFERENCE CONTRACTOR MAY SUGGEST ALTERNATE, MAKERS & MODELS WHICH ARE EQUIVALENT IN QUALITY & CRAFTSMANSHIP.

SITE AREA CALCULATIONS				
	EXISTING CO	NDITION		PRO
IMPERVIOUS SURFACES				
BUILDING COVERAGE	47,180 SF	30.8%		46
PAVEMENT	31,397 SF	20.5%		39
TOTAL	78,577 SF	51.2%	0.0 AC	86
PERVIOUS SURFACES				
TOTAL	74,751 SF	48.8%	1.7 AC	66
TOTAL SITE AREA	153,328 SF	100.0%	3.5 AC	153
DIFFERENCE (EX. VS PROP.)	7,810 SF	5.1%		
DISTURBED AREA	30,000 SF	0.7	AC	

OWNER INFORMATION

COMFORT HAVEN LLC 4207 QUAKER TRAIL NE

PRIOR LAKE, MN 55372 JON GLEISNER

612-600-6036 JONNYGLEIS@HOTMAIL.COM

CITY OF MAPLE PLAIN SITE SPECIFIC N

- 1. THE CONDITION OF WYMAN AVENUE AND BRYANT (INCLUDING THE STORM CONVEYANCE SYSTEM) SH DOCUMENTED WITH VIDEO PRIOR TO ANY WORK. THE HAVE JUST BEEN RECONSTRUCTED AND ARE IN GREA CONDITION. ANY DAMAGE TO THE STREETS OR SEDIM DEPOSITED IN THE STORM SEWER AFTER WORK BEGIN BE DEEMED TO BE CAUSED BY THE CONTRACTOR AND RESPONSIBILITY TO REPAIR OR REMOVE.
- WORK WITHIN PUBLIC RIGHT-OF-WAY MUST BE COORDINATED WITH THE CITY. REMOVAL LIMITS SHALL BE MARKED BY THE CITY PRIOR TO DEMOLITION.

SITE LAYOUT NOTES:

1. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

2. CONTRACTOR SHALL VERIFY LOCATIONS AND LAYOUT OF ALL SITE ELEMENTS PRIOR TO BEGINNING CONSTRUCTION, INCLUDING BUT NOT LIMITED TO, LOCATIONS OF EXISTING AND PROPOSED PROPERTY LINES, EASEMENTS, SETBACKS, UTILITIES, BUILDINGS AND PAVEMENTS. CONTRACTOR IS RESPONSIBLE FOR FINAL LOCATIONS OF ALL ELEMENTS FOR THE SITE. ANY REVISIONS REQUIRED AFTER COMMENCEMENT OF CONSTRUCTION, DUE TO LOCATIONAL ADJUSTMENTS SHALL BE CORRECTED AT NO ADDITIONAL COST TO OWNER. ADJUSTMENTS TO THE LAYOUT SHALL BE APPROVED BY THE ENGINEER/LANDSCAPE ARCHITECT PRIOR TO INSTALLATION OF MATERIALS. STAKE LAYOUT FOR APPROVAL.

3. THE CONTRACTOR SHALL OBTAIN ALL NECESSARY PERMITS PRIOR TO CONSTRUCTION, INCLUDING A RIGHT-OF-WAY AND STREET OPENING PERMIT.

4. THE CONTRACTOR SHALL VERIFY RECOMMENDATIONS NOTED IN THE GEO TECHNICAL REPORT PRIOR TO INSTALLATION OF SITE IMPROVEMENT MATERIALS.

5. LOCATIONS OF STRUCTURES, ROADWAY PAVEMENTS, CURBS AND GUTTERS, BOLLARDS, AND WALKS ARE APPROXIMATE AND SHALL BE STAKED IN THE FIELD, PRIOR TO INSTALLATION, FOR REVIEW AND APPROVAL BY THE ENGINEER/LANDSCAPE ARCHITECT.

6. CURB DIMENSIONS SHOWN ARE TO FACE OF CURB. BUILDING DIMENSIONS ARE TO FACE OF CONCRETE FOUNDATION. LOCATION OF BUILDING IS TO BUILDING FOUNDATION AND SHALL BE AS SHOWN ON THE DRAWINGS.

7. THE CONTRACTOR SHALL SUBMIT SHOP DRAWINGS OR SAMPLES AS SPECIFIED FOR REVIEW AND APPROVAL BY THE ENGINEER/LANDSCAPE ARCHITECT PRIOR TO FABRICATION FOR ALL PREFABRICATED SITE IMPROVEMENT MATERIALS SUCH AS, BUT NOT LIMITED TO THE FOLLOWING, FURNISHINGS, PAVEMENTS, WALLS, RAILINGS, BENCHES, FLAGPOLES, LANDING PADS FOR CURB RAMPS, AND LIGHT AND POLES. THE OWNER RESERVES THE RIGHT TO REJECT INSTALLED MATERIALS NOT PREVIOUSLY APPROVED.

8. FIELD VERIFY ALL EXISTING SITE CONDITIONS, DIMENSIONS.

9. PARKING IS TO BE SET PARALLEL OR PERPENDICULAR TO EXISTING BUILDING UNLESS NOTED OTHERWISE. 10. ALL PARKING LOT PAINT STRIPING TO BE WHITE, 4" WIDE TYP.

11. BITUMINOUS PAVING TO BE "LIGHT DUTY" UNLESS OTHERWISE NOTED. SEE DETAIL SHEETS FOR PAVEMENT SECTIONS.

12. ALL TREES THAT ARE TO REMAIN ARE TO BE PROTECTED FROM DAMAGE WITH A CONSTRUCTION FENCE AT THE DRIP LINE. SEE LANDSCAPE DOCUMENTS.

13. CONTRACTOR IS RESPONSIBLE TO INSTALL ANY SIDEWALK AND CURBING PER DESIGN PLAN. CONTRACTOR TO VERIFY ALL CURBS AND SIDEWALKS WILL DRAIN PROPERLY IN FIELD CONDITIONS. CONTRACTOR MUST CONTACT THE CIVIL ENGINEER 24-HOURS PRIOR TO ANY CURB AND/OR SIDEWALK INSTALLATION TO REVIEW AND INSPECT CURB STAKES. CONTRACTOR IS RESPONSIBLE FOR ANY CURB OR SIDEWALK REPLACEMENT IF THIS PROCEDURE IS NOT FOLLOWED.

ROPOSED CO	ONDITION			
46,980 SF	30.6%			
39,407 SF	25.7%			
86,387 SF	56.3%	2.0 AC		
66,941 SF	43.7%	1.5 AC		
153,328 SF	100.0%	3.5 AC		
			SITE PLAN LEGE	END:
			6	SIGN REQI HC = NP = ST =
				CP =
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PRE	PREVE TRUD					
COMFORT HAVEN	MAPLE PLAIN, MN	COMFORT HAVEN LLC 4207 QUAKER TRAIL NE, PRIOR LAKE, MN 55372				
PROJECT		OWNER				
I HEREBY SPECIFI PREPARED SUPERVIS LICENSED UNDER T	(CERTIFY THA CATION, OR RE BY ME OR UNE SION AND THAT PROFESSION, HE LAWS OF TH MINNESOTA	T THIS PLAN, EPORT WAS DER MY DIRECT T I AM A DULY AL ENGINEER HE STATE OF				
 DATE <u>02</u> /14	David J. Knae 1/25 LICENSI	ble ble				
ISSUE/S DATE						
02/14/25	CITY SUBMITTAL					
-						
PROJECT MANAGER CONTACT NUMBER DRAWN BY REVIEWED BY	DAVID KNAEBLE 612-615-0060 ZH DK					
	/ISION SUM	MARY				
DATE	DESC	RIPTION				
	S	ITE PLAN				

Section 4. Item B

612-615-006

GROUP

Civil Engineering ° Surveying ° Landscape

Architecture

5000 Glenwood Avenue

vilsitearoup.com

Golden Valley, MN 55422

Call before you dig.

CONSTRUCTION LIMITS

PROPERTY LINE

CONCRETE PAD/WALK

REQUIRED.

ST = STOP

HC = ACCESSIBLE SIGN

NP = NO PARKING FIRE LANE

CP = COMPACT CAR PARKING ONLY

SIGN AND POST ASSEMBLY. SHOP DRAWINGS

CURB AND GUTTER-SEE NOTES (T.O.) TIP OUT

BITUMINOUS PAVEMENT (IF APPLICABLE). SEE

GEOTECHNICAL REPORT FOR AGGREGATE

BASE & WEAR COURSE DEPTH, SEE DETAIL.

FULL DEPTH RECLAMATION PAVEMENT

GUTTER WHERE APPLICABLE-SEE PLAN

COPYRIGHT 2023 CIVIL SITE GR

1. CONTRACTOR SHALL VERIFY ALL BUILDING ELEVATIONS, (FFE, LFE, GFE), PRIOR TO CONSTRUCTION BY CROSS CHECKING WITH ARCHITECTURAL, STRUCTURAL AND CIVIL ELEVATIONS FOR EQUIVALENT "100" ELEVATIONS. THIS MUST BE DONE PRIOR TO EXCAVATION AND INSTALLATION OF ANY FOOTING MATERIALS. VERIFICATION OF THIS COORDINATION SHALL BE CONFIRMED IN WRITING BY CIVIL, SURVEYOR, ARCHITECTURAL, STRUCTURAL AND CONTRACTOR PRIOR TO CONSTRUCTION.

Section 4. Item F

612-615-00

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I HEREBY CERTIFY THAT THIS PLAN,

SPECIFICATION, OR REPORT WAS

PREPARED BY ME OR UNDER MY DIREC

SUPERVISION AND THAT I AM A DULY LICENSED PROFESSIONAL ENGINEER

UNDER THE LAWS OF THE STATE OF

MINNESOTA.

David J. Knaeble

DATE 02/14/25 LICENSE NO. 48776

ISSUE/SUBMITTAL SUMMARY

02/14/25 CITY SUBMITTAL

DATE

proseble

DESCRIPTION

GROUP Civil Engineering ° Surveying ° Landscape

Architecture

5000 Glenwood Avenue

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/ilsitearoup.com

Golden Valley, MN 55422

2. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

3. SEE SITE PLAN FOR HORIZONTAL LAYOUT & GENERAL GRADING NOTES.

4. THE CONTRACTOR SHALL COMPLETE THE SITE GRADING CONSTRUCTION (INCLUDING BUT NOT LIMITED TO SITE PREPARATION, SOIL CORRECTION, EXCAVATION, EMBANKMENT, ETC.) IN ACCORDANCE WITH THE REQUIREMENTS OF THE OWNER'S SOILS ENGINEER. ALL SOIL TESTING SHALL BE COMPLETED BY THE OWNER'S SOILS ENGINEER. THE CONTRACTOR SHALL BE RESPONSIBLE FOR COORDINATING ALL REQUIRED SOIL TESTS AND INSPECTIONS WITH THE SOILS ENGINEER.

5. ANY ELEMENTS OF AN EARTH RETENTION SYSTEM AND RELATED EXCAVATIONS THAT FALL WITHIN THE PUBLIC RIGHT OF WAY WILL REQUIRE A "RIGHT OF WAY EXCAVATION PERMIT". CONTRACTOR IS RESPONSIBLE FOR AQUIRING THIS PERMIT PRIOR TO

6. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

7. GRADING AND EXCAVATION ACTIVITIES SHALL BE PERFORMED IN ACCORDANCE WITH THE NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT REQUIREMENTS & PERMIT REQUIREMENTS OF THE CITY.

8. PROPOSED SPOT GRADES ARE FLOW-LINE FINISHED GRADE ELEVATIONS, UNLESS OTHERWISE NOTED.

9. GRADES OF WALKS SHALL BE INSTALLED WITH 5% MAX. LONGITUDINAL SLOPE AND 1% MIN. AND 2% MAX. CROSS SLOPE,

10. PROPOSED SLOPES SHALL NOT EXCEED 3:1 UNLESS INDICATED OTHERWISE ON THE DRAWINGS. MAXIMUM SLOPES IN

11. PROPOSED RETAINING WALLS, FREESTANDING WALLS, OR COMBINATION OF WALL TYPES GREATER THAN 4' IN HEIGHT SHALL BE DESIGNED AND ENGINEERED BY A REGISTERED RETAINING WALL ENGINEER. DESIGN DRAWINGS SHALL BE SUBMITTED FOR REVIEW AND APPROVAL PRIOR TO CONSTRUCTION.

12. THE CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTENANCE OF GRADE STAKES THROUGHOUT THE DURATION OF CONSTRUCTION TO ESTABLISH PROPER GRADES. THE CONTRACTOR SHALL ALSO BE RESPONSIBLE FOR A FINAL FIELD CHECK OF FINISHED GRADES ACCEPTABLE TO THE ENGINEER/LANDSCAPE ARCHITECT PRIOR TO TOPSOIL AND SODDING ACTIVITIES. 13. IF EXCESS OR SHORTAGE OF SOIL MATERIAL EXISTS, THE CONTRACTOR SHALL TRANSPORT ALL EXCESS SOIL MATERIAL OFF

THE SITE TO AN AREA SELECTED BY THE CONTRACTOR, OR IMPORT SUITABLE MATERIAL TO THE SITE.

14. EXCAVATE TOPSOIL FROM AREAS TO BE FURTHER EXCAVATED OR REGRADED AND STOCKPILE IN AREAS DESIGNATED ON THE SITE. THE CONTRACTOR SHALL SALVAGE ENOUGH TOPSOIL FOR RESPREADING ON THE SITE AS SPECIFIED. EXCESS TOPSOIL SHALL BE PLACED IN EMBANKMENT AREAS, OUTSIDE OF BUILDING PADS, ROADWAYS AND PARKING AREAS. THE CONTRACTOR SHALL SUBCUT CUT AREAS, WHERE TURF IS TO BE ESTABLISHED, TO A DEPTH OF 6 INCHES. RESPREAD TOPSOIL IN AREAS WHERE TURF IS TO BE ESTABLISHED TO A MINIMUM DEPTH OF 6 INCHES.

15. FINISHED GRADING SHALL BE COMPLETED. THE CONTRACTOR SHALL UNIFORMLY GRADE AREAS WITHIN LIMITS OF GRADING, INCLUDING ADJACENT TRANSITION AREAS. PROVIDE A SMOOTH FINISHED SURFACE WITHIN SPECIFIED TOLERANCES, WITH UNIFORM LEVELS OR SLOPES BETWEEN POINTS WHERE ELEVATIONS ARE SHOWN, OR BETWEEN SUCH POINTS AND EXISTING GRADES. AREAS THAT HAVE BEEN FINISH GRADED SHALL BE PROTECTED FROM SUBSEQUENT CONSTRUCTION OPERATIONS, TRAFFIC AND EROSION. REPAIR ALL AREAS THAT HAVE BECOME RUTTED BY TRAFFIC OR ERODED BY WATER OR HAS SETTLED BELOW THE CORRECT GRADE. ALL AREAS DISTURBED BY THE CONTRACTOR'S OPERATIONS SHALL BE RESTORED TO EQUAL OR BETTER THAN ORIGINAL CONDITION OR TO THE REQUIREMENTS OF THE NEW WORK.

16. PRIOR TO PLACEMENT OF THE AGGREGATE BASE, A TEST ROLL WILL BE REQUIRED ON THE STREET AND/OR PARKING AREA SUBGRADE. THE CONTRACTOR SHALL PROVIDE A LOADED TANDEM AXLE TRUCK WITH A GROSS WEIGHT OF 25 TONS. THE TEST ROLLING SHALL BE AT THE DIRECTION OF THE SOILS ENGINEER AND SHALL BE COMPLETED IN AREAS AS DIRECTED BY THE SOILS ENGINEER. THE SOILS ENGINEER SHALL DETERMINE WHICH SECTIONS OF THE STREET OR PARKING AREA ARE UNSTABLE. CORRECTION OF THE SUBGRADE SOILS SHALL BE COMPLETED IN ACCORDANCE WITH THE REQUIREMENTS OF THE SOILS ENGINEER. NO TEST ROLL SHALL OCCUR WITHIN 10' OF ANY UNDERGROUND STORM RETENTION/DETENTION SYSTEMS.

17.1. THE BUILDING SUBGRADE FINISHED SURFACE ELEVATION SHALL NOT VARY BY MORE THAN 0.30 FOOT ABOVE, OR 0.30 FOOT BELOW, THE PRESCRIBED ELEVATION AT ANY POINT WHERE MEASUREMENT IS MADE.

17.2. THE STREET OR PARKING AREA SUBGRADE FINISHED SURFACE ELEVATION SHALL NOT VARY BY MORE THAN 0.05 FOOT ABOVE, OR 0.10 FOOT BELOW, THE PRESCRIBED ELEVATION OF ANY POINT WHERE MEASUREMENT IS MADE

17.3. AREAS WHICH ARE TO RECEIVE TOPSOIL SHALL BE GRADED TO WITHIN 0.30 FOOT ABOVE OR BELOW THE REQUIRED ELEVATION, UNLESS DIRECTED OTHERWISE BY THE ENGINEER.

17.4. TOPSOIL SHALL BE GRADED TO PLUS OR MINUS 1/2 INCH OF THE SPECIFIED THICKNESS.

18.1. THE CONTRACTOR SHALL PROTECT NEWLY GRADED AREAS FROM TRAFFIC AND EROSION, AND KEEP AREA FREE OF TRASH

18.2. CONTRACTOR SHALL REPAIR AND REESTABLISH GRADES IN SETTLED, ERODED AND RUTTED AREAS TO SPECIFIED TOLERANCES. DURING THE CONSTRUCTION, IF REQUIRED, AND DURING THE WARRANTY PERIOD, ERODED AREAS WHERE TURF IS TO BE ESTABLISHED SHALL BE RESEEDED AND MULCHED.

18.3. WHERE COMPLETED COMPACTED AREAS ARE DISTURBED BY SUBSEQUENT CONSTRUCTION OPERATIONS OR ADVERSE WEATHER, CONTRACTOR SHALL SCARIFY, SURFACE, RESHAPE, AND COMPACT TO REQUIRED DENSITY PRIOR TO FURTHER

RADING PLAN LE	GEND:		
1125	EX. 1' CONTOUR ELEVATION INTERVAL		
1137	1.0' CONTOUR ELEVATION INTERVAL		
41.26	SPOT GRADE ELEVATION (GUTTER/FLOW LINE UNLESS OTHERWISE NOTED)	PROJECT MANAGER CONTACT NUMBER DRAWN BY	DAVID KNAEBLE 612-615-0060 ZH
891.00 G	SPOT GRADE ELEVATION GUTTER	REVIEWED BY PROJECT NUMBER	DK 23443.01
891.00 TC	SPOT GRADE ELEVATION TOP OF CURB	RE	VISION SUMMARY
891.00 BS/TS	SPOT GRADE ELEVATION BOTTOM OF STAIRS/TOP OF STAIRS	DATE	DESCRIPTION
891.00 ME	SPOT GRADE ELEVATION MATCH EXISTING		
 GB	GRADE BREAK - HIGH POINTS		
	CURB AND GUTTER (T.O = TIP OUT)		
ТО			
EOF=1135.52	EMERGENCY OVERFLOW		
	CONSTRUCTION LIMITS		
	Know what's below. Call before you dig.		C3.(

CITY OF MAPLE PLAIN UTILITY NOTES:

1. RESERVED FOR CITY SPECIFIC UTILITY NOTES.

GENERAL UTILITY NOTES:

1. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.

Section 4. Item F

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I HEREBY CERTIFY THAT THIS PLAN,

SPECIFICATION, OR REPORT WAS

PREPARED BY ME OR UNDER MY DIREC SUPERVISION AND THAT I AM A DULY

LICENSED PROFESSIONAL ENGINEER

UNDER THE LAWS OF THE STATE OF

MINNESOTA.

David J. Knaeble

DATE 02/14/25 LICENSE NO. 48776

ISSUE/SUBMITTAL SUMMARY

and

02/14/25 CITY SUBMITTAL

DATE

proseble

DESCRIPTION

GROUP

Civil Engineering ° Surveying ° Landscape

Architecture

5000 Glenwood Avenue

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Golden Valley, MN 55422

3. CONTRACTOR SHALL FIELD VERIFY LOCATION AND ELEVATION OF EXISTING UTILITIES AND TOPOGRAPHIC FEATURES PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL IMMEDIATELY NOTIFY THE ENGINEER OF DISCREPANCIES OR VARIATIONS FROM THE PLANS.

4. UTILITY INSTALLATION SHALL CONFORM TO THE CURRENT EDITION OF "STANDARD SPECIFICATIONS FOR WATER MAIN AND SERVICE LINE INSTALLATION" AND "SANITARY SEWER AND STORM SEWER INSTALLATION" AS PREPARED BY THE CITY ENGINEERS ASSOCIATION OF MINNESOTA (CEAM), AND SHALL CONFORM WITH THE REQUIREMENTS OF THE CITY AND THE PROJECT SPECIFICATIONS.

5. CASTINGS SHALL BE SALVAGED FROM STRUCTURE REMOVALS AND RE-USED OR PLACED AT THE DIRECTION OF THE

6. ALL WATER PIPE SHALL BE CLASS 52 DUCTILE IRON PIPE (DIP) AWWA C151, ASME B16.4, AWWA C110, AWWA C153 UNLESS

7. ALL SANITARY SEWER SHALL BE SDR 26 POLYVINYL CHLORIDE (PVC) ASTM D3034 & F679, OR SCH 40 ASTM D1785, 2665, ASTM F794, 1866) UNLESS OTHERWISE NOTED.

8. ALL STORM SEWER PIPE SHALL BE HDPE ASTM F714 & F2306 WITH ASTM D3212 SPEC FITTINGS UNLESS OTHERWISE

9. PIPE LENGTHS SHOWN ARE FROM CENTER TO CENTER OF STRUCTURE OR TO END OF FLARED END SECTION. 10. UTILITIES ON THE PLAN ARE SHOWN TO WITHIN 5' OF THE BUILDING FOOTPRINT. THE CONTRACTOR IS ULTIMATELY RESPONSIBLE FOR THE FINAL CONNECTION TO BUILDING LINES. COORDINATE WITH ARCHITECTURAL AND MECHANICAL

11. CATCH BASINS AND MANHOLES IN PAVED AREAS SHALL BE SUMPED 0.04 FEET. ALL CATCH BASINS IN GUTTERS SHALL BE SUMPED 0.15 FEET PER DETAILS. RIM ELEVATIONS SHOWN ON THIS PLAN DO NOT REFLECT SUMPED ELEVATIONS.

13. HYDRANT TYPE, VALVE, AND CONNECTION SHALL BE IN ACCORDANCE WITH CITY REQUIREMENTS. HYDRANT EXTENSIONS

14. A MINIMUM OF 8 FEET OF COVER IS REQUIRED OVER ALL WATERMAIN, UNLESS OTHERWISE NOTED. EXTRA DEPTH MAY BE REQUIRED TO MAINTAIN A MINIMUM OF 18" VERTICAL SEPARATION TO SANITARY OR STORM SEWER LINES. EXTRA DEPTH WATERMAIN IS INCIDENTAL.

15. A MINIMUM OF 18 INCHES OF VERTICAL SEPARATION AND 10 FEET OF HORIZONTAL SEPARATION IS REQUIRED FOR ALL UTILITIES, UNLESS OTHERWISE NOTED.

16. ALL CONNECTIONS TO EXISTING UTILITIES SHALL BE IN ACCORDANCE WITH CITY STANDARDS AND COORDINATED WITH THE CITY PRIOR TO CONSTRUCTION.

17. CONNECTIONS TO EXISTING STRUCTURES SHALL BE CORE-DRILLED.

18. COORDINATE LOCATIONS AND SIZES OF SERVICE CONNECTIONS WITH THE MECHANICAL DRAWINGS.

19. COORDINATE INSTALLATION AND SCHEDULING OF THE INSTALLATION OF UTILITIES WITH ADJACENT CONTRACTORS AND

20. ALL STREET REPAIRS AND PATCHING SHALL BE PERFORMED PER THE REQUIREMENTS OF THE CITY. ALL PAVEMENT CONNECTIONS SHALL BE SAWCUT. ALL TRAFFIC CONTROLS SHALL BE PROVIDED BY THE CONTRACTOR AND SHALL BE ESTABLISHED PER THE REQUIREMENTS OF THE MINNESOTA MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MMUTCD) AND THE CITY. THIS SHALL INCLUDE BUT NOT BE LIMITED TO SIGNAGE, BARRICADES, FLASHERS, AND FLAGGERS AS NEEDED. ALL PUBLIC STREETS SHALL BE OPEN TO TRAFFIC AT ALL TIMES. NO ROAD CLOSURES SHALL BE PERMITTED WITHOUT APPROVAL BY THE CITY.

21. ALL STRUCTURES, PUBLIC AND PRIVATE, SHALL BE ADJUSTED TO PROPOSED GRADES WHERE REQUIRED. THE REQUIREMENTS OF ALL OWNERS MUST BE COMPLIED WITH. STRUCTURES BEING RESET TO PAVED AREAS MUST MEET OWNERS REQUIREMENTS FOR TRAFFIC LOADING.

22. 2CONTRACTOR SHALL COORDINATE ALL WORK WITH PRIVATE UTILITY COMPANIES.

23. CONTRACTOR SHALL COORDINATE CONNECTION OF IRRIGATION SERVICE TO UTILITIES. COORDINATE THE INSTALLATION OF IRRIGATION SLEEVES NECESSARY AS TO NOT IMPACT INSTALLATION OF UTILITIES.

24. CONTRACTOR SHALL MAINTAIN AS-BUILT PLANS THROUGHOUT CONSTRUCTION AND SUBMIT THESE PLANS TO ENGINEER UPON COMPLETION OF WORK.

25. ALL JOINTS AND CONNECTIONS IN STORM SEWER SYSTEM SHALL BE GASTIGHT OR WATERTIGHT. APPROVED RESILIENT RUBBER JOINTS MUST BE USED TO MAKE WATERTIGHT CONNECTIONS TO MANHOLES, CATCHBASINS, OR OTHER

26. ALL PORTIONS OF THE STORM SEWER SYSTEM LOCATED WITHIN 10 FEET OF THE BUILDING OR WATER SERVICE LINE MUST BE TESTED IN ACCORDANCE WITH MN RULES, CHAPTER 4714, SECTION 1109.0.

27. FOR ALL SITES LOCATED IN CLAY SOIL AREAS, DRAIN TILE MUST BE INSTALLED AT ALL LOW POINT CATCH BASINS 25' IN EACH DIRECTION. SEE PLAN AND DETAIL. INSTALL LOW POINT DRAIN TILE PER PLANS AND GEOTECHNICAL REPORT RECOMMENDATIONS AND REQUIREMENTS.

UTILITY LEGEND:			
	CATCH BASIN		
	MANHOLE		
	GATE VALVE AND VALVE BOX		
		PROJECT MANAGER	DAVID KNAEBLE
			612-615-0060
		REVIEWED BY	DK
1		PROJECT NUMBER	23443.01
I	WATER MAIN	RE	VISION SUMMARY
		DATE	DESCRIPTION
>>	STORM SEWER		
	FES		
	CONSTRUCTION LIMITS		
			UTILITY PL
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Know what's b	elow. 1" = 30'-0"		1,41
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Canbelo	15'-0" 0 30'-0"		

LANDSCAPE NOTES:

1029.74 (Per Rec.)	<u> </u>	ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE	<u>IR</u> 1.
=1029.77 =1030.24	2.	ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER. CONTRACTOR SHALL INSPECT THE SITE WITH THE OWNER AND/OR OWNER'S REPRESENTATIVES PRIOR TO WORK	2.
Found 1/2 Inch		BE INCLUDED AT THAT TIME.	
	3.	ALL EXISTING PLANTING BEDS SHALL BE CLEANED OF DEAD PLANT MATERIAL, WEEDS, AND "VOLUNTEER" LARGER TREES AND SHRUBS. GENERALLY REMOVALS SHALL BE AT THE DISCRETION OF THE CONTRACTOR WITH THE GOAL OF TRIMMING ALL EXISTING SHRUBS TO A MANAGEABLE SIZE AND SHAPE - APPROX. 4' HT. FOR MOST AREAS.	3.
< _ <	4.	CONTRACTOR SHALL REVIEW AND ASSESS ALL EXISTING LANDSCAPE EDGING. REPLACE DAMAGED OR BROKEN SECTION AS NEEDED. MATCH EXIST. MATERIALS IN-KIND.	4.
PID: 2511824220005 Address: 5489 Bryant Owner: Kevin & Ramo	5.	ONCE CLEANED OF DEAD PLANT MATERIAL, DEBRIS AND WEEDS, ALL EXISTING PLANTING BEDS SHALL BE RE-MULCHED WITH IN-KIND MULCH MATERIALS SO AS TO PROVIDE A MULCH LAYER OF APPROX. 3" TOTAL.	5.
	6.	ALL TREES THROUGHOUT THE SITE SHALL BE EXAMINED BY THE CONTRACTORS ARBORIST (OR EQUIV.) AND ASSESSED FOR STRUCTURAL INTEGRITY, HEALTH, AND SHAPE/AESTHETICS. CONTRACTOR SHALL TRIM TREES BASED ON THOSE CRITERIA.	
	7.	ALL TRIMMING SHALL CONFORM WITH THE AMERICAN ASSOCIATION OF NURSERYMEN STANDARDS AND INDUSTRY "BEST PRACTICES".	6.
LIMITS	8.	ALL AREAS DISTURBED BY CONSTRUCTION ACTIVITIES SHALL BE RETURNED TO PREVIOUS CONDITIONS OR CONDITIONS AS PRESCRIBED IN THESE DOCUMENTS AS COMPLETED UNLESS OTHERWISE NOTED ON THE DRAWINGS.	7
1028.83 1025.18 NW	9.	COORDINATE LOCATION OF VEGETATION WITH UNDERGROUND AND OVERHEAD UTILITIES, LIGHTING FIXTURES, DOORS AND WINDOWS. CONTRACTOR SHALL STAKE IN THE FIELD FINAL LOCATION OF TREES AND SHRUBS FOR REVIEW AND APPROVAL BY THE LANDSCAPE ARCHITECT PRIOR TO INSTALLATION.	7. 8.
1024.63 N	10.	ALL PLANT MATERIALS SHALL BE WATERED AND MAINTAINED UNTIL ACCEPTANCE.	9.
-	11.	REPAIR AT NO COST TO OWNER ALL DAMAGE RESULTING FROM LANDSCAPE CONTRACTOR'S ACTIVITIES.	10.
L	12.	SWEEP AND MAINTAIN ALL PAVED SURFACES FREE OF DEBRIS GENERATED FROM LANDSCAPE CONTRACTOR'S ACTIVITIES.	11.
	13.	CONTRACTOR SHALL INSPECT AND ASSESS THE EXISTING SITE IRRIGATION SYSTEM DESIGN AND INSTALLATION. THE SYSTEM SHOULD BE FULL OPERATIONAL AND NOT LEAKING. IT SHOULD BE FULLY PROGRAMMABLE AND CAPABLE OF ALL TERMATE DATE WATERING, PROVIDE HEAD TO HEAD OP DRIP COVERACE AND RE CAPABLE OF CAPABLE OF ALL TERMATE DATE WATERING.	12.
D: 2511824220081 ddress: 1519 Prairielan		PRECIPITATION PER WEEK. SYSTEM SHOULD EXTEND INTO THE PUBLIC RIGHT-OF-WAY TO THE EDGE OF PAVEMENT/BACK OF CURB. IF THE SYSTEM DOES NOT MEET THESE GENERAL CRITERIA, OR THE RECOMMENDATIONS AS SPECIFIED IN THE "IRRIGATION NOTES & RECOMMENDATIONS", CONTRACTOR SHALL PROPOSE SPECIFIC REPAIRS OR RENOVATIONS TO	13. 14.
wner: Michelle & Rober	14.	UPDATE THE SYSTEM - INCLUDE AN ALTERNATE BID FOR THAT WORK. CONTRACTOR SHALL SECURE APPROVAL OF PROPOSED IRRIGATION SYSTEM INCLUDING PRICING FROM OWNER, PRIOR TO	15
	~ -	REPAIRS, RENOVATION, OR INSTALLATION.	15.
	GE	NERAL PRUNING GUIDELINES & NOTES:	17.
/ood Fence	1.	REVIEW AS GENERAL GUIDELINES & PRACTICES. ALL TRIMMING SHALL CONFORM WITH THE AMERICAN ASSOCIATION OF NURSERYMEN STANDARDS AND INDUSTRY "BEST PRACTICES".	18.
	C	TREES	19.
	2. 2.	I REMOVE LIMBS THAT EXTEND BEYOND THE NATURAL CROWN OF THE TREE	
	2.2	2. REMOVE DEAD, BROKEN OR CROSSING LIMBS	
PID: 25118242200	2.3	 REMOVE LIMBS THAT TURN INWARD TOWARDS THE TRUNK, UNLESS THIS IS A CHARACTERISTIC OF THE PARTICULAR SPECIES 	20.
Address: 1509 Prai Owner: Kevin & Ba	2.4	1. TRIM BRANCH STUBS AS CLOSE TO THE TRUNK, OR NEXT MAJOR LIMB AS POSSIBLE	21
	2.5	5. REMOVE ALL ROOT SUCKERS AND SPROUTS SHOPTEN LOW REANCHES TO DEVELOP TRUNK THICKNESS	22
	2.0	7. REMOVE COMPETING STEMS TO DEVELOP A SINGLE TRUNK	22.
	2.8	3. REMOVE GIRDLING ROOTS ON YOUNG TREES ONLY	20.
TNH= 1034.04	2.9). REMOVE "WATER SPOUT" LIMBS 10 EXAMINE STRUCTURE OF THE TREE AND REMOVE RRANCHING WHICH CREATES A NARROW ANGLE	24.
	۷.	BETWEEN THE LIMB AND THE TRUNK.	25.
	2.1	1. REMOVE LIMBS THAT GROW PARALLEL TO AND TOO CLOSE TO ADJACENT LIMBS	
3.2±	3.	SHRUBS - CANE & WOODY:	26.
	3.1	REMOVE ALL DEAD CANES/STEMS	
JPT0:J125714824220083	3.2	REMOVE APPROX. $\frac{1}{3}$ OF CANES OR STEMS AT THE GROUND - STARTING WITH THE OLDEST IF	
Owner: Craig Kvern 8	3.3	3. THIN BRANCHES THROUGHOUT THE CROWN.	
	3.4	I. REMOVE TANGLED LIMBS	
Wood Fence	3.5	5. "HEAD BACK" THE CROWN OF THE PLANT TO APPROX. ² / ₃ THE CURRENT HEIGHT OF THE	
	3.6	 FORM CROWN AND OVERALL SHAPE OF SHRUB TO MATCH GENERAL PARAMETERS OF THE PARTICULAR SPECIES. 	
	4.	SHRUBS - EVERGREEN:	
	4.1	I. REMOVE ALL DEAD OR DAMAGED LIMBS	
	4.2	2. REMOVE ALL LIMBS THAT EXTEND BEYOND THE NATURAL SHAPE OF THE PLANT.	
	4.3	3. REMOVE TANGLED LIMBS	
PID: 25118242200	4.4	M. II WOLTIFLE STEWS ARE FRESENTAT THE GROUND (DEFENDS ON SPECIES) REMOVE APPROX. /3 UP	

- 4.4. IF MULTIPLE STEMS ARE PRESENT AT THE GROUND (DEPENDS ON SPECIES) REMOVE APPROX. $\frac{1}{3}$ OF
- THE OLD STEMS. 4.5. TRIM THE CROWN EVENLY FROM THE TOP DOWNWARD, CREATING A NATURALLY ROUNDED FORM -DO NOT "SQUARE OFF" OR CUT FLAT SIDES.

Found 1/2 Inch Open Iron Pipe

Address: 1485 Pra Owner: Michele S I

> PID: 251182 Address: 14 Owner: D &

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ND: 2511824220012

dress: 1459 Prairiela ner: Nancee Louise 🛛

Found 1/2 Inch Open Iron Pipe

RIGATION NOTES & RECOMMENDATIONS:

ENTIRE SITE SHALL BE FULLY IRRIGATED. THE CONTRACTOR SHALL SUBMIT IRRIGATION SHOP DRAWINGS FOR REVIEW AND APPROVAL BY THE LANDSCAPE ARCHITECT PRIOR TO INSTALLATION. PROVIDE SITE WIDE IRRIGATION SYSTEM DESIGN AND INSTALLATION. SYSTEM SHALL BE FULLY PROGRAMMABLE AND CAPABLE OF ALTERNATE DATE WATERING. THE SYSTEM SHALL PROVIDE HEAD TO HEAD OR DRIP COVERAGE AND BE CAPABLE OF DELIVERING ONE INCH OF PRECIPITATION PER WEEK. SYSTEM SHALL EXTEND INTO THE PUBLIC RIGHT-OF-WAY TO THE EDGE OF PAVEMENT/BACK OF CURB.

Section 4. Item B

612-615-00

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GROUP

Civil Engineering ° Surveying ° Landscape

Architecture

5000 Glenwood Avenue

MMART

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I HEREBY CERTIFY THAT THIS PLAN, SPECIFICATION, OR REPORT WAS

PREPARED BY ME OR UNDER MY DIREC

SUPERVISION AND THAT I AM A DULY LICENSED LANDSCAPE ARCHITECT UNDER

THE LAWS OF THE STATE OF MINNESOTA

Golden Valley, MN 55422

CONTRACTOR SHALL SECURE APPROVAL OF PROPOSED IRRIGATION SYSTEM INLCUDING PRICING FROM OWNER, PRIOR TO INSTALLATION.

SEE MECHANICAL AND ELECTRICAL PLANS AND SPECIFICATIONS FOR IRRIGATION WATER, METER, AND POWER CONNECTIONS.

CONTRACTOR TO VERIFY LOCATION OF ALL UNDERGROUND/ABOVE GROUND FACILITIES PRIOR TO ANY EXCAVATION/INSTALLATION. ANY DAMAGE TO UNDERGROUND/ABOVE GROUND FACILITIES SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR AND COSTS ASSOCIATED WITH CORRECTING DAMAGES SHALL BE BORNE ENTIRELY BY THE CONTRACTOR.

SERVICE EQUIPMENT AND INSTALLATION SHALL BE PER LOCAL UTILITY COMPANY STANDARDS AND SHALL BE PER NATIONAL AND LOCAL CODES. EXACT LOCATION OF SERVICE EQUIPMENT SHALL BE COORDINATED WITH THE LANDSCAPE ARCHITECT OR EQUIVALENT AT THE JOB SITE.

CONTRACTOR SHALL COORDINATE WITH LOCAL UTILITY COMPANY FOR THE PROPOSED ELECTRICAL SERVICE AND METERING FACILITIES.

IRRIGATION WATER LINE CONNECTION SIZE IS 1-1/2" AT BUILDING. VERIFY WITH MECHANICAL PLANS. ALL MAIN LINES SHALL BE 18" BELOW FINISHED GRADE.

ALL LATERAL LINES SHALL BE 12" BELLOW FINISHED GRADE.

ALL EXPOSED PVC RISERS, IF ANY, SHALL BE GRAY IN COLOR.

CONTRACTOR SHALL LAY ALL SLEEVES AND CONDUIT AT 2'-0" BELOW THE FINISHED GRADE OF THE TOP OF PAVEMENT. EXTEND SLEEVES TO 2'-0" BEYOND PAVEMENT.

CONTRACTOR SHALL MARK THE LOCATION OF ALL SLEEVES AND CONDUIT WITH THE SLEEVING MATERIAL "ELLED" TO 2'-0" ABOVE FINISHED GRADE AND CAPPED.

FABRICATE ALL PIPE TO MANUFACTURE'S SPECIFICATIONS WITH CLEAN AND SQUARE CUT JOINTS. USE QUALITY GRADE PRIMER AND SOLVENT CEMENT FORMULATED FOR INTENDED TYPE OF CONNECTION.

BACKFILL ALL TRENCHES WITH SOIL FREE OF SHARP OBJECTS AND DEBRIS.

ALL VALVE BOXES AND COVERS SHALL BE BLACK IN COLOR.

GROUP VALVE BOXES TOGETHER FOR EASE WHEN SERVICE IS REQUIRED. LOCATE IN PLANT BED AREAS WHENEVER POSSIBLE.

IRRIGATION CONTROLLER LOCATION SHALL BE VERIFIED ON-SITE WITH OWNER'S REPRESENTATIVE.

CONTROL WIRES: 14 GAUGE DIRECT BURIAL, SOLID COPPER IRRIGATION WIRE. RUN UNDER MAIN LINE. USE MOISTURE-PROOF SPLICES AND SPLICE ONLY AT VALVES OR PULL BOXES. RUN SEPARATE HOT AND COMMON WIRE TO EACH VALVE AND ONE (1) SPARE WIRE AND GROUND TO FURTHEST VALVE FROM CONTROLLER. LABEL OR COLOR CODE ALL WIRES.

AVOID OVER SPRAY ON BUILDINGS, PAVEMENT, WALLS AND ROADWAYS BY INDIVIDUALLY ADJUSTING RADIUS OR ARC ON SPRINKLER HEADS AND FLOW CONTROL ON AUTOMATIC VALVE.

ADJUST PRESSURE REGULATING VALVES FOR OPTIMUM PRESSURE ON SITE.

USE SCREENS ON ALL HEADS.

A SET OF AS-BUILT DRAWINGS SHALL BE MAINTAINED ON-SITE AT ALL TIMES IN AN UPDATED CONDITION.

ALL PIPE 3" AND OVER SHALL HAVE THRUST BLOCKING AT EACH TURN.

ALL AUTOMATIC REMOTE CONTROL VALVES WILL HAVE 3" MINIMUM DEPTH OF 3/4" WASHED GRAVEL UNDERNEATH VALVE AND VALVE BOX. GRAVEL SHALL EXTENT 3" BEYOND PERIMETER OF VALVE BOX. THERE SHALL BE 3" MINIMUM SPACE BETWEEN BOTTOM OF VALVE BOX COVER AND TOP OF VALVE STRUCTURE.

EGEND
EGEND CLEAN PLANTING BED, REMOVE ALL WEEDS & VOLUNTARY VEGETATION, PROTECT EXIST. PERENNIALS, RE-MULCH, IN-KIND - APPROX. 9,303 SF REMOVE WEEDS AND DEBRIS ALONG BUILDING FOUNDATION, RE-MULCH IN-KIND - APPROX. 9,303 SF REMOVE WEEDS AND DEBRIS ALONG BUILDING FOUNDATION, RE-MULCH IN-KIND - APPROX. 9,303 SF REMOVE ALL WEEDS & VOLUNTARY VEGETATION, PROTECT EXIST. PERENNIALS, RE-MULCH, IN-KIND - APPROX. 9,303 SF REMOVE WEEDS AND DEBRIS ALONG BUILDING FOUNDATION, RE-MULCH IN-KIND - APPROX. 9,303 SF REMOVE ALL WEEDS & VOLUNTARY VEGETATION, REMOVE ALL DEBRIS AND RE-ESTABLISH LAWN IN ALL AREAS AROUND TRASH ENCLOSURE AND ACCESSORY BUILDINGS. TRIM EXISTING TREES AND SHRUBS - APPROX 2,240 SF LAWN - SOD
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. + . + . + . LAWN - SEED
CEDAR WOOD MULCH, SAMPLES REQUIRED
EDGING - SHALL BE COMMERCIAL GRADE, 4" DEPTH ALUMINUM,
BLACK OR DARK GREEN IN COLOR, INCLUDE ALL CONNECTORS,
INSTRUC./SPECS.
Know what's DEIOW. $1^{"} = 30^{\circ}-0^{"}$

	CODE	COMMON / BOTANICAL NAME	QTY	CONT	NATIVE PLANTS	POLLINATOR FRIENDLY		
16	ENTAL TR	REE						
	AL2	Spring Flurry Serviceberry / Amelanchier x laevis 'JFS-Arb'	1	2" CAL. B&B	NATIVE CULTIVAR	Y		
	CODE	COMMON / BOTANICAL NAME	QTY	SIZE	NATIVE PLANTS	POLLINATOR FRIENDLY		
;								
	PN3	Northwind Switch Grass / Panicum virgatum `North Wind`	18	#1 CONT	NATIVE CULTIVAR	Y		
					-			
	SCHE	EDULE						
	COMMON / BOTANICAL NAME QTY SIZE							
COVERS								
SHREDDED CEDAR MULCH 3" DEEP / SHREDDED CEDAR MULCH DOUBLE SHREDDED CEDAR MULCH INSTALLED 4" DEEP ON GRADED, WEED FREE, & PREPARED SOIL. PROVIDE EDGING AS BEQ. ON LANDSCAPE PLAN								
	Blue Grass Commerci Kentucky I	s Based / Sod ial grade, locally grown, well rooted sod blend of improved Bluegrass w/ uniform color, leaf texture, density and varieties	2,791	sf Sod				

7,895 sf Seed Mix

consisting of a minimum of two and no more than four common cultivars.

SUNNY LAWN MIX, SHOOTING STAR NATIVE SEED OR EQUIV.,

60% Improved Kentucky Bluegrass, 25% Fine-leaf Perennial Ryegrass, 15% Creeping Red Fescue. Installed at +/-225#/ACRE.

SUNNY LAWN MIX / TURF SEED

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(PRV A	HART -	SCHON
	COMFORT HAVEN	MAPLE PLAIN, MN	COMFORT HAVEN LLC 4207 QUAKER TRAIL NE, PRIOR LAKE, MN 55372
PROJECT			OWNER
	I HEREBY (SPECIFIC/ PREPARED B' SUPERVISIO ICENSED LAN THE LAWS OF ATE 02/14/2 ISSUE/SU DATE 02/14/2 ISSUE/SU	CERTIFY THA ATION, OR RE Y ME OR UND DN AND THAT IDSCAPE ARC THE STATE O Robert L. Bind 25LICENSI JBMITTAL S DESC TY SUBMITTAL	T THIS PLAN, EPORT WAS DER MY DIRECT TI AM A DULY CHITECT UNDER DF MINNESOTA.
PRO CON DRA REVI PRO	JECT MANAGER DA TACT NUMBER 61 TACT NUMBER 61 JECT NUMBER 23 REVI DATE	AVID KNAEBLE 2-615-0060 4 443.01 SION SUM DESC	MARY
		LAN	NDSCAPE DETAILS
	00 CC	DPYRIGHT 2023 C	1.4

SEE SHEET L1.0 FOR LANDSCAPE NOTES & LEGEND

SWPPP NOTES:

- 1. ALL EXISTING UTILITY LOCATIONS SHOWN ARE APPROXIMATE. CONTACT "GOPHER STATE ONE CALL" (651-454-0002 OR 800-252-1166) FOR UTILITY LOCATIONS, 48 HOURS PRIOR TO CONSTRUCTION. THE CONTRACTOR SHALL REPAIR OR REPLACE ANY UTILITIES THAT ARE DAMAGED DURING CONSTRUCTION AT NO COST TO THE OWNER.
- THIS PROJECT IS LESS THAN ONE ACRE AND WILL NOT REQUIRE AN MPCA NPDES PERMIT. CONTRACTOR IS RESPONSIBLE FOR OBTAINING ANY EROSION CONTROL PERMITS REQUIRED BY THE CITY.
- 3. SEE SHEETS SW1.0 SW1.3 FOR ALL EROSION CONTROL NOTES, DESCRIPTIONS, AND PRACTICES.
- SEE GRADING PLAN FOR ADDITIONAL GRADING AND EROSION CONTROL NOTES.
- CONTRACTOR IS RESPONSIBLE FOR SWPPP IMPLEMENTATION, INSPECTIONS, AND COMPLIANCE WITH NPDES PERMIT.

ALL SPECIFIED EROSION AND SEDIMENT CONTROL PRACTICES, AND MEASURES CONTAINED IN THIS SWPPP ARE THE MINIMUM REQUIREMENTS. ADDITIONAL PRACTICES MAY BE REQUIRED DURING THE COURSE OF CONSTRUCTION.

CITY OF MAPLE PLAIN EROSION CONTROL NOTES:

1. PERIMETER EROSION CONTROL MUST BE INSTALLED BY THE CONTRACTOR AND INSPECTED BY THE CITY PRIOR TO ANY OTHER WORK. THE CONTRACTOR MUST PROVIDE A MINIMUM 24- HOUR NOTICE PRIOR TO INSPECTION.

	Section 4, Item B. Civil Engineering ° Surveying ° Landscape Architecture S000 Glenwood Avenue Golden Valley, MN 55422 civilsitegroup.com 612-615-0060	
	PRELIMINARY. CION PRELIMINARY CION PRESIDENTION	
	COMFORT HAVEN MAPLE PLAIN, MN	COMFORT HAVEN LLC 4207 QUAKER TRAIL NE, PRIOR LAKE, MN 55372
	L O W O C O C C C C C C C C C C C C C C C	HAT THIS PLAN, REPORT WAS INDER MY DIRECT IAT I AM A DULY DNAL ENGINEER
	UNDER THE LAWS OF MINNESC Janual J / David J. Kn Date 02/14/25 LICE ISSUE/SUBMITTA	THE STATE OF DTA. weble naeble NSE NO. 48776 L SUMMARY
	DATE DE 02/14/25 CITY SUBMITTA	
EX. 1' CONTOUR ELEVATION INTERVAL DRAINAGE ARROW	PROJECT MANAGER DAVID KNAEBLE CONTACT NUMBER 612-615-0060 DRAWN BY ZH REVIEWED BY DK PROJECT NUMBER 23443.01 REVISION SU	IMMARY
SILT FENCE / BIOROLL - GRADING LIMIT	DATE DE	SCRIPTION
STABILIZED CONSTRUCTION ENTRANCE		
111 	SWPPP	- EXISTING ONDITIONS
The fore you dig. $1" = 30'-0"$		DNDITIONS

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LEGEND:

----- 1125 -----

SILT FENCE / BIOROLL - GRADING

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INLET PROTECTION

STABILIZED CONSTRUCTION ENTI

Know what's below. 1" = 30'-0" Call before you dig.

SWPPP NOTES:

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		<text></text>	
		COMFORT HAVEN MAPLE PLAIN, MN	COMFORT HAVEN LLC 4207 QUAKER TRAIL NE, PRIOR LAKE, MN 55372
		I HEREBY CERTIFY SPECIFICATION, C PREPARED BY ME OR SUPERVISION AND LICENSED PROFESS UNDER THE LAWS C MINNES Janil J David J. K DATE 02/14/25 LIC ISSUE/SUBMITT DATE D 02/14/25 CITY SUBMIT	THAT THIS PLAN, R REPORT WAS UNDER MY DIRECT THAT I AM A DULY SIONAL ENGINEER DF THE STATE OF SOTA.
LEGEND: 1125 	EX. 1' CONTOUR ELEVATION INTERVAL 1.0' CONTOUR ELEVATION INTERVAL DRAINAGE ARROW SILT FENCE / BIOROLL - GRADING LIMIT INLET PROTECTION	PROJECT MANAGER DAVID KNAEBLE CONTACT NUMBER 612-615-0060 DRAWN BY ZH REVIEWED BY DK PROJECT NUMBER 23443.01 REVISION S DATE E	UMMARY
Know wha	STABILIZED CONSTRUCTION ENTRANCE EROSION CONTROL BLANKET The below. before you dig. 1" = 20'-0"	SWPPP - C SSWPPP - C C C C C C C C C C C C C C C C C C C	PROPOSED ONDITIONS

LEGEND:

SILT FENCE / BIOROLL - GRAD ▝▖▖▖▌

NOTES:

DIRECTED BY THE ENGINEER.

5 SEDIMENT BIO-ROLL / COMPOST FILTER LOG

EXISTING - 4" HIGH, 18" - UNDISTURBED ROADWAY

1. PROVIDE APPROPRIATE TRANSITION BETWEEN STABILIZED CONSTRUCTION ENTRANCE AND UNDISTURBED ROADWAY. 2. THE ENTRANCE SHALL BE MAINTAINED IN A CONDITION WHICH WILL PREVENT TRACKING OR FLOWING OF SEDIMENT ONTO UNDISTURBED ROADWAY. THIS MAY REQUIRE PERIODIC TOP DRESSING WITH ADDITIONAL STONE OR ADDING STONE TO THE LENGTH OF THE ENTRANCE. 3. REPAIR AND CLEANOUT MEASURES USED TO TRAP SEDIMENT.

4. ALL SEDIMENT SPILLED, DROPPED, WASHED, OR TRACKED ONTO UNDISTURBED ROADWAY SHALL BE REMOVED AS 5. FINAL LOCATION AND INSTALLATION SHALL BE COORDINATED WITH THE CITY PRIOR TO CONSTRUCTION ACTIVITIES.

4 STABILIZED CONSTRUCTION ACCESS

6. CRUSHED STONE SHALL BE 1-1/2" DIA. CLOSE GRADED, AND IN ACCORDANCE TO MNDOT SECTION 2118.

	Section 4, Item B.
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G R O Civil Engineering ° Surveyir	U P ng ° Landscape
Architecture	
Golden Valley, MN	55422
civilsitegroup.com	612-615-0060
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Jamid J Km	seble
David J. Knae DATE <u>02/14/25</u> LICENS	epie E NO <u>. 48776</u>
ISSUE/SUBMITTAL	SUMMARY
DATE DESC 02/14/25 CITY SUBMITTAL	CRIPTION
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THE CONTRACTOR AND ALL SUBCONTRACTORS INVOLVED WITH A CONSTRUCTION ACTIVITY THAT DISTURBS SITE SOIL OR WHO IMPLEMENT A POLLUTANT CONTROL MEASURE IDENTIFIED IN THE STORM WATER POLLUTION PREVENTION PLAN (SWPPP) MUST COMPLY WITH THE REQUIREMENTS OF THE NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM (NPDES) GENERAL PERMIT (DATED AUGUST 1, 2018 # MNR100001) AND ANY LOCAL GOVERNING AGENCY HAVING JURISDICTION CONCERNING EROSION AND SEDIMENTATION CONTROL

STORMWATER DISCHARGE DESIGN REQUIREMENTS

SWPPP

THE NATURE OF THIS PROJECT WILL BE CONSISTENT WITH WHAT IS REPRESENTED IN THIS SET OF CONSTRUCTION PLANS AND SPECIFICATIONS. SEE THE SWPPP PLAN SHEETS AND SWPPP NARRATIVE (ATTACHMENT A: CONSTRUCTION SWPPP TEMPLATE) FOR ADDITIONAL SITE SPECIFIC SWPPP INFORMATION. THE PLANS SHOW LOCATIONS AND TYPES OF ALL TEMPORARY AND PERMANENT EROSION PREVENTION AND SEDIMENT CONTROL BMP'S. STANDARD DETAILS ARE ATTACHED TO THIS SWPPP DOCUMENT.

- THE INTENDED SEQUENCING OF MAJOR CONSTRUCTION ACTIVITIES IS AS FOLLOWS:
- 1. INSTALL STABILIZED ROCK CONSTRUCTION ENTRANCE 2. INSTALLATION OF SILT FENCE AROUND SITE
- 3. INSTALL ORANGE CONSTRUCTION FENCING AROUND INFILTRATION AREAS
- 4. INSTALL INLET PROTECTION AT ALL ADJACENT AND DOWNSTREAM CATCH BASINS 5. CLEAR AND GRUB FOR TEMPORARY SEDIMENT BASIN / POND INSTALL
- 6. CONSTRUCT TEMPORARY SEDIMENT BASIN / POND (SECTION 14)
- 7. CLEAR AND GRUB REMAINDER OF SITE 8. STRIP AND STOCKPILE TOPSOIL
- 9. ROUGH GRADING OF SITE 10. STABILIZE DENUDED AREAS AND STOCKPILES
- 11. INSTALL SANITARY SEWER, WATER MAIN STORM SEWER AND SERVICES
- 12. INSTALL SILT FENCE / INLET PROTECTION AROUND CB'S 13. INSTALL STREET SECTION
- 14. INSTALL CURB AND GUTTER
- 15. BITUMINOUS ON STREETS
- 16. FINAL GRADE BOULEVARD, INSTALL SEED AND MULCH 17. REMOVE ACCUMULATED SEDIMENT FROM BASIN / POND
- 18. FINAL GRADE POND / INFILTRATION BASINS (DO NOT COMPACT SOILS IN INFILTRATION AREAS.) 19. WHEN ALL CONSTRUCTION ACTIVITY IS COMPLETE AND THE SITE IS STABILIZED BY EITHER SEED OR SOD/LANDSCAPING. REMOVE SILT FENCE AND RESEED ANY AREAS DISTURBED BY THE REMOVAL.

RECORDS RETENTION:

THE SWPPP (ORIGINAL OR COPIES) INCLUDING, ALL CHANGES TO IT, AND INSPECTIONS AND MAINTENANCE RECORDS MUST BE KEPT AT THE SITE DURING CONSTRUCTION BY THE PERMITTEE WHO HAS OPERATIONAL CONTROL OF THAT PORTION OF THE SITE. THE SWPPP CAN BE KEPT IN EITHER THE FIELD OFFICE OR IN AN ON SITE VEHICLE DURING NORMAL WORKING HOURS.

ALL OWNER(S) MUST KEEP THE SWPPP, ALONG WITH THE FOLLOWING ADDITIONAL RECORDS, ON FILE FOR THREE (3) YEARS AFTER SUBMITTAL OF THE NOT AS OUTLINED IN SECTION 4. THIS DOES NOT INCLUDE ANY RECORDS AFTER SUBMITTAL OF THE NOT.

- 1. THE FINAL SWPPF
- 2. ANY OTHER STORMWATER RELATED PERMITS REQUIRED FOR THE PROJECT: 3. RECORDS OF ALL INSPECTION AND MAINTENANCE CONDUCTED DURING CONSTRUCTION (SEE SECTION 11,
- INSPECTIONS AND MAINTENANCE) 4. ALL PERMANENT OPERATION AND MAINTENANCE AGREEMENTS THAT HAVE BEEN IMPLEMENTED, INCLUDING ALL RIGHT OF WAY, CONTRACTS, COVENANTS AND OTHER BINDING REQUIREMENTS REGARDING PERPETUAL
- MAINTENANCE; AND 5. ALL REQUIRED CALCULATIONS FOR DESIGN OF THE TEMPORARY AND PERMANENT STORMWATER MANAGEMENT SYSTEMS.

SWPPP IMPLEMENTATION RESPONSIBILITIES:

- 1. THE OWNER AND CONTRACTOR ARE PERMITTEE(S) AS IDENTIFIED BY THE NPDES PERMIT.
- 2. CONTRACTOR SHALL BE RESPONSIBLE FOR ALL ON-SITE IMPLEMENTATION OF THE SWPPP, INCLUDING THE ACTIVITIES OF ALL OF THE CONTRACTOR'S SUBCONTRACTORS.
- 3. CONTRACTOR SHALL PROVIDE A PERSON(S) KNOWLEDGEABLE AND EXPERIENCED IN THE APPLICATION OF EROSION PREVENTION AND SEDIMENT CONTROL BMPS TO OVERSEE ALL INSTALLATION AND MAINTENANCE OF BMPS AND IMPLEMENTATION OF THE SWPPP
- 4. CONTRACTOR SHALL PROVIDE PERSON(S) MEETING THE TRAINING REQUIREMENTS OF THE NPDES PERMIT TO CONDUCT INSPECTION AND MAINTENANCE OF ALL EROSION PREVENTION AND SEDIMENT CONTROL BMPS IN ACCORDANCE WITH THE REQUIREMENTS OF THE PERMIT. ONE OF THESE INDIVIDUAL(S) MUST BE AVAILABLE FOR AN ONSITE INSPECTION WITHIN 72 HOURS UPON REQUEST BY MPCA. CONTRACTOR SHALL PROVIDE TRAINING DOCUMENTATION FOR THESE INDIVIDUAL(S) AS REQUIRED BY THE NPDES PERMIT. THIS TRAINING DOCUMENTATION SHALL BE RECORDED IN OR WITH THE SWPPP BEFORE THE START OF CONSTRUCTION OR AS SOON AS THE PERSONNEL FOR THE PROJECT HAVE BEEN DETERMINED. DOCUMENTATION SHALL INCLUDE: 4.1. NAMES OF THE PERSONNEL ASSOCIATED WITH THE PROJECT THAT ARE REQUIRED TO BE TRAINED PER
- SECTION 21 OF THE PERMIT. 4.2. DATES OF TRAINING AND NAME OF INSTRUCTOR AND ENTITY PROVIDING TRAINING. 4.3. CONTENT OF TRAINING COURSE OR WORKSHOP INCLUDING THE NUMBER OF HOURS OF TRAINING.
- 5. FOLLOWING FINAL STABILIZATION AND THE TERMINATION OF COVERAGE FOR THE NPDES PERMIT. THE OWNER IS EXPECTED TO FURNISH LONG TERM OPERATION AND MAINTENANCE (O & M) OF THE PERMANENT STORM WATER MANAGEMENT SYSTEM.

CONSTRUCTION ACTIVITY REQUIREMENTS

SWPPP AMENDMENTS (SECTION 6):

- 1. ONE OF THE INDIVIDUALS DESCRIBED IN ITEM 21.2.A OR ITEM 21.2.B OR ANOTHER QUALIFIED INDIVIDUAL MUST COMPLETE ALL SWPPP CHANGES. CHANGES INVOLVING THE USE OF A LESS STRINGENT BMP MUST INCLUDE A
- JUSTIFICATION DESCRIBING HOW THE REPLACEMENT BMP IS EFFECTIVE FOR THE SITE CHARACTERISTICS. 2. PERMITTEES MUST AMEND THE SWPPP TO INCLUDE ADDITIONAL OR MODIFIED BMPS AS NECESSARY TO CORRECT PROBLEMS IDENTIFIED OR ADDRESS SITUATIONS WHENEVER THERE IS A CHANGE IN DESIGN,
- CONSTRUCTION, OPERATION, MAINTENANCE, WEATHER OR SEASONAL CONDITIONS HAVING A SIGNIFICANT EFFECT ON THE DISCHARGE OF POLLUTANTS TO SURFACE WATERS OR GROUNDWATER. 3. PERMITTEES MUST AMEND THE SWPPP TO INCLUDE ADDITIONAL OR MODIFIED BMPS AS NECESSARY TO CORRECT PROBLEMS IDENTIFIED OR ADDRESS SITUATIONS WHENEVER INSPECTIONS OR INVESTIGATIONS BY
- THE SITE OWNER OR OPERATOR, USEPA OR MPCA OFFICIALS INDICATE THE SWPPP IS NOT EFFECTIVE IN ELIMINATING OR SIGNIFICANTLY MINIMIZING THE DISCHARGE OF POLLUTANTS TO SURFACE WATERS OR GROUNDWATER OR THE DISCHARGES ARE CAUSING WATER QUALITY STANDARD EXCEEDANCES (E.G., NUISANCE CONDITIONS AS DEFINED IN MINN. R. 7050.0210, SUBP. 2) OR THE SWPPP IS NOT CONSISTENT WITH THE OBJECTIVES OF A USEPA APPROVED TMDL.

BMP SELECTION AND INSTALLATION (SECTION 7):

1. PERMITTEES MUST SELECT, INSTALL, AND MAINTAIN THE BMPS IDENTIFIED IN THE SWPPP AND IN THIS PERMIT IN AN APPROPRIATE AND FUNCTIONAL MANNER AND IN ACCORDANCE WITH RELEVANT MANUFACTURER SPECIFICATIONS AND ACCEPTED ENGINEERING PRACTICES.

EROSION PREVENTION (SECTION 8):

- 1. BEFORE WORK BEGINS, PERMITTEES MUST DELINEATE THE LOCATION OF AREAS NOT TO BE DISTURBED. 2. PERMITTEES MUST MINIMIZE THE NEED FOR DISTURBANCE OF PORTIONS OF THE PROJECT WITH STEEP SLOPES. WHEN STEEP SLOPES MUST BE DISTURBED, PERMITTEES MUST USE TECHNIQUES SUCH AS PHASING
- AND STABILIZATION PRACTICES DESIGNED FOR STEEP SLOPES (E.G., SLOPE DRAINING AND TERRACING). 3. PERMITTEES MUST STABILIZE ALL EXPOSED SOIL AREAS, INCLUDING STOCKPILES. STABILIZATION MUST BE INITIATED IMMEDIATELY TO LIMIT SOIL EROSION WHEN CONSTRUCTION ACTIVITY HAS PERMANENTLY OR TEMPORARILY CEASED ON ANY PORTION OF THE SITE AND WILL NOT RESUME FOR A PERIOD EXCEEDING 14 CALENDAR DAYS. STABILIZATION MUST BE COMPLETED NO LATER THAN 14 CALENDAR DAYS AFTER THE CONSTRUCTION ACTIVITY HAS CEASED. STABILIZATION IS NOT REQUIRED ON CONSTRUCTED BASE COMPONENTS OF ROADS, PARKING LOTS AND SIMILAR SURFACES. STABILIZATION IS NOT REQUIRED ON TEMPORARY STOCKPILES WITHOUT SIGNIFICANT SILT, CLAY OR ORGANIC COMPONENTS (E.G., CLEAN AGGREGATE STOCKPILES, DEMOLITION CONCRETE STOCKPILES, SAND STOCKPILES) BUT PERMITTEES MUST
- PROVIDE SEDIMENT CONTROLS AT THE BASE OF THE STOCKPILE. 4. FOR PUBLIC WATERS THAT THE MINNESOTA DNR HAS PROMULGATED "WORK IN WATER RESTRICTIONS" DURING SPECIFIED FISH SPAWNING TIME FRAMES, PERMITTEES MUST COMPLETE STABILIZATION OF ALL EXPOSED SOIL AREAS WITHIN 200 FEET OF THE WATER'S EDGE, AND THAT DRAIN TO THESE WATERS, WITHIN 24 HOURS
- DURING THE RESTRICTION PERIOD. 5. PERMITTEES MUST STABILIZE THE NORMAL WETTED PERIMETER OF THE LAST 200 LINEAR FEET OF TEMPORARY OR PERMANENT DRAINAGE DITCHES OR SWALES THAT DRAIN WATER FROM THE SITE WITHIN 24 HOURS AFTER CONNECTING TO A SURFACE WATER OR PROPERTY EDGE. PERMITTEES MUST COMPLETE STABILIZATION OF REMAINING PORTIONS OF TEMPORARY OR PERMANENT DITCHES OR SWALES WITHIN 14 CALENDAR DAYS AFTER CONNECTING TO A SURFACE WATER OR PROPERTY EDGE AND CONSTRUCTION IN
- THAT PORTION OF THE DITCH TEMPORARILY OR PERMANENTLY CEASES. 6. TEMPORARY OR PERMANENT DITCHES OR SWALES BEING USED AS A SEDIMENT CONTAINMENT SYSTEM DURING CONSTRUCTION (WITH PROPERLY DESIGNED ROCK-DITCH CHECKS, BIO ROLLS, SILT DIKES, ETC.) DO NOT NEED TO BE STABILIZED. PERMITTEES MUST STABILIZE THESE AREAS WITHIN 24 HOURS AFTER THEIR USE AS A SEDIMENT CONTAINMENT SYSTEM CEASES
- 7. PERMITTEES MUST NOT USE MULCH, HYDROMULCH, TACKIFIER, POLYACRYLAMIDE OR SIMILAR EROSION PREVENTION PRACTICES WITHIN ANY PORTION OF THE NORMAL WETTED PERIMETER OF A TEMPORARY OR
- PERMANENT DRAINAGE DITCH OR SWALE SECTION WITH A CONTINUOUS SLOPE OF GREATER THAN 2 PERCENT
- 8. PERMITTEES MUST PROVIDE TEMPORARY OR PERMANENT ENERGY DISSIPATION AT ALL PIPE OUTLETS WITHIN 24 HOURS AFTER CONNECTION TO A SURFACE WATER OR PERMANENT STORMWATER TREATMENT SYSTEM.

9. PERMITTEES MUST NOT DISTURB MORE LAND (I.E., PHASING) THAN CAN BE EFFECTIVELY INSPECTED AND MAINTAINED IN ACCORDANCE WITH SECTION 11.

SEDIMENT CONTROL (SECTION 9):

- ZONES. PERMITTEES MUST INSTALL SEDIMENT CONTROL PRACTICES BEFORE ANY UPGRADIENT LAND-DISTURBING ACTIVITIES BEGIN AND MUST KEEP THE SEDIMENT CONTROL PRACTICES IN PLACE UNTIL THEY ESTABLISH PERMANENT COVER.
- THESE ADDITIONAL PRACTICES AS REQUIRED IN ITEM 6.3.
- ONLY AS APPROPRIATE FOR SITE CONDITIONS. EXCEPT WHEN WORKING ON A SHORELINE OR BELOW THE WATERLINE. IMMEDIATELY AFTER THE SHORT TERM
- DRAIN TO A SURFACE WATER.
- 5. PERMITTEES MUST RE-INSTALL ALL SEDIMENT CONTROL PRACTICES ADJUSTED OR REMOVED TO COMPLETE.
- DOCUMENT THE NEED FOR REMOVAL IN THE SWPPP. 8. PERMITTEES MUST PROVIDE SILT FENCE OR OTHER EFFECTIVE SEDIMENT CONTROLS AT THE BASE OF STOCKPILES ON THE DOWNGRADIENT PERIMETER
- STORMWATER CONVEYANCES SUCH AS CURB AND GUTTER SYSTEMS UNLESS THERE IS A BYPASS IN PLACE FOR THE STORMWATER
- CONSTRUCTION SITE OR ONTO PAVED ROADS WITHIN THE SITE. SEDIMENT TRACKING ONTO THE STREET.
- 12. PERMITTEES MUST INSTALL TEMPORARY SEDIMENT BASINS AS REQUIRED IN SECTION 14. RESTRICT VEHICLE AND EQUIPMENT USE TO MINIMIZE SOIL COMPACTION.
- 14. PERMITTEES MUST PRESERVE TOPSOIL ON THE SITE, UNLESS INFEASIBLE. ALL STORMWATER.
- PRIOR TO DISCHARGE.

DEWATERING AND BASIN DRAINING (SECTION 10):

- 1. PERMITTEES MUST DISCHARGE TURBID OR SEDIMENT-LADEN WATERS RELATED TO DEWATERING OR BASIN DRAINING (E.G., PUMPED DISCHARGES, TRENCH/DITCH CUTS FOR DRAINAGE) TO A TEMPORARY OR PERMANENT SEDIMENT BASIN ON THE PROJECT SITE UNLESS INFEASIBLE. PERMITTEES MAY DEWATER TO SURFACE WATERS IF THEY VISUALLY CHECK TO ENSURE ADEQUATE TREATMENT HAS BEEN OBTAINED AND NUISANCE CONDITIONS (SEE MINN. R. 7050.0210, SUBP. 2) WILL NOT RESULT FROM THE DISCHARGE. IF PERMITTEES CANNOT DISCHARGE THE WATER TO A SEDIMENTATION BASIN PRIOR TO ENTERING A SURFACE WATER, PERMITTEES MUST TREAT IT WITH APPROPRIATE BMPS SUCH THAT THE DISCHARGE DOES NOT ADVERSELY AFFECT THE SURFACE WATER OR DOWNSTREAM PROPERTIES. 2. IF PERMITTEES MUST DISCHARGE WATER CONTAINING OIL OR GREASE, THEY MUST USE AN OIL-WATER
- DISCHARGE
- INUNDATION OF WETLANDS IN THE IMMEDIATE VICINITY OF DISCHARGE POINTS THAT CAUSES SIGNIFICANT ADVERSE IMPACT TO THE WETLAND.
- INCORPORATE THE BACKWASH WATER INTO THE SITE IN A MANNER THAT DOES NOT CAUSE EROSION.

INSPECTIONS AND MAINTENANCE (SECTION 11):

- HOURS AFTER A RAINFALL EVENT GREATER THAN 1/2 INCH IN 24 HOURS.
- AND CONVEYANCE SYSTEMS BUT NOT CURB AND GUTTER SYSTEMS, FOR EVIDENCE OF EROSION AND OBTAINING ACCESS. PERMITTEES ARE RESPONSIBLE FOR CONTACTING ALL LOCAL, REGIONAL, STATE AND
- SURFACE WATERS
- USERS OF PUBLIC STREETS. BECOME NONFUNCTIONAL OR THE SEDIMENT REACHES 1/2 OF THE HEIGHT OF THE DEVICE.
- 9. PERMITTEES MAY ADJUST THE INSPECTION SCHEDULE DESCRIBED IN ITEM 11.2 AS FOLLOWS:
- CONSTRUCTION ACTIVITY CONTINUES ON OTHER PORTIONS OF THE SITE; OR OCCURRING ANYWHERE ON THE SITE, INSPECTIONS CAN BE REDUCED TO ONCE PER MONTH AND, AFTER 12
- REQUIRE INSPECTIONS TO RESUME IF CONDITIONS WARRANT; OR INSPECTIONS MAY BE SUSPENDED. INSPECTIONS MUST RESUME WITHIN 24 HOURS OF RUNOFF OCCURRING, OR UPON RESUMING CONSTRUCTION, WHICHEVER COMES FIRST.
- CONDUCTED AND THESE RECORDS MUST BE RETAINED WITH THE SWPPP. THESE RECORDS MUST INCLUDE: a. DATE AND TIME OF INSPECTIONS; AND
- b. NAME OF PERSONS CONDUCTING INSPECTIONS; AND c. ACCURATE FINDINGS OF INSPECTIONS, INCLUDING THE SPECIFIC LOCATION WHERE CORRECTIVE ACTIONS
- ARE NEEDED; AND d. CORRECTIVE ACTIONS TAKEN (INCLUDING DATES, TIMES, AND PARTY COMPLETING MAINTENANCE
- ACTIVITIES); AND AND

1. PERMITTEES MUST ESTABLISH SEDIMENT CONTROL BMPS ON ALL DOWNGRADIENT PERIMETERS OF THE SITE AND DOWNGRADIENT AREAS OF THE SITE THAT DRAIN TO ANY SURFACE WATER, INCLUDING CURB AND GUTTER SYSTEMS. PERMITTEES MUST LOCATE SEDIMENT CONTROL PRACTICES UPGRADIENT OF ANY BUFFER

2. IF DOWNGRADIENT SEDIMENT CONTROLS ARE OVERLOADED, BASED ON FREQUENT FAILURE OR EXCESSIVE MAINTENANCE REQUIREMENTS, PERMITTEES MUST INSTALL ADDITIONAL UPGRADIENT SEDIMENT CONTROL PRACTICES OR REDUNDANT BMPS TO ELIMINATE THE OVERLOADING AND AMEND THE SWPPP TO IDENTIFY 3. TEMPORARY OR PERMANENT DRAINAGE DITCHES AND SEDIMENT BASINS DESIGNED AS PART OF A SEDIMENT

CONTAINMENT SYSTEM (E.G., DITCHES WITH ROCK-CHECK DAMS) REQUIRE SEDIMENT CONTROL PRACTICES 4. A FLOATING SILT CURTAIN PLACED IN THE WATER IS NOT A SEDIMENT CONTROL BMP TO SATISFY ITEM 9.2

CONSTRUCTION ACTIVITY (E.G., INSTALLATION OF RIP RAP ALONG THE SHORELINE) IN THAT AREA IS COMPLETE, PERMITTEES MUST INSTALL AN UPLAND PERIMETER CONTROL PRACTICE IF EXPOSED SOILS STILL

ACCOMMODATE SHORT-TERM ACTIVITIES SUCH AS CLEARING OR GRUBBING, OR PASSAGE OF VEHICLES, IMMEDIATELY AFTER THE SHORT-TERM ACTIVITY IS COMPLETED. PERMITTEES MUST RE-INSTALL SEDIMENT CONTROL PRACTICES BEFORE THE NEXT PRECIPITATION EVENT EVEN IF THE SHORT-TERM ACTIVITY IS NOT

6. PERMITTEES MUST PROTECT ALL STORM DRAIN INLETS USING APPROPRIATE BMPS DURING CONSTRUCTION UNTIL THEY ESTABLISH PERMANENT COVER ON ALL AREAS WITH POTENTIAL FOR DISCHARGING TO THE INLET. 7. PERMITTEES MAY REMOVE INLET PROTECTION FOR A PARTICULAR INLET IF A SPECIFIC SAFETY CONCERN (E.G. STREET FLOODING/FREEZING) IS IDENTIFIED BY THE PERMITTEES OR THE JURISDICTIONAL AUTHORITY (E.G. CITY/COUNTY/TOWNSHIP/MINNESOTA DEPARTMENT OF TRANSPORTATION ENGINEER). PERMITTEES MUST

9. PERMITTEES MUST LOCATE STOCKPILES OUTSIDE OF NATURAL BUFFERS OR SURFACE WATERS, INCLUDING

10. PERMITTEES MUST INSTALL A VEHICLE TRACKING BMP TO MINIMIZE THE TRACK OUT OF SEDIMENT FROM THE

11. PERMITTEES MUST USE STREET SWEEPING IF VEHICLE TRACKING BMPS ARE NOT ADEQUATE TO PREVENT

13. IN ANY AREAS OF THE SITE WHERE FINAL VEGETATIVE STABILIZATION WILL OCCUR, PERMITTEES MUST

15. PERMITTEES MUST DIRECT DISCHARGES FROM BMPS TO VEGETATED AREAS UNLESS INFEASIBLE 16. PERMITTEES MUST PRESERVE A 50 FOOT NATURAL BUFFER OR, IF A BUFFER IS INFEASIBLE ON THE SITE PROVIDE REDUNDANT (DOUBLE) PERIMETER SEDIMENT CONTROLS WHEN A SURFACE WATER IS LOCATED WITHIN 50 FEET OF THE PROJECT'S EARTH DISTURBANCES AND STORMWATER FLOWS TO THE SURFACE WATER. PERMITTEES MUST INSTALL PERIMETER SEDIMENT CONTROLS AT LEAST 5 FEET APART UNLESS LIMITED BY LACK OF AVAILABLE SPACE. NATURAL BUFFERS ARE NOT REQUIRED ADJACENT TO ROAD DITCHES JUDICIAL DITCHES, COUNTY DITCHES, STORMWATER CONVEYANCE CHANNELS, STORM DRAIN INLETS, AND SEDIMENT BASINS. IF PRESERVING THE BUFFER IS INFEASIBLE, PERMITTEES MUST DOCUMENT THE REASONS IN THE SWPPP. SHEET PILING IS A REDUNDANT PERIMETER CONTROL IF INSTALLED IN A MANNER THAT RETAINS

17. PERMITTEES MUST USE POLYMERS, FLOCCULANTS, OR OTHER SEDIMENTATION TREATMENT CHEMICALS IN ACCORDANCE WITH ACCEPTED ENGINEERING PRACTICES, DOSING SPECIFICATIONS AND SEDIMENT REMOVAL DESIGN SPECIFICATIONS PROVIDED BY THE MANUFACTURER OR SUPPLIER. THE PERMITTEES MUST USE CONVENTIONAL EROSION AND SEDIMENT CONTROLS PRIOR TO CHEMICAL ADDITION AND MUST DIRECT TREATED STORMWATER TO A SEDIMENT CONTROL SYSTEM FOR FILTRATION OR SETTLEMENT OF THE FLOC

SEPARATOR OR SUITABLE FILTRATION DEVICE (E.G., CARTRIDGE FILTERS, ABSORBENTS PADS) PRIOR T

3. PERMITTEES MUST DISCHARGE ALL WATER FROM DEWATERING OR BASIN-DRAINING ACTIVITIES IN A MANNER THAT DOES NOT CAUSE EROSION OR SCOUR IN THE IMMEDIATE VICINITY OF DISCHARGE POINTS OR

4. IF PERMITTEES USE FILTERS WITH BACKWASH WATER, THEY MUST HAUL THE BACKWASH WATER AWAY FOR DISPOSAL, RETURN THE BACKWASH WATER TO THE BEGINNING OF THE TREATMENT PROCESS, OR

1. PERMITTEES MUST ENSURE A TRAINED PERSON, AS IDENTIFIED IN ITEM 21.2.B, WILL INSPECT THE ENTIRE CONSTRUCTION SITE AT LEAST ONCE EVERY SEVEN (7) DAYS DURING ACTIVE CONSTRUCTION AND WITHIN 24

2. PERMITTEES MUST INSPECT AND MAINTAIN ALL PERMANENT STORMWATER TREATMENT BMPS. 3. PERMITTEES MUST INSPECT ALL EROSION PREVENTION AND SEDIMENT CONTROL BMPS AND POLLUTION PREVENTION MANAGEMENT MEASURES TO ENSURE INTEGRITY AND EFFECTIVENESS. PERMITTEES MUST REPAIR, REPLACE OR SUPPLEMENT ALL NONFUNCTIONAL BMPS WITH FUNCTIONAL BMPS BY THE END OF THE NEXT BUSINESS DAY AFTER DISCOVERY UNLESS ANOTHER TIME FRAME IS SPECIFIED IN ITEM 11.5 OR 11.6. PERMITTEES MAY TAKE ADDITIONAL TIME IF FIELD CONDITIONS PREVENT ACCESS TO THE AREA. 4. DURING EACH INSPECTION, PERMITTEES MUST INSPECT SURFACE WATERS, INCLUDING DRAINAGE DITCHES

SEDIMENT DEPOSITION. PERMITTEES MUST REMOVE ALL DELTAS AND SEDIMENT DEPOSITED IN SURFACE WATERS, INCLUDING DRAINAGE WAYS, CATCH BASINS, AND OTHER DRAINAGE SYSTEMS AND RESTABILIZE THE AREAS WHERE SEDIMENT REMOVAL RESULTS IN EXPOSED SOIL. PERMITTEES MUST COMPLETE REMOVAL AND STABILIZATION WITHIN SEVEN (7) CALENDAR DAYS OF DISCOVERY UNLESS PRECLUDED BY LEGAL. REGULATORY, OR PHYSICAL ACCESS CONSTRAINTS. PERMITTEES MUST USE ALL REASONABLE EFFORTS TO OBTAIN ACCESS. IF PRECLUDED, REMOVAL AND STABILIZATION MUST TAKE PLACE WITHIN SEVEN (7) DAYS OF

FEDERAL AUTHORITIES AND RECEIVING ANY APPLICABLE PERMITS, PRIOR TO CONDUCTING ANY WORK IN 5. PERMITTEES MUST INSPECT CONSTRUCTION SITE VEHICLE EXIT LOCATIONS, STREETS AND CURB AND GUTTER SYSTEMS WITHIN AND ADJACENT TO THE PROJECT FOR SEDIMENTATION FROM EROSION OR TRACKED SEDIMENT FROM VEHICLES. PERMITTEES MUST REMOVE SEDIMENT FROM ALL PAVED SURFACES WITHIN ONE

(1) CALENDAR DAY OF DISCOVERY OR, IF APPLICABLE, WITHIN A SHORTER TIME TO AVOID A SAFETY HAZARD TO 6. PERMITTEES MUST REPAIR. REPLACE OR SUPPLEMENT ALL PERIMETER CONTROL DEVICES WHEN THEY

7. PERMITTEES MUST DRAIN TEMPORARY AND PERMANENT SEDIMENTATION BASINS AND REMOVE THE SEDIMENT WHEN THE DEPTH OF SEDIMENT COLLECTED IN THE BASIN REACHES 1/2 THE STORAGE VOLUME. 8. PERMITTEES MUST ENSURE THAT AT LEAST ONE INDIVIDUAL PRESENT ON THE SITE (OR AVAILABLE TO THE PROJECT SITE IN THREE (3) CALENDAR DAYS) IS TRAINED IN THE JOB DUTIES DESCRIBED IN ITEM 21.2.B.

a. INSPECTIONS OF AREAS WITH PERMANENT COVER CAN BE REDUCED TO ONCE PER MONTH, EVEN IF b. WHERE SITES HAVE PERMANENT COVER ON ALL EXPOSED SOIL AND NO CONSTRUCTION ACTIVITY IS

MONTHS, MAY BE SUSPENDED COMPLETELY UNTIL CONSTRUCTION ACTIVITY RESUMES. THE MPCA MAY c. WHERE CONSTRUCTION ACTIVITY HAS BEEN SUSPENDED DUE TO FROZEN GROUND CONDITIONS,

10. PERMITTEES MUST RECORD ALL INSPECTIONS AND MAINTENANCE ACTIVITIES WITHIN 24 HOURS OF BEING

e. DATE OF ALL RAINFALL EVENTS GREATER THAN 1/2 INCHES IN 24 HOURS, AND THE AMOUNT OF RAINFALL FOR EACH EVENT. PERMITTEES MUST OBTAIN RAINFALL AMOUNTS BY EITHER A PROPERLY MAINTAINED RAIN GAUGE INSTALLED ONSITE, A WEATHER STATION THAT IS WITHIN ONE (1) MILE OF YOUR LOCATION, OR A WEATHER REPORTING SYSTEM THAT PROVIDES SITE SPECIFIC RAINFALL DATA FROM RADAR SUMMARIES;

- f. IF PERMITTEES OBSERVE A DISCHARGE DURING THE INSPECTION, THEY MUST RECORD AND SHOULD PHOTOGRAPH AND DESCRIBE THE LOCATION OF THE DISCHARGE (I.E., COLOR, ODOR, SETTLED OR SUSPENDED SOLIDS, OIL SHEEN, AND OTHER OBVIOUS INDICATORS OF POLLUTANTS); AND g. ANY AMENDMENTS TO THE SWPPP PROPOSED AS A RESULT OF THE INSPECTION MUST BE DOCUMENTED AS
- REQUIRED IN SECTION 6 WITHIN SEVEN (7) CALENDAR DAYS. POLLUTION PREVENTION MANAGEMENT (SECTION 12):
- 1. PERMITTEES MUST PLACE BUILDING PRODUCTS AND LANDSCAPE MATERIALS UNDER COVER (E.G., PLASTIC SHEETING OR TEMPORARY ROOFS) OR PROTECT THEM BY SIMILARLY EFFECTIVE MEANS DESIGNED TO MINIMIZE CONTACT WITH STORMWATER. PERMITTEES ARE NOT REQUIRED TO COVER OR PROTECT PRODUCTS WHICH ARE EITHER NOT A SOURCE OF CONTAMINATION TO STORMWATER OR ARE DESIGNED TO BE EXPOSED TO STORMWATER.
- 2. PERMITTEES MUST PLACE PESTICIDES, FERTILIZERS AND TREATMENT CHEMICALS UNDER COVER (E.G., PLASTIC SHEETING OR TEMPORARY ROOFS) OR PROTECT THEM BY SIMILARLY EFFECTIVE MEANS DESIGNED TO MINIMIZE CONTACT WITH STORMWATER. 3. PERMITTEES MUST STORE HAZARDOUS MATERIALS AND TOXIC WASTE, (INCLUDING OIL, DIESEL FUEL,
- GASOLINE, HYDRAULIC FLUIDS, PAINT SOLVENTS, PETROLEUM-BASED PRODUCTS, WOOD PRESERVATIVES, ADDITIVES, CURING COMPOUNDS, AND ACIDS) IN SEALED CONTAINERS TO PREVENT SPILLS, LEAKS OR OTHER DISCHARGE. STORAGE AND DISPOSAL OF HAZARDOUS WASTE MATERIALS MUST BE IN COMPLIANCE WITH MINN. R. CH. 7045 INCLUDING SECONDARY CONTAINMENT AS APPLICABLE. 4. PERMITTEES MUST PROPERLY STORE, COLLECT AND DISPOSE SOLID WASTE IN COMPLIANCE WITH MINN. R. CH.
- 5. PERMITTEES MUST POSITION PORTABLE TOILETS SO THEY ARE SECURE AND WILL NOT TIP OR BE KNOCKED
- OVER. PERMITTEES MUST PROPERLY DISPOSE SANITARY WASTE IN ACCORDANCE WITH MINN. R. CH. 7041. 6. PERMITTEES MUST TAKE REASONABLE STEPS TO PREVENT THE DISCHARGE OF SPILLED OR LEAKED CHEMICALS, INCLUDING FUEL, FROM ANY AREA WHERE CHEMICALS OR FUEL WILL BE LOADED OR UNLOADED INCLUDING THE USE OF DRIP PANS OR ABSORBENTS UNLESS INFEASIBLE. PERMITTEES MUST ENSURE ADEQUATE SUPPLIES ARE AVAILABLE AT ALL TIMES TO CLEAN UP DISCHARGED MATERIALS AND THAT AN APPROPRIATE DISPOSAL METHOD IS AVAILABLE FOR RECOVERED SPILLED MATERIALS. PERMITTEES MUST REPORT AND CLEAN UP SPILLS IMMEDIATELY AS REQUIRED BY MINN. STAT. 115.061, USING DRY CLEAN UP MEASURES WHERE POSSIBLE.
- 7. PERMITTEES MUST LIMIT VEHICLE EXTERIOR WASHING AND EQUIPMENT TO A DEFINED AREA OF THE SITE. PERMITTEES MUST CONTAIN RUNOFF FROM THE WASHING AREA IN A SEDIMENT BASIN OR OTHER SIMILARLY EFFECTIVE CONTROLS AND MUST DISPOSE WASTE FROM THE WASHING ACTIVITY PROPERLY. PERMITTEES MUST PROPERLY USE AND STORE SOAPS, DETERGENTS, OR SOLVENTS.
- 8. PERMITTEES MUST PROVIDE EFFECTIVE CONTAINMENT FOR ALL LIQUID AND SOLID WASTES GENERATED BY WASHOUT OPERATIONS (E.G., CONCRETE, STUCCO, PAINT, FORM RELEASE OILS, CURING COMPOUNDS AND OTHER CONSTRUCTION MATERIALS) RELATED TO THE CONSTRUCTION ACTIVITY. PERMITTEES MUST PREVENT LIQUID AND SOLID WASHOUT WASTES FROM CONTACTING THE GROUND AND MUST DESIGN THE CONTAINMENT SO IT DOES NOT RESULT IN RUNOFF FROM THE WASHOUT OPERATIONS OR AREAS. PERMITTEES MUST PROPERLY DISPOSE LIQUID AND SOLID WASTES IN COMPLIANCE WITH MPCA RULES. PERMITTEES MUST INSTALL A SIGN INDICATING THE LOCATION OF THE WASHOUT FACILITY.

PERMIT TERMINATION (SECTION 4 AND SECTION 13):

- 1. PERMITTEES MUST SUBMIT A NOT WITHIN 30 DAYS AFTER ALL TERMINATION CONDITIONS LISTED IN SECTION 13 ARE COMPLETE. 2. PERMITTEES MUST SUBMIT A NOT WITHIN 30 DAYS AFTER SELLING OR OTHERWISE LEGALLY TRANSFERRING
- THE ENTIRE SITE, INCLUDING PERMIT RESPONSIBILITY FOR ROADS (E.G., STREET SWEEPING) AND STORMWATER INFRASTRUCTURE FINAL CLEAN OUT, OR TRANSFERRING PORTIONS OF A SITE TO ANOTHER PARTY. THE PERMITTEES' COVERAGE UNDER THIS PERMIT TERMINATES AT MIDNIGHT ON THE SUBMISSION DATE OF THE NOT.
- 3. PERMITTEES MUST COMPLETE ALL CONSTRUCTION ACTIVITY AND MUST INSTALL PERMANENT COVER OVER ALL AREAS PRIOR TO SUBMITTING THE NOT. VEGETATIVE COVER MUST CONSIST OF A UNIFORM PERENNIAL VEGETATION WITH A DENSITY OF 70 PERCENT OF ITS EXPECTED FINAL GROWTH. VEGETATION IS NOT REQUIRED WHERE THE FUNCTION OF A SPECIFIC AREA DICTATES NO VEGETATION, SUCH AS IMPERVIOUS SURFACES OR THE BASE OF A SAND FILTER.
- 4. PERMITTEES MUST CLEAN THE PERMANENT STORMWATER TREATMENT SYSTEM OF ANY ACCUMULATED SEDIMENT AND MUST ENSURE THE SYSTEM MEETS ALL APPLICABLE REQUIREMENTS IN SECTION 15 THROUGH 19 AND IS OPERATING AS DESIGNED.
- 5. PERMITTEES MUST REMOVE ALL SEDIMENT FROM CONVEYANCE SYSTEMS PRIOR TO SUBMITTING THE NOT. 6. PERMITTEES MUST REMOVE ALL TEMPORARY SYNTHETIC EROSION PREVENTION AND SEDIMENT CONTROL BMPS PRIOR TO SUBMITTING THE NOT. PERMITTEES MAY LEAVE BMPS DESIGNED TO DECOMPOSE ON-SITE IN PLACE
- 7. FOR RESIDENTIAL CONSTRUCTION ONLY, PERMIT COVERAGE TERMINATES ON INDIVIDUAL LOTS IF THE STRUCTURES ARE FINISHED AND TEMPORARY EROSION PREVENTION AND DOWNGRADIENT PERIMETER CONTROL IS COMPLETE, THE RESIDENCE SELLS TO THE HOMEOWNER, AND THE PERMITTEE DISTRIBUTES THE MPCA'S "HOMEOWNER FACT SHEET" TO THE HOMEOWNER.
- 8. FOR CONSTRUCTION PROJECTS ON AGRICULTURAL LAND (E.G., PIPELINES ACROSS CROPLAND), PERMITTEES MUST RETURN THE DISTURBED LAND TO ITS PRECONSTRUCTION AGRICULTURAL USE PRIOR TO SUBMITTING THE NOT

SEED NOTES:

ALL SEED MIXES AND APPLICATION SHALL BE IN ACCORDANCE WITH THE MNDOT SEEDING MANUAL.

GENERAL RECOMMENDATIONS

THE CONTRACTOR IS RESPONSIBLE TO SALVAGE AND PRESERVE EXISTING TOPSOIL NECESSARY FOR FINAL STABILIZATION AND TO ALSO MINIMIZE COMPACTION IN ALL LANDSCAPE AREAS. IMMEDIATELY BEFORE SEEDING THE SOIL SHALL BE TILLED TO A MINIMUM DEPTH OF 3 INCHES.

TEMPORARY EROSION CONTROL SEEDING, MULCHING & BLANKET.

SFFD

 TEMPORARY SEED SHALL BE MNDOT SEED MIX 21-112 (WINTER WHEAT COVER CROP) FOR WINTER AND 21-111 (OATS COVER CROP) FOR SPRING/SUMMER APPLICATIONS. BOTH SEED MIXES SHALL BE APPLIED AT A SEEDING RATE OF 100 LBS/ACRE.

MULCH

 IMMEDIATELY AFTER SEEDING, WITHIN 24 HOURS, MNDOT TYPE 1 MULCH SHOULD BE APPLIED TO PROTECT AND ENHANCE SEED GERMINATION. MULCH SHALL BE APPLIED AT 90% COVERAGE (2 TONS PER ACRE OF STRAW MULCH)

SLOPES 3:1 (HORIZ/VERT.) OR FLATTER MUCH SHALL BE COVERED WITH MULCH

 SLOPES STEEPER THAN 3:1 OR DITCH BOTTOMS SHALL BE COVERED WITH EROSION CONTROL BLANKET. SEE PLAN FOR MORE DETAILED DITCH AND STEEP SLOPE EROSION CONTROL TREATMENTS.

AREAS AND QUANTITIES:

SITE AREA CA

MPERVIOUS BUILDING PAVEMEN

PERVIOUS SU

DIFFERENCE DISTURBED A

EROSION CO DISTURBED A SILT FENCE/B EROSION CON INLET PROTE

CONTRACTOR:

NA

CONSTRUCTION. PROJECT NARRATIVE:

PROJECT IS A REMODEL OF AN EXISTINGSENIOR LIVING BUILDING. SITE, GRADING AND LANDSCAPE IMPROVEMENTS WILL OCCUR.

PRESERVING A 50 FOOT NATURAL BUFFER AROUND WATER BODIES IS NOT REQUIRED OF THIS PROJECT BECAUSE WATER BODIES ARE NOT LOCATED ON SITE.

INFILTRATION IS NOT PROVIDED AS PART OF THIS PROJECT BECAUSE PERMANENT STORM WATER MANAGEMENT IS NOT REQUIRED.

NA

PERMANENT SEED MIX FOR THIS PROJECT ALL AREAS THAT ARE NOT TO BE SODDED OR LANDSCAPED SHALL RECEIVE A NATIVE PERMANENT SEED MIX. •• AREAS IN BUFFERS AND ADJACENT TO OR IN WET AREAS MNDOT SEED MIX 33-261 (STORMWATER SOUTH AND WEST) AT 35 LBS PER ACRE. DRY AREAS MNDOT SEED MIX 35-221 (DRY PRAIRIE GENERAL) AT 40 LBS PER ACRE. MAINTENANCE SHALL BE IN ACCORDANCE TO THE MNDOT SEEDING MANUAL

TRAINING SECTION 21

DESIGN ENGINEER: DAVID J. KNAEBLE P.E. TRAINING COURSE: DESIGN OF SWPPP TRAINING ENTITY: UNIVERSITY OF MINNESOTA INSTRUCTOR: JOHN CHAPMAN DATES OF TRAINING COURSE: 8/22/2012- 8/23/2012 TOTAL TRAINING HOURS: 12 DATE OF RECERTIFICATION: 4/22/22 EXPIRATION: 5/31/2025

OWNER INFORMATION

COMFORT HAVEN LLC 4207 QUAKER TRAIL NE PRIOR LAKE, MN 55372 JON GLEISNER 612-600-6036 JONNYGLEIS@HOTMAIL.COM

LCULATIONS						
	EXISTING CONDITION		PROPOSED CONDITION		NDITION	
SURFACES						
COVERAGE	47,180 SF	30.8%		46,980 SF	30.6%	
т	31,397 SF	20.5%		39,407 SF	25.7%	
TOTAL	78,577 SF	51.2%	0.0 AC	86,387 SF	56.3%	2.0 AC
IRFACES						
TOTAL	74,751 SF	48.8%	1.7 AC	66,941 SF	43.7%	1.5 AC
TOTAL SITE AREA	153,328 SF	100.0%	3.5 AC	153,328 SF	100.0%	3.5 AC
(EX. VS PROP.)	7,810 SF	5.1%				
REA	30,000 SF	0.7	AC			
NTROL QUANTITIES						
REA	30,000 SF					
IO-ROLL	±1100 LF					
NTROL BLANKET	0 SF					
CTION DEVICES	±5 EA					

NOTE: QUANTITIES ARE FOR INFORMATIONAL PURPOSES ONLY. CONTRACTOR SHALL DETERMINE FOR THEMSELVES THE EXACT QUANTITIES FOR BIDDING AND CONSTRUCTION.

SWPPP CONTACT PERSON

SWPPP INSPECTOR TRAINING: ALL SWPPP INSPECTIONS MUST BE PERFORMED BY A PERSON THAT MEETS THE TRAINING REQUIREMENTS OF THE NPDES CONSTRUCTION SITE PERMIT. TRAINING CREDENTIALS SHALL BE PROVIDED BY THE CONTRACTOR AND KEPT ON SITE WITH THE SWPPP

PARTY RESPONSIBLE FOR LONG TERM OPERATION AND MAINTENANCE OF PERMANENT STORM WATER MANAGEMENT SYSTEM

PERMANENT STORMWATER MANAGEMENT IS NOT REQUIRED AS PART OF THIS PROJECT TO MEET NPDES PERMIT REQUIREMENTS. THE PROPERTY OWNER IS RESPONSIBLE FOR THE LONG TERM OPERATION AND MAINTENANCE OF THE PROPOSED STORMWATER SYSTEM.

SWPPP ATTACHMENTS (ONLY APPLICABLE IF SITE IS 1 ACRE OR GREATER):

SUPPLEMENTARY SITE SPECIFIC EROSION CONTROL NOTES: THESE NOTES SUPERCEDE ANY GENERAL SWPPP NOTES.

THIS PROJECT IS LESS THAN 1.0 ACRE SO AN NPDES PERMIT IS NOT REQUIRED AND DOESN'T NEED TO BE SUBMITTED TO THE MPCA. THE CONTRACTOR IS REQUIRED TO FOLLOW THE GUIDELINES IN THE NPDES PERMIT THROUGHOUT

NATIVE BUFFER NARRATIVE:

INFILTRATION NARRATIVE:

SOIL CONTAMINATION NARRATIVE:

SOILS ONSITE HAVE NOT BEEN IDENTIFIED AS CONTAMINATED.

SPECIAL TMDL BMP REQUIREMENTS SITE SPECIFIC (IF REQUIRED)

PERMANENT STABILIZATION NOTES SITE SPECIFIC:

	LISH WOODEN FENCE IN ITS ENTIRETY AND REPLACE, I CONCRETE
	NG LOT LIGHTING, SEE ELECTRICAL
3 REPLA PRIVA	CE EXISTING WOODEN FENCE WITH 6' TALL CEDAR CY FENCE
4 REPAIL OR MC TRIPPI	R ALL SIDEWALK WITH CRACKS THAT ARE UPLIFTING AT RE THAN A 1/4" IN HEIGHT, WHICH REPRESENT A NG HAZARD
	BISH OR REPLACE EXISTING RUSTING DOOR AND FRAME
6 NEW B	ITUMINOUS PARKING LOT AND RESTRIPE
	RIPE THIS BITUMINOUS PARKING LOT
8 ACCES	SSIBLE PARKING SPOT WITH EXISTING SIGN
9 REPLA VERBA	CE EXISTING SIGNAGE, VERIFY WITH OWNER ON
	NG FLAG POLE
11 REPLA THE NI MATCH	CE BUILDING NAME SIGNAGE AS DIRECTED BY OWNER, UMBERS ARE REQUIRED TO REMAIN. LETTERING TO I.
12 FIRE H	YDRANT ON OTHER SIDE OF STREET
13 EXISTI	NG WALL PACK LIGHT FIXTURE BEING REPLACED
	UBBISH ENCLOSURE AND CONCRETE PAD.
15 RE-SID AND R CITY O	E TO MATCH UPDATED MAIN BUILDING EXTERIOR - PATCH EPAIR FASCIA -OR- DEMOLITION AS REQUIRED BY THE IF MAPLE PLAIN PLANNING AND ZONING DEPARTMENT.
16 REPLA	CE EXISTING CANOPY SOFFIT APPLIED LIGHT FIXTURES
	NG GAZEBO TO REMAIN - TOUCH UP PAINT
$\langle 18 angle$ 6' TALL	WOOD COMPOSITE FENCING

SITE PLAN KEYNOTES

- \langle 19 \rangle BOLLARDS
- $\langle 20 \rangle$ EXISTING FIRE HYDRANT ig 21ig
 angle NO PARKING SIGN

81989 BUILDING EXTERIOR EXISTING CONDITIONA300SCALE: 12" = 1'-0"

9 A300 1998 BUILDING EXTERIOR EXISTING CONDITION - 2 SCALE: 12" = 1'-0"

Section 4, Item B.


METAL LAP - OR- LP SMART SIDING - 6" LAP - CAVERN STEEL



METAL LAP OR LP SMART SIDING - 6" LAP - QUARRY GRAY



METAL LAP OR LP SMART SIDING - 6" LAP - SNOWSCAPE WHITE



BRICK STAIN AND CMU PAINT TO MATCH EXISTING HAVEN HOME CANOPY IRON SPOT BRICK LOOK AND TONE



EXISTING SPLIT FACE CMU



METAL CAP FLASHING OR LP SMART SIDING -TRIM - SNOWSCAPE WHITE



STUCCO BAND TO BE PAINTED TO MATCH BRICK STAIN AND CMU PAINT



EXISTING SPLIT FACE CMU TO BE PAINTED TO MACH BRICK STAIN AND STUCCO PAINT



EXISTING SHINGLE ROOF













EXTERIOR MATERIAL PALETTE

 $\mathbf{\tilde{A}}^{15}$





С	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
С	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
С	•0.0	0.0	• 0.0	0.0	0.0	0.1	0.1	•0.1	0.1	0.0	0.0	• 0.0	0.10	01 .1	•0.1	0.1		• 0.0	• • • • • •
1	0.1	0.2	•0.2	•	0.4	0.5	• MH: 0.6	27 • 0.6	•0.6	0.6	•0.7	•0.6	0.6	SP1 •0.Md:	27 0.6	0.6	0.5		•0.0
1	•0.2	•0.3	• • 4	•0.5	0.6	0:7	•1.0	1.2	1.1	•1.0	•1.1	1.1	•1.1	•1.2	1 1.3	•1.2	•1.0	•1.1	• <u>1</u>
1	• 0.2	• 0 .3	•0.4	•0.50	• ⁹ . ⁵	0.6	• 0.8	•0.9	•0.8	•0.9	•1.0	0.9	•0.9	•1.0	•1.1	•1.0	•0.9	1.0	•1.0
1	• 0.2	0.2	0.3	• 0.4	0.5	0.6	0.9	•0.9	•0.8	•0.8	•0.8	0.8	0.9	1.0	•1.1	0.9	0.9	•0.9	•0.9
1	•0.2	0.2	4 .3	•0.4	0.5	•0.6	•0.7	•0.8	•0.8	•0.8	•0.7	•C.8	0.8	0.9	•0.9	•0.9	•0.8	•0.8	•0.
1	•0.1	0.2	0.3	0.3	•0.4	8.5 E	0.5	0.6	•0.6	• 0 .6	•0.6	• 0.7	0.7	0.7	• 0.7	•0.7	0.7	•0.7	•0.
1	• 0.1	0.2	• • • • •	•0.3	•0.3	•0.4	0.3	•0.4	•0.4	•0 • 5	•0.5	0.5	0.5	0.55	0.5	• . 5			
1	• 0.1	0.2	• • • •	•0.3	•0.3	• . 3													
10	.011	0.2	• 0.2	0.3	0.4	• . 4													
1	•0.1	0.2	•	0.5	•	1.0													
С	•0.1	0.1	•04	5 1.1	•2.2	•2.4]												
С	•0.0	0 :11	0.5	•1.1	•2.0	2.2													
С	•0.0	0.1	• • • •	0B-2 1 MQ:		H: 22.1													
С	•0.0	0.1	•0.4	1 .1	•2.2	• 2 .5													
С	•0.0	•0.1	0.2	0.5	•0.9	1.1													
С	•0.0	• 0.1		0.2	0.3	0 .45	5												
С	•0.0	•0.0	•0.0	0.1	0.1	• . 2													
С	•0.0	0.0	0.0	0.0	0.1	•0.1													
С	•0.0	0.0	• • • •	•0.0	•0.0	•0.0													
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С	•0.0	0.0	• • • •		•0.3	•0.8	2.2	•5.2	•7.4	• 5 .9	2.5	6.1	7.5	0.0	•0.0	•0.0	0.0	•0.0	•0.2
С	•0.0	0.0	• • • •	0.1	0.3	07	•1.3 1	•2.1	•2.4	•2.2	•2.7	•3.2	•2.7	•1.3	0.1	0.0	•0.0	•0.0	•0.5
С	•0.0	p .0		0.1	•0.2	0.2	•0.3	•0.4	0.4	• <u>9</u> .7	• <u>1</u> .0	1.0	•0.6	•0.3	0.1	•0.0	•0.0	•0.0	•0.1
С	•0.0	•0.0	•0.0-/	······································	•••0•.0 k		••••0•.0	•0.1	• • • • • • • • • • • • • • • • • • • •	•••0•.2 •	<u>.</u>	• • • • • • • • • • • • • • • • • • • •	***0**. <u>*1</u> **	5. 5. Ox	0.0		• • • • • • • • • • • • • • • • • • • •	•0.0	0.
С	•0.0	•0.0	8.0	•.0	•0.0	•0.0	•0.0	•0.0	•0.1	•0.1	•9. ₀ 1	0.0	•0.0	•0.0	•0.0	0.0	0.0	•d.0	•0.(
С	•0.0	•0.0	•0.0	•0.0	0.0	0.0	0.0	0.0	•0.0	0.0	0.0	0.0	0.0	0.0	0.0	•0.0	•0.0	•0.0	•0.0
C	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	0.0	•0.0	•0.0	0.0	•0.0	•0.0	0.0	•0.0	•0.0	•0.0	•0.0	•0.0



2. Not a Construction Document, for Design purposes only

3. Standard indoor calc points @ 30" A.F.F. unless noted otherwise

4. Standard outdoor calc points @ Grade unless noted otherwise

5. Egress calc points @ 0" A.F.F.

6. Mlazgar Associates assumes no responsibility for installed light levels due to field conditions, etc.



immary								Symbol
	CalcType	Units	Avg	Max	Min	Avg/Min	Max/Min	<u></u>
	Illuminance	Fc	0.12	0.7	0.0	N.A.	N.A.	$\overline{\mathbf{i}}$
	Illuminance	Fc	0.57	9.1	0.0	N.A.	N.A.	\odot
						·		\bigcirc

Luminaire Schedule Qty 10 - 0 4

• 0.1	• 0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
0.1	•0.1	•0.1	•0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
0.1	1 0.1	• 0.1	•0.1	0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
•0.3	0.4	•0.3	0.2	•0.1	0.1	0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	0.0	•0.0	• • • •	•0.0	•0.0
5 0.8	1.0	0.8	0.5	0.2	0.2	0.2	0.1	•0.11	•0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
• 1.4 ^M	SP2 H: 17.6	•1.3	•0.9	0.8	•0.7	•0.60	• ^{9.4}	•0.3	0.2	0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0 ×	•0.0	•0.0	•0.0	•0.0
•2.1	•2.1	•1.6	•1.1	•0.9	•0.8	0.7	•0.5	• 0.4	•0.3	•0.1	0.1	•0.0	•0.0	•0.0	•0.0	•	0.0	•.0	•0.0	•0.0	•0.0
•2.6	•2.4	•1.7	•1.1	0.9	0.8	•0.6	0.5	•0.4	• 0.3	0.2	0°.1	•0.1	•0.0	•0.0	•0.0	0.0	•0.0	0.0	•0.0	•0.0	•0.0
4.3	3.1	•2.5	•1.3	•0.9	•0.8	0.7	•0.6	0.55	•0.3	0.2	•0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	0.0	•0.0	•0.0	•0.0
	5.4	• 4 .2	7.7	•1.0	•0.8	0.7	0.6	•0.6	•0.4	•0.2	0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•.0	•0.0	•0.0	•0.0	•0.0
0A MH: 10	7.4	•7.3	•2.4	•1.1	•0.8	•0.8	0.7	0.8	0.5	0.2	•0.1	•0.1	0.1	•0.0	0.0	•0.0	• • • • • • • • • • • • • • • • • • • •	0.0	•0.0	•0.0	•0.0
		6.0	3.1	1.3	10.9	•0.8	0.9	0.9	0.6	•0.2	0.1	0.1	•0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
		•3.8	•2.4	15	•1.0	0.9	•] O	•1.0	•0.6	5 ^{0.2}	0.1	0.1	0.1	•0.1	•0.0	•0.0	0.0	•0.0	0.0	•0.0	•0.0
T	0.2	4.5	•1.4	13	•1.2	•1.0	•1.0	•1.0	•0.7	•0.3	0.2	•0.1	•0.1	•0.1	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
•0.1	0.2	•0.4	e.0	1.0	•1.2	•1.2	1.2	. 3	1.0	0.5	0.2	•0.1	•0.1	0.1	•0.0	0.0	0.0	•0.0	• 0.0	•0.0	•0.0
•0.2	0.2	•0/3) . 57		1.2	1.4	•1.4	1 .5	1.3 582 14:27	L ^{0.8}	0.2	••••••••••••••••••••••••••••••••••••••	10.1	0.1	•0.0	•0.0	•0.0	•0.0	•••••	•0.0	•0.0
0.2	0.2	0.4	0.6	0.9	1.1	1.3	1.3	1.4	1.1	0.6	0.2	0.1	0.1	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	0./3	0.4	0.6	0.8	1.0	1.0	•	1.1	0.8	0.5	0.2	0.1	•	0.1	0.0	•	0.0	0.0	0.0	•	•
4 0.2	0.3	0.5	0.6	0.8	0.9	•	1.1	1.1	0.7	0.2	0.1	0.1	0.1	•	•	•	•	0.0	0.0	0.0	••••
0,3	0.4	0 ⁰ .5	0.6	<u>0.7</u>	0.8	• 0.9	1.1	1.21	0.7	0.1	0.1	0.1	0.1	0.0	0.0	••••	0.0	0.0	0.0	0.0	•
0.6	0.6	0.6	0.6	0.7	0.8	■ 0.9	1.0		•		•0.1	0.1	•0.1	•	0.0	•••••	•••••	•	•	•••••••••••••••••••••••••••••••••••••••	•
<u>ц</u> . 0	0.7	•	•0.6	•	0.8	0.9	•1	1.2 •1	•	. 5.1	0.1	•	•0.1	•	•••••	•	•	•	•	••••••	•••••
1.6 •1.6	•	•	0.6	•	•1 •	0.9		•	•	•	Ø·⊥1	• 1	•	•	•	•	•	•	•	•	•
1.0	• 4	• 4	•0.6	• 8	•1 1	1 2	•1 2	•		•0.5	• 2	• 1	• • • 1	•	•	•	•	•	•	•	•
10,5	•0.3	•		• . 8	•1.1	•1.3	• 1.4		•1 . 2	•0.70	• • ••	•0.1	•0.1	•0.0	•0.0	•	•0.0	•0.0	•	•	•0.0
•0.3	•0.2	•0.3	•0.5	•	•1:0	•1.1	•1.1	•1.2	P2 ⁻ 0 - 9	•0.5	• 0.2	0.1	•0.1	•.0	•0.0	•0.0	•0.0	•0.0	• . 0	•0.0	•0.0
• <u>0.2</u>	•0.2	•0.3	•0.5	•0.7	•0.8	0.8	•0.9	•0,9	1 •0.6	•0.2	•0,1	0.1	•0.1	•0.0	•0.0	•0.0	Q.0	0.0	0.0	•0.0	•0.0
) 0.2	•0.2	•0.3	•0.4	0.6	•0.6	•0,7	•0.8	•0.8	•0.5	•0,1	•0.1	•0.1	•0.0	•0.0	•0-0	0.0	0.0	•0.0	• • •	•0.0	•0.0
<u>0.1</u>	0.2	0.3	0.4	0.5	0.5	<u>•</u> 0.6	0.6	•0.8	0.4	0.1	•0.0	0.0	•0.0	•0.0	•0.0	•9.0	•0.0	•0.0	• • • • •	•0.0	•0.0
1 0.1	•0.2	•0.2	•0.3	0.3	•0.4	•0.4	0.5	•0,6	• . 4	.1 ₁	•0.0	•	0.0	•0.0	•.0	•0.0	•0.0	••••••	••••••••••••••••••••••••••••••••••••••	•0.0	•0.0
• 0.1	• 0.2	•0.2	•0.2	0.3	0.3	•0.3	•0.4	0.5 •0.4	0.3	<u>0.0</u>	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0
•0.1	•0.1	•0.2	•0.2	0.2	0.2	•0.2	•0.3	•0.3	•0.2	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0	•0.0

Label	Manufacturer	Description	Arrangement	Lum. Lumens	Lum. Watts	LLF
OA		PRV-P-PA1B-740-U-T3	Single	7261	52.8	0.900
OB		TT-D2-740-U-WQ	Single	5273	39.2	0.900
OB-1		TT-D1-740-U-RW	Single	3097	28	0.900
OB-2		TT-D1-740-U-DL-HSS	Single	2930	28.8	0.900
SP1		PRV-PA1A-740-U-T4W-HSS	Single	5420	54	0.900
SP2		PRV-PA1B-740-U-T4W	Single	9738	74	0.900



				Section 4, Item B.
Project	Catalog #	Туре		
Prepared by	Notes	Date		



🖌 Interactive Menu

- Ordering Information page 2
- Mounting Details page 3, 4
- Optical Configurations page 5
- Product Specifications page 5
- Energy and Performance Data page 6, 7
- Control Options page 8

Quick Facts

- Direct-mounted discrete light engine for improved optical uniformity and visual comfort
- Lumen packages range from 4,300 68,000 nominal lumens (30W - 550W)
- · Replaces 70W up to 1,000W HID equivalents
- Efficacies up to 157 lumens per watt
- Standard universal quick mount arm with universal drill pattern

Dimensional Details



NOTES: 1. Visit <u>https://www.designlights.org/search/</u> to confirm qualification. Not all product variations are DLC qualified. 2. IDA Certified for 3000K CCT and warmer only.



Lumark

Prevail Discrete LED

Area / Site Luminaire

Product Features

LumenSafe Technology

Product Certifications



Connected Systems

WaveLinx

Ordering Information

SAMPLE NUMBER: PRV-XL-PA4B-740-U-T4W-BZ

Product Family 1.2	Light E	Ingine	Color	Voltago	Distribution	Mounting	Finish
Product Failing ***	Configuration	Drive Current ⁴	Temperature	vonage	Distribution	(Included)	Finish
PRV-P=Prevail Petite BAA-PRV-P=Prevail Petite BAA Buy American Act Compliant ³ TAA-PRV-P=Prevail Petite TAA Trade Agreements Act Compliant ³	PA1 =1 Panel, 24 LED Rectangle	A=400mA Nominal B=700mA Nominal C=950mA Nominal D=1200mA Nominal	740=70CRI, 4000K 730=70CRI, 3000K 750=70CRI, 5000K 8540=85CRI, 4000K	U=Universal, 120-277V H=High Voltage, 347-480V 1=120V 2=208V 3=240V	T2R=Type II Roadway T2U=Type II Urban T3=Type III T4W=Type IV Wide	SA=QM Standard Versatile Arm MA=QM Mast Arm FMA=Fixed Mast Arm ²⁸ WM=QM Wall Mount Arm	AP=Grey BZ=Bronze BK=Black DP=Dark Platinum GM=Graphite
PRV=Prevail BAA-PRV=Prevail BAA Buy American Act Compliant ³ TAA-PRV=Prevail TAA Trade Agreements Act Compliant ³	PA1=1 Panel, 24 LED Rectangle PA2=2 Panels, 48 LED Rectangles	A =700mA Nominal B =950mA Nominal		4=277V 8=480V ⁵ 9=347V DV=DuraVolt, 277-480V ^{5,6}	5WQ =Type V Square Wide	ADJA-WM= Adjustable Arm – Wall Mount ³⁰ ADJA=Adjustable Arm – Pole Mount ³⁰ ADJS=Adjustable Arm – Slipfitter, 3" vertical	Metallic WH =White
PRV-XL=PRV XL BAA-PRV-XL=Prevail XL BAA Buy American Act Compliant ³ TAA-PRV-XL=Prevail XL TAA Trade Agreements Act Compliant ³	PA3=3 Panels, 72 LED Rectangles PA4=4 Panels, 96 LED Rectangles	A=750mA Nominal B=950mA Nominal				tenon ³⁰ SP2=Adjustable Arm – Slipfitter, 2 3/8" vertical tenon ^{28, 30}	
PRV-M=Prevail Maxx BAA-PRV-M=Prevail Maxx BAA Buy American Act Compliant ³ TAA-PRV-M=Prevail Maxx TAA Trade Agreements Act Compliant ³	PA6 = 6 Panels, 144 LED Rectangles	PA6= 6 Panels, 144 A=600mA Nominal ED Rectangles B=800mA Nominal C=1000mA Nominal D=1200mA Nominal					
	Options (Add as Suffi	x)			Accessories (Ord	ler Separately) ^{20, 21}	
10K-10KV UL 1449 Fused Surge Protective I 20MSP-20kV MOV Surge Protective Device 20K-20kV UL 1449 Fused Surge Protective I F=Single Fuse (Used with Voltages 120, 277 FF=Double Fuse (Used with Voltages 208, 24 L90-Optics Rotated 90° Left R90-Optics Rotated 90° Right CC=Coastal Construction finish ³¹ HSS=House Side Shield (Factory Installed) ⁷ HA=50°C High Ambient Temperature ⁸ PR=NEMA 3-PIN Twistlock Photocontrol Rec PR7=NEMA 3-PIN Twistlock Photocontrol Rec PR7=NEMA 3-PIN Twistlock Photocontrol Ref MS/DIM-L08=Motion Sensor for Dimming 0 9° 20' Mounting Height ^{11,12,13,24,34} MS/DIM-L40=Motion Sensor for Dimming 0 - 40' Mounting Height ^{11,12,13,24,35} SPB1=Motion Sensor for Dimming Operation Interface, Up to 8' Mounting Height ^{11,14,23,24} SPB2=Motion Sensor for Dimming Operation Interface, 8' - 20' Mounting Height ^{11,14,23,24}	Device ZW=Wave ZD=DALI- ZW-SWPI Daylight, 14, 0 or 480V) ZW-SWPI Daylight, 14, 12, 15, 14, 14, 14, 14, 14, 14, 14, 14, 14, 14	elinx-enabled 4-PIN Twist enabled 4-PIN Twistlock D4XX = Wavelinx Pro, Dim WAC Programmable, 7' - 7,22 D5XX =Wavelinx Pro, Dim WAC Programmable, 15' - 7,38,39 J4XX =Wavelinx Pro, SR D J4XX=Wavelinx Pro, SR D J4X, 15' - 40' Mounting He Below]=LumenSafe Int Camera ¹⁸ , 19	lock Receptacle ^{11, 12} Receptacle ^{11, 12} ning Motion and 15' Mounting Height 40' Mounting Height river, Dimming Motion ght ^{11, 12, 15, 17, 22} river, Dimming Motion light ^{11, 12, 15, 16, 17, 28, 29} egrated Network	PRVSA-XX=Standard Arm M PRVMA-XX=Wall Mount Kit PRV-ADJA-XX=Adjustable / PRV-ADJA-XX=Adjustable / PRV-ADJA-XX=Adjustable / PRV-ADJA-WM-XX=Adjustat Kit ²⁰ PRVXLBA-XX=Standard Arr PRVXLMA-XX=Wall Mount PRVXLMA-XX=Wall Mount Kit ³⁰ PRV-XL-ADJA-XX=Adjustat Kit ³⁰ PRV-XL-ADJA-XX=Adjustat BRV-M-ADJA-XX=Adjustat BRV-M-ADJA-XX=Adjustat Kit ²⁸ MA1010-XX=Single Tenon / 0.D. Tenon MA1011-XX=2@180*Tenon 0.D. Tenon	Adunting Kit ²² tring Kit ²² zz Arm - Pole Mount Kit ²² Arm - Slipfitter Kit ²² bible Arm - Wall Mount In Mounting Kit ²⁹ ounting Kit ²⁹ ounting Kit ²⁹ ounting Kit ²⁹ ounting Kit ²⁹ ounting Kit ²⁹ bie Arm - Pole Mount bie Arm - Slipfitter Kit ²⁹ le Arm - Slipfitter Kit ²⁸ stable Arm - Wall Adapter for 3-1/2"	MA1017-XX=Single Tenon A 0.D. Tenon MA1018-XX=2@180° Tenor 0.D. Tenon SRA238=Tenon Adapter fron PRV/DIS-FDV=Full Drop Vis PRVXL/DIS-FDV=Full Drop Vis PRVXL/DIS-FDV=Full Drop Vis PRS-VP=House Side Shield 7,34 VGS-ARCH= Panel Drop Shi OA/RA1013=Photocontrol S OA/RA1013=Photocontrol S OA/RA1013=Photocontrol S OA/RA1014=NEMA Photocc OA/RA1014=NEMA Photocc OA/RA1013=NEMA Photocc OA/RA1013=NEMA Photocc OA/RA1013=NEMA Photocc OA/RA1013=NEMA Photocc OA/RA1013=NEMA Photocc OA/RA1027=NEMA Photoccc OA/RA1047=NEMA Photocc OA/RA1047=NEMA Phot	Adapter for 2-3/8" a Adapter for 2-3/8" a Adapter for 2-3/8" or ²³ lisor ¹⁹ Kit, Vertical Panel ^{7,24} Kit, Vertical Panel ^{7,24} Kit, Horizontal Panel eld, Long shorting Cap ontrol - 120V ontrol - 20V ontrol - 480V ontrol - 480V ontrol - 480V ontrol of for utdoor Control Module ess Sensor, 7' - 15' ess Sensor, 15' - 40'
NOTES: 1. DesignLights Consortium® Qualified. Refer to <u>w</u> 2. Customer is responsible for engineering analysi installation instructions and pole white paper WPS 3. Only product configurations with these designat or Trade Agreements Act of 1979 (TAA), respective Components shipped separately may be separately 4. Nominal drive currents shown here. For actual d 5. 480V not to be used with ungrounded or impeda 6. DuraVolt drivers feature added protection from j fluctuations. Visit <u>www.signify.com/duravolt</u> for 7. House Shield hort for use with SWQ distribut 8. Not available with PAD light engine in Petite ho 9. Coastal construction finish sait spray tested to 0 10. If High Voltage (H) or DuraVolt (DV) is specifier 11. Controls system is not available in combination SPB, ZD, or ZW). 12. Option not available with High Voltage (H) or D 13. Utilizes the Wattstopper sensor FSP-32X serie Table. Field-configures via mobile application. See 15. Sensor passive infrared (PIR) may be overly set	ww.designlights.org Qualified s to confirm pole and fixture of 13001EN for additional suppred der prefixes are built to be cor- ley. Please refer to <u>DOMESTIC</u> y analyzed under domestic pr rive current by configuration, nce grounded systems. power quality issues such as i pore information. tion. using (PRV-P). over 5,000-hours per ASTM B d, use a photocontrol that mai with a photocontrol recepta uraVolt (DV). Must specify Ur or color white unless specifie s. Sensor color determined by c Controls section for details. sitive when operating below	Products List under Family compatibility for applications rr information. <u>PREFERENCES</u> website for eference requirements. refer to Power and Lumens t loss of neutral, transients an 117, with a scribe rating of 9 j tches the input voltage used. cle (PR or PR7) or another co iversal (U), 347V (9), or 480/ d otherwise via PDR. To field v product finish. See Sensor (-20°C (-4°F).	Models for details. 16, is, Refer to opurish opurish and the formation. 18, ables. det ables. det d voltage 21, voltage 21, opurish and the formation opurish opurish and the formation opurish opurish and the formation opurish opurish and the formation opurish opurish and the formation opurish (%) voltage. 26, configure, order 27, opurish and the formation opurish color Reference 28, 30, 30, 0, 0, 0, 0, 0, 0, 0, 0, 0,	In order for the device to be field- antities. Only compatible with Wav ration. See website for more Wav Replace XX with sensor color (WH Only available in PRV-XL configur. Not available with High Voltage (H ails and compatability information Replace XX with paint color. For BA or TAA requirements, Ac juirements. Consult factory for fur Not for use with PRV-XL or PRV-M Only for use with PRV-XL or PRV-M Only for use with PRV-XL or PRV-M Only for use with PRV-XL or PRV-M onif and more. Consult your lightim, Requires 4-PIN twistlock receptan Requires 7-PIN NEMA twistlock pi er controls systems (MS, 2D, ZW Only available for PRV-M configur Only for use with PRV-XL. Fixed for PRV-M	configurable, requires WAC (eLinx system and software a linx application informatior , BZ or BK). titons. , DV, 8 or 9) or HA options. (, bessories sold separately wither information. configurations. ible to PRV-M, PRV-XL, or PF en ordering as a field-install lotion Sensor (MS) parametor grepresentative for more inf le option (ZD or ZW) option totocontrol receptacle (PR7 titons.	Sateway components WAC-PoE and ind requires system components to Consult LumenSafe system product II be separately analyzed under dor tv-P. able accessory (1, 2, 3, 4, or 6). Ref ers including high and low modes, s j option. The WOLC-7 cannot be usi J47V.	WPOE-120 in appropriate be installed for pages for additional nestic preference er to House Side Shield ensitivity, time delay, ed in conjunction with

LumenSafe Integrated Network Security Camera Technology Options (Add as Suffix)

Product Fam	nily	Camera Type	Data Backhaul						
L=LumenSafe Technology	LumenSafeTechnology	H=Dome Camera, High Res Z=Dome Camera, Remote PTZ	C=Cellular, Customer Installed SIM Card A=Cellular, Factory Installed AT&T SIM Card V=Cellular, Factory Installed Verizon SIM Card	S=Cellular, Factory Installed Sprint SIM Card E=Ethernet Networking					



Lumark

4-3/4"

[121mm]

Mounting Details





WM=QM Wall Mount Arm (PRV & PRV-P)



MA=QM Mast Arm (PRV & PRV-P)



ADJA=Adjustable Arm Pole Mount (PRV & PRV-P)



ADJA-WM=Adjustable Arm Wall Mount (PRV & PRV-P)



ADJS=Adjustable Slipfitter 3 (PRV & PRV-P)



SA=QM Pole Mount Arm (PRV-XL)



WM=QM Wall Mount Arm (PRV-XL)







ADJA=Adjustable Arm Pole Mount (PRV-XL)



ADJA-WM=Adjustable Arm Wall Mount (PRV-XL)



ADJS=Adjustable Slipfitter 3 (PRV-XL)





Mounting Details

SA=QM Pole Mount Arm (PRV-M)





WM=QM Wall Mount Arm (PRV-M)





MA=QM Mast Arm (PRV-M)





FMA=Fixed Mast Arm (PRV-M)





DM=Direct Pole Mount Arm (PRV-M)



Versatile Mount System



ADJS=Adjustable Slipfitter (PRV-M)



SP2=Adjustable Slipfitter 2-3/8" (PRV-M)





Mounting Details

Mounting Configurations and EPAs

NOTE: For 2 PRV's mounted at 90°, requires minimum 3' square or 4" round pole for fixture clearance. For 2 PRV-XL's mounted at 90°, requires minimum 4" square or round pole for fixture clearance. Customer is responsible for engineering analysis to confirm pole and fixture compatibility for applications

Housing Size	Tilt Angle (Degrees)	Arm Mount Single	Arm Mount 2 @ 180°	Arm Mount 2 @ 90°	Arm Mount 3 @ 90°	Arm Mount 4 @ 90°
Dreveil Detite	0°	0.54	1.08	0.84	1.38	1.38
Prevan Petite	60°	1.68	1.85	2.42	3.15	3.30
	0°	0.92	1.35	1.42	1.63	1.63
Prevail	60°	2.20	2.40	3.05	3.88	4.07
	60° + Full Drop Visor	2.20	2.40	3.25	4.28	4.47
	0°	1.12	2.25	2.13	2.52	2.52
Prevail XL	60°	3.99	4.30	5.26	6.51	6.79
	60° + Full Drop Visor	3.99	4.30	5.59	7.17	7.49
Provail Maxy	0°	1.28	2.56	1.7	2.69	2.69
Fievall WidXX	60°	5.09	5.52	6.34	7.49	7.81

Optical Configurations



- **Optics**
- Dark Sky Approved (3000K CCT and warmer only)
- Precision molded polycarbonate optics •

Electrical

- -40°C minimum operating temperature
- 40°C maximum operating temperature

OOPER

Lighting Solutions

- ٠ >.9 power factor
- <20% total harmonic distortion
- Class 1 electronic drivers have expected life of 100,000 hours with <1% failure rate
- 0-10V dimming driver is standard with leads external to the fixture
- Standard MOV surge protective device designed to withstand 10kV of transient line surge

- 1-1/2" to 4-7/8" (Type M drilling recommended for new installations)
- A knock-out on the standard mounting arm enables round pole mounting
- Adjustable pole and wall mount arms adjust in 5° increments from 0° to 60°; Downward facing orientation only (Type N drilling required for ADJA mount)
- Adjustable slipfitter arm adjusts in 5° increments from -5° to 85°; Downward facing orientation only
- Prevail and Prevail Petite: 3G vibration rated (all arms)
- Prevail XL Mast Arm: 3G vibration rated ٠
- Prevail XL Standard Arm: 1.5G vibration rated
- Adjustable Arms: 1.5G vibration rated •

Finish is compliant to 3,000 hour salt spray standard (per ASTM B117)

Typical Applications

• Parking lots, Walkways, Roadways and **Building Areas**

Shipping Data

- Prevail Petite: 18 lbs. (7.94 kgs.)
- Prevail: 20 lbs. (9.09 kgs.) •
- Prevail XL: 45 lbs. (20.41 kgs.) •
- Prevail Maxx: 49 lbs. (22.23 kgs.) •

Warranty

• Five year limited warranty, consult website for details. www.cooperlighting.com/legal

Prevail Disc Section

Section 4, Item B.

Energy and L	and Performa		Yiew PRV-P IES files			* \	/iew PR	V IES fil	es	📌 V	🖌 View PRV-XL IES file						
Pro	oduct Family		Prevai	l Petite			Pre	vail			Prev	ail XL			Prevai	Maxx	
Li	ght Engine	PA1A	PA1B	PA1C	PA1D	PA1A	PA1B	PA2A	PA2B	PA3A	PA3B	PA4A	PA4B	PA6A	PA6B	PA6C	PA6D
Power (Watts)	31	53	72	93	54	74	113	151	172	234	245	303	274	366	457	544
Drive Current	(mA)	375	670	930	1200	670	930	720	970	750	980	785	970	600	800	1000	1200
Input Current	@ 120V (A)	0.26	0.44	0.60	0.78	0.45	0.62	0.93	1.26	1.44	1.95	2.04	2.53	2.30	3.05	3.83	4.54
Input Current	@ 277V (A)	0.12	0.20	0.28	0.35	0.21	0.28	0.41	0.55	0.62	0.85	0.93	1.12	0.99	1.30	1.62	1.94
Input Current	@ 347V (A)	0.10	0.17	0.23	0.29	0.17	0.23	0.33	0.45	0.52	0.70	0.74	0.90	0.78	1.05	1.32	1.60
Input Current	@ 480V (A)	0.07	0.13	0.17	0.22	0.12	0.17	0.24	0.33	0.39	0.52	0.53	0.65	0.58	0.76	0.95	1.14
Distribution																	
	4000K/5000K Lumens	4,505	7,362	9,495	11,300	7,605	9,896	15,811	19,745	24,718	30,648	34,067	39,689	41,611	52,596	61,921	67,899
Type II	BUG Rating	B1-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G2	B2-U0-G3	B2-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B3-U0-G4	B4-U0-G5	B4-U0-G5	B4-U0-G5
Roadway	Lumens per Watt	147	139	132	121	141	134	141	131	144	131	139	131	152	144	135	125
	3000K Lumens ¹	4,103	6,705	8,647	10,291	6,926	9,012	14,399	17,982	22,511	27,912	31,025	36,145	37,896	47,900	56,392	61,837
	4000K/5000K Lumens	3,727	6,091	7,855	9,349	6,006	7,815	12,487	15,594	19,521	24,204	26,094	31,334	32,874	41,553	48,919	53,642
Type II Roadway	BUG Rating	B0-U0-G1	B0-U0-G2	B0-U0-G2	B1-U0-G2	B0-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G3	B1-U0-G3	B1-U0-G4	B1-U0-G4	B2-U0-G4	B2-U0-G4	B2-U0-G5	B2-U0-G5
w/ HSS	Lumens per Watt	121	115	109	100	111	106	111	103	113	103	107	103	120	114	107	99
	3000K Lumens ¹	3,394	5,547	7,154	8,514	5,470	7,117	11,372	14,201	17,778	22,043	24,502	28,545	29,939	37,843	44,552	48,853
	4000K/5000K Lumens	4,496	7,347	9,476	11,277	7,597	9,886	15,795	19,724	24,692	30,616	34,031	39,647	41,372	52,294	61,565	67,509
Type II Urban	BUG Rating	B1-U0-G1	B2-U0-G2	B2-U0-G2	B3-U0-G3	B2-U0-G2	2 B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G4	B4-U0-G4	B4-U0-G4	B4-U0-G4	B4-U0-G4	B5-U0-G5	B5-U0-G5	B5-U0-G5
	Lumens per Watt	146	139	131	121	141	134	141	131	144	131	139	131	151	143	135	124
	3000K Lumens ¹	4,095	6,691	8,630	10,271	6,919	9,003	14,384	17,963	22,488	27,882	30,992	36,107	37,678	47,625	56,068	61,481
	4000K/5000K Lumens	3,253	5,316	6,856	8,160	5,297	6,893	11,013	13,753	17,217	21,347	23,728	27,644	28,951	36,594	43,082	47,241
Type II Urban	BUG Rating	B1-U0-G1	B1-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G1	B1-U0-G2	B1-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G3	B2-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G4	B3-U0-G5	B3-U0-G5
1, 1100	Lumens per Watt	106	101	95	87	98	93	97	91	100	91	97	91	106	100	94	87
	3000K Lumens 1	2,963	4,841	6,244	7,431	4,824	6,277	10,029	12,525	15,680	19,441	21,609	25,176	26,366	33,327	39,235	43,023
	4000K/5000K Lumens	4,443	7,261	9,364	11,145	7,575	9,857	15,749	19,667	24,621	30,527	33,932	39,532	41,155	52,020	61,242	67,155
Type III	BUG Rating	BI-00-GI	BI-00-G2	120 BZ-00-GZ	B2-00-G2	BI-00-G2	100-G3	B3-00-G3	B3-00-G3	B3-00-G4	B3-00-G5	100-G5	100-65	B4-00-G5	B4-00-G5	B4-00-G5	B4-00-G5
	2000// Lumens 1	145	138	130	10150	140	133	141	130	143	130	138	130	150	142	134	123
	4000K/5000K Lumons	2,406	5,566	7 1 7 0	9 5 4 2	5,593	7.277	11,545	14 510	19 176	22,002	25.040	20 192	20 150	20 121	44 970	40.212
	BLIG Bating	B0-110-C1	B1_U0_G2	B1-110-62	81_U0_C2	B1-110-G2	B1-10-62	B1-110-62	B1_10_G3	B2-110-G4	B2-110-G4	B2-110-G4	29,103 B2-110-05	B2-110-05	B3-110-G5	83-110-G5	49,212
Type III w/ HSS	Lumens per Watt	111	105	100-02	91	104	98	103	96	106	96	102	96	110	104	98	90
	3000K Lumens ¹	3102	5.069	6.538	7 781	5.093	6.627	10.588	13 222	16 553	20.524	22 813	26.578	27466	34717	40872	44818
	4000K/5000K Lumens	4,348	7,106	9,164	10.906	7,484	9,738	15,560	19.431	24.325	30,161	33.525	39.057	41,207	52.086	61.320	67.240
	BUG Rating	B1-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G3	B2-U0-G2	2 B2-U0-G3	B3-U0-G3	B3-U0-G4	B3-U0-G4	B3-U0-G5	B3-U0-G5	B4-U0-G5	B4-U0-G5	B4-U0-G5	B4-U0-G5	B4-U0-G5
Type IV Wide	Lumens per Watt	142	135	127	117	139	132	139	129	141	129	137	129	151	142	134	124
	3000K Lumens ¹	3,960	6,471	8,346	9,932	6,816	8,869	14,170	17,696	22,153	27,468	30,531	35,570	37,528	47,435	55,845	61,236
	4000K/5000K Lumens	3,318	5,422	6,993	8,323	5,420	7,053	11,268	14,072	17,617	24,843	24,279	28,286	30,005	37,926	44,650	48,961
Type IV Wide	BUG Rating	B0-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G2	B1-U0-G3	B1-U0-G3	B1-U0-G4	B2-U0-G4	B2-U0-G4	B2-U0-G5	B2-U0-G5	B3-U0-G5	B3-U0-G5	B3-U0-G5
w/ HSS	Lumens per Watt	108	103	97	89	100	95	100	93	102	106	99	93	110	104	98	90
	3000K Lumens ¹	3,022	4,938	6,369	7,580	4,936	6,423	10,262	12,816	16,044	19,892	22,111	25,760	27,326	34,540	40,664	44,589
	4000K/5000K Lumens	4,497	7,349	9,478	11,280	7,831	10,190	16,281	20,332	25,453	31,559	35,079	40,868	42,947	54,285	63,909	70,079
Type V Square	BUG Rating	B3-U0-G1	B3-U0-G2	B4-U0-G2	B4-U0-G2	B3-U0-G2	84-U0-G3	B4-U0-G3	B5-U0-G3	B5-U0-G4	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5	B5-U0-G5
Wide	Lumens per Watt	146	139	131	121	145	138	145	135	148	135	143	135	157	143	136	129
	3000K Lumens ¹	4,095	6,693	8,632	10,273	7,132	9,280	14,827	18,517	23,180	28,741	31,947	37,219	39,112	49,438	58,203	63,822
NOTES:																	

1. For 3000K or HSS BUG Ratings, refer to published IES files



Energy and Performance Data

House Side Shield Reference Table

Product	Family	Prevail	Pre	vail	Prev	ail XL	Prevail Maxx
Light E	ngine	PA1	PA1	PA2	PA3	PA4	PA6
	Standard	HSS-HP (Qty 1)	HSS-VP (Qty 1)	HSS-HP (Qty 2)	HSS-HP (Qty 3)	HSS-VP (Qty 4)	HSS-HP (qty 6)
Rotated Optics	L90 or R90 option	HSS-VP (Qty 1)	HSS-HP (Qty 1)	HSS-VP (Qty 2)	HSS-VP (Qty 3)	HSS-HP (Qty 4)	HSS-VP (qty 6)

Sensor Color Reference Table (SPBx)

Housing Finish	Sensor Color
AP=Grey	Grey
BZ =Bronze	Bronze
BK =Black	Black
DP =Dark Platinum	Grey
GM =Graphite Metallic	Black
WH =White	White

Lumen Multiplier

Ambient Temperature	Lumen Multiplier
0°C	1.02
10°C	1.01
25°C	1.00
40°C	0.99
50°C	0.97

Lumen Maintenance

Ambient Temperature	TM-21 Lumen Maintenance (78,000 Hours)	Theoretical L70 (Hours)		
Up to 50°C	96.76%	> 896,000		



Control Options

0-10V This fixture provides 0-10V dimming wire leads for use with a lighting control panel or other control method.

Photocontrol (PR and PR7) Photocontrol receptacles provide a flexible solution to enable "dusk-to-dawn" lighting by sensing light levels. Advanced control systems compatible with NEMA 7-PIN standards can be utilized with the PR7 receptacle.

Dimming Occupancy Sensor (SPB, MS/DIM-LXX) These sensors are factory installed in the luminaire housing. When the SPB or MS/DIM sensor options are selected, the luminaire will dim down after five minutes of no activity detected. When activity is detected, the luminaire returns to full light output. These occupancy sensors include an integral photocell for "dusk-to-dawn" control or "daylight harvesting." Factory default is enabled for the MS sensors and disabled for the SPB. SPB motion sensors require the Sensor Configuration mobile application by Wattstopper to change factory default dimming level, time delay, sensitivity and other parameters. Available for iOS and Android devices. The SPB sensor is factory preset to dim down to approximately 10% power with a time delay of five minutes.





WaveLinx Wireless Control and Monitoring System Available in 7-PIN or 4-PIN configurations, the WaveLinx Outdoor control platform operates on a wireless mesh network based on IEEE 802.15.4 standards enabling wireless control of outdoor lighting. At least one Wireless Area Controller (WAC) is required for full functionality and remote communication (including adjustment of any factory pre-sets).

WaveLinx Outdoor Control Module (WOLC-7P-10A) A photocontrol that enables astronomic or time-based schedules to provide ON, OFF and dimming control of fixtures utilizing a 7-PIN receptacle. The out-of-box functionality is ON at dusk and OFF at dawn.

WaveLinx Wireless Sensor (SWPD4 and SWPD5) These outdoor sensors offer passive infrared (PIR) occupancy sensing and a photocell for closed-loop daylight sensing. These sensors can be factory installed or field-installed via simple, tool-less integration into luminaires equipped with the Zhaga Book 18 compliant 4-PIN receptacle (ZD or ZW). These sensors are factory preset to dim down to approximately 50 percent power after 15 minutes of no activity detected, and the photocell for "dusk-to-dawn" control is default enabled. A variety of sensor lenses are available to optimize the coverage pattern for mounting heights from 7'-40'.



LumenSafe (LD) The LumenSafe integrated network camera is a streamlined, outdoor-ready camera that provides high definition video surveillance. This IP camera solution is optimally designed to integrate into virtually any video management system or security software platform of choice. No additional wiring is needed beyond providing line power to the luminaire. LumenSafe features factory-installed power and networking gear in a variety of networking options allowing security integrators to design the optimal solution for active surveillance.



Cooper Lighting Solutions 1121 Highway 74 South Peachtree City, GA 30269 P: 770-486-4800 www.cooperlighting.com © 2023 Cooper Lighting Solutions All Rights Reserved. Specifications and dimensions

Specifications and dimensions subject to change without notice

					Section 4, Item B	
Project	Catalog #		Туре	-		
Prepared by	Notes		Date			



Lumark

Prevail Petite Discrete Wall

Wall Mount Luminaire

Product Features



Interactive Menu

- Ordering Information page 2
- Mounting Details page 3
- Product Specifications page 3
- Energy and Performance Data page 4
- Control Options page 5

Product Certifications



Quick Facts

- Direct-mounted discrete light engine for improved optical uniformity and visual comfort
- Lumen packages range from 4,300 11,300 lumens (30W - 90W)
- Replaces 70W up to 250W HID equivalents
- Efficacies up to 147 lumens per watt
- Surface mount configuration with standard conduit entry

Connected Systems

• WaveLinx

Dimensional Details

Surface Mount (SM)







NOTES: 1. Visit <u>https://www.designlights.org/search/</u> to confirm qualification. Not all product variations are DLC qualified. 2. IDA Certified for 3000K CCT and warmer only.



Ordering Information

SAMPLE NUMBER: PRV-P-PA1B-740-U-T4W-SM-BZ

	Light Engine		Color				
Product Family ¹	Configuration	Drive Current ²	Temperature	Voltage	Distribution Mounting (Included)		Finish
PRV-P=Prevail Petite BAA-PRV-P=Prevail Petite BAA Compliant ²³ TAA-PRV-P=Prevail Petite TAA Compliant ²³	PA1=1 Panel, 24 LED Rectangle	A=400mA Nominal B=700mA Nominal C=950mA Nominal D=1200mA Nominal	740=70CRI, 4000K 730=70CRI, 3000K 750=70CRI, 5000K	U= Universal, 120-277V H= High Voltage, 347-480V 1=120V 2=208V 3=240V 4=277V 8=480V ^{3, 24} 9=347V DV=Duravolt, 277-480V	T2R=Type II Roadway SM=Surface Wall Mount T2U=Type II Urban WM=Wall Mount Arm T3=Type III T4W=Type IIV T4W=Type IV Wide SWQ=Type V Square Wide		BZ=Bronze AP=Grey BK=Black DP=Dark Platinum GM=Graphite Metallic WH=White
	Opti	ons (Add as Suffix)			Acce	essories (Order Separately) ¹	8, 19
10K+10kV UL 1449 Fused Surge Protective Device HSS-HP=House Side Shield, Horizontal Panel? 20MSP-20kV MOV Surge Protective Device DARA 1013=Photocontrol Shorting Cap 20MSP-20kV MOV Surge Protective Device DARA 1013=Photocontrol Shorting Cap 20MSP-20kV MOV Surge Protective Device DARA 1013=Photocontrol Shorting Cap 20MSP-20kV MOV Surge State Prack (Ambient Temp, 0° to 40°C) 4° DARA 1015=Photocontrol - 347V F=Snejderuse Used with Voltages 208, 240 or 480V) DARA 1016=HEMA Photocontrol - 480V EBP=Cold Weather Emergency Battery Pack (Ambient Temp, -20° to 40°C) 4° DARA 1016=HEMA Photocontrol - 480V CBP-Cold Weather Emergency Battery Pack (Ambient Temp, -20° to 40°C) 4° WOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WDOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WDOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WDOL-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WDOL-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° WOLC-7P-10A=Watclike Sconfiguration Tool for Occupancy Sensor 3° PGC-Butch Photocontrol 1° Remote Programmable, 5° 20' Mounting \$*1,*1* WOLC-7P-10A=Watclike Sconfiguration Sensor, IR Remote Programmable							
 NOTES: 1. DesignLights Consortium® Qualified. Refer to www.designlights.org Qualified Products List under Family Models for details. 2. Norminal drive currents shown here. For actual drive curren by configuration, refer to Power and Lumens tables. 3. 480V not to be used with unigrounded or impedance grounded systems. 4. Only available on Surface Wall Mount (SM) mounting. 5. Must use with Univeral (U) voltage only. Not available with other voltage options. Not available with PA1D light engine. 6. House Side Shield not for use with SWQ distribution. 7. Not available with EBP, CBP, or CBP-CEC options. Not available with PA1D light engine. 8. Salt spray tested to over 5,000-hours per ASTM B117 with a scribe rating of 9 per ASTM D1654. Also achieves 7,000-hour rating per ASTM B117 with a scribe rating of 4 per ASTM D1654. Extended lead times may apply. 9. Option is not available with other controls: photocontrol that matches the input voltage. 10. If High Voltage (H) or Duvalvol (DV) is specified, use aphotocontrol that matches the input voltage. 11. Option not available with High Voltage (H). Must specified otherwise via PDR. To field-configure, order FSIR-100 accessory separately. 12. Utilizes the Wattstopper sensor FSP-3XX series. Sensor color determined by product finish. See Sensor Color Reference Table. Field-configures via mobile application. See Controls section for details. 14. Sensor passive infrared (PIR) may be overly sensitive when operating below -20° C (4+F). 15. In order for the device to be field-configures, components WAC-PoE and WPDE-120 in appropriate quantities. Only compatible with WaveLinx system and software and requires system components to be installed for operation. See website for more Wavelinx application information. 16. Replace X with spans color (WH, BZ or BN). 17. Requires 4-PIN twistlock receptacle option (Z) or ZW) option. <li< td=""></li<>							

Tor more information. Components simpled separately may be separately analyzed under domestic preference requirements. 24. DuraVol drivers feature added protection from power quality issues such as loss of neutral, transients and voltage fluctuations. Visit <u>www.signify.com/duravolt</u> for more information. 25. Cannot be used with PR7 or other motion response control options.



Lumark

Prevail Petite Disc

Mounting Details

Surface Mount Plate (SM)



Surface Mount Assembly (SM)





Product Specifications

Construction

- Single-piece die-cast aluminum housing
- Tethered die-cast aluminum door Surface Mount (SM) offers two 1/2" NPT conduit ٠
- entry plugs
- ٠ Not suitable for inverted mount installation

Optics

- Dark Sky Approved (3000K CCT and warmer only) ٠
- Precision molded polycarbonate optics

Electrical

- -40°C minimum operating temperature ٠
- 40°C maximum operating temperature
- >.9 power factor •

- <20% total harmonic distortion ٠
- Class 1 electronic drivers have expected life of • 100,000 hours with <1% failure rate
- 0-10V dimming driver is standard with leads external to the fixture
- Standard MOV surge protective device designed to withstand 10kV of transient line surge
- Luminaire available with the field adjustable dimming controller (FADC) to manually adjust wattage and reduce the total lumen output and light levels. Comes pre-set to the highest position at the lumen output selected.

Typical Applications

Outdoor, Pedestrian Pathways, Building Entrances, Loading Docks, Perimeter Parking Lots

Finish

Five-stage super TGIC polyester powder coat paint, 2.5 mil nominal thickness

Shipping Data

Prevail Petite (with CBP): 21 lbs. (9.53 kgs.)

Warranty

Five year limited warranty, consult website for details. www.cooperlighting.com/legal



Prevail Petite Disc Section 4, Item B.

Energy and Performance Data

Power and Lumens

	Light Engine	PA1A	PA1B	PA1C	PA1D
Power (Wa	tts)	31	53	72	93
Drive Current (mA)		375	670	930	1200
Input Current @ 120V (A)		0.26	0.44	0.60	0.78
Input Curre	ent @ 277V (A)	0.12	0.20	0.28	0.35
Input Curre	ent @ 347V (A)	0.10	0.17	0.23	0.29
Input Curre	ent @ 480V (A)	0.07	0.13	0.17	0.22
Distributio	n				
	4000K/5000K Lumens	4,505	7,362	9,495	11,300
Type II Roadway	BUG Rating	B1-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2
	Lumens per Watt	147	139	132	121
	3000K Lumens ¹	4,103	6,705	8,647	10,291
	4000K/5000K Lumens	3,727	6,091	7,855	9,349
Type II	BUG Rating	B0-U0-G1	B0-U0-G2	B0-U0-G2	B1-U0-G2
Roadway w/ HSS	Lumens per Watt	121	115	109	100
	3000K Lumens ¹	3,394	5,547	7,154	8,514
	4000K/5000K Lumens	4,496	7,347	9,476	11,277
Type II	BUG Rating	B1-U0-G1	B2-U0-G2	B2-U0-G2	B3-U0-G3
Urban	Lumens per Watt	146	139	131	121
	3000K Lumens ¹	4,095	6,691	8,630	10,271
	4000K/5000K Lumens	3,253	5,316	6,856	8,160
Type II Urban w/ HSS	BUG Rating	B1-U0-G1	B1-U0-G1	B1-U0-G2	B1-U0-G2
	Lumens per Watt	106	101	95	87
	3000K Lumens ¹	2,963	4,841	6,244	7,431
	4000K/5000K Lumens	4,443	7,261	9,364	11,145
	BUG Rating	B1-U0-G1	B1-U0-G2	B2-U0-G2	B2-U0-G2
туре п	Lumens per Watt	145	138	130	119
	3000K Lumens ¹	4,046	6,612	8,528	10,150
	4000K/5000K Lumens	3,406	5,566	7,179	8,543
Type III	BUG Rating	B0-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2
w/ HSS	Lumens per Watt	111	105	100	91
	3000K Lumens ¹	3,102	5,069	6,538	7,781
	4000K/5000K Lumens	4,348	7,106	9,164	10,906
Type IV	BUG Rating	B1-U0-G2	B2-U0-G2	B2-U0-G2	B2-U0-G3
Wide	Lumens per Watt	142	135	127	117
	3000K Lumens ¹	3,960	6,471	8,346	9,932
	4000K/5000K Lumens	3,318	5,422	6,993	8,323
Type IV	BUG Rating	B0-U0-G1	B1-U0-G2	B1-U0-G2	B1-U0-G2
HSS	Lumens per Watt	108	103	97	89
	3000K Lumens ¹	3,022	4,938	6,369	7,580
	4000K/5000K Lumens	4,497	7,349	9,478	11,280
Type V	BUG Rating	B3-U0-G1	B3-U0-G2	B4-U0-G2	B4-U0-G2
Square Wide	Lumens per Watt	146	139	131	121
	3000K Lumens ¹	4,095	6,693	8,632	10,273
NOTES: 1. For 3000K o	r HSS BUG Ratings, refer to publis	hed IES files.			

Power and Lumens: Emergency Configurations

	Light Engine	PA1A	PA1B	PA1C				
Power (Wa	tts)1	37	37 59					
Input Curre	ent @ 120V (A)	0.33	0.52	0.68				
Input Curre	ent @ 277V (A)	0.16	0.24	0.31				
Distributio	n²							
Type II	4000K/5000K Lumens		2,035					
Roadway	3000K Lumens		1,853					
Type II	4000K/5000K Lumens	2,030						
Urban	3000K Lumens	1,849						
Town III	4000K/5000K Lumens	2,007						
туре п	3000K Lumens	1,827						
Type IV	4000K/5000K Lumens	1,964						
Wide	3000K Lumens	1,788						
Type V	4000K/5000K Lumens	2,031						
Wide	3000K Lumens	1,849						
NOTES: 1. Power and cur 2. Estimated lun	NOTES: 1. Power and current based on full power consumption while EBP or CBP is charging. 2. Estimated lumen outputs while luminaire is operating in emergency mode only at full charge.							

Lumen Maintenance

Configuration	TM-21 Lumen Maintenance (50,000 Hours)	Theoretical L70 (Hours)		
Up to 50°C	96.76%	> 663,000		

Sensor Color Reference Table (SPBx)

Housing Finish	Sensor Color
AP=Grey	Grey
BZ =Bronze	Bronze
BK =Black	Black
DP =Dark Platinum	Grey
GM =Graphite Metallic	Black
WH =White	White

Lumen Multiplier

Ambient Temperature	Lumen Multiplier
0°C	1.02
10°C	1.01
25°C	1.00
40°C	0.99
50°C	0.97

FADC Settings

Lumen Multiplier
25%
46%
55%
62%
72%
77%
82%
85%
90%
100%

Control Options

0-10V This fixture provides 0-10V dimming wire leads for use with a lighting control panel or other control method.

Photocontrol (PR and PR7) Photocontrol receptacles provide a flexible solution to enable "dusk-to-dawn" lighting by sensing light levels. Advanced control systems compatible with NEMA 7-PIN standards can be utilized with the PR7 receptacle.

Dimming Occupancy Sensor (SPB, MS/DIM-LXX and MS-LXX) These sensors are factory installed in the luminaire housing. When the SPB or MS/DIM sensor options are selected, the luminaire will dim down after five minutes of no activity detected. When activity is detected, the luminaire returns to full light output. When a sensor for ON/OFF operation (MS-LXX) is selected, the luminaire will turn off after five minutes of no activity. These occupancy sensors include an integral photocell for "dusk-to-dawn" control or "daylight harvesting." Factory default is enabled for the MS sensors and disabled for the SPB. SPB motion sensors require the Sensor Configuration mobile application by Wattstopper to change factory default dimming level, time delay, sensitivity and other parameters. Available for iOS and Android devices. The SPB sensor is factory preset to dim down to approximately 10% power with a time delay of five minutes.





WaveLinx Wireless Control and Monitoring System Available in 7-PIN or 4-PIN configurations, the WaveLinx Outdoor control platform operates on a wireless mesh network based on IEEE 802.15.4 standards enabling wireless control of outdoor lighting. At least one Wireless Area Controller (WAC) is required for full functionality and remote communication (including adjustment of any factory pre-sets).

WaveLinx Outdoor Control Module (WOLC-7P-10A) A photocontrol that enables astronomic or time-based schedules to provide ON, OFF and dimming control of fixtures utilizing a 7-PIN receptacle. The out-of-box functionality is ON at dusk and OFF at dawn.

WaveLinx Wireless Sensor (SWPD4 and SWPD5) These outdoor sensors offer passive infrared (PIR) occupancy sensing and a photocell for closed-loop daylight sensing. These sensors can be factory installed or field-installed via simple, tool-less integration into luminaires equipped with the Zhaga Book 18 compliant 4-PIN receptacle (ZD or ZW). These sensors are factory preset to dim down to approximately 50 percent power after 15 minutes of no activity detected, and the photocell for "dusk-to-dawn" control is default enabled. A variety of sensor lenses are available to optimize the coverage pattern for mounting heights from 7'-40'.





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				Section 4, Item B
Project	Catalog #	Туре		
Prepared by	Notes	Date		



McGraw-Edison

TT TopTier

Parking Garage Luminaire

Product Features

BAA

Product Certifications











Quick Facts

Lumen packages range from 2,757 - 22,831

• Energy and Performance Data page 4

- Efficacies up to 146 lumens per watt
- Utilizes patented waveguide technology for maximum visual comfort
- Surface, pendant, trunnion, wall and direct • conduit mount options

Connected Systems WaveLinx Lite

Synapse

Dimensional Details

Interactive Menu

• Ordering Information page 2 • Product Specifications page 2 • Optical Configurations page 2 • Mounting Details page 3

• Control Options page 6

SURFACE MOUNT

CQ, MQ, WQ and RW: D1-D6 DL: D1-D4 Base luminaire weight: 18.2 lbs (8.3 kg)



SURFACE MOUNT CQ, MQ, WQ and RW: D7+ DL: D5+ Base luminaire weight: 20.1 lbs (9.1 kg)

4-13/16" [122mm]





Visit <u>https://www.designlights.org/search/</u> to confirm qualification. Not all product variations are DLC qualified.
 IDA Certified for 3000K CCT and warmer only.



Ordering Information

SAMPLE NUMBER: TT-D3-740-U-WQ-STM-30L-AP

Flouuct Failing	Configuration	Color remperature	voltage	Distribution	-			Fillisti	
TT=TopTier ¹ BAA-TT=TopTier, Buy American Act Compliant ²⁷ TAA-TT=TopTier, Trade Agreements Act Compliant ²⁷	D1=4,000 Nominal Lumens D2=5,500 Nominal Lumens D3=6,500 Nominal Lumens D4=8,000 Nominal Lumens D5=10,000 Nominal Lumens D6=13,000 Nominal Lumens D7=15,000 Nominal Lumens D8=18,000 Nominal Lumens D9=20,000 Nominal Lumens D10=22,000 Nominal Lumens	735=70 CRI, 3500K CCT 740=70 CRI, 4000K CCT 750=70 CRI, 5000K CCT 830=80 CRI, 3000K CCT AMB=Amber 590nm ²⁹	U=120-277V H=347-480V ^{22.26} 1=120V 2=208V 3=240V 4=277V 8=480V 9=347V	CQ=Concentrated MQ=Medium WQ=Wide RW=Rectangular Wide ³⁰ DL=Drive Lane / Type 4 ³⁰	[Blank]=Surfac TMB=Trunnion Connection Bo: DPM=Decorativ WM=Wall Mour STM=Stem Mou	e Mount ¹⁶ Mount with < /e Pendant Mount ⁴ it .nt to 1/2" conduit ¹⁶	[Blank]=6" 30L=30" 36L=36" 48L=48" 72L=72" 108L=108" 120L=120" 144L=144"	NW=White AP=Grey BZ=Bronze BK=Black DP=Dark Platinum GM=Graphite Metallic	
		Options (Add as Suffi	ix)			Accessorie	es (Order Separate	ely) 28	
F=Single Fuse (120, 277 FF=Double Fuse (208, 24 IBP=Integral Battery Pac IBP=CEC=Integral Battery ITS=Integral Transfer SW 924=UL924 listed luminc GG=Clear Glass ⁸ SG=Solite* Glass ⁹ UPL=Uplight* TR=Tamper Resistant Ha NAT=Natarorium finish DALI=DALI Driver ¹⁵ MS/DIM-L08=Dimming (SPB1=Dimming Motion a Programmable, < 8' Mou SPB2=Dimming Motion a	or 347V Specify Voltage) 10 or 480V Specify Voltage) 25 ^{5, 24} 24 Y Pack, CEC compliant ⁵ 27 Y Pack, CEC compliant ⁵ 20 Y Pack,	ZW=WaveLinx-e ZD=SR Driver-eu ZW-WOBWH=W Programmable, ZW-WOFWH=W Programmable, ZD-WOFWH=W Programmable, ZD-WOFWH=W Programmable, ZW-SWPD4WH= Programmable, ZD-SWPD5WH= Programmable, ZD-SWPD5WH= Programmable, ZD-SWPD5WH= Programmable, LWR-LW=Enligh LWR-LN=Enligh DIM10-L08=Syn DIM10-L20=Syn	enabled 4-PIN Twiss nabled 4-PIN Twiss (aveLinx Lite, Dimm 7'-15' Mounting ²² aveLinx Lite, Dimm 15'-40' Mounting aveLinx Lite, SR Dri 15'-40' Mounting "WaveLinx Pro, Din 7'-15' Mounting "WaveLinx Pro, SR I 15'-40' Mounting "WaveLinx Pro, SR I 7'-15' Mounting "WaveLinx Pro, SR I 15'-40' Mounting ted Wireless Senso ted Wireless Senso napse occupancy so	tlock Receptacle ^{22, 23} lock Receptacle ^{22, 23} ing Motion and Daylight, Blue 22, 30 ver, Dimming Motion and Day 22, 31 ming Motion and Daylight, W 22, 32 ming Motion and Daylight, W 22, 33 Driver, Dimming Motion and D 22, 32 Driver, Dimming Motion and D 32 Driver, D 32	etooth light, Bluetooth light, Bluetooth IAC laylight, WAC laylight, WAC g Height ^{11, 18} ting Height ^{11, 18}	MA1252=Replacement 10kV Surge Module TT/WG=Wire Guard ²⁵ TT/BC-UP-XX=Bird Guard ^{12,13} TT/HSS-XX=House Side Shield ²⁵ DPMS36-XX=36 [°] Pendant Mount Stem ^{12,14} DPMS36-XX=48 [°] Pendant Mount Stem ^{12,14} DPMST36-XX=48 [°] Pendant Mount Stem with Tether ^{12,14,31} DPMST36-XX=48 [°] Pendant Mount Stem with Tether ^{12,14,31} DPMST36-XX=48 [°] Pendant Mount Stem with Tether ^{12,14,31} DPMST36-XX=48 [°] Pendant Mount Stem with Tether ^{12,14,31} Sign=10=Wireless Configuration Tool for Occupancy Sensor ¹⁷ WOB-WH= WaveLinx Lite Sensor, Dimming Motion and Daylight, Bluetooth Programmable, 7 [°] - 15 [°] Mounting ^{20,22} WOF-WH= WaveLinx Sensor, Dimming Motion and Daylight, WAC Programmable, 7 [°] - 15 [°] Mounting ^{20,22,23} SWPD4-WH= WaveLinx Sensor, Dimming Motion and Daylight, WAC Programmable, 7 [°] - 15 [°] Mounting ^{20,22,23} SPB4=Dimming Motion and Daylight Sensor, Bluetooth Programmable, 20 [°] - 40 [°] Mounting ^{11,21}			
NOTES: 1. DesignLights Consortium® Models for details. 2. Only for use with 480V Wys systems or corner grounded 3 Delta and Three Phase Corne 3. Not available with D7 - D10 4. Order Pendant Mount Stem 5. IBP ambient operating tem configurations, DALI, or ZD oj 6. Additional 8.0W. Provides 1 7. Choose lead length for Surf 8. Not available with CQ. 9. Standard with CQ. option a 10. U voltage only. Ambient o component. 11. Includes integral photoce 12. Specify color use with Ste 14. Designed for use with Ste 14. Designed for use with Ste 15. Not available with H volta 16. Not available with H volta	Qualified. Refer to www.designlights.o e systems. Per NEC, not for use with ung systems (commonly known as Three Ph forounded Delta systems). configurations. a accessory. perature - 20°C to 35°C (D1-D3), -20°C t ptions. 920 lumens. Not available with D10 con face Mount and Stem Mount only. TMB, vailable with WQ only. perating temperature -20°C to 50°C (D1 II. (X. m Mount and Decorative Pendant Mour corative Pendant Mount only. ge or IBP. Not compatible with MS/DIM vire harness length.	rg Qualified Products List under F grounded systems, impedance gr ase Three Wire Delta, Three Phas o 25°C (D4-D6). Not available wit figuration. DPM and WM lengths predeterm -D4) or -20°C to 40°C (D5-D6). UI t only.	Family 17. The 18. Enli iounded 19. 924 se High Leg 20. Req 21. Sen 22. Can 23. For 24. Spe 25. TT/ tined. 26. D4- 27. Only Agreem L924 listed separat 28. Acc 29. Nam 30. Not 31. For fixture µ Surface	FSIR-100 configuration tool is requ ghted wireless sensors are factory option provides luminaire UL924 li uires ZW or ZD receptacle. sor configuration mobile applications to the used with other control opti WaveLinx applications, WAC Gatew actor) power supply if needed. Not i cify 120V or 277V. WG and TT/HSS cannot be installed D10 only. Not compatible with battk product configurations with these enents Act of 1979 (TAA), respective ley may be separately analyzed unn essories soid separately will be sepa row-band 590mm +/- Smm for wildlife available in D10 configuration. installations in locations such as g potentially will be subject to impact Mount, Trunnion Mount (TMB), Wa	ired to adjust param installed only, and r sting, used in conjur on required for confiq ons. vay required to enabi required for WaveLir d together. TT/HSS & ery. d together. TT/HSS & designated prefixes der designated prefixes user for the state and observatory use. ymnasiums, arenas, ts from external sou all Mount (WM) and S	eters including high and low mod equire network components in ap- totion with ITS or IBP-CEC. guration. See controls page for de le field-configurability: Order WAC tx Lite Commercial (LC) application & TT/WG not available on D7-D10 of a are built to be compliant with the <u>DMSTIC PREFERENCES</u> website ence requirements. Choose lumen package D1. sports complexes, multi-purpose roces, DPM mounting is required, u Ster Mount (STM) are prohibited	es, sensitivity, time del rorpriate quantities. tails. -PoE and WPOE-120 (1 ins. sonfigurations. Buy American Act of 1 for more information. C c. Consult factory for fur rooms, and any other I tilizing the stem kit wit in these applications.	ay and more. DV to 933 (BAA) or Trade components shipped ther information. ocations where the h tether (DPMST*).	
Product Spe	cifications								

Construction

• Low profile, die-cast aluminum housing provides a clean, symmetric aesthetic

Optics

- Five optical distributions utilizing visual comfort waveguide technology
- 10 lumen packages, ranging from 2,757 to 22,831
- Integral uplight option utilizes a dedicated, 8W light engine, producing 920 lumens for reduced visual contrast and cave effect
- IDA Certified for 3000k CCT and warmer only. Not available with uplight option.

Electrical

• D1-D6: -40C - 50C operating temperature

LOOPER

Lighting Solutions

- D7-D10: -40C 40C operating temperature
- **Optical Distributions**

- Greater than 90% lumen maintenance at 50,000 hours
- IP66 rated
- 120-277V 50/60Hz, 347V 60Hz or 480V 60Hz operation
- 10kV surge module standard
- 0-10V dimming standard

Mounting

- Surface mount directly to square or octagonal 4" surface or recessed junction box using quick mount bracket
- Optional stem mount bracket with set screw for direct 1/2" NPS conduit mounting
- Trunnion, decorative pendant, and wall mount options also available
- · For installations in locations such as

gymnasiums, arenas, sports complexes, multipurpose rooms, and any other locations where the fixture potentially will be subject to impacts from external sources, the stem kit with tether (DPMST*) is required.

Finish

- 2.5 mil nominal TGIC powder coat thickness
- Finishes include white, black, bronze, gray, dark platinum and graphite metallic
- RAL and custom color matches available
- Natatorium option (NAT) available, providing 5,000 hour salt spray rating per ASTM B117, with a scribe rating of 9 per ASTM D1654

Warranty

• Five-year warranty



McGraw-Edison

Mounting Details



Stem Mount





Trunnion Mount





18-3/8" [467mm]

Wall Mount





Top View - Wall Mount

Wire Guard (TT/WG)

Accessories





House Side Shield (TT/HSS-XX)





McGraw-Edison

Energy and Performance Data

Power and Lumens (3000K/3500K/4000K/5000K)

🖌 View TopTier IES files

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								Dr	57	DO	DO	D10
D (11)	Lumen Pack	age		02	03	D4	247	105.0	1047	140.7	170.1	100.0
Power (wa	ttage) CQ, MQ, W	ų	28.0	39.2	47.2	57.0	74.7	105.2	124.7	148.7	173.1	193.8
Power (wa	ttage) RW Uniy		28.0	39.2	47.2	57.0	/4./	105.2	127.1	152.0	178.0	
Power (Wa	ttage) DL Only		28.8	40.5	48.8	59.8	62.3	97.4	127.1	152.6	178.0	-
Distribution	n											
	CQ Concentrated	Lumens	3,409	4,640	5,595	6,660	8,383	11,030	12,307	14,411	16,430	18,001
		BUG Rating	B1-U0-G1	B2-U0-G1	B2-U0-G1	B2-U0-G1	B3-U0-G1	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2
		Lumens per Watt	122	118	119	116	112	105	99	97	95	93
	MO	Lumens	3,647	4,964	5,986	7,125	8,969	11,800	12,854	15,053	17,161	18,802
	Medium	BUG Rating	B2-U0-G1	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3
		Lumens per Watt	130	127	127	124	120	112	103	101	99	97
3000K		Lumens	3,449	4,695	5,662	6,740	8,483	11,161	12,350	14,463	16,489	18,065
CCT 80 CRI	WQ Wide	BUG Rating	B2-U0-G1	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
		Lumens per Watt	123	120	120	117	114	106	99	97	95	93
	RW	Lumens	2,757	3,753	4,526	5,387	6,781	8,922	11,977	13,619	15,122	
	Rectangular	BUG Rating	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	
	wide	Lumens per Watt	98	96	96	94	91	85	94	89	85	-
	וח	Lumens	2,959	3,985	4,762	5,622	6,537	8,771	11,834	13,337	14,768	
	Drive Lane /	BUG Rating	B1-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3	B1-U0-G3	B2-U0-G3	B2-U0-G4	B2-U0-G4	B2-U0-G4	
	Type 4	Lumens per Watt	103	98	98	94	105	90	93	87	83	-
	CQ Concentrated	Lumens	3,618	4,925	5,940	7,070	8,899	11,708	14,944	17,500	19,951	21,858
		BUG Rating	B1-U0-G1	B2-U0-G1	B2-U0-G1	B2-U0-G1	B3-U0-G1	B3-U0-G2	B3-U0-G2	B3-U0-G2	B4-U0-G2	B4-U0-G2
		Lumens per Watt	129	126	126	123	119	111	120	118	115	113
	MQ Medium	Lumens	3,872	5,270	6,355	7,564	9,520	12,527	15,609	18,279	20,839	22,831
		BUG Rating	B2-U0-G2	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3
		Lumens per Watt	138	134	135	131	127	119	125	123	120	118
3500K	WQ	Lumens	3,662	4,984	6,011	7,154	9,005	11,848	14,997	17,562	20,022	21,936
CCT		BUG Rating	B2-U0-G1	B3-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G4
70 CRI	wide	Lumens per Watt	131	127	127	124	121	113	120	118	116	113
	RW Rectangular	Lumens	2,927	3,984	4,805	5,719	7,198	9,471	14,544	16,537	18,363	
		BUG Rating	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	
	Wide	Lumens per Watt	105	102	102	99	96	90	114	108	103	
		Lumens	3.141	4.230	5.055	5.968	7.938	10.650	14.370	16.195	17.933	-
	DL Drive Lane /	BUG Bating	B1-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G4	B3-U0-G4	B3-U0-G5	-
	Type 4	Lumens per Watt	109	104	104	100	127	109	113	106	101	-
		Lumens	3.828	5.211	6.284	7.480	9.415	12.387	14,944	17.500	19.951	21.858
	CQ	BUG Bating	B1-U0-G1	B2-U0-G1	B2-U0-G1	B2-U0-G1	B3-U0-G1	B3-U0-G2	B3-U0-G2	B3-U0-G2	B4-U0-G2	B4-U0-G2
	Concentrated	Lumens per Watt	137	133	133	130	126	118	120	118	115	113
			4 096	5 575	6 723	8.002	10.072	13 253	15 609	18 279	20.839	22.831
	MQ	BLIC Pating	R2-110-C2	B2-U0-C2	B2-U0-C2	B2-110-C2	B2-110-C2	R2-110-C2	R4-110-C2	R4-110-C2	R4-110-C2	B4-U0-C2
	Medium	Lumons por Watt	146	142	142	120	125	126	125	122	120	110
			2.974	E 070	6 250	7 560	0.527	12.525	14.007	17 562	20.022	21.026
4000K/ 5000K	WQ	DUC Dating	3,874	5,273	0,309	7,309	9,527	12,030 D4 U0 C2	14,997	17,302 D4110.02	20,022	21,930
CCT 70 CRI	Wide	BUG Rating	B2-00-G1	B3-00-G2	B3-00-G2	B3-00-G2	B3-00-G3	B4-00-G3	B4-00-G3	B4-00-G3	B4-00-G3	B4-00-G4
700		Lumens per Watt	138	135	135	131	128	119	120	118	116	113
	RW	Lumens	3,097	4,215	5,083	6,050	7,615	10,020	14,544	16,537	18,363	
	Rectangular Wide	BUG Rating	B2-U0-G2	B3-U0-G2	B3-U0-G2	B3-U0-G3	B3-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	B4-U0-G3	-
		Lumens per Watt	111	108	108	105	102	95	114	108	103	-
	DL	Lumens	3,323	4,475	5,348	6,314	7,938	10,650	14,370	16,195	17,933	-
	Drive Lane / Type 4	BUG Rating	B1-U0-G2	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G3	B2-U0-G4	B3-U0-G4	B3-U0-G5	
	Type 4	Lumens per Watt	115	110	110	106	127	109	113	106	101	-



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Energy and Performance Data

CQ, MQ and WQ Distributions

Lumen Package	D1	D2	D3	D4	D5	D6	D7	D8	D9	D10
Power (Wattage)	28.0	39.2	47.2	57.6	74.7	105.2	124.7	148.7	173.1	193.8
Input Current @ 120V (A)	0.23	0.33	0.39	0.48	0.62	0.88	1.09	1.31	1.53	1.72
Input Current @ 208V (A)	0.13	0.19	0.23	0.28	0.36	0.51	0.57	0.67	0.78	0.88
Input Current @ 240V (A)	0.12	0.16	0.20	0.24	0.31	0.44	0.56	0.66	0.76	0.85
Input Current @ 277V (A)	0.10	0.14	0.17	0.21	0.27	0.38	0.49	0.58	0.67	0.74
Input Current @ 347V (A)	0.08	0.11	0.14	0.17	0.22	0.30	0.40	0.47	0.55	0.62
Input Current @ 480V (A)	0.06	0.08	0.10	0.12	0.16	0.22	0.30	0.35	0.41	0.45

RW Distribution

Lumen Package	D1	D2	D3	D4	D5	D6	D7	D8	D9
Power (Wattage)	28.0	39.2	47.2	57.6	74.7	105.2	127.1	152.6	178.0
Input Current @ 120V (A)	0.23	0.33	0.39	0.48	0.62	0.88	1.11	1.34	1.58
Input Current @ 208V (A)	0.13	0.19	0.23	0.28	0.36	0.51	0.58	0.69	0.81
Input Current @ 240V (A)	0.12	0.16	0.20	0.24	0.31	0.44	0.56	0.67	0.78
Input Current @ 277V (A)	0.10	0.14	0.17	0.21	0.27	0.38	0.50	0.59	0.68
Input Current @ 347V (A)	0.08	0.11	0.14	0.17	0.22	0.30	0.41	0.48	0.57
Input Current @ 480V (A)	0.06	0.08	0.10	0.12	0.16	0.22	0.30	0.36	0.42

DL Distribution

Lumen Package	D1	D2	D3	D4	D5	D6	D7	D8	D9
Power (Wattage)	28.8	40.5	48.8	59.8	62.3	97.4	127.1	152.6	178.0
Input Current @ 120V (A)	0.24	0.34	0.41	0.50	0.55	0.86	1.11	1.34	1.58
Input Current @ 208V (A)	0.14	0.19	0.23	0.29	0.28	0.44	0.58	0.69	0.81
Input Current @ 240V (A)	0.12	0.17	0.20	0.25	0.28	0.43	0.56	0.67	0.78
Input Current @ 277V (A)	0.10	0.15	0.18	0.22	0.24	0.37	0.50	0.59	0.68
Input Current @ 347V (A)	0.08	0.12	0.14	0.17	0.21	0.31	0.41	0.48	0.57
Input Current @ 480V (A)	0.06	0.08	0.10	0.12	0.15	0.23	0.30	0.36	0.42

Lumen Maintenance

Lumen Package	Ambient Temperature	25,000 hours*	50,000 hours*	60,000 hours*	100,000 hours**	Theoretical L70 hours**
	25°C	98.0%	95.2%	94.1%	89.8%	> 300,000
D1-D6 (D1 - D4 DL/T4)	40°C	97.9%	94.8%	93.6%	89.0%	> 290,000
	50°C	97.7%	94.5%	93.2%	88.4%	> 270,000
D7 - D10	25°C	95.8%	93.2%	92.2%	88.2%	> 300,000
(D5+ DL/T4) 40°C	93.9%	89.7%	88.1%	81.9%	> 180,000	
* Supported by JES TM-21 stand	larda					

* Supported by IES TM-21 standards

**Theoretical values represent estimations commonly used; however, refer to the IES position on LED Product Lifetime Prediction, IES PS-10-18, explaining proper use of IES TM-21 and LM-80.

Lumen Multiplier

Ambient Temperature	Multiplier
0°C	1.03
10C	1.02
25°C	1.00
40°C	0.98
50°C	0.97



McGraw-Edison

Control Options

0-10V (D) 0-10V dimming comes standard on all TopTier configurations for use with integrated or external lighting controls.

Dimming Occupancy Sensor (MS/DIM) These sensors are factory installed in the luminaire, dimming to 50% after five minutes of no motion detected. When motion is detected, the luminaire output is 100%. Includes an integral photocell that can be programmed for "dusk-to-dawn" operation. The FSIR-100 programming tool can be utilized to adjust dimming level, time delay, sensitivity and other parameters. Two lens options provide optimal coverage patterns up to 20' mounting height.



For mounting heights up to 20' (-L20) n 5 10 15 20 12 15 20 20 18 15 12 9 6 3 0 3 6 9 18 Coverage Side Area (Feet)

Dimming Occupancy Sensor (SPB)

These passive infrared (PIR) sensors are factory installed in the luminaire housing. When the SPB sensor option is selected, the occupancy sensor is connected to a dimming driver and the entire luminaire dims when no motion is detected. After a period of time, the luminaire turns off, and when motion is detected, the luminaire returns to full light output. The SPB sensor default parameters are listed in the table below, and can be configured utilizing the Sensor Configuration mobile application for iOS and Android devices. The SPB/X is configured to control only the specified number of light squares. An integral photocontrol can be activated with the app for "dusk-to-dawn" control or daylight harvesting - the factory default is off. Three sensor lenses are available to optimize the coverage pattern for mounting heights from 8'-40'. Four sensor colors are available; Bronze, Black, Gray and White, and are automatically selected based on the luminaire finish as indicated by the table below.

SPB sensor finish matched to luminaire finish						
Lumina	Luminaire Finish					
WH	White	White				
ВК	Black	Black				
GM	Graphite Metallic	Black				
BZ	Bronze	Bronze				
AP	Gray	Gray				
DP	Dark Platinum	Gray				

SPB/X A	SPB/X Availability Table					
Fixture Square Count	Available SPB/X Square Count					
1	Not Available					
2	Not Available					
3	Not Available					
4	2					
5	2 or 3					
6	3					
7	2, 3, 4 or 5					
8	2, 3, 5 or 6					
9	3 or 6					

WaveLinx Wireless Control and Monitoring System

Operates on a wireless mesh network based on IEEE 802.15.4 standards enabling wireless control of outdoor lighting. WaveLinx and WaveLinx Lite sensors utilize the Zhaga Book 18 compliant 4-PIN receptacle (ZD or ZW), while the WOLC control module utilizes a 7-PIN receptacle. ZW option provides 4-PIN receptacle and control module to enable future installation of WaveLinx sensors. ZD option provides 4-PIN receptacle and sensor-ready (SR) driver to enable future installation of WaveLinx sensors, power monitoring, and advanced functionality. WaveLinx (SWPD4 to SWPD5) outdoor wireless sensors offer passive infrared (PIR) occupancy and photocell for closed loop daylight harvesting, and can be factory or field-installed. Sensors are factory preset to dim down

to 50% after 15 minutes of no motion detected. Two lens options are available for mounting heights of 7' to 40'. Use the WaveLinx mobile application for set-up and configuration. At least one Wireless Area Controller (WAC) is required for full functionality and remote communication (including adjustment of any factory pre-sets). WaveLinx Lite (WOF and WOB) outdoor wireless sensors provide PIR occupancy and photocell for closed loop daylight harvesting, and can be factory or field-installed. Sensors are factory preset to dim down to 50% after 15 minutes of no motion detected. Two lens options are available for mounting heights of 7' to 40'. Use the WaveLinx Lite mobile application for set-up and configuration. WAC not required. WaveLinx Outdoor Control Module (WOLC-7P-10A) accessory provides a photocontrol enabling astronomic or time-based schedules to provide ON, OFF and dimming control of fixtures utilizing a 7-PIN receptacle. The out-of-box functionality is ON at dusk and OFF at dawn.

For mounting heights up to 15' (SWPD4 and WOB)





For mounting heights up to 40' (SWPD5 and WOF)





McGraw-Edison

WaveLinx-Ready 4-PIN Twistlock Receptacle (ZW) Includes the WaveLinx control module, integrated 4-Pin receptacle, and standard 0-10V dimming driver, enabling the subsequent addition of a WaveLinx sensor.

Enlighted Wireless Control and Monitoring System (LWR-LW and LWR-LN) The Enlighted control system is a connected lighting solution, combining LED luminaires with an integrated wireless sensor system. The sensor controls the lighting system in compliance with the latest energy codes while collecting valuable data about building performance and use. Software applications utilizing energy dashboards maximize data inputs to help optimize the use of other resources beyond lighting.



For mounting heights from 16' to 40' (LWR-LN)



Synapse (DIM10) SimplySNAP integrated wireless controls system by Synapse. Includes factory installed DIM10 control module and FSP-20 motion sensor; requires additional Synapse system components for operation. Contact Synapse at www.synapsewireless.com for product support, warranty, and terms and conditions.



For mounting heights up to 20' (-L20)



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Section 4, Item B.



5050 INDEPENDENCE STREET | P.O. BOX 97 | MAPLE PLAIN, MN 55359 Ph: (763) 479-0515 | Fax: (763) 479-0519 | www.mapleplain.com

January 24, 2025

Attn: Jon Gleisner 4207 Quaker Trail NE Prior Lake, MN 55372

RE: 1520 Wyman Avenue - Site Plan Review and Conditional Use Permit

Dear Jon:

The City has completed a review of your application submitted on January 6, 2025, for the Site Plan Review and Conditional Use Permit for the property located at 1520 Wyman Ave. The City has identified several items that will require further clarification, additional information and or revised plans prior to consideration for approval. As a formality and in accordance with Minnesota State Statute 15.99, the City is required to notify you that in order to allow sufficient time to fully review the application, the City will be extending the review time to 120 days. It is anticipated that your application will initially be considered by the City's Planning Commission on Thursday, March 6th at 6:00 pm.

The City offers the following comments:

Site Plan and Conditional Use

- The proposed use of the building is a licensed assisted care living facility with memory care. The proposed use will consist of 39 assisted living units and 22 memory care units. Assisted car living facility is a conditional use in the R-1 zoning district.
- 2. Please confirm staffing numbers for all shifts and times of day. How many staff will be present at any given time on the property and will staffing shifts overlap? If shifts will overlap and or will have different staffing levels, please provide a more detailed breakdown of the anticipated staffing at all hours of the day. It would also be helpful to understand the types of staff on the premise at any given time throughout the day (i.e., professional, security, aids, food preparation, etc.).
- 3. The City has established parking standards for assisted living facility with memory care as noted below.

Number of Units(type)	Required Stalls Per Number of Beds	Total Spaces
22 (Memory Care)	4 spaces + 1 space per 3 beds	12 spaces
39 (Assisted Living)	0.5 spaces per 1 unit	20 spaces
Staff Parking	Actual maximum number for staff overlap	spaces
-		spaces

The proposed plans indicate a total of 61 parking spaces which includes 14 existing parking spaces in front of the building. Once staffing information is confirmed, a final parking total will be calculated. It appears that the proposed parking will meet applicable requirements.

- 4. It is not clear from the plans if there will be new mechanical equipment installed with this facility. Please confirm if any new mechanical equipment is proposed and where it will be located. Please also confirm if it will be screened from surrounding residential properties? Please note, the current rooftop units are not currently screened from view from the adjacent residential properties. Please provide additional information relating to the proposed mechanical equipment installation.
- 5. A parking lot lighting plan was submitted with light fixture cut sheets and a photometric plan. It appears that the proposed light fixtures will be cut off type fixtures. The City has the following lighting standards:
- (c) Method of measurement.
 - (1) Maximum footcandles.
 - a. No light source or combination thereof which casts light on a public street or an adjacent commercial, office or industrial zoned property shall exceed one footcandle as measured from the property line or right-of-way line.
 - b. No light source or combination thereof which casts light on adjacent residential zoned property shall exceed one-half footcandle as measured at the property line.

It appears that the proposed plan does not fully comply with the requirements along the north and east property lines (.5 foot candle line extends beyond property line). Please review this condition to determine if the lighting plan can be modified to fully comply with applicable standards.

6. A landscape plan has been submitted. It is noted that no new landscaping is proposed on the plan. There are two areas where new landscaping should be considered by the applicant. Several mature trees are being removed for the purpose of installing the new access drive and parking on the south side of the building. It is recommended that new deciduous trees are planted either within the proposed islands, or along the south side of the proposed parking lot. It is also recommended that some landscaping be planted along the east and south sides of the new refuse enclosure located to the southeast of the building.

- 7. Building signage will need to be approved by the City. A signage plan submittal is not required as a part of the site plan review but will require City approval.
- 8. The City will need to evaluate the number of Sewer Access Charges (SAC) for this property and a formal determination will need to be submitted to the Metropolitan Council should the City approve the proposed use.

Architectural Plans/Building Materials

9. Plans have been reviewed and will be presented to the Planning Commission and City Council.

<u>Police/Fire</u>

10. West Hennepin Public Safety and Maple Plain Fire Department are still in the process of reviewing the plans and the proposed use/resource requirements. Police and fire have been gathering information relating to the call volumes associated with your specific facilities. Additional information relating to their review will be provided in separate correspondence. Once their review is complete, the city will want to meet to discuss their findings.

Engineering

- 11. The proposed improvements disturb less than 1 acre, so an NPDES permit is not required.
- 12. This site is in Pioneer Sarah Creek Watershed Management Commission's jurisdictional area. Their rules correspond with the NPDES requirements, so no permit should be required from the PSCWMC.
- 13. The condition of Wyman Avenue and Bryant Street (including the storm conveyance system) should be documented with video prior to any work. These streets have just been reconstructed and are in great condition. Any damage to the streets or sediment deposited in the storm sewer after work begins should be deemed to be caused by the Contractor and their responsibility to repair or remove.
- 14. Work within public right-of-way must be coordinated with the City. Removal limits shall be marked by the City prior to demolition.
- 15. The adjacent neighbors have installed landscaping up to the edge of the fence along the eastern property line, and proposed improvements indicate the removal and replacement of this fence. This work would likely disturb the landscaping along the east side of the fence. A temporary construction

easement should be provided for this work, and coordination with the neighbors to preserve / replace the landscaping will also be likely necessary.

- 16. Perimeter erosion control must be installed by the Contractor and inspected by the City prior to any other work. The Contractor must provide a minimum 24-hour notice prior to inspection.
- 17. The storm sewer layout at the Wyman Avenue entrance should be revised as the driveway culvert has inadequate cover. Consideration should be given to eliminating the driveway culvert and installing an inlet on the south side of the driveway with a connection to the inlet in the new driveway or some combination of an additional manhole to direct an apron to the south with a connection to the new inlet.
- 18. A Construction Site Management plan should be provided to indicate location of the following:
 - i. Temporary parking for Contractor (not on streets)
 - ii. Dumpsters / Trash Receptacles
 - iii. Temporary Biffy
 - iv. Hazardous materials / Concrete Wash

Please let me know if you have any questions regarding the comments provided within this letter. Please provide the additional information, respond to comments and or revised plans as requested by Friday, February 14.

Sincerely,

Mark Kaltsas, Planner City of Maple Plan

CC: Jacob Kolander, City Administrator Gary Kroells, West Hennepin Public Safety Director Rick Denneson, Maple Plain Fire Chief Andrew Altstatt, Sperides Reiners Architects



2/14/2025

Mark Kaltsas, Planner City of Maple Plain

Re: 1520 Wyman Avenue – Site Plan Review and Conditional Use Permit

Dear Mr. Kaltsas,

This reply to your plan review letter, follows the numbering sequence set up in that letter – which is attached for ease of cross checking. Changes to the documents are attached.

- 1. Correct.
- Staffing numbers and types are anticipated to be as follows when the resident census is 100%:
 - 7 AM 3 PM Day Shift
 - 12 CNAs (Certified Nursing Assistants)
 - 1 LPN
 - 1 RN with periodic hours
 - 1 Office Admin / Front Desk
 - <u>15 Total</u>

3PM - 11PM Evening Shift

- 12 CNAs (Certified Nursing Assistants)
- 1 LPN
- 1 Office Admin / Front Desk
- RN is on call
- <u>14 Total</u>
- 11PM 7AM Night Shift
 - 4 CNAs (Certified Nursing Assistants)
 - 1 Office Admin / Front Desk
 - RN is on call
 - <u>5 Total</u>
- 6 AM 9 AM Breakfast Shift
 - 4 Kitchen Workers (6 AM 9 AM Breakfast Shift)
 - <u>4 Total</u>

6442 City West Parkway Suite #300 Eden Prairie, MN 55344 952.996.9662 Sperides Reiners Architects, Inc. 10 AM – 1 PM Lunch Shift

- 4 Kitchen Workers (6 AM 9 AM Breakfast Shift)
- <u>4 Total</u>

4 PM – 7 PM Dinner Shift

- 4 Kitchen Workers (6 AM 9 AM Breakfast Shift)
- <u>4 Total</u>
- 3. The shift overlap with the greatest number of workers arriving and leaving is at 3 PM, when the day shift ends and the evening shift begins. 29 workers are involved in that shift change. Note that shift change times will be staggered by 15 minute intervals and that not all staff change at the same time.
- 4. While we don't know the locations of new RTU's now, they will be screened. The structure that those locations are on will dictate the type and extent of screening. Screening will match the exterior materials, to blend in.
- 5. Please see the attached revised Photometric Plan.
- 6. Please see the attached revised Landscaping Plans. The landscape plan has been updated to reflect the additional ornamental tree planted in south parking island, and a 3' wide planting bed has been added for screening around the new proposed trash enclosure.
- 7. This is understood.
- 8. This is understood.
- 9. This is understood.
- 10. This is excellent to hear, thank you.
- 11. This is understood.
- 12. This is understood.
- 13. This is understood. A note has been added to the civil plans.
- 14. This is understood. A note has been added to the civil plans.
- 15. This is understood. Notes have been added to the site and landscape plans addressing this comment. The contractor will coordinate with adjacent property owners on any landscape restoration if needed.
- 16. This is understood.
- 17. Please see the attached revised Civil Plans. The storm sewer has been eliminated from this project due to the reconstructed road elevations of Wyman Avenue. The parking lot can now all surface drain to the street without the need for a storm sewer pipe or culvert.
- 18. Please see the attached Construction Site Management Plan.

Sincerely,

Sperides Reiners Architects, Inc.

Gitta

Andrew Altstatt

Attachments:

- Original plan review letter from city of Maple Plain
- Entire consolidated resubmittal PDF

Section 4, Item B.



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