### Preliminary Site Development Plans

# Bren Road Multifamily

Minnetonka, Minnesota

Presented by: Greystar

#### CONSULTANT CONTACT LIST:

DEVELOPER/OWNER
GREYSTAR DEVELOPMENT CENTRAL, LLC
750 BERING DRIVE, SUITE 400
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NDODINGTON@GREYSTAR.COM
CONTACT: NED DODINGTON

CIVIL ENGINEER
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500 WASHINGTON AVE S, SUITE 1080
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BURT.COFFIN@ESGARCH.COM

CONTACT: BURT COFFIN

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SAMBATEK
12800 WHITEWATER DRIVE, SUITE 300
MINNETONKA, MN 55343
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MSALO@SAMBATEK.COM
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GEOTECHNICAL
BRAUN INTERTEC CORPORATION
11001 HAMPSHORE AVENUE S
MINNEAPOLIS, MN 55438
TEL 612-221-9007
BROUNSVILLE@BRAUNINTERTEC.COM
CONTACT: BRANDON ROUNSVILLE

LANDSCAPE ARCHITECT
URBAN ECOSYSTEMS
2500 UNIVERSITY AVE W, #C8
ST. PAUL, MN 55114
TEL 952-818-4468
RYAN@URBANECOSYSTEMS.COM
CONTACT: RYAN HERM

# RED CIRCLE RD SITE 62 N.T.S.

VICINITY MAP

**NO SCALE** 

#### BENCHMARKS =

BM NO. 1 TOP NUT HYDRANT, SOUTHEAST CORNER OF SITE ELEV.=913.98

BM NO. 2 TOP NUT HYDRANT, NORTHEAST CORNER OF SITE ELEV.=896.05

SHEET INDEX									
SHEET	DESCRIPTION								
1.01	TITLE SHEET								
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6.01	UTILITY PLAN								
9.01	DETAILS								
9.02	DETAILS								
1.01	TREE INVENTORY								

#### GOVERNING SPECIFICATIONS

CITY OF MINNETONKA WATER RESOURCES MANAGEMENT PLAN
CITY ENGINEER'S ASSOCIATION OF MINNESOTA STANDARD SPECIFICATIONS (2018)
MNDOT STANDARD SPECIFICATIONS FOR CONSTRUCTION (2020 EDITION)

**ESG**ARCHITECTURE & DESIGN

500 Washington Avenue South, Suite 1080 Minneapolis, MN 55415 p 612.339.5508 | f 612.339.5382 www.esgarch.com



Minnetonka, MN 55343

763.476.6010 telephone

Engineering | Surveying | Planning | Environmental

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Brian W. Frank
Registration No. 52728 Date: MM/DD/YYYY

If applicable, contact us for a wet signed copy of this plan which is available upon request at Sambatek's, Minnetonka, MN office.



LAND USE
APPLICATION
SUBMITTAL
12/06/2022

ORIGINAL ISSUE:

REVISIONS:

No. Description Date

#1 CITY/WATERSHED 01/30/23
COMMENTS

51166

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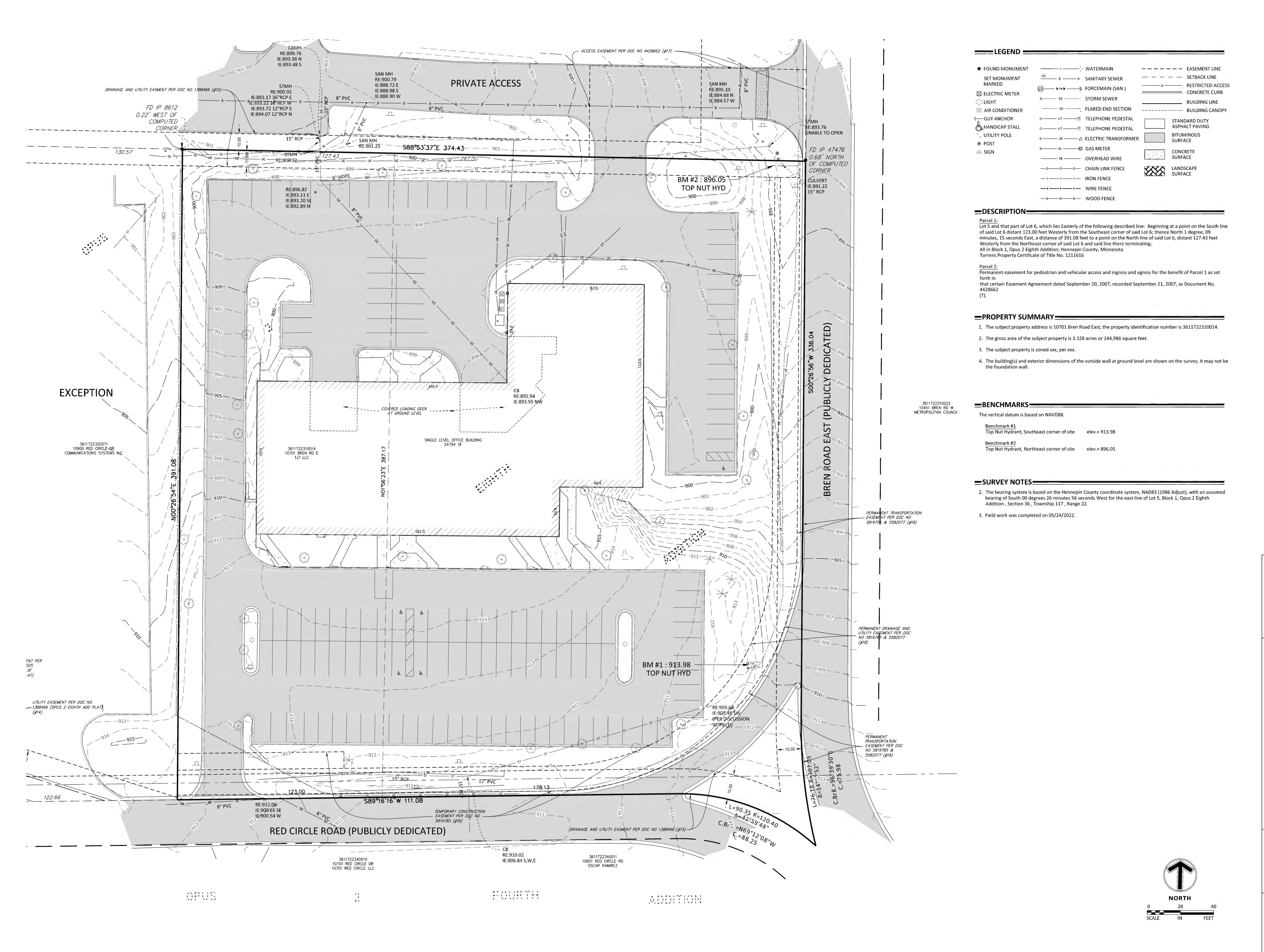
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KEY PLAN

BREN ROAD MULTIFAMILY

TITLE SHEET

C1.01



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NOT FOR CONSTRUCTION

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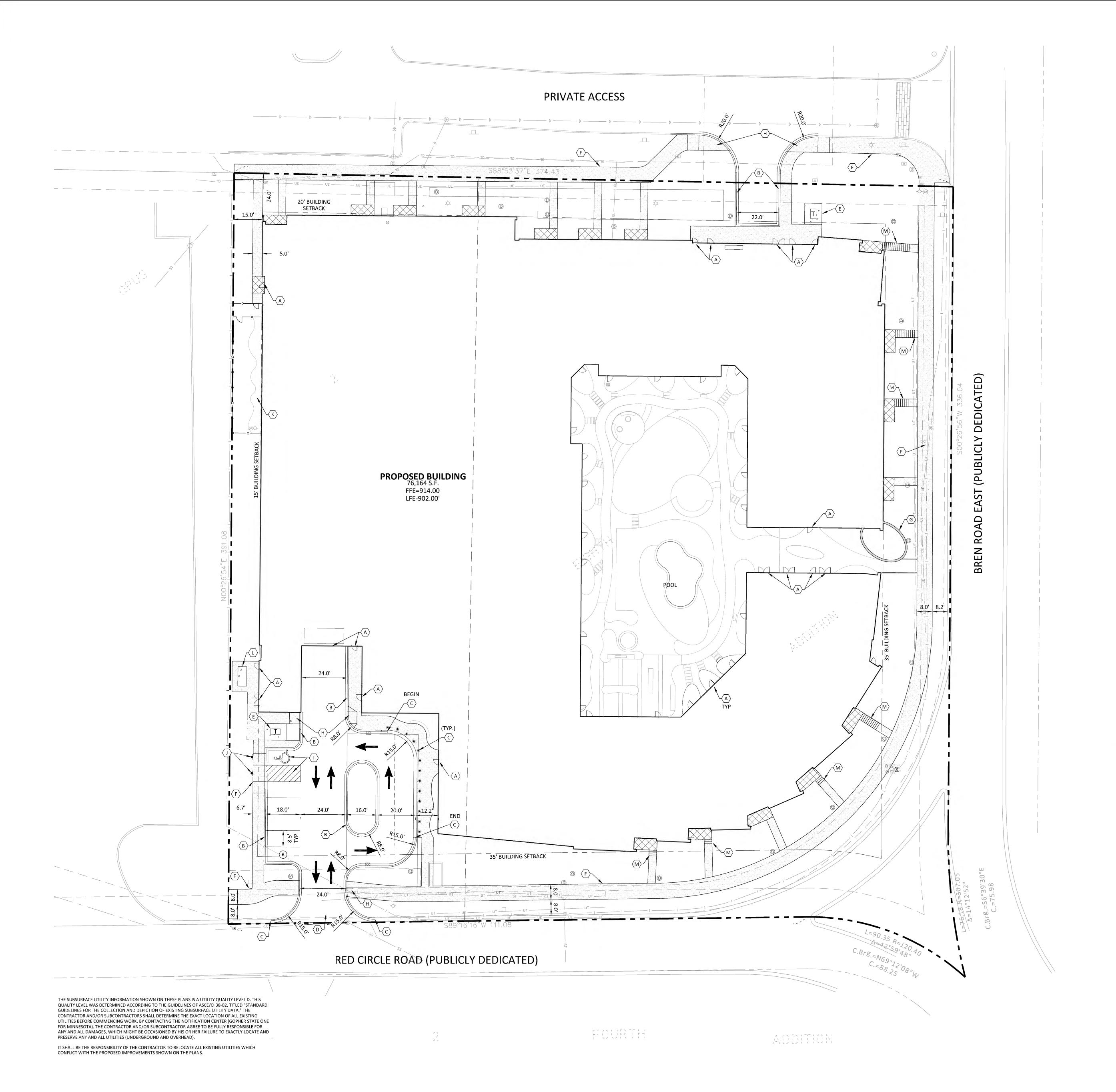
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KEY PLAN

BREN ROAD MULTIFAMILY

**EXISTING CONDITIONS** 

C2.01



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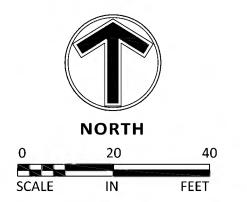
LEGEND = PROPOSED **EXISTING** STANDARD DUTY BOUNDARY LINE ASPHALT PAVING CONCRETE CURB **HEAVY DUTY** ASPHALT PAVING ---- EASEMENT LINE CONCRETE **BUILDING LINE** PAVING RETAINING WALL CONCRETE SIDEWALK PAVEMENT BY OTHERS
(SEE ARCHITECTURAL PLANS) SAW CUT LINE -----CHAIN LINK FENCE SIGN BOLLARD PARKING STALL COUNT **KEY NOTE** LIGHT POLE (BY OTHERS)

AREA SITE AREA	137,635 SF 3.16 AC	
BUILDING		
UNITS	275 UNITS	
DENSITY	87 UNITS/AC	
OPEN SPACE REQUIRED (300 SF / UNIT)	82,500 SF	
OPEN SPACE PROVIDED	35,290 SF	
ZONING		
EXISTING ZONING	I-1	
PROPOSED ZONING	PUD	
SETBACKS		
FRONT YARD	35 FT	
SIDE/REAR WEST	15 HT	
SIDE/REAR NORTH	20 FT	
PARKING		
PARKING REQUIRED	550 TOTAL	
(2 SPACES/UNIT, 1 TO BE ENCLOSED)	275 ENCLOSED	
PARKING PROVIDED	401	
SURFACE	6	
ENCLOSED	395	

1. NOTES PLACEHOLDER

#### EKEY NOTES

- A. BUILDING, STOOPS, STAIRS (SEE ARCHITECTURAL PLANS)
- B. B-612 CONCRETE CURB AND GUTTER
- C. FLAT CURB AND GUTTER
- D. CONCRETE APRONE. TRANSFORMER
- F. CONCRETE SIDEWALK
- G. RETAINING WALLH. ADA ACCESS LOCATION
- I. ACCESSIBLE STALL STRIPING
- J. ACCESSIBLE PARKING SIGN
- K. DOG RUN
- L. GENERATOR
- M. STAIRS WITH HANDRAILS
- M. STAIRS WITH HANGN. BOLLARDS



## BREN ROAD MULTIFAMILY MINNETONKA, MN

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Brian W. Frank
Registration No. 52728 Date: MM/DD/YYYY

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## LAND USE APPLICATION SUBMITTAL 12/06/2022

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BREN ROAD MULTIFAMILY

SITE PLAN

C3.01

GRADING NOTES PLACE HOLDER

BREN ROAD

MINNETONKA, MN

**MULTIFAMILY** 

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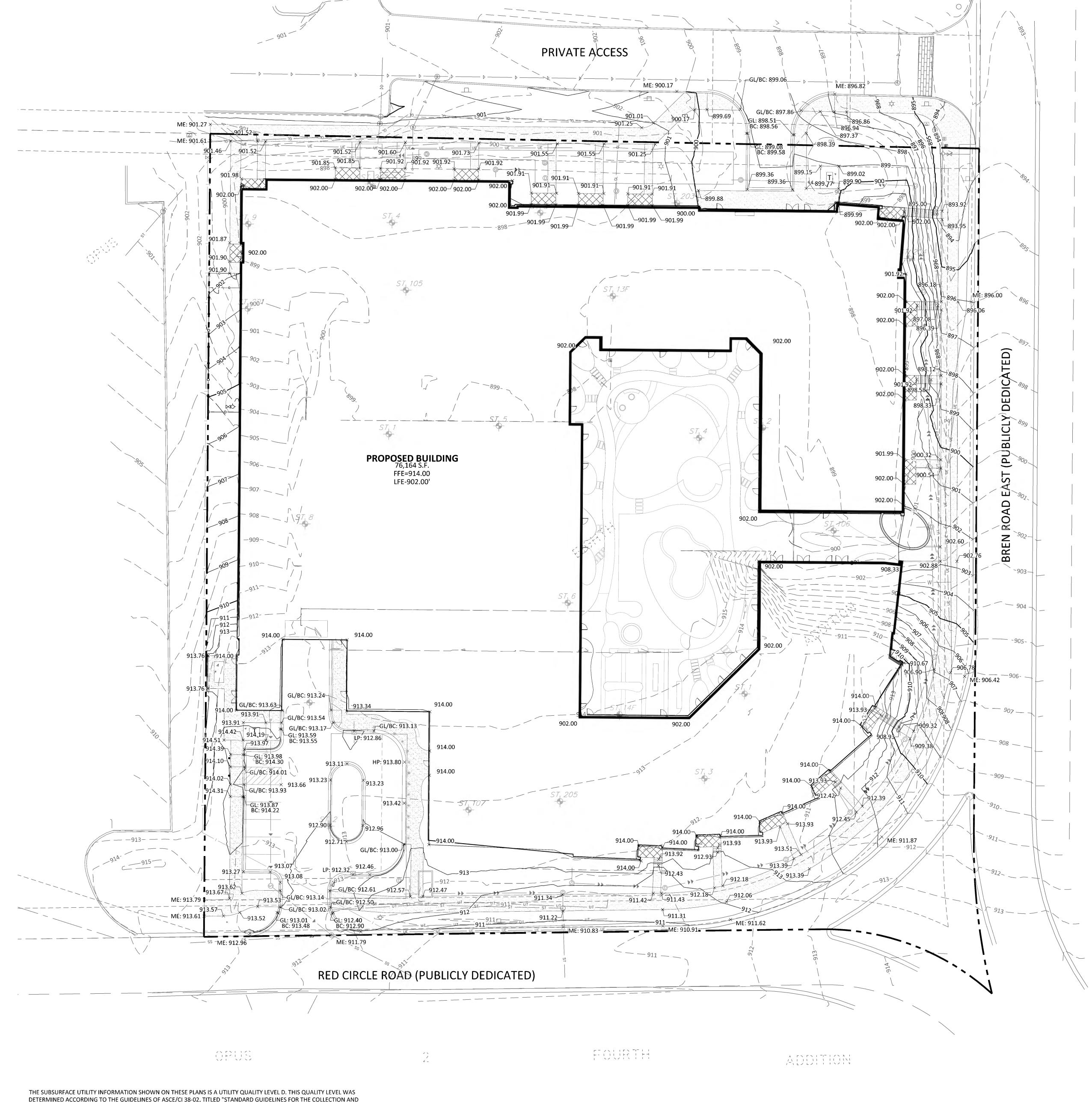
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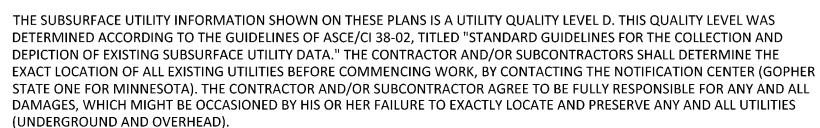
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**KEY PLAN** 

**BREN ROAD MULTIFAMILY** 

**GRADING PLAN** 





IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE

PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.

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IE:906.84 S,W,E

THE SUBSURFACE UTILITY INFORMATION SHOWN ON THESE PLANS IS A UTILITY QUALITY LEVEL D. THIS QUALITY LEVEL WAS DETERMINED ACCORDING TO THE GUIDELINES OF ASCE/CI 38-02, TITLED "STANDARD GUIDELINES FOR THE COLLECTION AND DEPICTION OF EXISTING SUBSURFACE UTILITY DATA." THE CONTRACTOR AND/OR SUBCONTRACTORS SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, BY CONTACTING THE NOTIFICATION CENTER (GOPHER STATE ONE FOR MINNESOTA). THE CONTRACTOR AND/OR SUBCONTRACTOR AGREE TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES, WHICH MIGHT BE OCCASIONED BY HIS OR HER FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UTILITIES (UNDERGROUND AND OVERHEAD).

IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.

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**BREN ROAD MULTIFAMILY** MINNETONKA, MN

p 612.339.5508 | f 612.339.5382

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12800 Whitewater Drive, Suite 300

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Brian W. Frank

Minnetonka, MN office.

professional ENGINEER under the laws of the state

Registration No. 52728 Date: MM/DD/YYYY

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Minnetonka, MN 55343

763.476.6010 telephone

OVERFLOW ELEV. **BIO-ROLL** SILT FENCE SILT DIKE LIMITS OF DISTURBANCE SOIL BORING DIRECTION OF OVERLAND FLOW TEMPORARY DIVERSION DITCH 500 Washington Avenue South, Suite 1080 CHECK DAM Minneapolis, MN 55415

LIMITS OF DRAINAGE SUB-BASIN INLET PROTECTION DEVICE

TEMPORARY STONE CONSTRUCTION ENTRANCE TEMPORARY SEDIMENT BASIN

CONCRETE CURB

CONTOUR

TEMPORARY STABILIZATION MEASURES (SEED, MULCH, MATS OR BLANKETS AS OUTLINED IN THE SWPP) TEMPORARY STORAGE

AND PARKING AREA

EROSION CONTROL MATERIALS QUANTITIES LINEAR FEET LINEAR FEET LINEAR FEET

\* REFER TO SHEET C5.03 FOR GENERAL NOTES, MAINTENANCE NOTES, LOCATION MAPS, AND STANDARD DETAILS

#### NOTE TO CONTRACTOR

NOTICE OF TERMINATION IS FILED WITH THE MPCA, THE CONTRACTOR MUST UPDATE THE SWPPP, INCLUDING THE EROSION CONTROL PLAN SHEETS AS NECESSARY TO INCLUDE ADDITIONAL REQUIREMENTS, SUCH AS REQUIREMENTS DESCRIBED IN THE SWPPP NARRATIVE.

#### SOIL EROSION/SEDIMENTATION CONTROL OPERATION TIME SCHEDULE

	·																		
	CONSTRUCTION SEQUENCE	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	ОСТ	NOV	DEC	JAN	FEB	MAR	APR	MAY	JI
	TEMPORARY CONTROL MEASURES																		
IENT NT PL	STRIP & STOCKPILE TOPSOIL																		
5 & £	ROUGH GRADE / SEDIMENT CONTROL																		
	TEMPORARY CONSTRUCTION ROADS																		
	FOUNDATION / BUILDING CONSTRUCTION																		
	SITE CONSTRUCTION																		
	PERMANENT CONTROL STRUCTURES																		
	FINISH GRADING																		
	LANDSCAPING / SEED / FINAL STABILIZATION																		
	STORM FACILITIES																		

LAND USE

**APPLICATION** SUBMITTAL 12/06/2022

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51166

DRAWN BY

**KEY PLAN** 

**BREN ROAD MULTIFAMILY** 

PHASE I EROSION **CONTROL PLAN** 

RE:910.02 IE:906.84 S,W,E

**EXISTING** CONCRETE CURB ── STORM SEWER DRAINTILE CONTOUR RIPRAP EOF 902.5 OVERFLOW ELEV. **BIO-ROLL** SILT FENCE SILT DIKE

LIMITS OF DISTURBANCE

SOIL BORING DIRECTION OF OVERLAND FLOW TEMPORARY DIVERSION DITCH CHECK DAM

LIMITS OF DRAINAGE SUB-BASIN INLET PROTECTION DEVICE TEMPORARY STONE

> TEMPORARY STORAGE AND PARKING AREA

CONSTRUCTION ENTRANCE TEMPORARY SEDIMENT BASIN TEMPORARY STABILIZATION MEASURES (SEED, MULCH, MATS OR BLANKETS AS OUTLINED IN THE SWPP)

EROSION CONTROL MATERIALS QUANTITIES UNIT SILT FENCE LINEAR FEET LINEAR FEET

BIO-ROLL LINEAR FEET CONSTRUCTION ENTRANCE INLET PROTECTION DEVICE (IP-1) INLET PROTECTION DEVICE (IP-2) UNIT

\* REFER TO SHEET C5.03 FOR GENERAL NOTES, MAINTENANCE NOTES, LOCATION MAPS, AND STANDARD DETAILS

#### NOTE TO CONTRACTOR

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#### SOIL EROSION/SEDIMENTATION CONTROL OPERATION TIME SCHEDULE

	<u> </u>																		
	CONSTRUCTION SEQUENCE	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	ОСТ	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN
-	TEMPORARY CONTROL MEASURES																		
l Pl	STRIP & STOCKPILE TOPSOIL																		
4 4	ROUGH GRADE / SEDIMENT CONTROL																		
	TEMPORARY CONSTRUCTION ROADS																		
	FOUNDATION / BUILDING CONSTRUCTION																		
	SITE CONSTRUCTION																		
	PERMANENT CONTROL STRUCTURES																		
	FINISH GRADING																		
	LANDSCAPING / SEED / FINAL STABILIZATION																		
	STORM FACILITIES																		

NOTE: CONTRACTOR OR GENERAL CONTRACTOR TO COMPLETE TABLE WITH THEIR SPECIFIC PROJECT SCHEDULE

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**KEY PLAN** 

**BREN ROAD MULTIFAMILY** 

PHASE II EROSION **CONTROL PLAN** 

(UNDERGROUND AND OVERHEAD). IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.

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LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, BY CONTACTING THE NOTIFICATION CENTER (GOPHER STATE ONE FOR MINNESOTA). THE CONTRACTOR AND/OR SUBCONTRACTOR AGREE TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES, WHICH MIGHT BE OCCASIONED BY HIS OR HER FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UTILITIES

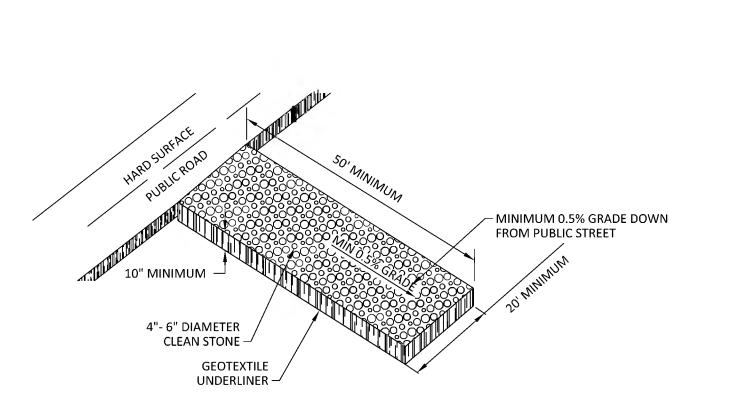
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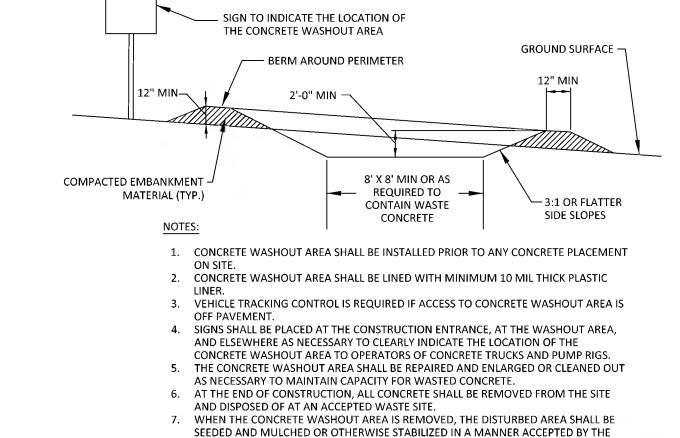
#### EROSION & SEDIMENTATION CONTROL NOTES & DETAILS / "SITE MAP"

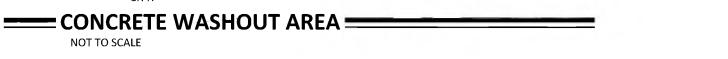


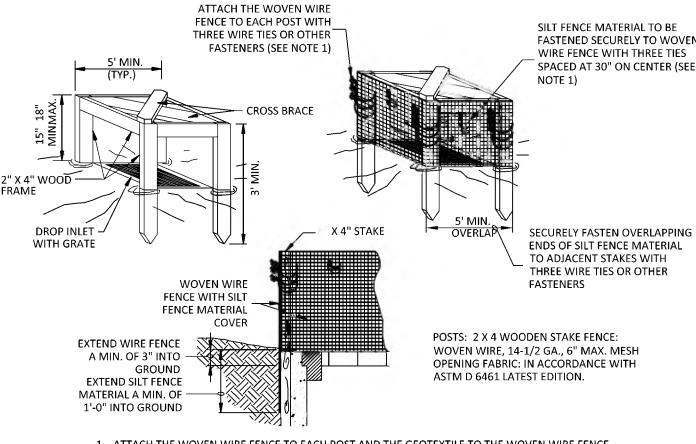


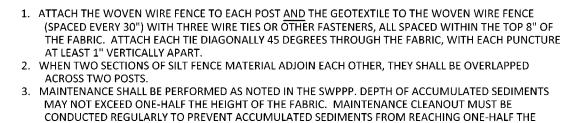












**SILT FENCE INLET PROTECTION (IP-1)** 

DEVELOPER/OWNER:

HOUSTON, TX 77057

832-269-0535

SUPERINTENDENT:

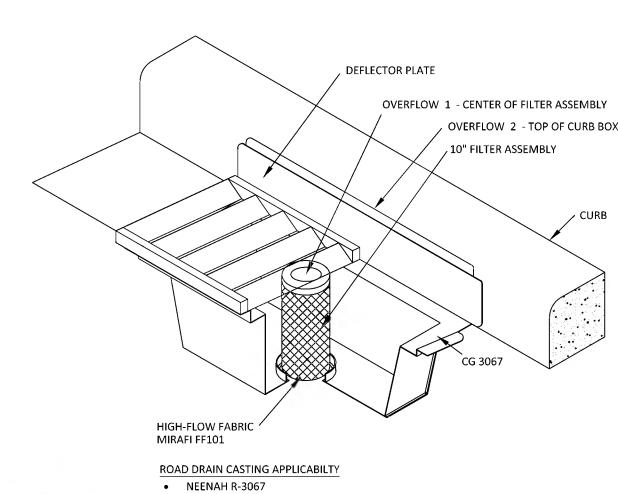
GREYSTAR DEVELOPMENT CENTRAL, LLC

SITE OPERATOR / GENERAL CONTRACTOR

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750 BERING DRIVE, SUITE 400

HEIGHT OF THE SILT FENCE MATERIAL ABOVE GRADE. 4. ALL SILT FENCE INLETS SHALL INCLUDE WIRE SUPPORT



	HIGH-FLOW FABRIC MIRAFI FF101	
	ROAD DRAIN CASTING APPLICABILTY  • NEENAH R-3067  • NEENAH R-3512	
ROAD NOT TO SO	DRAIN INLET PROTECTION (IP-2)	

#### == AREA SUMMARY ==== IN ACRES

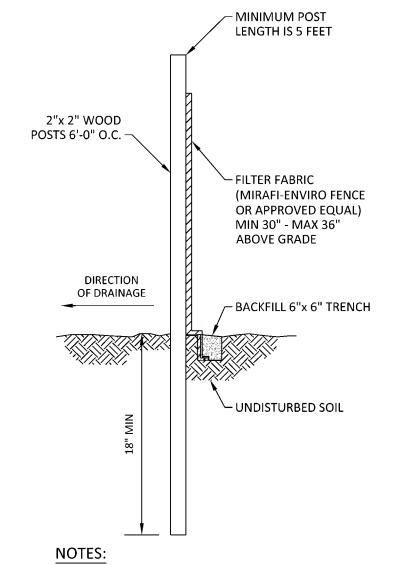
	III ACILI	
	PAVEMENT AREA	0.88 AC
	BUILDING AREA	1.75 AC
	SEEDED AREA	0.85 AC
	TOTAL DISTURBED	3.47 AC
	PRE - CONSTRUCTION IMPERVIOUS	2.21 AC
	POST - CONSTRUCTION IMPERVIOUS	2.63 AC

#### SEQUENCE OF CONSTRUCTION

- INSTALL STABILIZED CONSTRUCTION ENTRANCES.
- PREPARE TEMPORARY PARKING AND STORAGE AREA. 3. CONSTRUCT THE SILT FENCES ON THE SITE.
- 4. INSTALL INLET PROTECTION DEVICES ON EXISTING STORM STRUCTURES, AS SHOWN ON THE PLAN.
- 5. CONSTRUCT THE SEDIMENTATION AND SEDIMENT TRAP BASINS, AS REQUIRED.
- HALT ALL ACTIVITIES AND CONTACT THE CIVIL ENGINEERING CONSULTANT TO PERFORM INSPECTION OF BMPs. GENERAL CONTRACTOR SHALL SCHEDULE AND CONDUCT STORM WATER PRE-CONSTRUCTION MEETING WITH ENGINEER AND ALL GROUND DISTURBING CONTRACTORS BEFORE PROCEEDING WITH CONSTRUCTION.
- 7. CLEAR AND GRUB THE SITE. 8. BEGIN GRADING THE SITE.
- 9. START CONSTRUCTION OF BUILDING PAD AND STRUCTURES.

#### PHASE II:

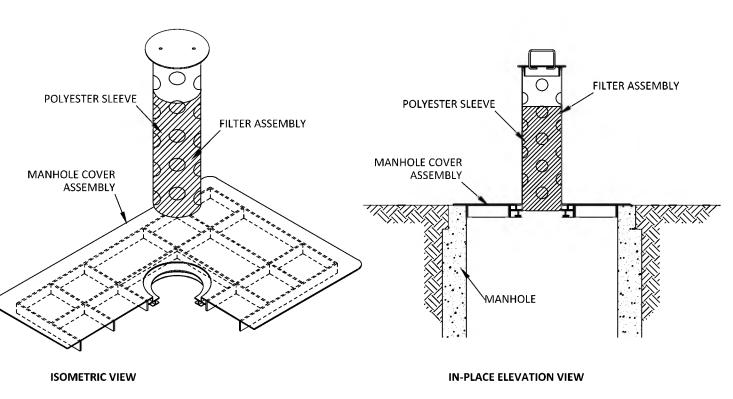
- TEMPORARY SEED DENUDED AREAS.
- INSTALL UTILITIES, UNDERDRAINS, STORM SEWERS, CURBS AND GUTTERS
- INSTALL RIP RAP AROUND OUTLET STRUCTURES.
- 4. INSTALL INLET PROTECTION AROUND ALL STORM SEWER STRUCTURES.
- PREPARE SITE FOR PAVING.
- 6. PAVE SITE. INSTALL INLET PROTECTION DEVICES.
- 8. COMPLETE GRADING AND INSTALL PERMANENT SEEDING AND PLANTING.
- 9. REMOVE ALL TEMPORARY EROSION AND SEDIMENT CONTROL DEVICES (ONLY IF SITE IS STABILIZED), IF REQUIRED BY THE CONTRACT.



 MAXIMUM SPACING BETWEEN POSTS (CENTER TO CENTER) SHALL NOT EXCEED 6 FEET IN SPACING.

#### PREASSEMBLED SILT FENCE-**WOOD POSTS (MNDOT 3886)**

A MINIMUM OF 5 FASTENERS PER POST



SPECIFICATIONS AND STANDARDS AISC MANUAL OF STEEL CONSTRUCTION, 9TH AWS STRUCTURAL WELDING CODE-STEEL, D1.1-94.

 29 CFR 1926-OSHA SAFETY AND HEALTH STANDARDS ALLOWABLE AXLE WEIGHT LOAD SAFETY FACTOR WATER FLOW RATE (THROUGH POLYESTER FILTER) 0.476 CFS @ 3" HEAD 1.074 CFS @ 15" HEAD 1.113 CFS @ 6" HEAD MAXIMUM OVERFLOW RATI

ROAD DRAIN INLET PROTECTION TOP SLAB MODEL (IP-3)

1.575 CFS @ 12" HEAD

CONTRACTOR SHALL IMPLEMENT BEST MANAGEMENT PRACTICES (BMP'S) AS REQUIRED BY THE SWPPP & PERMITS.

GENERAL EROSION NOTES

THE MORE STRINGENT SPECIFICATION SHALL APPLY.

SUBSEQUENT REPORTS AND RELATED DOCUMENTS.

CONTRACTOR SHALL OVERSEE THE INSPECTION & MAINTENANCE OF THE BMP'S AND EROSION PREVENTION FROM BEGINNING OF CONSTRUCTION AND UNTIL CONSTRUCTION IS COMPLETED, IS APPROVED BY ALL AUTHORITIES, AND THE NOTICE OF TERMINATION (NOT) HAS BEEN FILED WITH THE MPCA BY EITHER THE OWNER OR OPERATOR AS APPROVED ON PERMIT. ADDITIONAL BMP'S SHALL BE IMPLEMENTED AS DICTATED BY CONDITIONS AT NO ADDITIONAL COST TO OWNER THROUGHOUT ALL PHASES OF CONSTRUCTION. (NOTE TO THE PREPARER: REVISE INSPECTION RESPONSIBILITY PER OPTIONS IN SWPPP NARRATIVE (SECTION 02370))

1. CONSTRUCTION SHALL COMPLY WITH ALL APPLICABLE GOVERNING CODES AND BE CONSTRUCTED TO SAME. WHERE A

3. CONTRACTOR SHALL BE RESPONSIBLE FOR COMPLETING & SUBMITTING THE APPLICATION FOR THE MPCA GENERAL

WATER POLLUTION PREVENTION SHALL OBTAIN A COPY OF THE SWPPP AND THE STATE OF MINNESOTA NATIONAL

CONFLICT EXISTS BETWEEN LOCAL JURISDICTIONAL STANDARD SPECIFICATIONS AND SAMBATEK STANDARD SPECIFICATIONS,

CONTROL PLAN-ESC PLAN), THE STANDARD DETAILS, THE PLAN NARRATIVE, AND ITS APPENDICES, PLUS THE PERMIT AND ALL

STORMWATER PERMIT FOR CONSTRUCTION ACTIVITY. ALL CONTRACTORS AND SUBCONTRACTORS INVOLVED WITH STORM

POLLUTANT DISCHARGE ELIMINATION SYSTEM GENERAL PERMIT (NPDES PERMIT, ISSUED AUGUST 1, 2018) AND BECOME

FAMILIAR WITH THE CONTENTS. THE SWPPP AND ALL OTHER RELATED DOCUMENTS MUST BE KEPT AT THE SITE DURING

2. THE STORMWATER POLLUTION PREVENTION PLAN (SWPPP) IS COMPRISED OF THIS DRAWING (EROSION & SEDIMENTATION

- CONTRACTOR SHALL COMPLY WITH TRAINING REQUIREMENTS IN PART 21.1-21.3 OF THE GENERAL PERMIT
- BMP'S AND CONTROLS SHALL CONFORM TO FEDERAL, STATE, OR LOCAL REQUIREMENTS OR MANUAL OF PRACTICE, AS APPLICABLE. CONTRACTOR SHALL IMPLEMENT ADDITIONAL CONTROLS AS DIRECTED BY PERMITTING AGENCY OR OWNER. 7. ESC PLAN MUST CLEARLY DELINEATE ALL STATE WATERS. PERMITS FOR ANY CONSTRUCTION ACTIVITY IMPACTING STATE
- WATERS OR REGULATED WETLANDS MUST BE MAINTAINED ON SITE AT ALL TIMES. 8. CONTRACTOR SHALL MINIMIZE CLEARING TO THE MAXIMUM EXTENT PRACTICAL OR AS REQUIRED BY THE GENERAL PERMIT.
- THE BOUNDARIES OF THE CLEARING LIMITS SHOWN ON THE ESC PLANS SHALL BE CLEARLY DELINEATED (E.G. WITH FLAGS, STAKES, SIGNS, SILT FENCE, ETC.) ON THE DEVELOPMENT SITE BEFORE WORK BEGINS. GROUND DISTURBING ACTIVITIES MUST NOT OCCUR OUTSIDE THE LIMITS OF DISTURBANCE. 9. GENERAL CONTRACTOR SHALL DENOTE ON PLAN THE TEMPORARY PARKING AND STORAGE AREA WHICH SHALL ALSO BE USED
- AS THE EQUIPMENT MAINTENANCE AND CLEANING AREA, EMPLOYEE PARKING AREA, AND AREA FOR LOCATING PORTABLE FACILITIES, OFFICE TRAILERS, AND TOILET FACILITIES. 10. ALL WASH WATER (CONCRETE TRUCKS, VEHICLE CLEANING, EQUIPMENT CLEANING, ETC.) MUST BE LIMITED TO A DEFINED

AREA OF THE SITE AND SHALL BE CONTAINED AND PROPERLY TREATED OR DISPOSED. NO ENGINE DEGREASING IS ALLOWED

- 11. ALL LIQUID AND SOLID WASTES GENERATED BY CONCRETE WASHOUT OPERATIONS MUST BE CONTAINED IN A LEAK-PROOF CONTAINMENT FACILITY OR IMPERMEABLE LINER. A COMPACTED CLAY LINER IS NOT ACCEPTABLE. THE LIQUID AND SOLID WASTES MUST NOT CONTACT THE GROUND, AND THERE MUST NOT BE RUNOFF FROM THE CONCRETE WASHOUT OPERATIONS OR AREAS. LIQUID AND SOLID WASTES MUST BE DISPOSED OF PROPERLY AND IN COMPLIANCE WITH MPCA REGULATIONS. A SIGN MUST BE INSTALLED ADJACENT TO EACH WASHOUT FACILITY TO INFORM CONCRETE EQUIPMENT OPERATORS TO UTILIZE THE PROPER FACILITIES. SELF-CONTAINED CONCRETE WASHOUTS ON CONCRETE DELIVERY TRUCKS ARE ALLOWED.
- 12. SUFFICIENT OIL AND GREASE ABSORBING MATERIALS AND FLOTATION BOOMS SHALL BE MAINTAINED ON SITE OR READILY AVAILABLE TO CONTAIN AND CLEAN-UP FUEL OR CHEMICAL SPILLS AND LEAKS.
- 13. DUST ON THE SITE SHALL BE CONTROLLED. THE USE OF MOTOR OILS AND OTHER PETROLEUM BASED OR TOXIC LIQUIDS FOR DUST SUPPRESSION OPERATIONS IS PROHIBITED.
- 14. SOLID WASTE: COLLECTED SEDIMENT, ASPHALT & CONCRETE MILLINGS, FLOATING DEBRIS, PAPER, PLASTIC, FABRIC, CONSTRUCTION & DEMOLITION DEBRIS & OTHER WASTES MUST BE DISPOSED OF PROPERLY & MUST COMPLY WITH MPCA DISPOSAL REQUIREMENTS.
- 15. HAZARDOUS MATERIALS: OIL, GASOLINE, PAINT & ANY HAZARDOUS SUBSTANCES MUST BE PROPERLY STORED, INCLUDING SECONDARY CONTAINMENT, TO PREVENT SPILLS, LEAKS OR OTHER DISCHARGE. RESTRICTED ACCESS TO STORAGE AREAS MUST BE PROVIDED TO PREVENT VANDALISM. STORAGE & DISPOSAL OF HAZARDOUS WASTE MUST BE IN COMPLIANCE WITH
- 16. ALL STORM WATER POLLUTION PREVENTION MEASURES PRESENTED ON THIS PLAN, AND IN THE SWPPP, SHALL BE INITIATED AS SOON AS PRACTICABLE AND PRIOR TO SOIL DISTURBING ACTIVITIES UPSLOPE.
- 17. DISTURBED PORTIONS OF THE SITE WHERE CONSTRUCTION ACTIVITY HAS STOPPED SHALL BE TEMPORARILY SEEDED, WITHIN 14 DAYS OF INACTIVITY. SEEDING SHALL BE IN ACCORDANCE WITH MN/DOT SEED MIXTURE NUMBER 21-111 OR 21-112 DEPENDING ON THE SEASON OF PLANTING (SEE MN/DOT SPECIFICATION SECTION 2575.3) SEEDING METHOD AND APPLICATION RATE SHALL CONFORM TO MN/DOT SPECIFICATION SECTION 2575.3. TEMPORARY MULCH SHALL BE APPLIED IN ACCORDANCE WITH MN/DOT SPECIFICATION SECTION 2575.3F1 AND 2575.3G. ALTERNATIVELY, HYDRAULIC SOIL STABILIZER IN ACCORDANCE WITH MN/DOT SPECIFICATION SECTION 2575.3H MAY BE USED IN PLACE OF TEMPORARY MULCH
- 18. DISTURBED PORTIONS OF THE SITE WHERE CONSTRUCTION ACTIVITY HAS PERMANENTLY STOPPED SHALL BE PERMANENTLY STABILIZED. THESE AREAS SHALL BE STABILIZED IN ACCORDANCE WITH THE TIME TABLE DESCRIBED ABOVE. REFER TO THE GRADING PLAN AND/OR LANDSCAPE PLAN FOR VEGETATIVE COVER. (NOTE TO THE PREPARER: WHERE PERMANENT SEEDING IS NOT CALLED OUT IN THE GRADING AND/ OR LANDSCAPE PLAN, REPLACE THE LAST SENTENCE IN THIS ITEM WITH THE FOLLOWING: SEED WET PONDS WITH MN/DOT SEED MIXTURE 310 "NATIVE WET TALL" BELOW THE HWL. SEED ALL OTHER AREAS WITH SEED MIXTURE 260 "COMMERCIAL TURF". SEEDING METHOD AND APPLICATION RATE SHALL CONFORM TO MN/DOT SPECIFICATION SECTION 2573.3.)
- 19. CONTRACTORS OR SUBCONTRACTORS WILL BE RESPONSIBLE FOR REMOVING SEDIMENT FROM CONVEYANCES & FROM TEMPORARY SEDIMENTATION BASINS THAT ARE TO BE USED AS PERMANENT WATER QUALITY MANAGEMENT BASINS. SEDIMENT MUST BE STABILIZED TO PREVENT IT FROM BEING WASHED BACK INTO THE BASIN, CONVEYANCES, OR DRAINAGEWAYS DISCHARGING OFF-SITE OR TO SURFACE WATERS. THE CLEANOUT OF PERMANENT BASINS MUST BE SUFFICIENT TO RETURN THE BASIN TO DESIGN CAPACITY.
- 20. ON-SITE & OFF-SITE SOIL STOCKPILE AND BORROW AREAS SHALL BE PROTECTED FROM EROSION AND SEDIMENTATION THROUGH IMPLEMENTATION OF BMP'S. STOCKPILE AND BORROW AREA LOCATIONS SHALL BE NOTED ON THE SITE MAP AND
- PERMITTED IN ACCORDANCE WITH GENERAL PERMIT REQUIREMENTS. 21. TEMPORARY SOIL STOCKPILES MUST HAVE SILT FENCE OR OTHER EFFECTIVE SEDIMENT CONTROLS & CANNOT BE PLACED IN
- SURFACE WATERS, INCLUDING STORMWATER CONVEYANCES SUCH AS CURB & GUTTER SYSTEMS OR CONDUITS & DITCHES. 22. SLOPES SHALL BE LEFT IN A ROUGHENED CONDITION DURING THE GRADING PHASE TO REDUCE RUNOFF VELOCITIES AND EROSION.
- 23. DUE TO THE GRADE CHANGES DURING THE DEVELOPMENT OF THE PROJECT, CONTRACTOR SHALL BE RESPONSIBLE FOR ADJUSTING THE EROSION CONTROL MEASURES (SILT FENCES, CHECK DAMS, INLET PROTECTION DEVICES, ETC.) TO PREVENT
- 24. ALL CONSTRUCTION SHALL BE STABILIZED AT THE END OF EACH WORKING DAY, THIS INCLUDES BACKFILLING OF TRENCHES FOR UTILITY CONSTRUCTION AND PLACEMENT OF GRAVEL OR BITUMINOUS PAVING FOR ROAD CONSTRUCTION.

#### MAINTENANCE NOTES

ALL MEASURES STATED ON THIS EROSION AND SEDIMENT CONTROL PLAN, AND IN THE STORM WATER POLLUTION PREVENTION PLAN SHALL BE MAINTAINED IN FULLY FUNCTIONAL CONDITION UNTIL NO LONGER REQUIRED FOR A COMPLETED PHASE OF WORK OR FINAL STABILIZATION OF THE SITE. THE DESIGNATED CONTACT PERSON NOTED ON THIS PLAN MUST ROUTINELY INSPECT THE CONSTRUCTION ON SITE ONCE EVERY SEVEN DAYS DURING ACTIVE CONSTRUCTION AND WITHIN 24 HOURS AFTER A RAINFALL EVENT GREATER THAN 0.5 INCHES IN 24 HOURS. ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE CLEANED AND REPAIRED IN ACCORDANCE WITH THE FOLLOWING:

- 1. ALL SILT FENCES MUST BE REPAIRED, REPLACED, OR SUPPLEMENTED WHEN THEY BECOME NONFUNCTIONAL OR THE SEDIMENT REACHES 1/2 OF THE HEIGHT OF THE FENCE. THESE REPAIRS MUST BE MADE WITHIN 24 HOURS OF DISCOVERY, OR AS SOON AS FIELD CONDITIONS ALLOW ACCESS.
- 2. TEMPORARY AND PERMANENT SEDIMENTATION BASINS MUST BE DRAINED AND THE SEDIMENT REMOVED WHEN THE DEPTH OF SEDIMENT COLLECTED IN THE BASIN REACHES 1/2 THE STORAGE VOLUME. DRAINAGE AND REMOVAL MUST BE COMPLETED WITHIN 72 HOURS OF DISCOVERY, OR AS SOON AS FIELD CONDITIONS ALLOW ACCESS (SEE PART 10.1-10.5 OF THE GENERAL PERMIT)
- SURFACE WATERS, INCLUDING DRAINAGE DITCHES AND CONVEYANCE SYSTEMS, MUST BE INSPECTED FOR EVIDENCE OF SEDIMENT BEING DEPOSITED BY EROSION. CONTRACTOR 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. THE REMOVAL AND STABILIZATION MUST TAKE PLACE WITHIN SEVEN (7) DAYS OF DISCOVERY UNLESS PRECLUDED BY LEGAL, REGULATORY, OR PHYSICAL ACCESS CONSTRAINTS. CONTRACTOR SHALL USE ALL REASONABLE EFFORTS TO OBTAIN ACCESS. IF PRECLUDED, REMOVAL AND STABILIZATION MUST TAKE PLACE WITHIN SEVEN (7) CALENDAR DAYS OF OBTAINING ACCESS. CONTRACTOR IS RESPONSIBLE FOR CONTACTING ALL LOCAL, REGIONAL, STATE AND FEDERAL AUTHORITIES AND RECEIVING ANY APPLICABLE PERMITS, PRIOR TO CONDUCTING ANY WORK.
- 4. CONSTRUCTION SITE VEHICLE EXIT LOCATIONS MUST BE INSPECTED FOR EVIDENCE OF OFF-SITE SEDIMENT TRACKING ONTO PAVED SURFACES, TRACKED SEDIMENT MUST BE REMOVED FROM ALL OFF-SITE PAVED SURFACES. WITHIN 24 HOURS OF DISCOVERY, OR IF APPLICABLE, WITHIN A SHORTER TIME TO COMPLY WITH PART 9.11-9.12 OF THE GENERAL PERMIT
- 5. CONTRACTOR IS RESPONSIBLE FOR THE OPERATION AND MAINTENANCE OF TEMPORARY AND PERMANENT WATER QUALITY MANAGEMENT BMPS, AS WELL AS ALL EROSION PREVENTION AND SEDIMENT CONTROL BMPS, FOR THE DURATION OF THE CONSTRUCTION WORK AT THE SITE. THE PERMITTEE(S) ARE RESPONSIBLE UNTIL ANOTHER PERMITTEE HAS ASSUMED CONTROL (ACCORDING TO PART 3.1 TO 3.8 OF THE MPCA GENERAL PERMIT) OVER ALL AREAS OF THE SITE THAT HAVE NOT BEEN FINALLY STABILIZED OR THE SITE HAS UNDERGONE FINAL STABILIZATION, AND A (N.O.T.) HAS BEEN SUBMITTED TO THE MPCA.
- 6. IF SEDIMENT ESCAPES THE CONSTRUCTION SITE, OFF-SITE ACCUMULATIONS OF SEDIMENT MUST BE REMOVED IN A MANNER AND AT A FREQUENCY SUFFICIENT TO MINIMIZE OFF-SITE IMPACTS (E.G., FUGITIVE SEDIMENT IN STREETS COULD BE WASHED INTO STORM SEWERS BY THE NEXT RAIN AND/OR POSE A SAFETY HAZARD TO USERS OF PUBLIC STREETS).
- 7. ALL INFILTRATION AREAS MUST BE INSPECTED TO ENSURE THAT NO SEDIMENT FROM ONGOING CONSTRUCTION ACTIVITIES IS REACHING THE INFILTRATION AREA AND THESE AREAS ARE PROTECTED FROM COMPACTION DUE TO CONSTRUCTION EQUIPMENT DRIVING ACROSS THE INFILTRATION AREA.

#### BREN ROAD **MULTIFAMILY** MINNETONKA, MN

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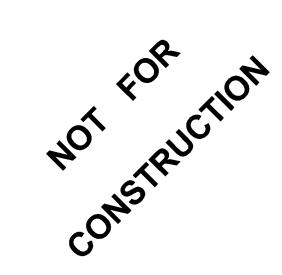


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Brian W. Frank Registration No. 52728 Date: MM/DD/YYYY If applicable, contact us for a wet signed copy of this plan which is available upon request at Sambatek's, Minnetonka, MN office.



LAND USE **APPLICATION SUBMITTAL** 12/06/2022

**ORIGINAL ISSUE:** 09/19/22

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**KEY PLAN** 

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**EROSION CONTROL NOTES & DETAILS** 

PROPOSED EXISTING S SANITARY SEWER POLYETHYLENE DRAINAGE STRUCTURE (PEDS) (SEE DETAIL 03, SHEET C9.02) DRAINTILE WATERMAIN UNDERGROUND UNDERGROUND TELEPHONE UNDERGROUND ELECTRIC CONCRETE CURB ---- EASEMENT LINE

UTILITY CONSTRUCTION NOTES : 1. UTILITY CONSTRUCTION NOTES HOLDER

BREN ROAD

MINNETONKA, MN

**MULTIFAMILY** 

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**BREN ROAD MULTIFAMILY** 

UTILITY PLAN

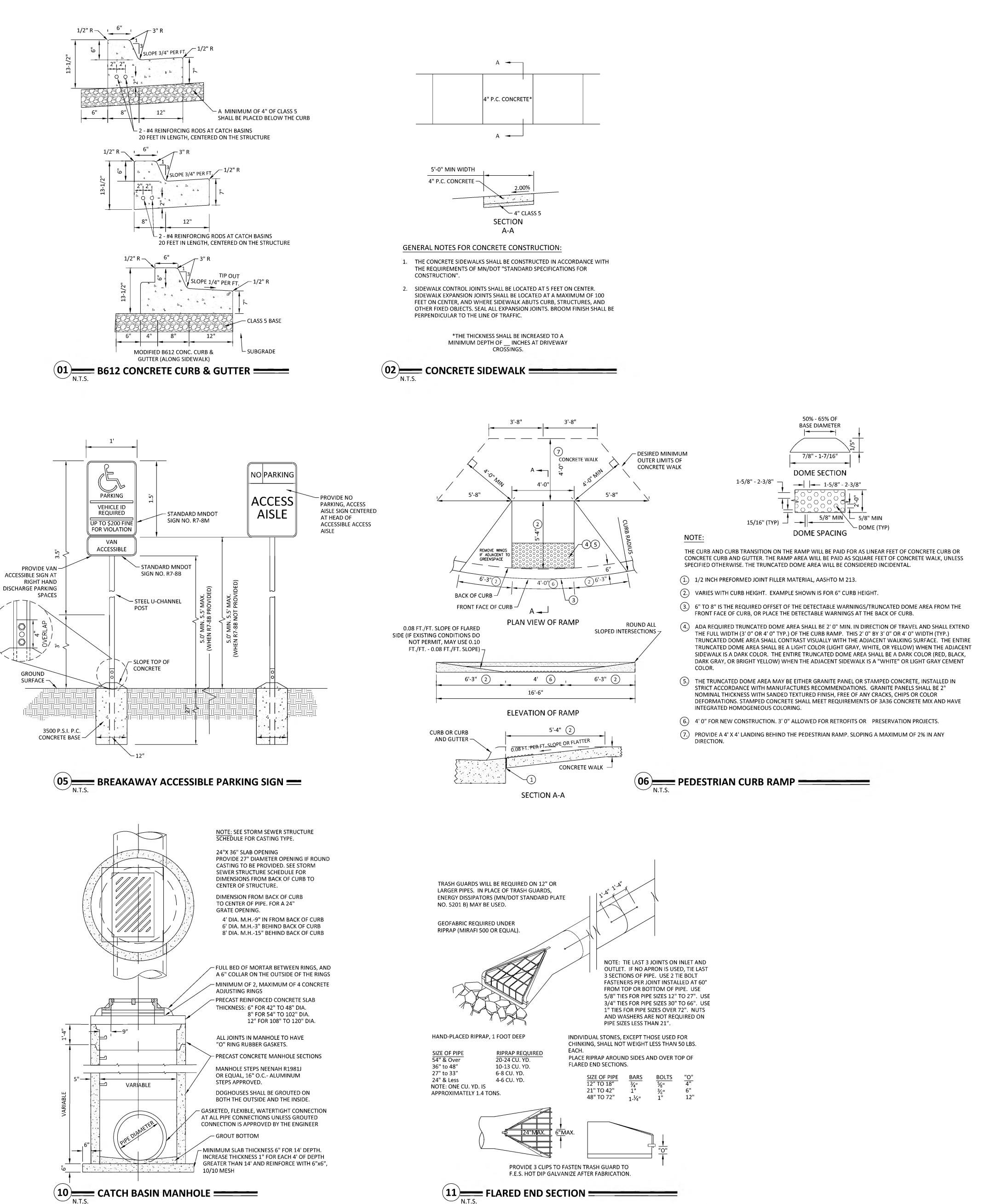
THE SUBSURFACE UTILITY INFORMATION SHOWN ON THESE PLANS IS A UTILITY QUALITY LEVEL D. THIS QUALITY LEVEL WAS DETERMINED ACCORDING TO THE GUIDELINES OF ASCE/CI 38-02, TITLED "STANDARD GUIDELINES FOR THE COLLECTION AND DEPICTION OF EXISTING SUBSURFACE UTILITY DATA." THE CONTRACTOR AND/OR SUBCONTRACTORS SHALL DETERMINE THE EXACT LOCATION OF ALL EXISTING UTILITIES BEFORE COMMENCING WORK, BY CONTACTING THE NOTIFICATION CENTER (GOPHER STATE ONE FOR MINNESOTA). THE CONTRACTOR AND/OR SUBCONTRACTOR AGREE TO BE FULLY RESPONSIBLE FOR ANY AND ALL DAMAGES, WHICH MIGHT BE OCCASIONED BY HIS OR HER FAILURE TO EXACTLY LOCATE AND PRESERVE ANY AND ALL UTILITIES (UNDERGROUND AND OVERHEAD).

IF THE CONTRACTOR ENCOUNTERS ANY DRAIN TILE WITHIN THE SITE, HE OR SHE SHALL NOTIFY THE ENGINEER WITH THE LOCATION, SIZE, INVERT AND IF THE TILE LINE IS ACTIVE. NO

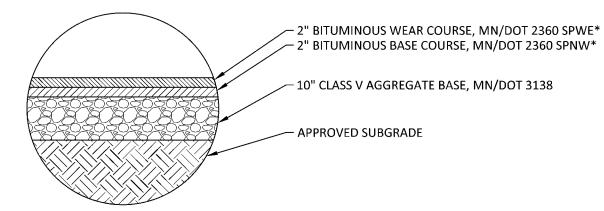
DRAIN TILE SHALL BE BACKFILLED WITHOUT APPROVAL FROM THE PROJECT ENGINEER.

IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR TO RELOCATE ALL EXISTING UTILITIES WHICH CONFLICT WITH THE PROPOSED IMPROVEMENTS SHOWN ON THE PLANS.

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STANDARD DUTY PAVEMENT

NOTES:

THE PAVEMENT SECTIONS SHALL BE CONSTRUCTED IN ACCORDANCE WITH MNDOT "STANDARD SPECIFICATION FOR CONSTRUCTION", AND ALSO THE REQUIREMENTS OF THE OWNER'S GEOTECHNICAL CONSULTANT.

\* REFER TO BITUMINOUS MIX DESIGN REQUIREMENT PROVIDED BY THE GEOTECHNICAL CONSULTANT

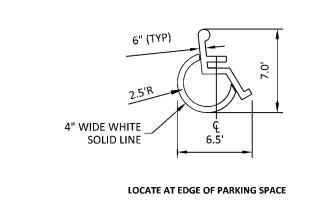
MINIMUM DEPTHS, AFTER COMPACTION.

3. MN/DOT SPEC. 2357 BITUMINOUS TACK COAT SHALL BE PLACED BETWEEN SUCCESSIVE BITUMINOUS LIFTS AND

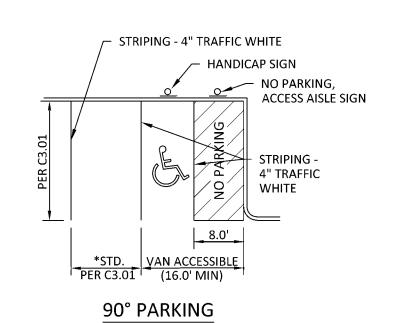
2. ALL THICKNESSES, AS SPECIFIED, ARE TO BE CONSIDERED

AGAINST ABUTTING CONCRETE CURB EDGES.

04)—— PAVEMENT SECTIONS —————



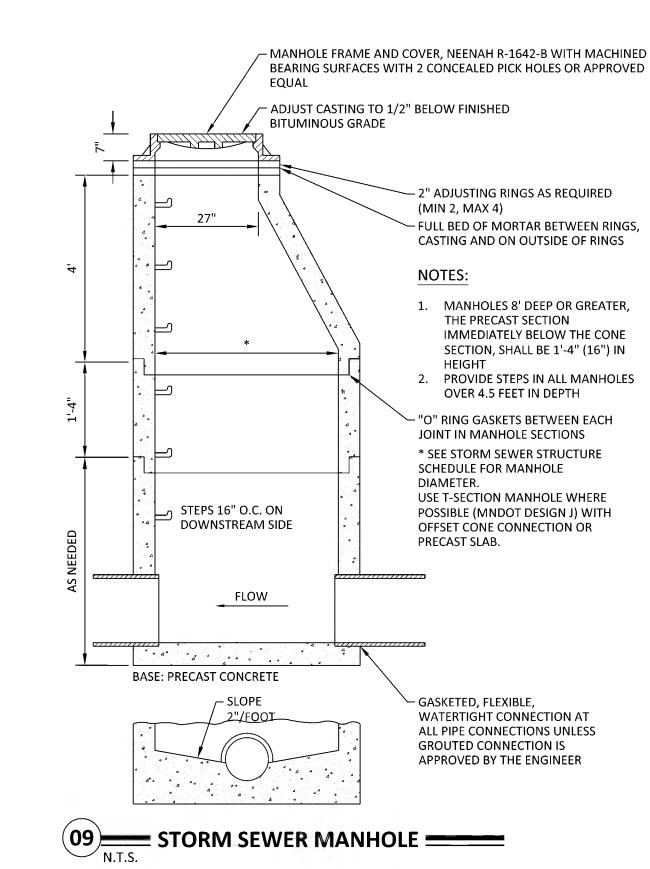
07 ACCESSIBLE PARKING SYMBOL



"VAN - ACCCESSIBLE" SIGNAGE. INSTALL AT DESIGNATED VAN HANDICAP SPACES, SIGNAGE SHALL BE BLUE BACKGROUND WITH WHITE CHARACTERS, 3" HIGH, UPPER CASE HELVETICA.

SIGN TO BE ADDED TO "ACCESSIBLE PARKING SIGN" 1C/1D

OS ADA/STANDARD STRIPING



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Brian W. Frank
Registration No. 52728 Date: MM/DD/YYYY

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KEY PLAN

BREN ROAD MULTIFAMILY

DETAILS

C9.01





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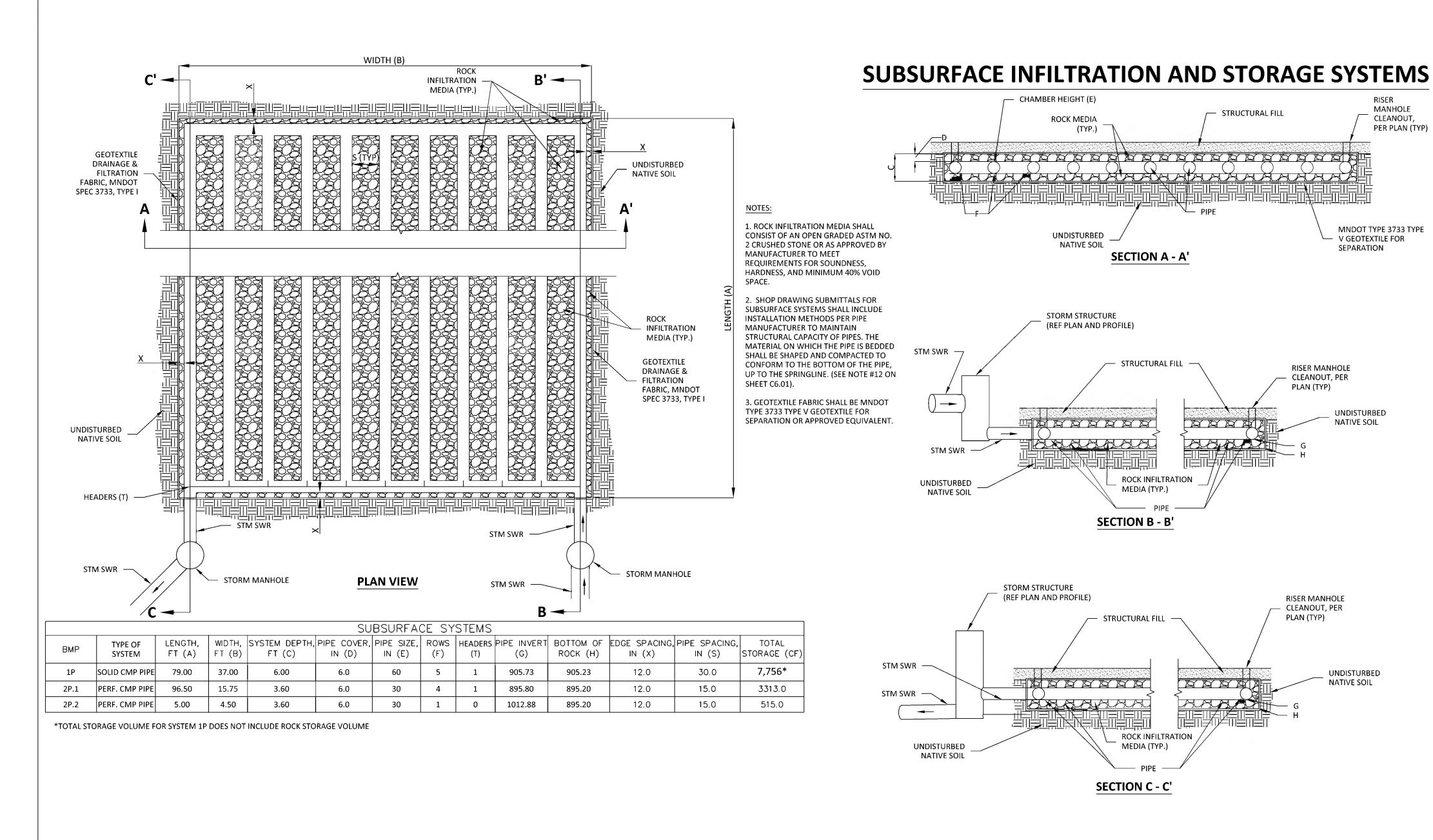
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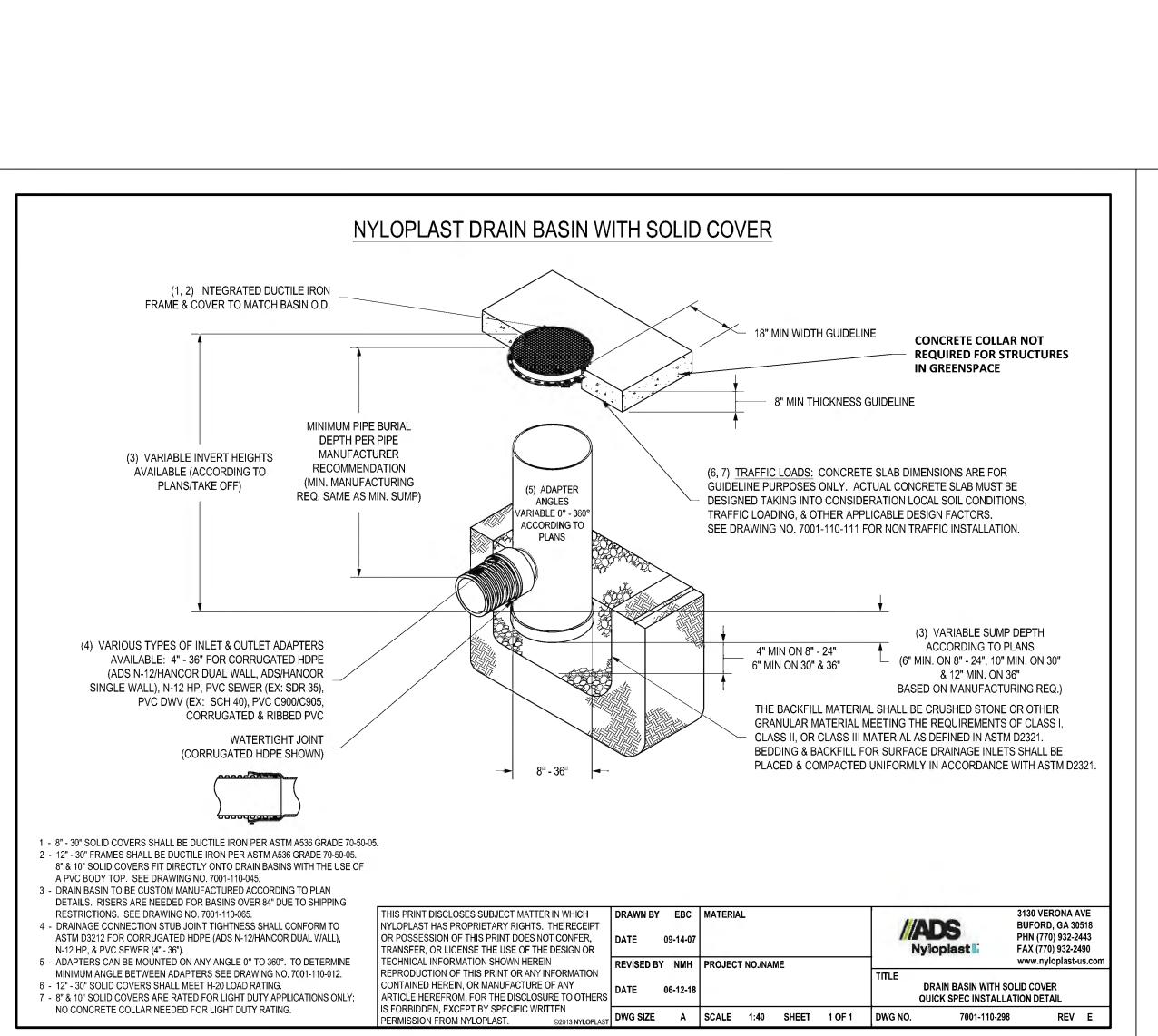
**BREN ROAD** 

**DETAILS** 

**MULTIFAMILY** 

**REVISIONS:** 





- RIM ELEVATION: SEE

MINIMUM

44 4

ADD SAFL BAFFLE OR APPROVED EQUIVALENT TO STRUCTURES:

(02) STORM MANHOLE WITH SUMP

203, 204C, 205, 211B, 222, 224A, 226, 436, 439

ADD SNOUT OR APPROVED EQUIVALENT SKIMMING DEVICE TO STRUCTURES:

STORMWATER SHEETS

FULL BED OF MORTAR BETWEEN

MINIMUM OF 2, MAXIMUM OF

4 CONCRETE ADJUSTING RINGS.

RAMNEK OR SIMILAR GASKET TYPE

AND TOP OF MANHOLE SECTION.

GASKETED, FLEXIBLE, WATERTIGHT

ADD SAFL BAFFLE AS REQUIRED PER

PLAN, OR APPROVED EQUIVALENT.

MANHOLE STEPS NEENAH R-1981-J

MINIMUM SLAB THICKNESS IS 6" FOR

14' DEPTH. INCREASE THICKNESS 1"

FOR 4' OF DEPTH GREATER THAN 14'

AND REINFORCE WITH 6"X6", 10/10

PLASTIC COATED OR APPROVED

EQUAL 16" O.C.

MATERIAL TO BE PLACED BETWEEN SLAB

PRECAST CONCRETE MANHOLE SECTIONS.

CONNECTION AT ALL PIPE CONNECTIONS

OUTSIDE OF THE RINGS.

- 6" PRECAST REINFORCED

CONCRETE SLAB.

RINGS, AND A 6" COLLAR ON THE

OTHER ACCEPTABLE CATCH BASIN CASTINGS DEPENDING UPON THE

24"X36"SLAB OPENING FOR NEENAH R-3067 CASTING, FOR EQUAL,

MINIMUM

FULL BED OF MORTAR BETWEEN

MINIMUM OF 2, MAXIMUM OF

4 CONCRETE ADJUSTING RINGS.

RAMNEK OR SIMILAR GASKET TYPE

AND TOP OF MANHOLE SECTION.

GASKETED, FLEXIBLE, WATERTIGHT

MANHOLE STEPS NEENAH R-1981-J

- MINIMUM SLAB THICKNESS IS 6" FOR

14' DEPTH. INCREASE THICKNESS 1"

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PLASTIC COATED OR APPROVED

EQUAL 16" O.C.

01 CATCH BASIN/STORM MANHOLE WITH SUMP

O3 POLYETHYLENE DRAINAGE STRUCTURE (PEDS)

MATERIAL TO BE PLACED BETWEEN SLAB

PRECAST CONCRETE MANHOLE SECTIONS.

CONNECTION AT ALL PIPE CONNECTIONS

OUTSIDE OF THE RINGS.

- 6" PRECAST REINFORCED

CONCRETE SLAB.

RINGS, AND A 6" COLLAR ON THE

WITH D.L., D.R. OR VANE GRATE. 27" DIAMETER OPENING FOR

NFFNAH R-2561-A BEEHIVE GRATE AND CASTING

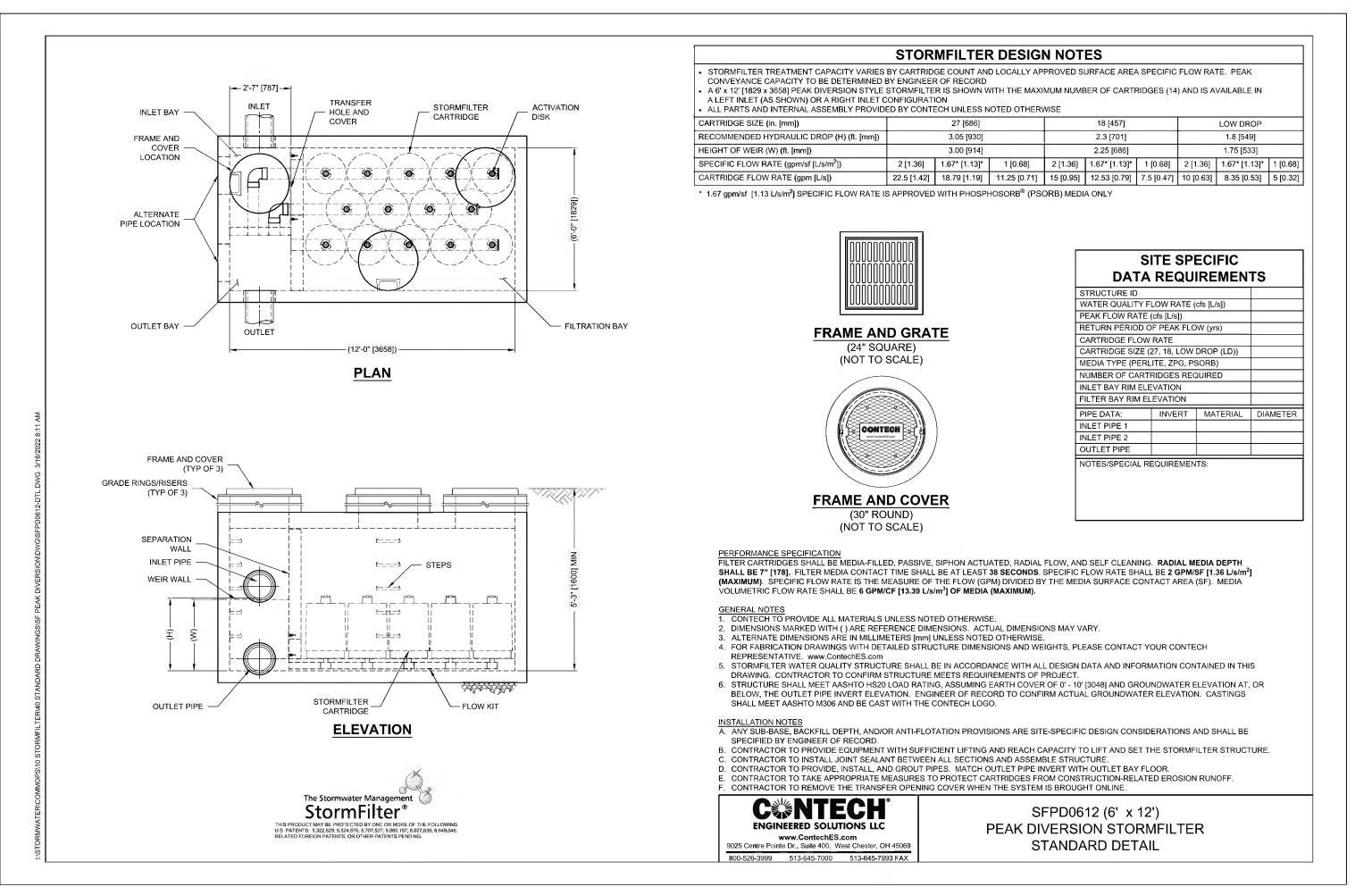
NEENAH R-2573 CONCAVE GRATE AND CASTING

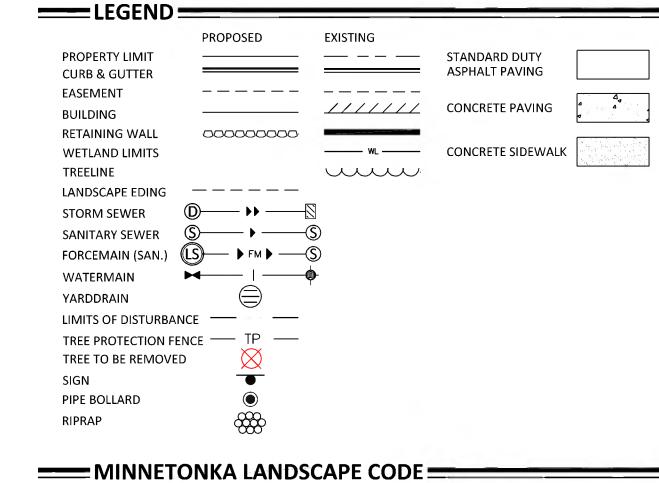
NEENAH R-2577 CONVEX GRATE AND CASTING

NEENAH R-2557 GRATE AND CASTING

NEENAH R-4342 GRATE AND CASTING

NEENAH R-1642-B COVER AND CASTING.





Development that is subject to landscape requirements in sections 300.27 and 300.31 must meet the minimum landscape requirements of the applicable section. Trees planted as part of a required landscaping plan may be counted as mitigation trees under this section, at the city's discretion.
 One inch for each inch in diameter of a deciduous tree removed and one foot for each foot in height of a coniferous tree removed

CALCULATIONS 2 INCHES PER EVERY SIGNIFICANT TREE	EXISTING 6 TREES	REQUIRE 12 INCH
1 INCH PER EACH INCH IN DIAMETER OF HIGH PRIORITY TREES OVERSTORY TREES	83 INCHES	154 INCH
1 FOOT PER EACH FOOT IN HEIGHT OF HIGH PRIORITY TREES CONIFERS	106 FEET	106 FEI

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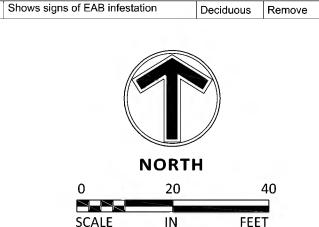
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Brian W. Frank
Registration No. 52728 Date: MM/DD/YYYY

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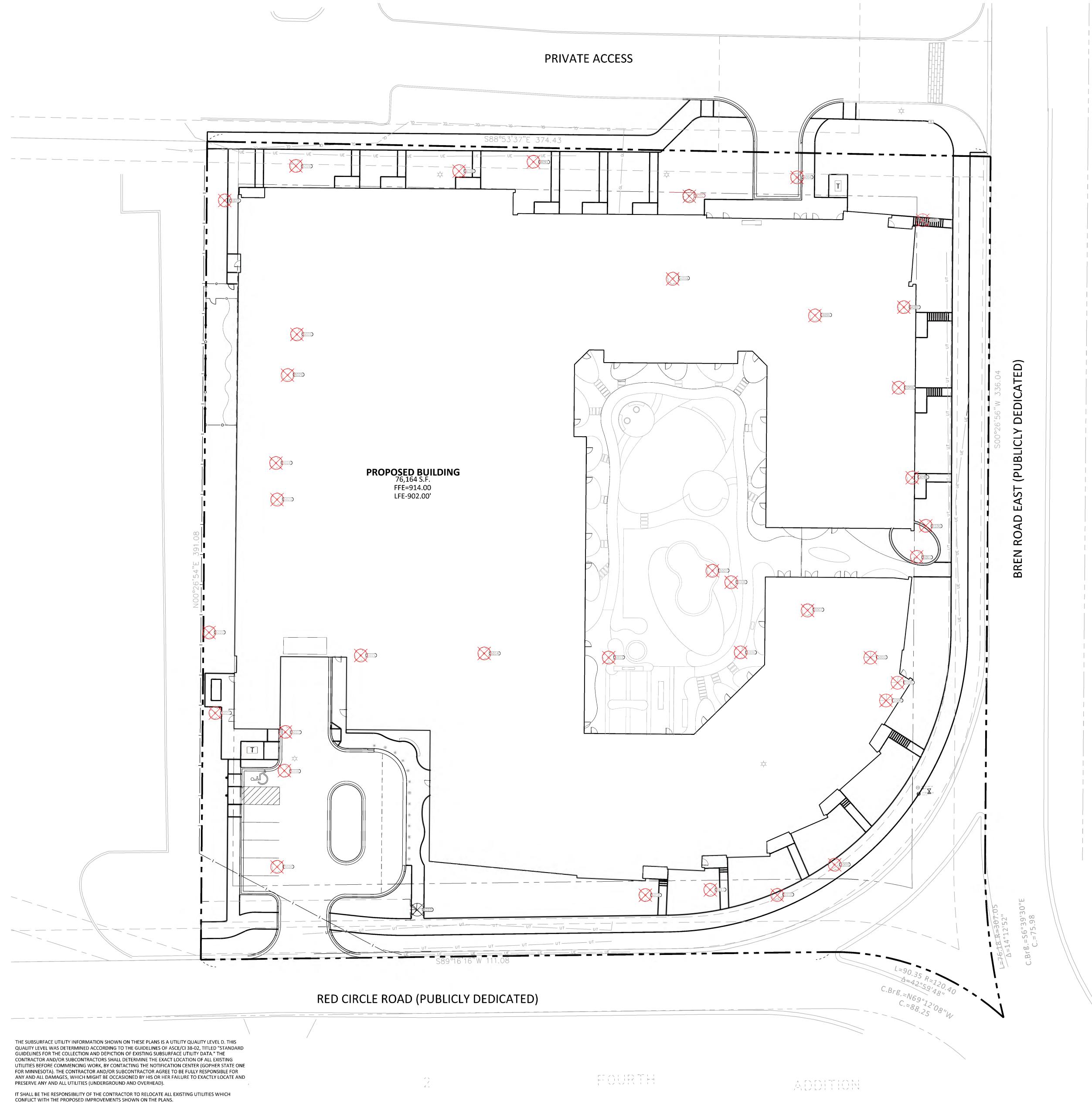
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KEY PLAN

BREN ROAD MULTIFAMILY

TREE INVENTORY

L1.01



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Typed or Printed Name

License # Date

#### SUPPLEMENTAL CITY INFO 01/27/2023

Date

ORIGINAL ISSUE: 10/27/22

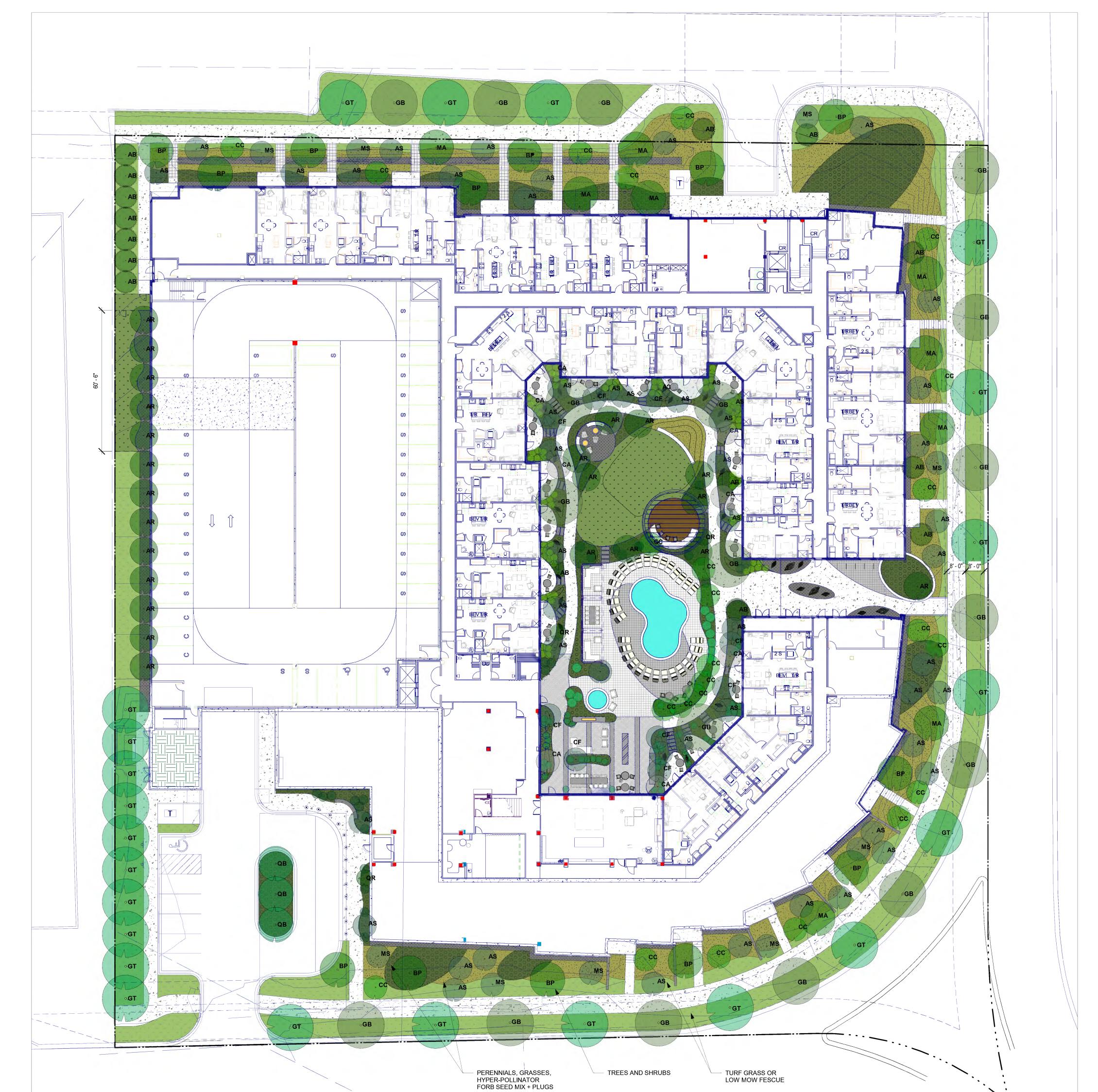
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PROJECT NUMBER Author Checker CHECKED BY

KEY PLAN

BREN ROAD -**MULTIFAMILY** ILLUSTRATIVE LANDSCAPE

PLAN





DWARF EUROPEAN CRANBERRYBUSH

VO Viburnum opulus 'Nanum'