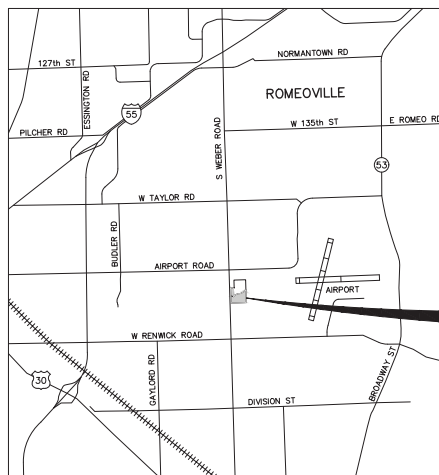


Preliminary Engineering Improvements for ES-BENZ CAR DEAR SOUTHEAST OF AIRPORT ROAD AND WEBER ROAD VILLAGE OF ROMEOVILLE, ILLINOIS

PROPOSED

EXISTING



LOCATION MAP

DEVELOPER: MERCEDES-BENZ OF ORLAND PARK
ADDRESS: 8430 W. 159TH STREET
CITY: ORLAND PARK, ILLINOIS
PHONE: (708) 460-0400

ARCHITECT: SIMON DESIGN GROUP
ADDRESS: 500 LAKE COOK ROAD, SUITE 350
CITY: DEERFIELD, ILLINOIS 60015
PHONE: (847) 572-3002

ABBREVIATIONS

[illegible]

R.O.W.	RIGHT-OF-WAY
REM	REMOVAL
REV	REVERSE
RR	RAILROAD
SAN	SANITARY FOOT
SHLD.	SHOULDER
SL	STREET LIGHT
SMH	SANITARY MANHOLE
ST	STORM
STD	STANDARD
SW	SIDEWALK
SY	SQUARE YARDS
TBR	TO BE REMOVED
T	TELEPHONE
T-A	TYPE A
T/C	TOP OF CURB
T/F	TOP OF FOUNDATION
T/W	TOP OF WALK
T/WALL	TOP OF WALL
TR	TEMPORARY
TRANS	TRANSFORMER
TRC	TRUNK
UV	ULTRAVIOLET
VL	VITRIFIED CLAY PIPE
W	WALL
WL	WATER LEVEL
WM	WATER MAIN

Ma
CONS

DRAINAGE CERTIFICATION:

I, JIM FRAYN, HEREBY CERTIFY THAT ADEQUATE STORM WATER STORAGE AND DRAINAGE CAPACITY HAS BEEN PROVIDED FOR THIS DEVELOPMENT, SUCH THAT SURFACE WATER FROM THE DEVELOPMENT WILL NOT BE DIVERTED ONTO AND CAUSE DAMAGE TO ADJACENT PROPERTY FOR STORMS UP TO AND INCLUDING THE ONE HUNDRED (100) YEAR EVENT, AND THAT THE DESIGN PLANS ARE IN COMPLIANCE WITH ALL APPLICABLE STATE, COUNTY, AND VILLAGE ORDINANCES.

JAMES FRAYN, P.E.

INDEX OF SHEETS

<u>SHEET NO.</u>	<u>SHEET DESCRIPTION</u>
1	TITLE SHEET
2	EXISTING CONDITIONS AND DEMOLITION PLAN
3	SOIL EROSION AND SEDIMENT CONTROL PLAN
4	SOIL EROSION AND SEDIMENT CONTROL PLAN DETAILS
5	SITE DIMENSIONAL AND PAVING PLAN
6	GRADING PLAN
7	UTILITY PLAN
8	CONSTRUCTION DETAILS
9	CONSTRUCTION DETAILS
10	CONSTRUCTION DETAILS
11	CONSTRUCTION DETAILS
12	CONSTRUCTION DETAILS
13	VILLAGE NOTES AND SPECIFICATIONS
14	CONSTRUCTION SPECIFICATIONS

NOTE:

THE BOUNDARY LINES AND TOPOGRAPHY FOR THIS PROJECT ARE BASED ON A FIELD SURVEY COMPLETED BY MANHARD CONSULTING, LTD. ON FEBRUARY 27, 2020. THE CONTRACTOR SHALL VERIFY THE EXISTING CONDITIONS PRIOR TO CONSTRUCTION AND SHALL IMMEDIATELY NOTIFY MANHARD CONSULTING AND THE CLIENT IN WRITING OF ANY DIFFERING CONDITIONS.

REFERENCE BENCHMARK: (NGS PID: DP5467)

STAINLESS STEEL ROD IN SLEEVE LOCATED ON THE NORTH SIDE OF RENWICK ROAD (COUNTY ROAD 36), APPROXIMATELY 1 MILE EAST OF WEBER ROAD. MORE PARTICULARLY LOCATED APPROXIMATELY 32.5 FEET NORTH OF THE NORTH EDGE OF PAVEMENT OF RENWICK ROAD, 28.5 FEET WEST OF A FIRE HYDRANT AND APPROXIMATELY 7 FEET SOUTH OF A CHAIN-LINK FENCE.

ELEVATION=661.68 DATUM=NAVD88-GEOID 18

SITE BENCHMARK #1:
SOUTHWEST BOLT ON HYDRANT LOCATED APPROXIMATELY 490 FEET EAST OF THE
CENTERLINE OF WEBER ROAD AND APPROXIMATELY 795 FEET SOUTH OF THE
CENTERLINE OF AIRPORT ROAD.

ELEVATION=647.70 DATUM=NAVD88-GEOID 18

SITE BENCHMARK #2:
SOUTHWEST BOLT ON HYDRANT LOCATED APPROXIMATELY 1005 FEET EAST OF THE
CENTERLINE OF WEBER ROAD AND APPROXIMATELY 795 FEET SOUTH OF THE
CENTERLINE OF AIRPORT ROAD.

ELEVATION=651.77 DATUM=NAVD88-GEOID 18

SITE BENCHMARK #3:
SOUTHEAST BOLT ON HYDRANT LOCATED APPROXIMATELY 290 FEET EAST OF THE
CENTERLINE OF WEBER ROAD AND APPROXIMATELY 1400 FEET SOUTH OF THE
CENTERLINE OF AIRPORT ROAD.

ELEVATION=644.30 DATUM=NAVD88-CEOID 18

SITE BENCHMARK #4:
CUT SQUARE IN SOUTHWEST CORNER OF CONCRETE HEADWALL LOCATED
APPROXIMATELY 65 FEET EAST OF THE CENTERLINE OF WEBER ROAD AND
APPROXIMATELY 2240 FEET SOUTH OF THE CENTERLINE OF AIRPORT ROAD.

ELEVATION=635.64 DATUM=NAVD88-GEOID 18



Manhard
CONSULTING LTD

7222 Spring Drive, Lombard, IL 60148 • 630.261.2222 • 708.261.2222 • www.harsco.com
Civil Engineers • Surveyors • Water Resources Engineers • Water & Wastewater Engineers
Construction Managers • Environmental Scientists • Landscape Architects • Planners



UTILITY CONTACTS		
ELECTRIC	WATER	SEWER
COMED	VILLAGE OF ROCKEVELL PUBLIC WORKS	VILLAGE OF ROCKEVELL PUBLIC WORKS
2 LINCOLN CENTER	615 ANDERSON DRIVE	615 ANDERSON DRIVE
OAK BROOK TERRACE, IL 60181	ROCKEVELL, IL 60446	ROCKEVELL, IL 60446
(800) 334-7661	(815) 886-1870	(815) 886-1870
GAS:	CONTACT: ERIC BJORK	CONTACT: ERIC BJORK
TELEPHONE:		
616-7	207 S. WEBER ROAD	VILLAGE CONTACT
1844 EERRY ROAD	ROCKEVELL, IL 60446	615 ANDERSON DRIVE
NAPERVILLE, IL 60563	(815) 836-7333	ROCKEVELL, IL 60446
(888) 642-6748	(815) 836-7333	(815) 886-1870
CONTACT:	CONTACT: JONATHAN A. ZARROCK, P.	

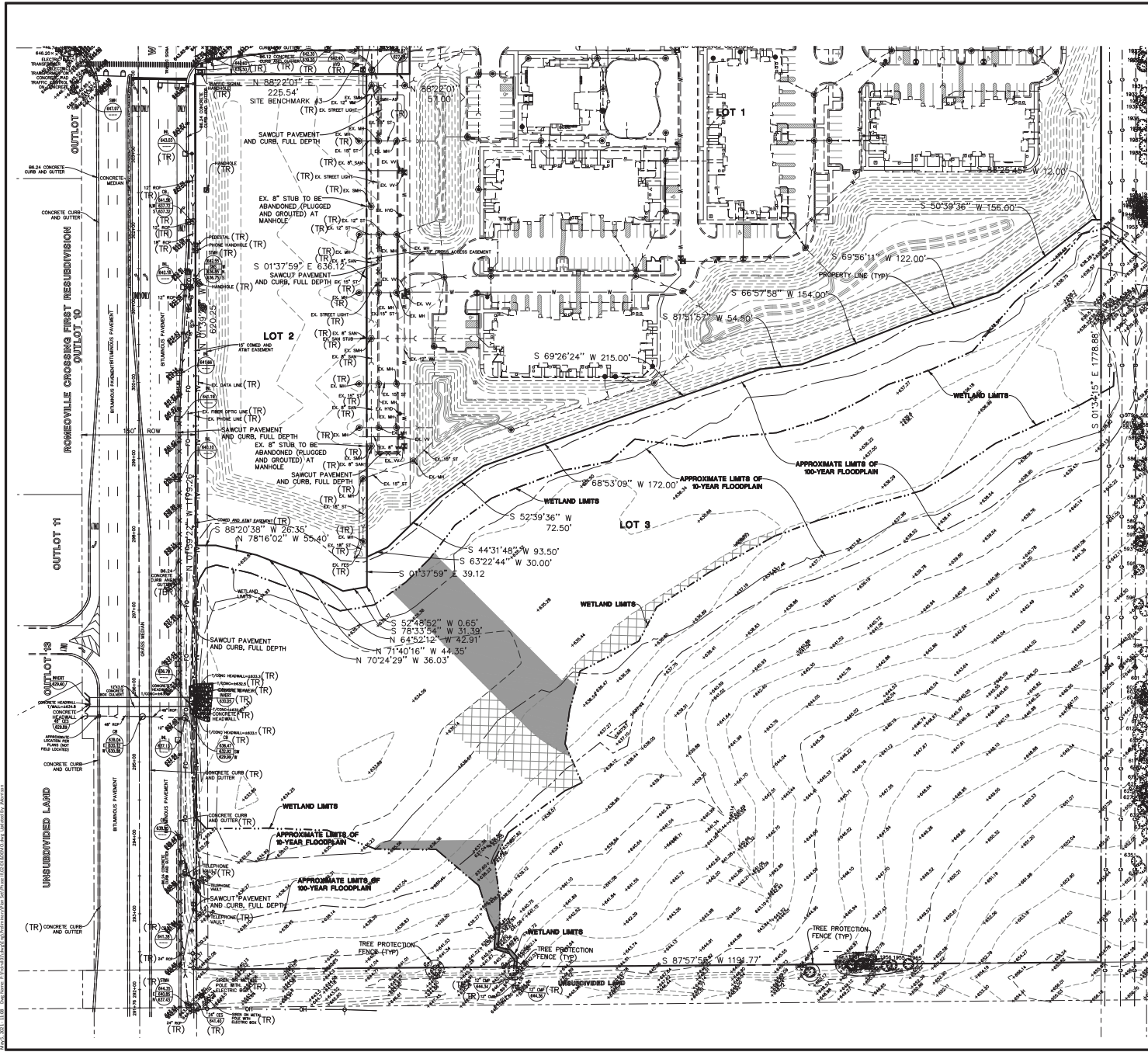
SEA

MANHARD CONSULTING, LTD. IS NOT RESPONSIBLE FOR THE SAFETY OF ANY PARTY AT OR ON THE CONSTRUCTION SITE. SAFETY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR AND ANY OTHER PERSON OR ENTITY PERFORMING WORK OR SERVICES. NEITHER THE OWNER NOR ENGINEER ASSUMES ANY RESPONSIBILITY FOR THE JOB SITE SAFETY OF PERSONS ENGAGED IN THE WORK OR THE MEANS OR METHODS OF CONSTRUCTION.

PROJ. MGR.: JSP
PROJ. ASSOC.: JCM
DRAWN BY: JCM
DATE: 05-07-21
SCALE: N.T.S.

SHEET
1 OF 14
FRD.RVIL01

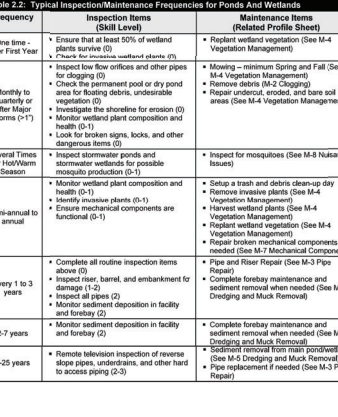
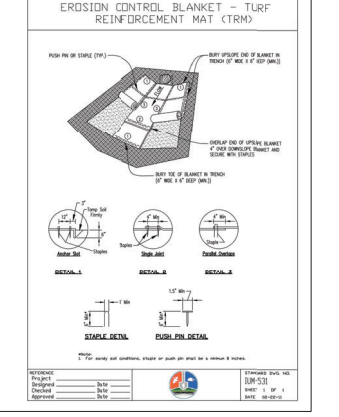
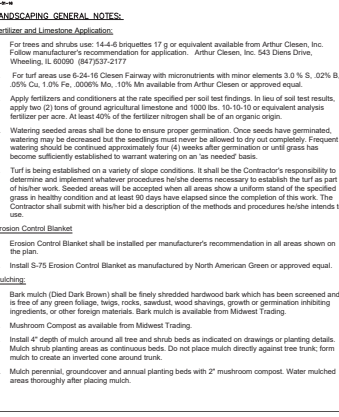
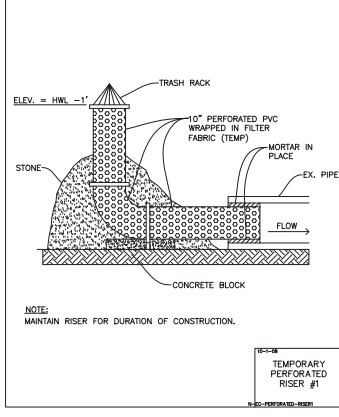
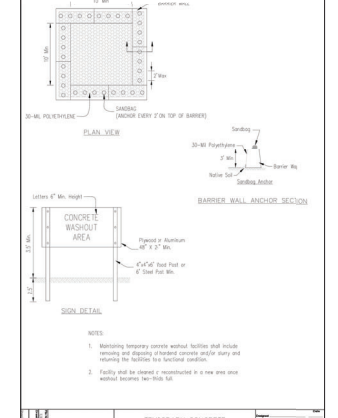
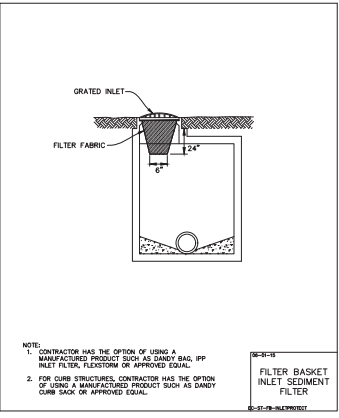
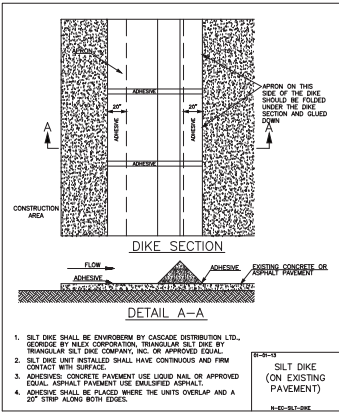
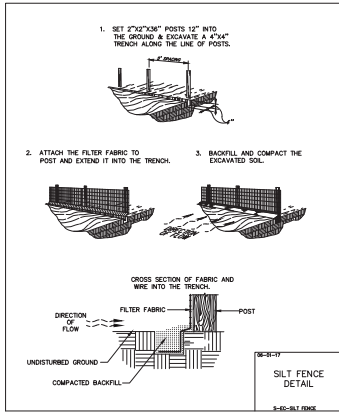
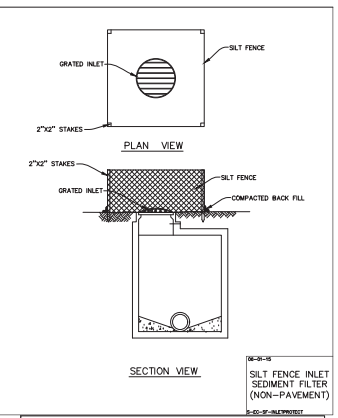
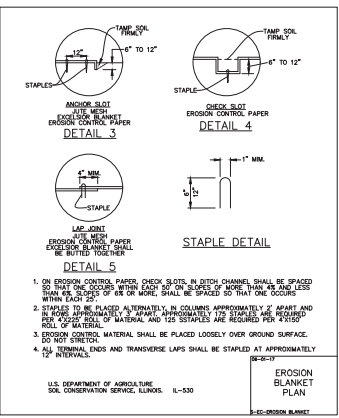
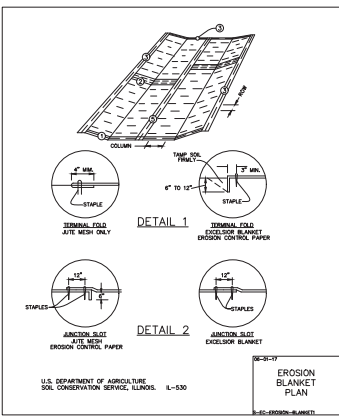
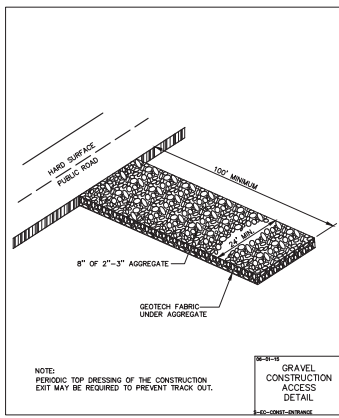
SHEET
1 OF 14



DEMOLITION LEGEND

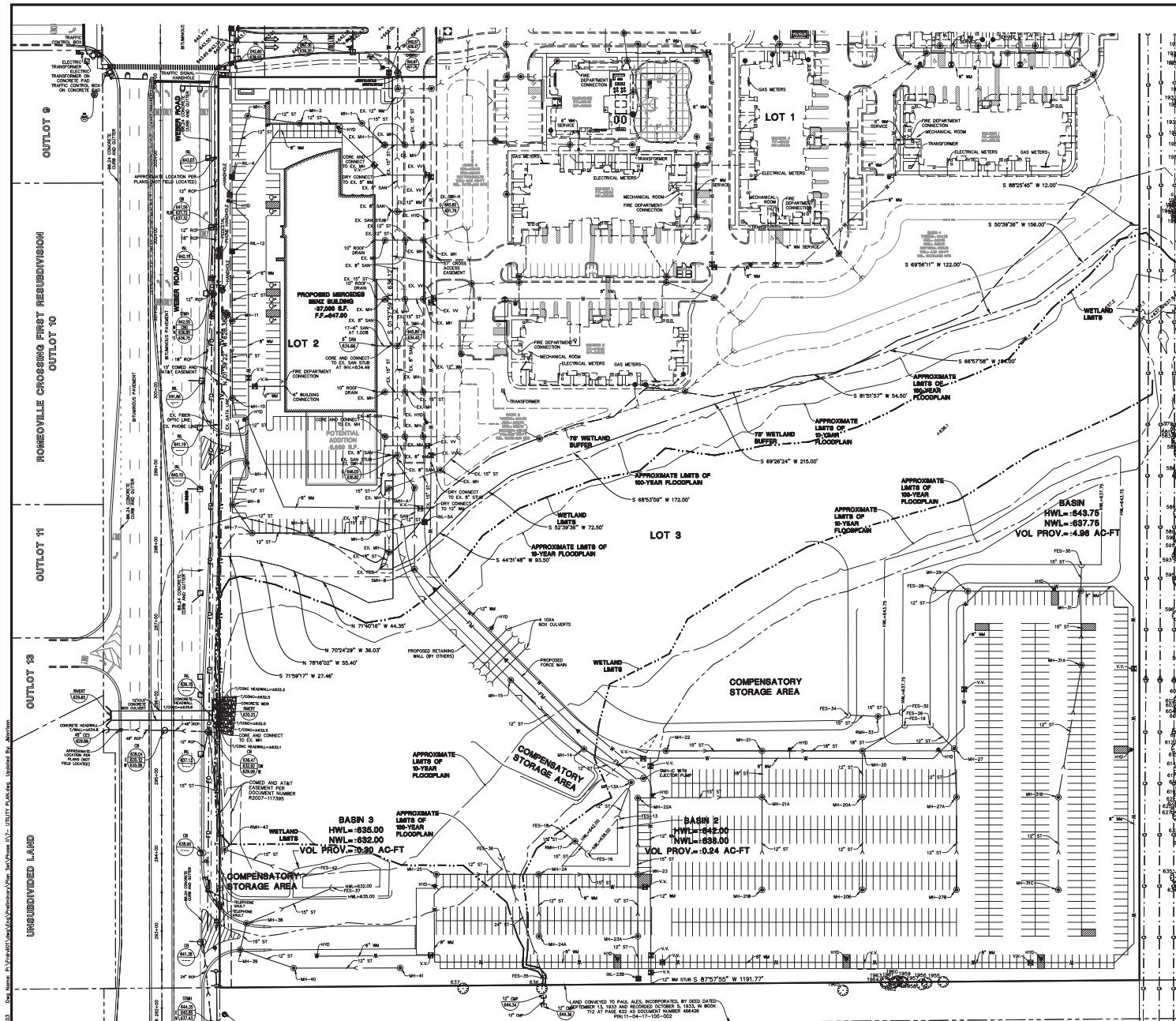
[Symbol]	BITUMINOUS PAVEMENT AND BASE TO BE REMOVED
[Symbol]	WETLAND IMPACT AREA TO BE MITIGATED FOR
[Symbol]	TEMPORARY WETLAND IMPACT AREA FOR COMPENSATORY STORAGE
[Symbol]	SAWCUT LINE
[Symbol]	FENCE, RETAINING WALL, RAILROAD TIES, POLES, CURB AND GUTTER, ETC. TO BE REMOVED
[Symbol]	UTILITY STRUCTURE TO BE REMOVED
[Symbol]	UTILITY LINE REMOVAL, FILL OR ABANDONMENT (REFER TO SPECIFICATIONS)
(TBR)	TO BE REMOVED
(TR)	TO REMAIN

- EXISTING CONDITIONS AND DEMOLITION NOTES:
- EXISTING CONDITIONS AND DEMOLITION PLAN REPRESENT SITE CONDITIONS AS OF FEBRUARY 27, 2020. CONTRACTOR SHALL INSPECT SITE PRIOR TO BIDDING WORK TO VERIFY ACTUAL FIELD CONDITIONS AS PORTIONS OF THE DEMOLITION WORK MAY HAVE SINCE BEEN COMPLETED. CONTRACTOR SHALL BE RESPONSIBLE TO COMPLETE ALL DEMOLITION WORK AS PER PLANS TO PREPARE THE SITE FOR CONSTRUCTION OF PROPOSED IMPROVEMENTS.
 - THE UNDERGROUND UTILITY INFORMATION AS SHOWN HEREON IS BASED, IN PART, UPON INFORMATION FURNISHED BY UTILITY COMPANIES AND THE LOCAL MUNICIPALITY. WHILE THIS INFORMATION IS BELIEVED TO BE RELIABLE, ITS ACCURACY AND COMPLETENESS CANNOT BE GUARANTEED NOR CERTIFIED TO.
 - THE CONTRACTOR IS RESPONSIBLE FOR DEMOLITION, REMOVAL AND DISPOSAL (IN A LOCATION APPROVED BY ALL JURISDICTIONAL GOVERNING ENTITIES) OF ALL STRUCTURES, PAVES, WALLS, FENCES, FOUNDATIONS, ROAD, PARKING LOTS, DRIVES, DRAINAGE STRUCTURES, UTILITIES, ETC., SUCH THAT THE IMPROVEMENTS SHOWN ON THESE PLANS CAN BE CONSTRUCTED. ALL DEMOLITION WORK SHALL BE IN ACCORDANCE WITH ALL APPLICABLE FEDERAL, STATE AND LOCAL REQUIREMENTS. ALL FACILITIES TO BE REMOVED SHALL BE UNDERCUT TO SUITABLE MATERIAL AND BROUGHT TO GRADE WITH SUITABLE COMPACTED FILL MATERIAL PER THE SPECIFICATIONS.
 - REFER TO SPECIFICATIONS SHEET FOR DEMOLITION NOTES.



- SOIL EROSION AND SEDIMENTATION CONTROL GENERAL NOTES:**
- ALL VEGETATIVE AND STRUCTURAL EROSION CONTROL PRACTICES SHALL BE CONSTRUCTED AND MAINTAINED IN ACCORDANCE WITH THE MINIMUM STANDARDS AND SPECIFICATIONS OF THE "ILLINOIS URBAN MANUAL".
 - MAINTENANCE AND REPLACEMENT OF EROSION CONTROL ITEMS, WHEN DIRECTED BY THE OWNER, SHALL BE CONSIDERED AS INCIDENTAL TO THE CONTRACT.
 - THE CONTRACTOR SHALL INSPECT ALL EROSION CONTROL MEASURES AT LEAST ONCE EVERY SEVEN (7) CALENDAR DAYS AND WITHIN 24 HOURS OF THE END OF A STORM THAT IS 0.5 INCHES OR GREATER OR EQUIVALENT SNOWFALL. ANY NECESSARY REPAIRS OR CLEANUP TO MAINTAIN THE EFFECTIVENESS OF SAID MEASURES SHALL BE MADE IMMEDIATELY.
 - INSTALL ALL PERIMETER SILT FENCING PRIOR TO ANY CLEARING OR GRADING. ON-SITE SEDIMENT CONTROL MEASURES AS SHOWN AND SPECIFIED BY THIS EROSION AND SEDIMENTATION CONTROL PLAN SHALL BE CONSTRUCTED AND FUNCTIONAL PRIOR TO INITIATING CLEARING, GRADING, STRIPPING, EXCAVATION OR FILLING ACTIVITIES ON THE SITE.
 - STORM WATERS FALLING ON THE ENTIRE SITE SHALL BE DIVERTED INTO THE DETENTION BASINS, PRIOR TO BEGINNING MASS EXCAVATION. THE CONTRACTOR SHALL CONSTRUCT DITCHES, DUMPS, SEDIMENTATION TRAPS AND SILTATION CONTROL MEASURES AS REQUIRED TO INTERCEPT SURFACE WATERS BEFORE THEY FLOW ONTO ADJACENT PROPERTY AND CONVEY THEM TO THE DETENTION BASINS.
 - STABILIZATION OF DISTURBED AREAS MUST BE INITIATED IMMEDIATELY WHENEVER ANY CLEARING, GRADING, EXCAVATING OR OTHER EARTH DISTURBING ACTIVITIES HAVE PERMANENTLY CEASED ON ANY PORTION OF THE SITE. OR TEMPORARILY CEASED ON ANY PORTION OF THE SITE AND WILL NOT RESUME FOR A PERIOD EXCEEDING 7 CALENDAR DAYS. STABILIZATION OF DISTURBED AREAS MUST BE INITIATED WITHIN 1 WORKING DAY OF PERMANENT OR TEMPORARY CESSATION OF EARTH DISTURBING ACTIVITIES AND SHALL BE COMPLETED AS SOON AS POSSIBLE BUT NOT LATER THAN 7 DAYS FROM THE INITIATION OF STABILIZATION WORK IN AN AREA.
 - TEMPORARY SEED MIXTURE SHALL BE APPLIED AT 64 LBS./ACRE.
 - INLET PROTECTION SHALL BE INSTALLED UNDER THE GRATING OF EACH DRAINAGE STRUCTURE.
 - STABILIZATION OF TOPSOIL STOCKPILES SHALL BE INITIATED IMMEDIATELY UPON COMPLETION UNLESS THEY WILL BE DISTURBED WITHIN FOURTEEN (14) CALENDAR DAYS. STABILIZATION OF STOCKPILES MUST BE INITIATED WITHIN 1 WORKING DAY OF PERMANENT OR TEMPORARY CESSATION OF EARTH DISTURBING ACTIVITIES AND SHALL BE COMPLETED AS SOON AS POSSIBLE BUT NOT LATER THAN 14 DAYS FROM THE INITIATION OF STABILIZATION WORK IN AN AREA. ALL SOIL STORAGE SHALL BE PROTECTED FROM EROSION WITH SILT FENCE ON THE DOWN SLOPE SIDE OF THE PILES.
 - DURING DEWATERING OPERATIONS, WATER WILL BE PUMPED INTO SEDIMENT BASINS. DEWATERING DIRECTLY INTO FLOWING STRUCTURES IS PROHIBITED. DISCHARGE LOCATIONS SHALL BE PROTECTED FROM EROSION.
 - WATER PUMPED DURING CONSTRUCTION OPERATION SHALL BE FILTERED.
 - DUST CONTROL SHALL BE PERFORMED ON A DAILY BASIS USING WATER DISPENSED FROM A TRUCK MOUNTED TANK WITH STANDARD DISCHARGE HEADER TO PROVIDE A UNIFORM RATE OF APPLICATION. CONTRACTOR TO COORDINATE DUST CONTROL REQUIREMENTS WITH VILLAGE PRIOR TO MOBILIZATION.
 - TEMPORARY GRAVEL CONSTRUCTION ENTRANCES SHALL BE MAINTAINED, ADJUSTED OR RELOCATED AS NECESSARY TO PREVENT SEDIMENT FROM BEING TRACKED ONTO PUBLIC ROADWAYS. ANY SEDIMENT REACHING A PUBLIC ROAD SHALL BE REMOVED BY SHOVELING OR STREET CLEANING BEFORE THE END OF EACH WORKING DAY.
 - ANY LOOSE MATERIAL THAT IS DEPOSITED IN THE FLOW LINE OF ANY GUTTER OR DRAINAGE STRUCTURE DURING CONSTRUCTION OPERATIONS SHALL BE REMOVED AT THE CLOSE OF EACH WORKING DAY.
 - OVERFLOW FLOW SHALL BE DIRECTED TO THE DETENTION BASINS PRIOR TO LEAVING THE SITE.
 - THE EROSION CONTROL MEASURES INDICATED ON THE PLANS ARE THE MINIMUM REQUIREMENTS. ADDITIONAL MEASURES MAY BE REQUIRED, AS DIRECTED BY THE CLIENT OR OTHER JURISDICTIONAL GOVERNMENTAL ENTITIES.
 - ALL EROSION AND SEDIMENTATION CONTROL MEASURES SHALL BE REMOVED AND DISPOSED OF IN ACCORDANCE WITH ALL JURISDICTIONAL GOVERNMENTAL AGENCY REQUIREMENTS WITHIN 30 DAYS OF FINAL STABILIZATION.
 - ALL ACCESS TO AND FROM THE CONSTRUCTION SITE IS TO BE RESTRICTED TO THE CONSTRUCTION ENTRANCE. ANY DAMAGE DONE TO EXISTING UTILITIES, ACCESS ROADS, CURBS, OR OTHER STRUCTURES MUST BE REPAIRED BY THE DEVELOPER.
 - ALL TEMPORARY AND PERMANENT EROSION AND SEDIMENT CONTROL PRACTICES MUST BE MAINTAINED AND REPAIRED AS NEEDED TO ASSURE EFFECTIVE PERFORMANCE OF THEIR INTENDED FUNCTION.
 - MAJOR AMENDMENTS OF THE SITE DEVELOPMENT OR EROSION AND SEDIMENTATION CONTROL PLANS SHALL BE SUBMITTED TO THE DEPARTMENT OF COMMUNITY DEVELOPMENT TO BE APPROVED IN THE SAME MANNER AS THE ORIGINAL PLANS.
 - ANY SEDIMENT REACHING A PUBLIC OR PRIVATE ROAD SHALL BE REMOVED BY SHOVELING OR STREET CLEANING (NOT FLUSHING) BEFORE THE END OF EACH WORKDAY AND TRANSPORTED TO A CONTROLLED SEDIMENT DISPOSAL.
 - THE CONTRACTOR SHALL TAKE THE NECESSARY STEPS TO CONTROL WASTE SUCH AS DISCARDED BUILDING MATERIALS, CONCRETE, TRUCK WASHOUT, CHEMICALS, LITTER AND SANITARY WASTE AT THE CONSTRUCTION SITE THAT MAY CAUSE ADVERSE IMPACTS TO WATER QUALITY.
 - ALL STORM SEWER FRAMES AND GRATES/LIDS SHALL BE MARKED WITH "DUMP NO WASTE" AND "DRAINS TO CREEK".
 - A NOTICE OF INTENT (NOI) MUST BE SUBMITTED TO THE MPDS PERMITTING AUTHORITY AND POSTMARKED AT LEAST 30 DAYS BEFORE COMMENCEMENT OF ANY WORK ON-SITE FOR ALL CONSTRUCTION SITES OVER ONE ACRE, INCLUDED IN THE NOI SHALL BE THE STORMWATER POLLUTION PREVENTION PLAN (SWPPP), WHICH INCLUDES THE APPROPRIATE BMP'S TO MINIMIZE THE DISCHARGE OF POLLUTANTS FROM THE CONSTRUCTION SITE.
 - AN INCIDENT OF NON-COMPLIANCE (INC) MUST BE COMPLETED AND SUBMITTED TO THE EPA IF, AT ANY TIME, AN EROSION OR SEDIMENT CONTROL DEVICE FAILS.
 - A NOTICE OF TERMINATION (NOT) MUST BE COMPLETED AND SUBMITTED TO THE EPA WHEN ALL PERMANENT EROSION CONTROL MEASURES ARE IN PLACE WITH A 70% ESTABLISHMENT OF VEGETATION.
 - SEE "SEASONS AT ROMKOVILLE STORMWATER POLLUTION PREVENTION PLAN (SWPPP)" BY MANHARD CONSULTING FOR MAINTENANCE PLAN.
 - BIODEGRADABLE EROSION CONTROL MEASURES SHALL BE USED IN LIEU OF PHOTO DEGRADABLE CONTRACTOR SHALL USE CUREX (NAG 575) OR APPROVED EQUIVALENT.

Table 2.1: Inspection Skill Level Descriptions	
Skill Level	Description
0	No special skills or prior experience required, but some basic training via manual, video, or other materials is necessary.
1	Inspector, maintenance crew member or citizen with prior experience with ponds and wetlands
2	Inspector or contractor with extensive experience with pond and wetland maintenance issues
3	Professional engineering consultant



UTILITY NOTES:

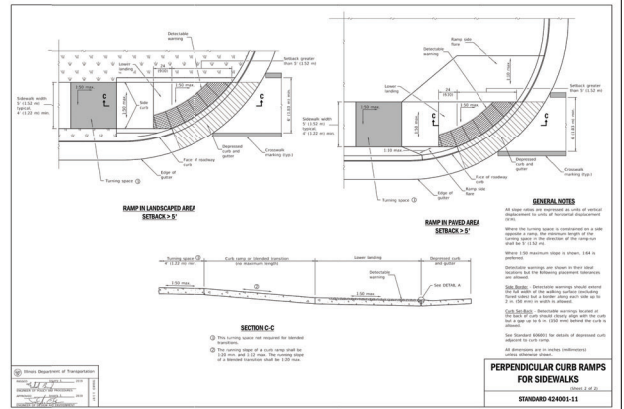
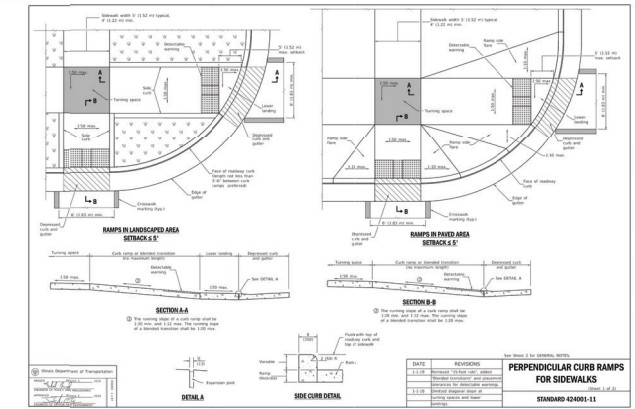
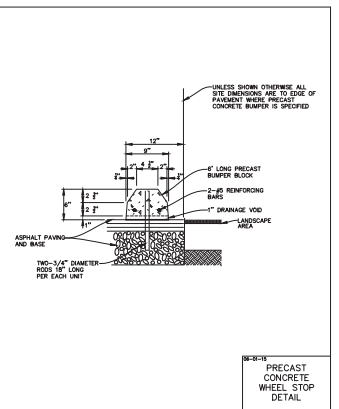
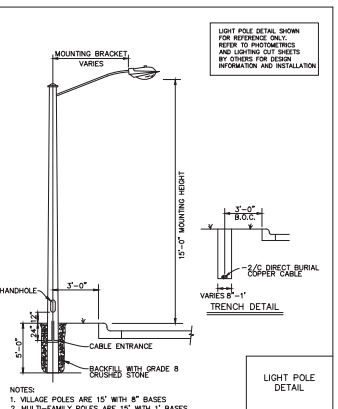
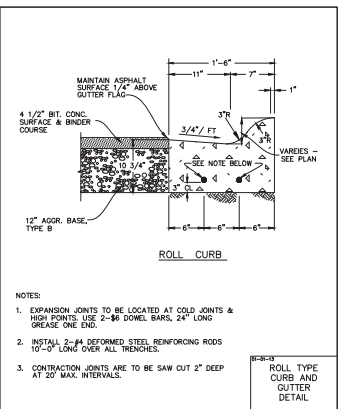
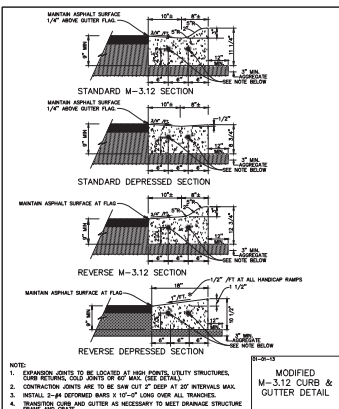
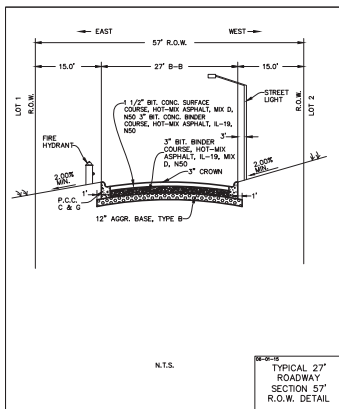
1. ALL UTILITY DIMENSIONS ARE TO CENTER OF PIPE OR CENTER OF STRUCTURE UNLESS OTHERWISE NOTED.
2. THE CONTRACTOR SHALL CONTACT I.U.L.L.E. (1-800-892-0123) PRIOR TO ANY WORK TO LOCATE UTILITIES AND SHALL CONTACT THE OWNER SHOULD UTILITIES APPEAR TO BE IN CONFLICT WITH THE PROPOSED IMPROVEMENT.
3. CONTRACTOR SHALL EXCAVATE AND VERIFY ALL EXISTING SEWER, WATER MAIN AND DRY UTILITY LOCATIONS, SIZES, CONDITIONS & ELEVATIONS AT PROPOSED POINTS OF CONNECTION AND CROSSINGS PRIOR TO ANY UNDERGROUND CONSTRUCTION AND NOTIFY THE OWNER OF ANY DISCREPANCIES OR CONFLICTS.
4. THE CONTRACTOR SHALL ADJUST RIM ELEVATIONS OF ALL EXISTING STRUCTURES TO PROPOSED FINISH GRADES.
5. AT LOCATIONS WHERE WATER MAIN CROSSES BENEATH OR LESS THAN 18" ABOVE A SEWER, PROVIDE WATER MAIN PROTECTION PER STANDARD SPECIFICATIONS FOR SEWER AND WATER MAIN CONSTRUCTION IN ILLINOIS, LATEST EDITION.
6. ALL WATER MAIN SHALL BE 6" BELOW FINISHED GRADE TO TOP OF MAINS UNLESS NOTED OTHERWISE.
7. ALL EXISTING UTILITIES SHOWN ARE NOT TO BE INTERPRETED AS THE EXACT ELEVATION OR LOCATION, OR AS THE ONLY OBSTACLES THAT MAY OCCUR ON THE SITE. CONTRACTOR SHALL VERIFY EXISTING CONDITIONS AND PROCEED WITH CAUTION AROUND ANY ANTICIPATED FEATURES.
8. THE UNDERGROUND UTILITY INFORMATION AS SHOWN HERE ON IS BASED, IN PART, UPON INFORMATION FURNISHED BY UTILITY COMPANIES AND THE LOCAL MUNICIPALITY. WHILE THIS INFORMATION IS BELIEVED TO BE RELIABLE, ITS ACCURACY AND COMPLETENESS CANNOT BE GUARANTEED NOR CERTIFIED.
9. ALL SANITARY AND STORM SEWER LENGTHS SHOWN ARE CENTER OF MANHOLE TO CENTER OF MANHOLE OR STORM MANHOLE TO FES.
10. CONTRACTOR SHALL CORE AND BOOT ALL PIPE ENTRANCES TO EXISTING SANITARY MANHOLES.
11. EXTERNAL CHIMNEY SEALS ARE REQUIRED ON PROPOSED AND ADJUSTED EXISTING SANITARY MANHOLES.
12. SOME EXISTING ITEMS TO BE REMOVED HAVE BEEN DELETED FROM THIS PLAN FOR CLARITY. SEE DEMOLITION PLAN FOR ITEMS DELETED.
13. ALL D.I. WATERMAIN FITTINGS SHALL BE WRAPPED.

MERCEDES-BENZ CAR DEALERSHIP
VILLAGE OF ROMEOVILLE, ILLINOIS
UTILITY PLAN

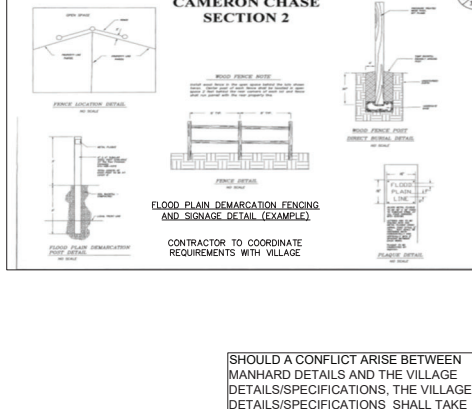
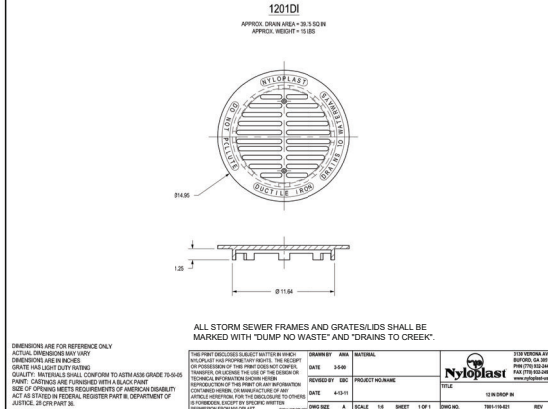
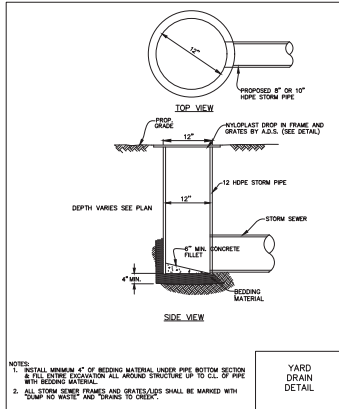
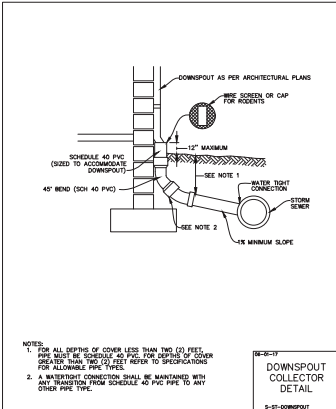
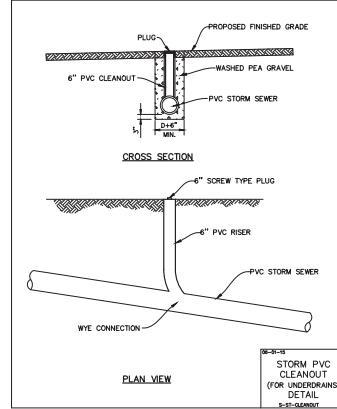
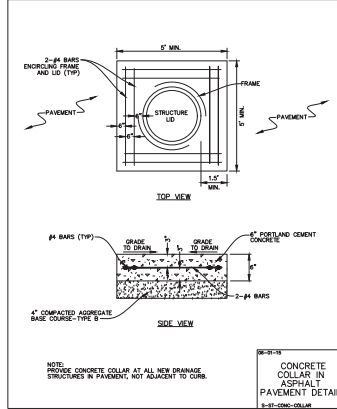
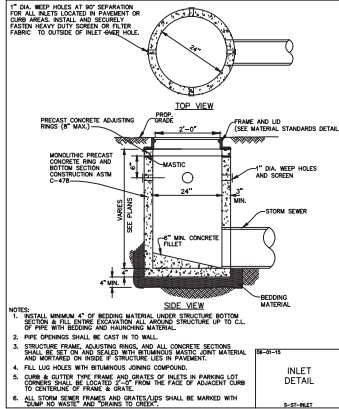
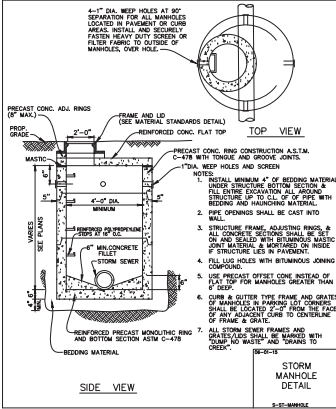
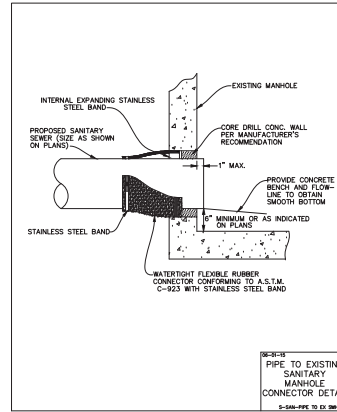
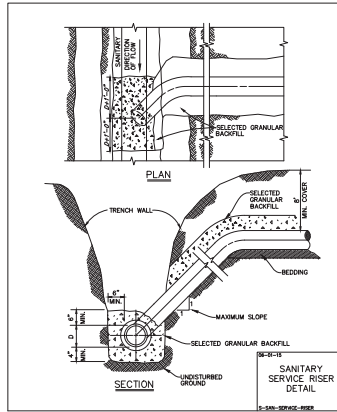
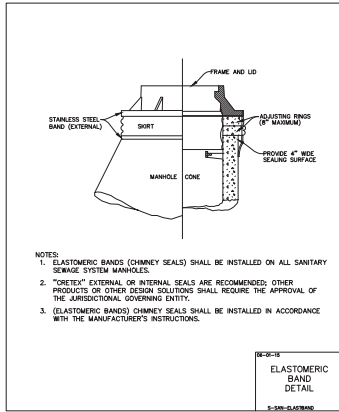
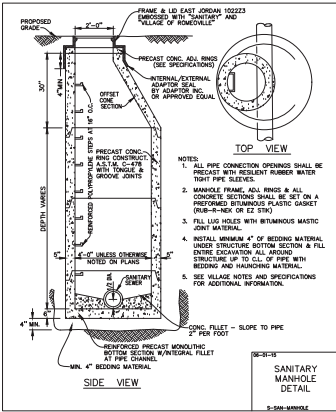
DATE: 06-07-21
DRAWN BY: LES
CHECKED BY: JON
SHEET
7 OF 14
FRD.VL01

©2021 MANHARD CONSULTING, LTD. ALL RIGHTS RESERVED

Manhard
CONSULTING LTD.
1000 West 10th Street, Suite 100
Romeoville, IL 60446
Phone: 815-892-0123
Fax: 815-892-0124
Email: info@manhardconsulting.com
Website: www.manhardconsulting.com



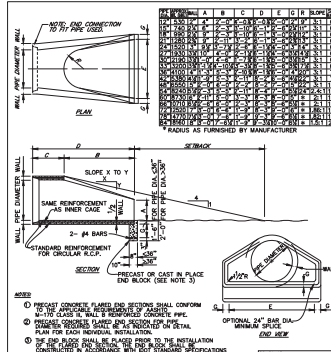
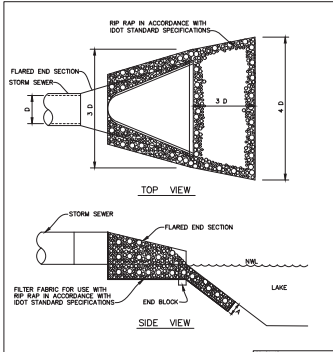
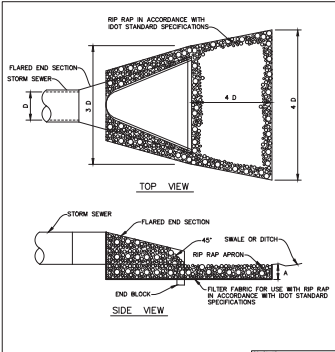
SHOULD A CONFLICT ARISE BETWEEN MANHARD DETAILS AND THE VILLAGE DETAILS/SPECIFICATIONS, THE VILLAGE DETAILS/SPECIFICATIONS SHALL TAKE PRECEDENCE.



SHOULD A CONFLICT ARISE BETWEEN MANHARD DETAILS AND THE VILLAGE DETAILS/SPECIFICATIONS, THE VILLAGE DETAILS/SPECIFICATIONS SHALL TAKE PRECEDENCE.

RIP-RAP									
STONE RIP-RAP								BEDDING	
SIZE DIA. (IN.)	QUALITY DESIGNATION	NUMBER PER CY	MINIMUM LENGTH (IN.)	MINIMUM WIDTH (IN.)	MINIMUM HEIGHT (IN.)	WEIGHT (LB)	SIZE MOD. (IN.)	MINIMUM LENGTH (IN.)	MINIMUM WIDTH (IN.)
12"	B	3	8"	4"	1-50	10	4.5"	N/A	
15"	B	3	8"	5	1-50	10	4.5"		
18"	B	4	16"	6"	1-150	40	7"	6"	
21"	B	4	16"	7"	1-150	40	7"	6"	
24"	B	4	16"	8"	1-150	40	7"	6"	
27"	B	4	16"	9"	1-150	40	7"	6"	
30"	B	4	16"	10"	1-150	40	7"	6"	
36"	B	5	22"	12"	3-400	90	10"	8"	
42"	B	6	25"	14"	3-600	90	10"	8"	
48"	B	6	26"	16"	4-800	170	12"	10"	
54"	B	6	26"	18"	6-800	170	12"	10"	
60"	B	6	26"	20"	6-800	170	12"	10"	
72"	B	6	26"	24"	6-800	170	12"	10"	

STONE
RIP RAP
DETAIL



© 2021 MANHARD CONSULTING, LTD. ALL RIGHTS RESERVED

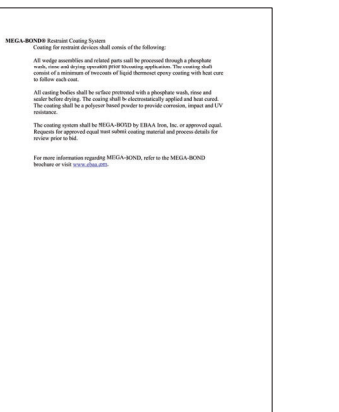
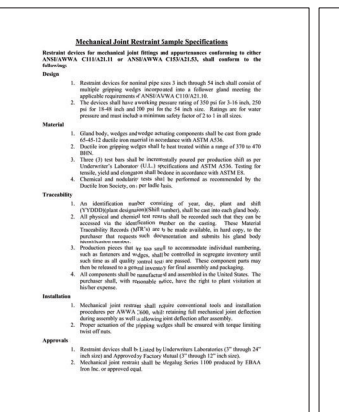
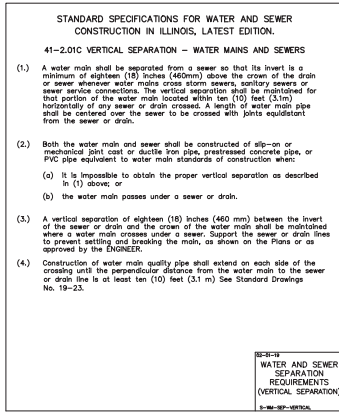
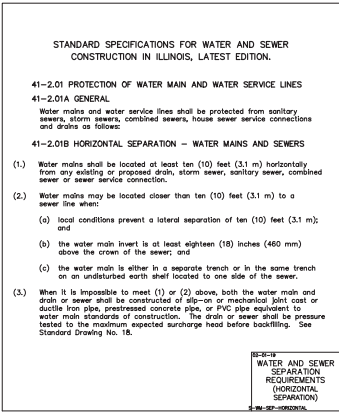
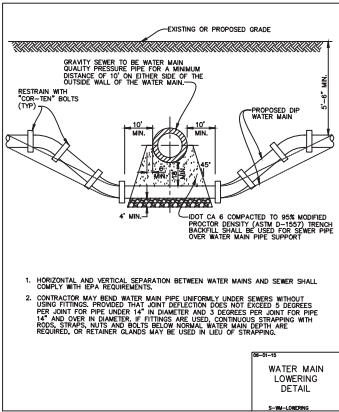
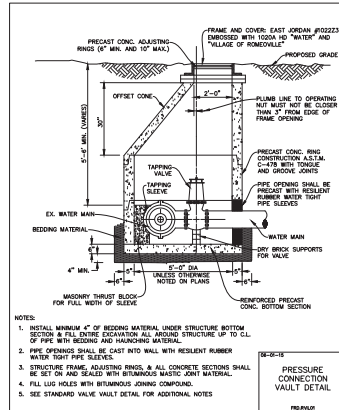
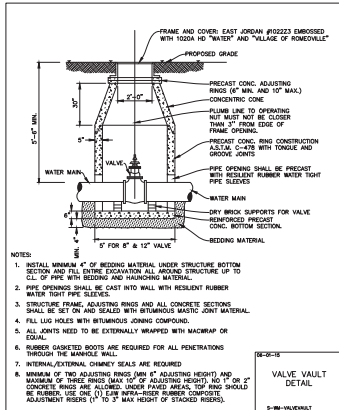
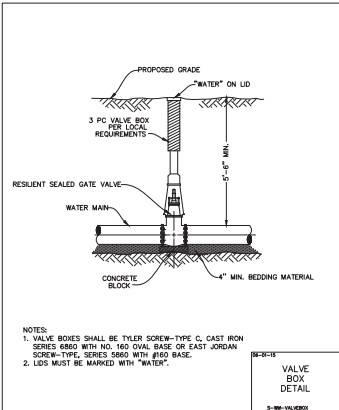
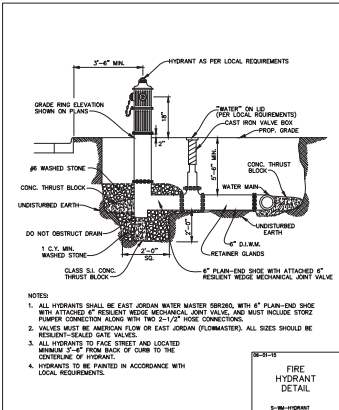
PROJ. MGR.: JSP
PROJ. ASSOC.: JCM
DRAWN BY: LES

SHEET
11 OF 14
FRD.RVIL01



Manhard
CONSULTING

300 Springer Drive, Lombard, IL 60148 ph 630.661.8800 fx 630.661.8845 manhard.com
 Civil Engineers | Surveyors | Water Engineers | Water & Waste Water Engineers



DUCTILE IRON JOINT RESTRAINT TABLE

JOINT RESTRAINT TABLE - Under additional pipe restraint is shown on the plans, the required length measured from 10\"/>

RESTRAINT LENGTHS - FEET

(*) - Restraint lengths measured at 75% of the design polyethylene wrapped pipe.

Pipe Size (inches)	Tee Branch	90° Elbow	22.5° Elbow	11.25° Elbow	Dead End
4	9 (10)	10 (10)	9 (9)	2 (3)	1 (2)
6	17 (19)	18 (19)	17 (17)	3 (3)	2 (2)
8	25 (27)	26 (27)	25 (25)	4 (4)	3 (3)
10	30 (32)	32 (33)	30 (30)	5 (5)	3 (3)
12	36 (38)	38 (39)	36 (36)	6 (6)	3 (3)
14	42 (44)	44 (45)	42 (42)	7 (7)	4 (4)
16	48 (50)	50 (51)	48 (48)	8 (8)	4 (4)
18	54 (56)	56 (57)	54 (54)	9 (9)	4 (4)
20	60 (62)	62 (63)	60 (60)	10 (10)	4 (4)
24	72 (74)	74 (75)	72 (72)	12 (12)	4 (4)
30	90 (92)	92 (93)	90 (90)	15 (15)	4 (4)
36	108 (110)	110 (111)	108 (108)	18 (18)	4 (4)

TEST PRESSURES BASED ON 150 PSI

REQUIRED PIPE LENGTH FOR RESTRAINED JOINTS

NOTE: EVERY JOINT ON THE PIPE SHALL BE RESTRAINED. ALL IMPROVEMENTS SHALL BE IN ACCORDANCE WITH RELIABLE STANDARD SPECIFICATIONS FOR IMPROVEMENTS.

VERTICAL FITTINGS

PIPE SIZE	TEE	90° ELBOW	22.5° ELBOW	11.25° ELBOW	DEAD END
4"	9'	10'	9'	2'	1'
6"	17'	18'	17'	3'	2'
8"	25'	26'	25'	4'	3'
10"	30'	32'	30'	5'	3'
12"	36'	38'	36'	6'	3'
14"	42'	44'	42'	7'	4'
16"	48'	50'	48'	8'	4'
18"	54'	56'	54'	9'	4'
20"	60'	62'	60'	10'	4'
24"	72'	74'	72'	12'	4'
30"	90'	92'	90'	15'	4'
36"	108'	110'	108'	18'	4'

HORIZONTAL FITTINGS

PIPE SIZE	TEE	90° ELBOW	22.5° ELBOW	11.25° ELBOW	DEAD END
4"	9'	10'	9'	2'	1'
6"	17'	18'	17'	3'	2'
8"	25'	26'	25'	4'	3'
10"	30'	32'	30'	5'	3'
12"	36'	38'	36'	6'	3'
14"	42'	44'	42'	7'	4'
16"	48'	50'	48'	8'	4'
18"	54'	56'	54'	9'	4'
20"	60'	62'	60'	10'	4'
24"	72'	74'	72'	12'	4'
30"	90'	92'	90'	15'	4'
36"	108'	110'	108'	18'	4'

MERCEDES BENZ CAR DEALERSHIP RESTRAINED JOINT LENGTH CALCULATIONS

Site Name	Fitting Type	Pipe Material	Soil Type	Safety Factor	Trench Type	Depth of Burial	Test Pressure	Nominal Size	Bend Angle	Branch Size	Length Along Run	Lowside Depth	Restraint Length	Restraint Length 2
12" to 12" Tee	Tee	Poly Wrapped Ductile	CL	1.5	5	5.5	150	12		12	13		1 ft.	
12" to 8" Tee	Tee	Poly Wrapped Ductile	CL	1.5	5	5.5	150	12		8	20		1 ft.	
8" to 8" Tee	Tee	Poly Wrapped Ductile	CL	1.5	5	5.5	150	8		8	20		1 ft.	
8"-45 Bend	Horizontal Bend	Poly Wrapped Ductile	CL	1.5	5	5.5	150	8	45				7 ft.	
8"-22.5 Bend	Horizontal Bend	Poly Wrapped Ductile	CL	1.5	5	5.5	150	8	22.5				4 ft.	
8"-11.25 Bend	Horizontal Bend	Poly Wrapped Ductile	CL	1.5	5	5.5	150	8	11.25				2 ft.	
8"-45 Lowering	Vertical Offset	Poly Wrapped Ductile	CL	1.5	5	5.5	150	8	45		10	28 ft.		5 ft.

SHOULD A CONFLICT ARISE BETWEEN MANHARD DETAILS AND THE VILLAGE DETAILS/SPECIFICATIONS, THE VILLAGE DETAILS/SPECIFICATIONS SHALL TAKE PRECEDENCE.

I.UNDERGROUND IMPROVEMENTS

STRUCTURE ADJUSTMENT

Minimum of two adjusting rings (min. 6" adjusting height) and maximum of three rings (Max. 10" adjusting height). No 1" or 2" concrete rings are allowed. Under paved areas, top ring should be rubber. Use one (1) EJW Infra-Riser rubber Composite Adjustment Risers.

MISCELLANEOUS

The Developer/Contractor is required to submit all testing results (density, chlorination, vacuum, pressure, etc) to the Village of Romeoville Public Works Department within 48 hours of any onsite testing.

SANITARY SEWER PIPE

Pipes must have a minimum cover depth of 5 feet. Pipes must be PVC SDR 26 when less than 15 feet deep, PVC SDR 21 when 15-20 feet deep, and SDR 18 when over 20 feet deep.

MANHOLES:

Manholes shall conform with the following

- [illegible]

FINAL ACCEPTANCE AND TESTING OF SANITARY SEWER

Before final acceptance, the sanitary sewers shall be tested in accordance with Section 31-1.11 of the "Standard Specifications for Water and Sewer Main Construction in Illinois". Specifically, all pipelines constructed of flexible materials shall be subject to air exfiltration tests, televising test, and deflection

The deflection test shall be performed no sooner than thirty (30) days of the backfilling operation and shall consist of measuring the pipe for vertical line deflection. Maximum ring deflection of the pipeline under load shall be limited to five (5) percent of the internal pipe diameter. All pipe exceeding this deflection shall be considered to have reached the limit of its serviceability and shall be re-laid or replaced by the developer. Deflection testing shall be accomplished using a manual, sphere, or pipe-type "top n-go-go" device, with a diameter equal to ninety-five (95) percent of the undeflected inside diameter of the pipe, or a video camera, if available. In addition, all sanitary sewer having a diameter of eight (8) inches or greater shall be televised. Copies of all video tapes must be submitted to the Village of Romeoville.

FINAL TESTING OF SANITARY SEWER MANHOLES

Vacuum Testing shall be carried out immediately after assembly and prior to backfilling of manholes that are up to seventy-two (72) inches in diameter. Manhole seals shall be plugged with a non-shrink grout, or rubber plug. The manhole frame and adjusting rings and chimney seals shall be in place before test grout shall be placed in the horizontal ports. All pipes entering the manhole shall be plugged, taking care to securely brace the plugs from being drawn into the manhole with the vacuum. Vacuum testing shall consist of creating a vacuum of ten (10) inches of mercury shall be placed on the manhole and the time measured for the vacuum to drop to nine (9) inches of mercury. This procedure shall be repeated three times at a minimum. ASTM C1242-02 Testing seals, developer shall seal all leaks and retest until acceptable. The testing shall be completed prior to backfilling (wherever possible) so that any leaks can be found and fixed immediately, and to save the horizontal manhole joints an opportunity to tighten.

FLOW MONITORING PRIOR TO ACCEPTANCE

The developer will be required to monitor the flowrate from the site for a period of two months (encompassing at least two major storm events) to identify excessive infiltration occurring in the system. The data must be submitted to the Village of Romeoville prior to acceptance of the public improvement.

WATER VALVES

All valves shall be resilient wedge valves conforming to the latest revision of ANSI/AWWA C115, with a rated working pressure of 200 psi in accordance with JURISDICTIONAL GOVERNING ENTITY requirements, except that butterfly valves conforming to ANSI/AWWA C301 shall be considered as all valves. All valves shall be installed in accordance with the applicable code of practice for the installation of valves.

ASTM C88. Transport containers for the pipe until they are shown on the plans for at least ten (10) days. Each container clearly plainly with memberline numbers and date of manufacture so it can be installed in the proper location, as chosen for the plans. Use new factory-installed cutouts in the bottom section area appropriate to the pipe being laid. Pipe connections at manholes - Cutouts should be equipped with rubber boots to ensure a watertight connection. Material shall be installed in accordance with the applicable code of practice for the installation of valves.

Flexible lightweight pipes, shall remain workable over a wide temperature range and shall not shrink, harden or oxidize upon aging. Material shall be equipped with a gasketed end for connection to rigid pipe.

Typical separator shall meet ASTM C438 and ASTM C 361 requirements. The frames for the tank shall be installed where corner sections are required.

Approved for use as a separator for external separation of pipe joints. Visco Seal as manufactured by Calveco Corp., BICO Environmental, Inc. (Visco Seal) as manufactured by MFC, or approved equal.

VALVE VAULT!

Valve vaults shall be constructed in conformance with Section IIIA Manholes, etc. above. All valve vaults shall be a minimum of 5' diameter. Frame and vault shall be East Jordan 10102223 embossed with 1020A HD "Water" and "Village of Romeville." All joints need to be externally wrapped with Mac or equal. Rubber gasketed boots are required for all penetrations through the manhole wall. Internal/External Chimney seals are required. Minimum two adjusting rings (Min. 6" adjusting height) and maximum of three rings (Max. 10" adjusting height). No 1" or 2" concrete rings are allowed.

paved areas, to

Valve boxes shall be constructed in conformance with the standard detail. Valve boxes shall be cast iron extension screw type having lids imprinted with

letters "WATER".

All fire hydrants shall be located as shown on the PLANS. Fire Hydrants shall have Harrington 5' Stortz nozzle with two 2-1.2" NST hose nozzles and

can be damaged

TAPPING RI FEVER / PRESSURE CONNECTIONS

The non-village (private) responsibility for maintenance

stop. One inch (1") taps made on ductile iron pipe shall be direct and shall not require saddles. A tap larger than 1" shall utilize a stainless steel service saddle equal to Cascade Model CDC2 or equivalent (Ford = FS303) with Water Superintendent's approval. All taps shall have a minimum of three feet

separation.

Pressure Connections are not allowed for same pipe sizes. For this type of situation, a tee must be used.

Use 2-piece ductile iron bolted sleeve type with mech

(1) Tyler Union Ductile Iron MJ Tapping Sleeve

concrete visits - n

CHLORINATION

Gas chlorine must be used for disinfection. The chlorination contractor must call 815-886-1870 a minimum of 24-hours in advance to schedule chlorine. All Village of Round Bay employees shall operate water system valves at turn on/off accepting whisks while samples are being collected. All chlorine and safety equipment must meet or exceed the standards and recommendations set by the Chlorine Institute, Inc. The chlorinator must be a licensed or certified Illinois water operator with a minimum of 5 years experience working with chlorine disinfection of water supply lines. The chlorination contractor must have two people present to chlorinate. One to monitor the cylinder and one to monitor in the field. The chlorination contractor must be bonded and insured, and have proof of both on file with the Village. The chlorination contractor must have updated 24-hour emergency phone numbers on file with Village.

The chlorination contractor must comply with state and federal regulations regarding transportation and handling of chlorine cylinders.

- (1) Shipping and emergency papers for every job location
- (2) Proof of insurance for hauling and handling chlorine gas
- (3) Commercial driver's license with Hazmat endorsement and medical card
- (4) Hazmat certificate of registration
- (5) Hazardous materials placard displayed on vehicle

Under no circumstances will chlorine contractors be allowed to apply heat to the chlorine cylinder (i.e. hot baths, propane torches, etc.). While the cylinder being used it must be in a vertical position, as well as being affixed to a solid object. Prior to chlorination, the chlorination contractor must provide a detailed written chlorination and flushing plan to the Village for review and written approval. At any time, the Village or its authorized representative may ask for

of any or all of the a

- MISCELLANEOUS**
- (1) A minimum of 48 hours prior to any water usages (i.e. flushes, fills, etc.), the contractor must call the Village of Romeoville's Water Department at 815-581-1111 to get approval of said usage.
 - (2) Any uncalibrated usages will result in penalties. All valves and hydrants shall be submitted to the Village of Romeoville Water Department for written approval prior to ordering.
 - (3) The developer will be required to conduct a leak detection survey by sounding and correlating with computerized equipment every valve box, hydrant and service to identify any leaks occurring in the system. The data must be submitted to the Village prior to acceptance of the public improvement.

SHOULD A CONFLICT ARISE BETWEEN THE MANHARD SPECIFICATIONS AND THE VILLAGE SPECIFICATIONS, THE VILLAGE SPECIFICATIONS TAKE PRECEDENCE.

OUTLOT 10

HOMEVILLE CROSSING FIRST RESURVEDIVISION

RECORDED
OUTLOT 11

OUTLOT 13

UNRESERVED LAND

LOT 2
PROPOSED MERCEDES
BENZ BUILDING
187,000 S.F.
F.F. 1847.00

~~FIRE DEPARTMENT CONNECTION~~

LOT 3

UNSUBDIVIDED LAND
 CONVEYED TO PAUL ALES, INCORPORATED, BY DEED DATED
 FEBRUARY 13, 1933 AND RECORDED OCTOBER 5, 1933, IN BOOK
 2 AT PAGE 622 AS DOCUMENT NUMBER 466426
 PIN:11-04-17-100-002

0 30 60 120

SCALE: 1"=60'

LEGEND

PROPOSED HYDRANT HAVING A RADIUS OF 150 FT SHOWING THAT THE ENTIRE SITE IS COVERED AND SPACING IS LESS THAN OR EQUAL TO 300 FT

EXISTING HYDRANT HAVING A
RADIUS OF 150 FT SHOWING THAT
THE ENTIRE SITE IS COVERED AND
SPACING IS LESS THAN OR EQUAL
TO 300 FT

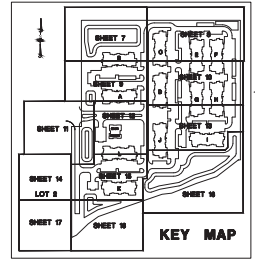
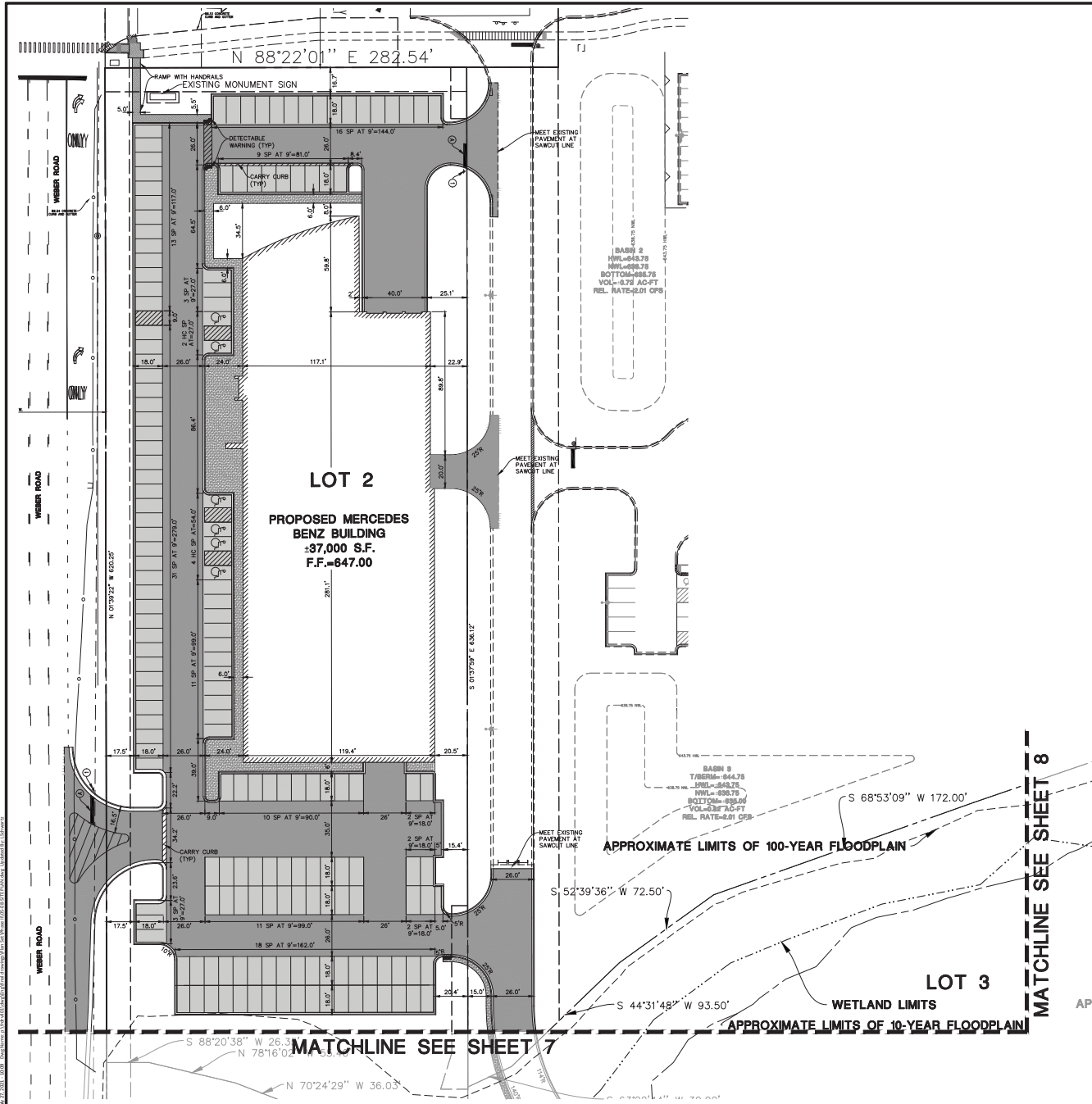
PROJ. MGR.: JSP
PROJ. ASSOC.: JCM
DRAWN BY: LES
DATE: 05-07-21
SCALE: 1"=60'

SHEET
3
FRD.RVIL01

MERCEDES BENZ OF ROMEOVILLE
VILLAGE OF ROMEOVILLE, ILLINOIS
FIRE HYDRANT COVERAGE EXHIBIT

Manhard
CONSULTING LTD.





PAVEMENT LEGEND	
STANDARD DUTY PAVEMENT	
1 1/2\" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50	
2\" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50	
8\" AGGREGATE BASE COURSE, TYPE B	
HEAVY DUTY PAVEMENT	
1 1/2\" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50	
3\" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50	
12\" AGGREGATE BASE COURSE, TYPE B	
CONCRETE SIDEWALK	
6\" PORTLAND CEMENT CONCRETE	
4\" COMPACTED AGGREGATE BASE COURSE, TYPE B	
PUBLIC SIDEWALK	
6\" PORTLAND CEMENT CONCRETE	
4\" COMPACTED AGGREGATE BASE COURSE, TYPE B	

SIGN LEGEND	
① R1-1 STOP SIGN	④ 24\" WHITE STOP BAR
② R7-8 HANDICAP PARKING SIGN	⑤ 4\" WHITE LINE
③ K-6245 VAN ACCESSIBLE PARKING	⑥ PEDESTRIAN CROSSWALK WITH 6\" WHITE STRIPING PERPENDICULAR TO DIRECTION OF TRAFFIC 2' O.C. WITH 4\" WHITE BORDER
④ NO PARKING SIGN	⑦ LETTERS AND SYMBOLS PAVEMENT MARKINGS
⑤ NO PARKING FIRE LANE	⑧ TRAFFIC FLOW DIRECTIONAL ARROWS
	⑨ 4\" WHITE DIAGONAL AT 45° SPACED 2' O.C. W/ 4\" WHITE BORDER
	⑩ 4\" YELLOW LINE
	⑪ 4\" YELLOW DIAGONAL AT 45° SPACED 2' O.C. W/ 4\" YELLOW BORDER

- SITE DIMENSIONAL AND PAVING NOTES:**
- ALL DIMENSIONS ARE FACE OF CURB TO FACE OF CURB OR BUILDING FOUNDATION UNLESS NOTED OTHERWISE.
 - ALL PROPOSED CURB AND GUTTER SHALL BE 86.12 UNLESS OTHERWISE NOTED.
 - ALL CURB RADIUS SHALL BE 3' MEASURED TO FACE OF CURB UNLESS NOTED OTHERWISE.
 - THREE (3) DRILLED AND GROUTED 18\" NO. 5 REINFORCING BARS OR EXPANSION TIE ANCHORS, 5\" AT DIAMETER, SHALL BE USED TO TIE THE NEW CURB AND GUTTER TO THE EXISTING CURB AND GUTTER ON EACH SIDE.
 - BUILDING DIMENSIONS AND ADJACENT PARKING HAVE BEEN PREPARED BASED UPON ARCHITECTURAL INFORMATION CURRENT AT THE DATE OF THIS DRAWING. SUBSEQUENT ARCHITECTURAL CHANGES MAY EXIST. THEREFORE CONTRACTOR SHALL REFER TO ARCHITECTURAL PLANS FOR PRECISE BUILDING DIMENSIONS AND NOTIFY THE ARCHITECT AND ENGINEER OF ANY DISCREPANCIES PRIOR TO CONSTRUCTION. BUILDING DIMENSIONS SHOWN SHOULD NOT BE USED FOR CONSTRUCTION LAYOUT OF BUILDING.
 - IMPROVEMENTS ADJACENT TO BUILDING, IF SHOWN, SUCH AS TRUCK DOCK, RETAINING WALLS, SIDEWALKS, CURBING, FENCES, CANOPIES, RAMPS, HANDICAP ACCESS, PLANTERS, DUMPSTERS, AND TRANSFORMERS ETC., HAVE BEEN SHOWN FOR APPROXIMATE LOCATION ONLY. REFER TO ARCHITECTURAL PLANS FOR EXACT LOCATIONS, SPECIFICATIONS AND DETAILS.
 - LOCATION OF PRIVATE SIDEWALKS SHALL BE COORDINATED WITH PROPOSED DRIVEWAY. CONTRACTOR TO VERIFY ACTUAL BUILDING PLAN LOCATIONS WITH ARCHITECT/DEVELOPER PRIOR TO CONSTRUCTING THE SIDEWALKS.
 - ALL ROADWAY AND PARKING LOT SIGNAGE, STRIPING, SYMBOLS, ETC. SHALL BE IN ACCORDANCE WITH LATEST JURISDICTION GOVERNMENTAL ENTITY DETAILS.
 - SOME EXISTING ITEMS TO BE REMOVED HAVE BEEN DELETED FROM THIS PLAN FOR CLARITY. SEE DEMOLITION PLAN FOR ITEMS DELETED.
 - PROVIDE DEPRESSED CURB AND RAMP AT ALL HANDICAP ACCESSIBLE SIDEWALK AND PATH LOCATIONS PER FEDERAL AND STATE STANDARDS.
 - THE CONTRACTOR SHALL CONTACT J.U.L.L.I.E. (1-800-892-0123) PRIOR TO ANY WORK TO LOCATE UTILITIES AND SHALL CONTACT THE OWNER SHOULD UTILITIES APPEAR TO BE IN CONFLICT WITH THE PROPOSED IMPROVEMENT.
 - ALL CROSSWALKS AND SIDEWALK CROSSINGS ARE TO BE STRIPED.

SITE STATISTICS TABLE	
PARCEL AREA	1,017,696 S.F. (23.36 ACRES)
LOT 2 AREA	347,959 S.F. (7.99 ACRES)
LOT 3 AREA	669,736 S.F. (15.38 ACRES)
TOTAL PARKING PROVIDED	1,013 SPACES
LOT 2 STANDARD PARKING PROVIDED	60 SPACES
LOT 2 HANDICAP PARKING PROVIDED	6 SPACES
LOT 3 PARKING PROVIDED	947 SPACES
LOT 2 OPEN SPACE AREA	235,329 S.F. (5.43 ACRES, 67.9%)
LOT 3 IMPERVIOUS AREA	111,630 S.F. (2.56 ACRES, 32.1%)
LOT 3 OPEN SPACE AREA	394,454 S.F. (9.06 ACRES, 58.9%)
LOT 3 IMPERVIOUS AREA	275,184 S.F. (6.32 ACRES, 41.1%)
TOTAL BUILDING AREA	37,000 S.F. (0.86 ACRES)
LOT COVERAGE	38.0%
FLOOR AREA RATIO	0.04

Manhard CONSULTING

1000 S. Main Street, Suite 100
Romeoville, IL 60446
Tel: 815.461.1111
Fax: 815.461.1112
Email: info@manhardconsulting.com
Website: www.manhardconsulting.com

Professional Engineer
Professional Surveyor
Professional Land Surveyor
Professional Planner

MERCEDES-BENZ CAR DEALERSHIP

VILLAGE OF ROMEOVILLE, ILLINOIS

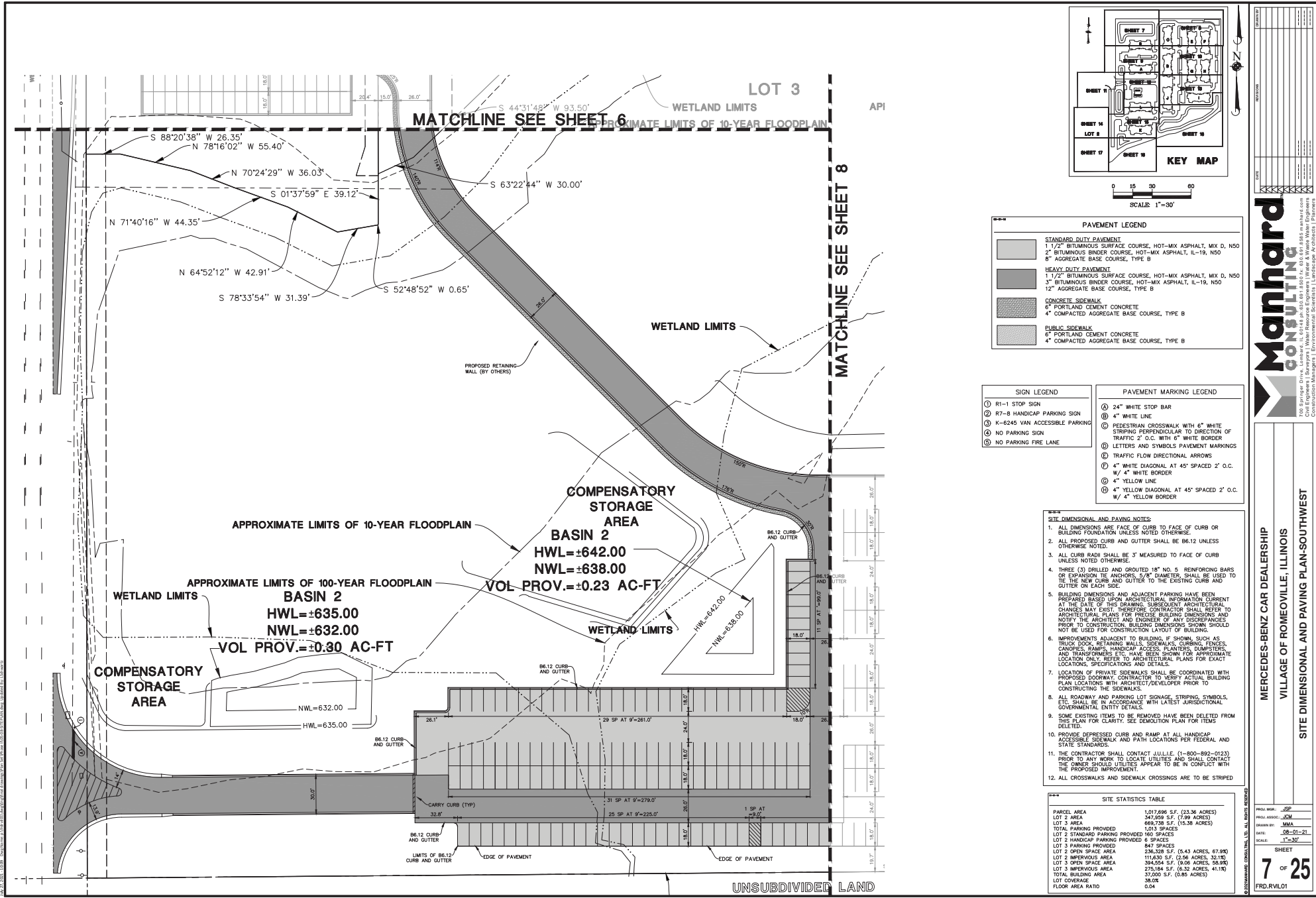
SITE DIMENSIONAL AND PAVING PLAN-NORTHWEST

DATE: 08-01-21

SCALE: 1\"=30'

SHEET 6 OF 25

PROJ: RV101



PAVEMENT LEGEND	
STANDARD DUTY PAVEMENT	
1 1/2" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50	
2" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50	
8" AGGREGATE BASE COURSE, TYPE B	
HEAVY DUTY PAVEMENT	
1 1/2" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50	
3" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50	
12" AGGREGATE BASE COURSE, TYPE B	
CONCRETE SIDEWALK	
6" PORTLAND CEMENT CONCRETE	
4" COMPACTED AGGREGATE BASE COURSE, TYPE B	
PUBLIC SIDEWALK	
6" PORTLAND CEMENT CONCRETE	
4" COMPACTED AGGREGATE BASE COURSE, TYPE B	

SIGN LEGEND	
① R1-1 STOP SIGN	
② R7-8 HANDICAP PARKING SIGN	
③ K-6245 VAN ACCESSIBLE PARKING	
④ NO PARKING SIGN	
⑤ NO PARKING FIRE LANE	

PAVEMENT MARKING LEGEND	
① 24" WHITE STOP BAR	
② 4" WHITE LINE	
③ PEDESTRIAN CROSSWALK WITH 6" WHITE STRIPING PERPENDICULAR TO DIRECTION OF TRAFFIC 2' O.C. WITH 6" WHITE BORDER	
④ LETTERS AND SYMBOLS PAVEMENT MARKINGS	
⑤ TRAFFIC FLOW DIRECTIONAL ARROWS	
⑥ 4" WHITE DIAGONAL AT 45° SPACED 2' O.C.	
⑦ W/ 4" WHITE BORDER	
⑧ 4" YELLOW LINE	
⑨ 4" YELLOW DIAGONAL AT 45° SPACED 2' O.C.	
⑩ W/ 4" YELLOW BORDER	

- SITE DIMENSIONAL AND PAVING NOTES:**
- ALL DIMENSIONS ARE FACE OF CURB TO FACE OF CURB OR BUILDING FOUNDATION UNLESS NOTED OTHERWISE.
 - ALL PROPOSED CURB AND GUTTER SHALL BE 86.12 UNLESS OTHERWISE NOTED.
 - ALL CURB RADI SHALL BE 3' MEASURED TO FACE OF CURB UNLESS NOTED OTHERWISE.
 - THREE (3) DRILLED AND GROUTED 18" NO. 5 REINFORCING BARS OR EXPANSION TIE ANCHORS, 5" DIA. SHALL BE USED TO TIE THE NEW CURB AND GUTTER TO THE EXISTING CURB AND GUTTER ON EACH SIDE.
 - BUILDING DIMENSIONS AND ADJACENT PARKING HAVE BEEN PREPARED BASED UPON ARCHITECTURAL INFORMATION CURRENT AT THE DATE OF THIS DRAWING. SUBSEQUENT ARCHITECTURAL CHANGES MAY EXIST. THEREFORE CONTRACTOR SHALL REFER TO ARCHITECTURAL PLANS FOR PRECISE BUILDING DIMENSIONS AND NOTIFY THE ARCHITECT AND ENGINEER OF ANY DISCREPANCIES PRIOR TO CONSTRUCTION. BUILDING DIMENSIONS SHOWN SHOULD NOT BE USED FOR CONSTRUCTION LAYOUT OF BUILDINGS.
 - IMPROVEMENTS ADJACENT TO BUILDING, IF SHOWN, SUCH AS TRUCK DOCK, RETAINING WALLS, SIDEWALKS, CURBING, FENCES, CANOPIES, RAMPS, HANDICAP ACCESS, PLANTERS, DUMPSTERS, AND TRANSFORMERS ETC. HAVE BEEN SHOWN FOR APPROXIMATE LOCATION ONLY. REFER TO ARCHITECTURAL PLANS FOR EXACT LOCATIONS, SPECIFICATIONS AND DETAILS.
 - LOCATION OF PRIVATE SIDEWALKS SHALL BE COORDINATED WITH PROPOSED DRIVEWAY. CONTRACTOR TO VERIFY ACTUAL BUILDING PLANS LOCATIONS WITH ARCHITECT/DEVELOPER PRIOR TO CONSTRUCTING THE SIDEWALKS.
 - ALL ROADWAY AND PARKING LOT SIGNAGE, STRIPING, SYMBOLS, ETC. SHALL BE IN ACCORDANCE WITH LATEST JURISDICTION GOVERNMENTAL ENTITY DETAILS.
 - SOME EXISTING ITEMS TO BE REMOVED HAVE BEEN DELETED FROM THIS PLAN FOR CLARITY. SEE DEMOLITION PLAN FOR ITEMS DELETED.
 - PROVIDE DEPRESSED CURB AND RAMP AT ALL HANDICAP ACCESSIBLE SIDEWALK AND PATH LOCATIONS PER FEDERAL AND STATE STANDARDS.
 - THE CONTRACTOR SHALL CONTACT J.U.L.L.I.E. (1-800-892-0123) PRIOR TO ANY WORK TO LOCATE UTILITIES AND SHALL CONTACT THE OWNER SHOULD UTILITIES APPEAR TO BE IN CONFLICT WITH THE PROPOSED IMPROVEMENT.
 - ALL CROSSWALKS AND SIDEWALK CROSSINGS ARE TO BE STRIPED.

SITE STATISTICS TABLE	
PARCEL AREA	1,017,896 S.F. (23.36 ACRES)
LOT 2 AREA	341,958 S.F. (7.79 ACRES)
LOT 3 AREA	668,738 S.F. (15.36 ACRES)
TOTAL PARKING PROVIDED	1,015 SPACES
LOT 2 HANDICAP PARKING PROVIDED	6 SPACES
LOT 3 PARKING PROVIDED	847 SPACES
LOT 2 OPEN SPACE AREA	236,338 S.F. (5.43 ACRES, 67.9%)
LOT 2 IMPERVIOUS AREA	111,630 S.F. (2.56 ACRES, 32.1%)
LOT 3 OPEN SPACE AREA	394,554 S.F. (9.06 ACRES, 38.9%)
LOT 3 IMPERVIOUS AREA	275,184 S.F. (6.32 ACRES, 41.1%)
TOTAL BUILDING AREA	37,000 S.F. (0.85 ACRES)
FLOOR AREA RATIO	0.04

Manhard CONSULTING

200 S. 1st St., Suite 100
Chicago, IL 60604
Tel: 312.462.1000
Fax: 312.462.1001
Email: info@manhardconsulting.com
Website: www.manhardconsulting.com

Mercedes-Benz Car Dealership

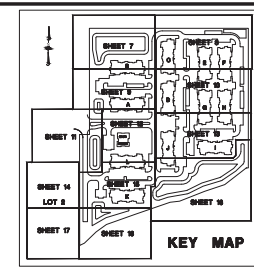
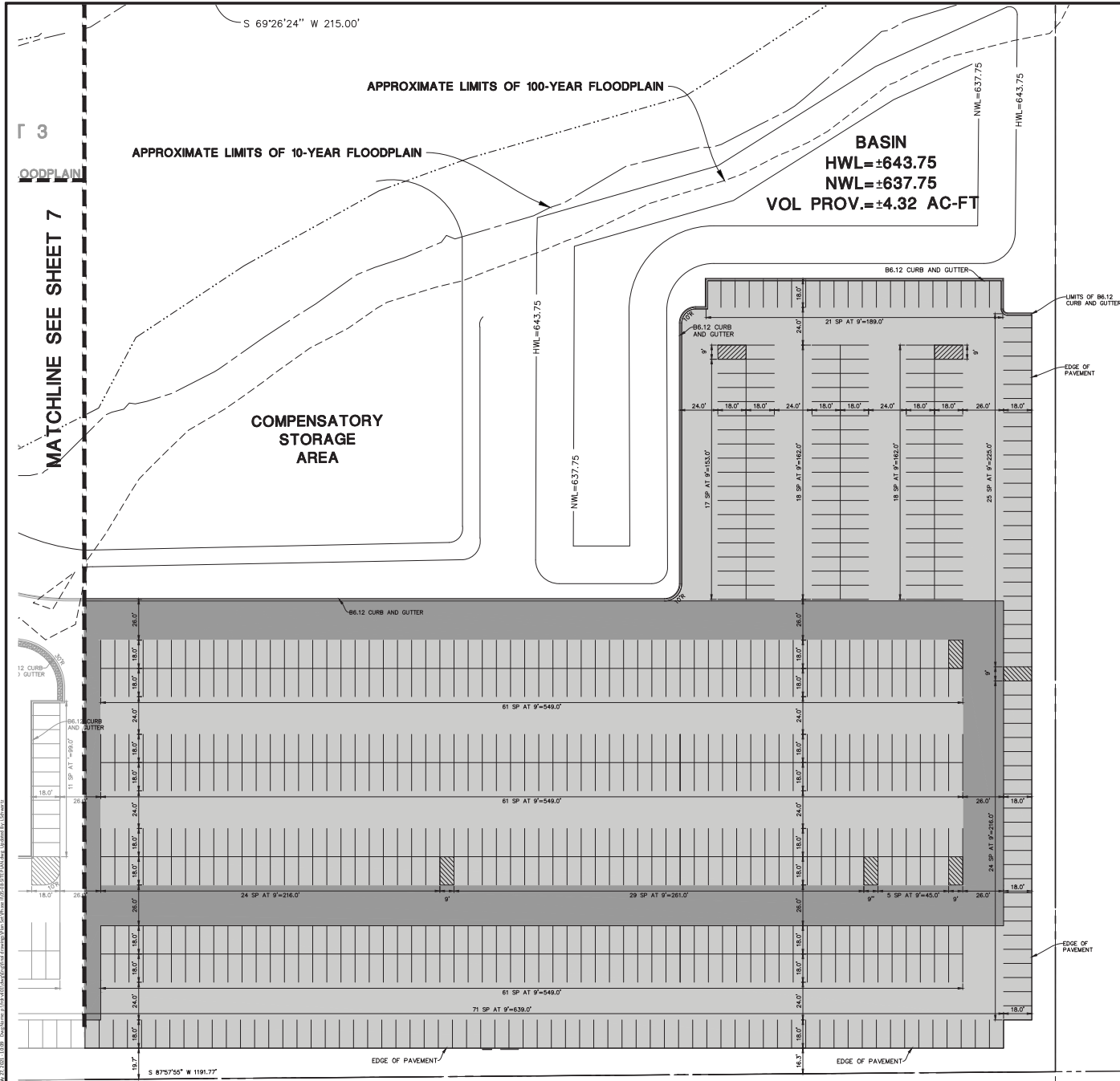
Village of Romeoville, Illinois

Site Dimensional and Paving Plan-Southwest

DATE: 11-15-21

SHEET 7 OF 25

PROJ: RV101



PAVEMENT LEGEND	
STANDARD DUTY PAVEMENT	1 1/2" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50
	2" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50
	8" AGGREGATE BASE COURSE, TYPE B
HEAVY DUTY PAVEMENT	1 1/2" BITUMINOUS SURFACE COURSE, HOT-MIX ASPHALT, MIX D, N50
	3" BITUMINOUS BINDER COURSE, HOT-MIX ASPHALT, IL-19, N50
	12" AGGREGATE BASE COURSE, TYPE B
CONCRETE SIDEWALK	6" PORTLAND CEMENT CONCRETE
PUBLIC SIDEWALK	6" PORTLAND CEMENT CONCRETE
	4" COMPACTED AGGREGATE BASE COURSE, TYPE B

SIGN LEGEND	
①	R1-1 STOP SIGN
②	R7-B HANDICAP PARKING SIGN
③	K-6245 VAN ACCESSIBLE PARKING
④	NO PARKING SIGN
⑤	NO PARKING FIRE LANE

PAVEMENT MARKING LEGEND	
①	24" WHITE STOP BAR
②	4" WHITE LINE
③	PEDESTRIAN CROSSWALK WITH 6" WHITE STRIPING PERPENDICULAR TO DIRECTION OF TRAFFIC 2' O.C. WITH 6" WHITE BORDER
④	LETTERS AND SYMBOLS PAVEMENT MARKINGS
⑤	TRAFFIC FLOW DIRECTIONAL ARROWS
⑥	4" WHITE DIAGONAL AT 45° SPACED 2' O.C.
⑦	W/ 4" WHITE BORDER
⑧	4" YELLOW LINE
⑨	4" YELLOW DIAGONAL AT 45° SPACED 2' O.C.
⑩	W/ 4" YELLOW BORDER

- SITE DIMENSIONAL AND PAVING NOTES:**
- ALL DIMENSIONS ARE FACE OF CURB TO FACE OF CURB OR BUILDING FOUNDATION UNLESS NOTED OTHERWISE.
 - ALL PROPOSED CURB AND GUTTER SHALL BE 86.12 UNLESS OTHERWISE NOTED.
 - ALL CURB RADIUS SHALL BE 3' MEASURED TO FACE OF CURB UNLESS NOTED OTHERWISE.
 - THREE (3) DRILLED AND GROUTED 18" NO. 5 REINFORCING BARS OR EXPANSION TIE ANCHORS, 9" Ø DIAMETER, SHALL BE USED TO TIE THE NEW CURB AND GUTTER TO THE EXISTING CURB AND GUTTER ON EACH SIDE.
 - BUILDING DIMENSIONS AND ADJACENT PARKING HAVE BEEN PREPARED BASED UPON ARCHITECTURAL INFORMATION CURRENT AT THE DATE OF THIS DRAWING. SUBSEQUENT ARCHITECTURAL CHANGES MAY EXIST. THEREFORE, CONTRACTOR SHALL REFER TO ARCHITECTURAL PLANS FOR PRECISE BUILDING DIMENSIONS AND PRIOR TO CONSTRUCTION, BUILDING DIMENSIONS SHOWN SHOULD NOT BE USED FOR CONSTRUCTION LAYOUT OF BUILDING.
 - IMPROVEMENTS ADJACENT TO BUILDING, IF SHOWN, SUCH AS TRUCK DOCK, RETAINING WALLS, SIDEWALKS, CURBING, FENCES, CANOPIES, RAMPS, HANDICAP ACCESS, PLANTERS, DUMPSTERS, AND TRANSFORMERS ETC., HAVE BEEN SHOWN FOR APPROXIMATE LOCATION ONLY. REFER TO ARCHITECTURAL PLANS FOR EXACT LOCATIONS, SPECIFICATIONS AND DETAILS.
 - LOCATION OF PRIVATE SIDEWALKS SHALL BE COORDINATED WITH PROPOSED DRIVEWAY. CONTRACTOR TO VERIFY ACTUAL BUILDING PLAN LOCATIONS WITH ARCHITECT/DEVELOPER PRIOR TO CONSTRUCTING THE SIDEWALKS.
 - ALL ROADWAY AND PARKING LOT SIGNAGE, STRIPING, SYMBOLS, ETC. SHALL BE IN ACCORDANCE WITH LATEST JURISDICTIONAL GOVERNMENTAL ENTITY DETAILS.
 - SOME EXISTING ITEMS TO BE REMOVED HAVE BEEN DELETED FROM THIS PLAN FOR CLARITY. SEE DEMOLITION PLAN FOR ITEMS DELETED.
 - PROVIDE DEPRESSED CURB AND RAMP AT ALL HANDICAP ACCESSIBLE SIDEWALK AND PATH LOCATIONS PER FEDERAL AND STATE STANDARDS.
 - THE CONTRACTOR SHALL CONTACT JULLIE (1-800-892-0123) PRIOR TO ANY WORK TO LOCATE UTILITIES AND SHALL CONTACT THE OWNER SHOULD UTILITIES APPEAR TO BE IN CONFLICT WITH THE PROPOSED IMPROVEMENT.
 - ALL CROSSWALKS AND SIDEWALK CROSSINGS ARE TO BE STRIPED.

SITE STATISTICS TABLE	
PARCEL AREA	1,017,699 S.F. (23.36 ACRES)
LOT 3 AREA	347,959 S.F. (7.99 ACRES)
LOT 2 AREA	466,734 S.F. (10.58 ACRES)
TOTAL PARKING PROVIDED	1,013 SPACES
LOT 2 STANDARD PARKING PROVIDED	160 SPACES
LOT 3 HANDICAP PARKING PROVIDED	6 SPACES
LOT 3 PARKING PROVIDED	847 SPACES
LOT 2 OPEN SPACE AREA	236,328 S.F. (5.43 ACRES, 67.99%)
LOT 3 IMPERVIOUS AREA	111,620 S.F. (2.56 ACRES, 32.1%)
LOT 2 OPEN SPACE AREA	384,504 S.F. (8.76 ACRES, 38.99%)
LOT 3 IMPERVIOUS AREA	275,184 S.F. (6.32 ACRES, 41.1%)
TOTAL BUILDING AREA	37,000 S.F. (0.85 ACRES)
LOT COVERAGE	36.0%
FLOOR AREA RATIO	0.04

DATE: _____

SCALE: 1"=30'

KEY MAP

MANHARD CONSULTING

1280 S. RIVER ST., SUITE 200, CHICAGO, IL 60605

TEL: (773) 344-1100 FAX: (773) 344-1101

WWW.MANHARDCONSULTING.COM

MERCEDES-BENZ CAR DEALERSHIP

VILLAGE OF ROMEOVILLE, ILLINOIS

SITE DIMENSIONAL AND PAVING PLAN-SOUTHEAST

PROJECT NO.: JCM

SCALE: 1"=30'

DATE: 11-01-21

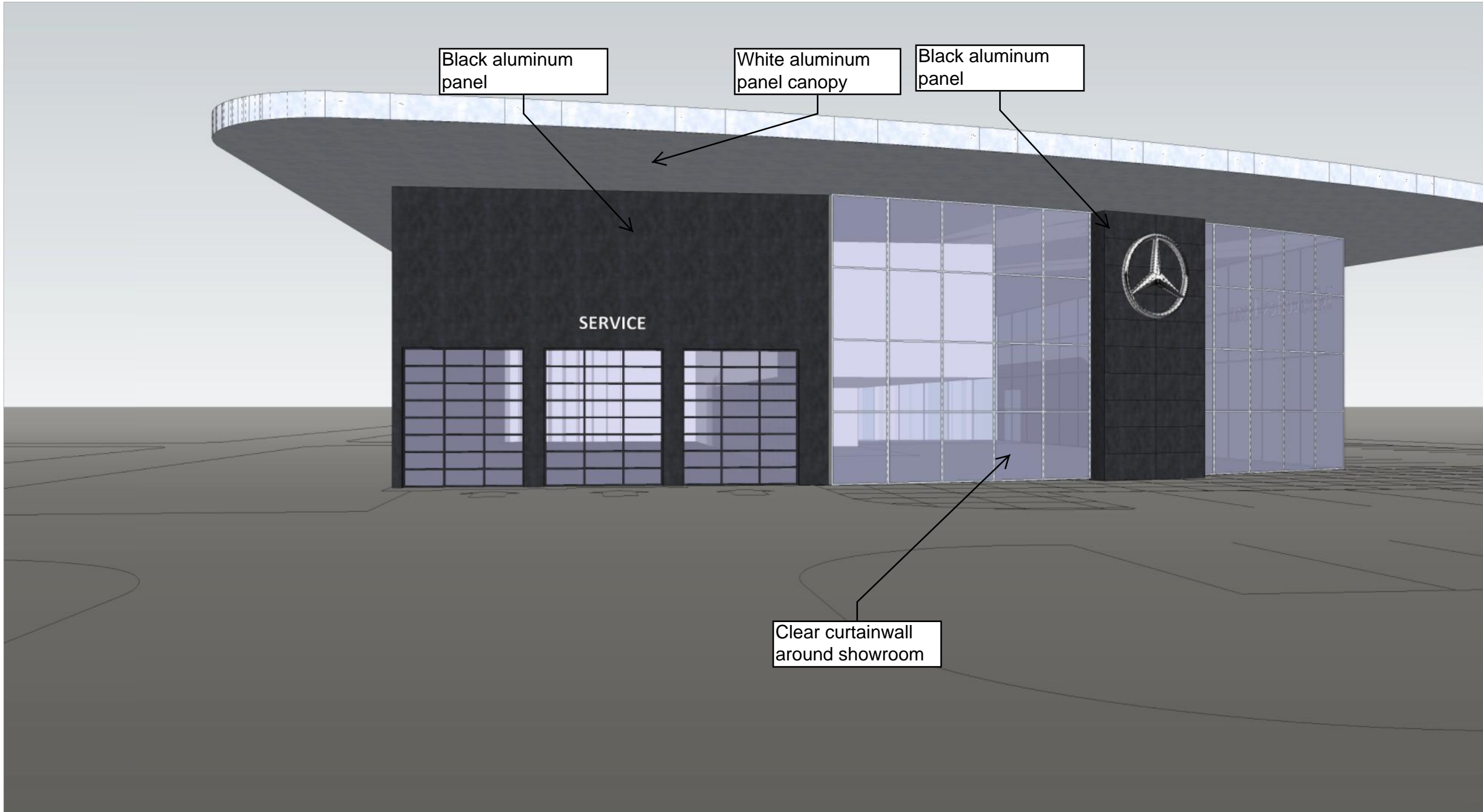
SHEET 8 OF 25

FRD.RVL01



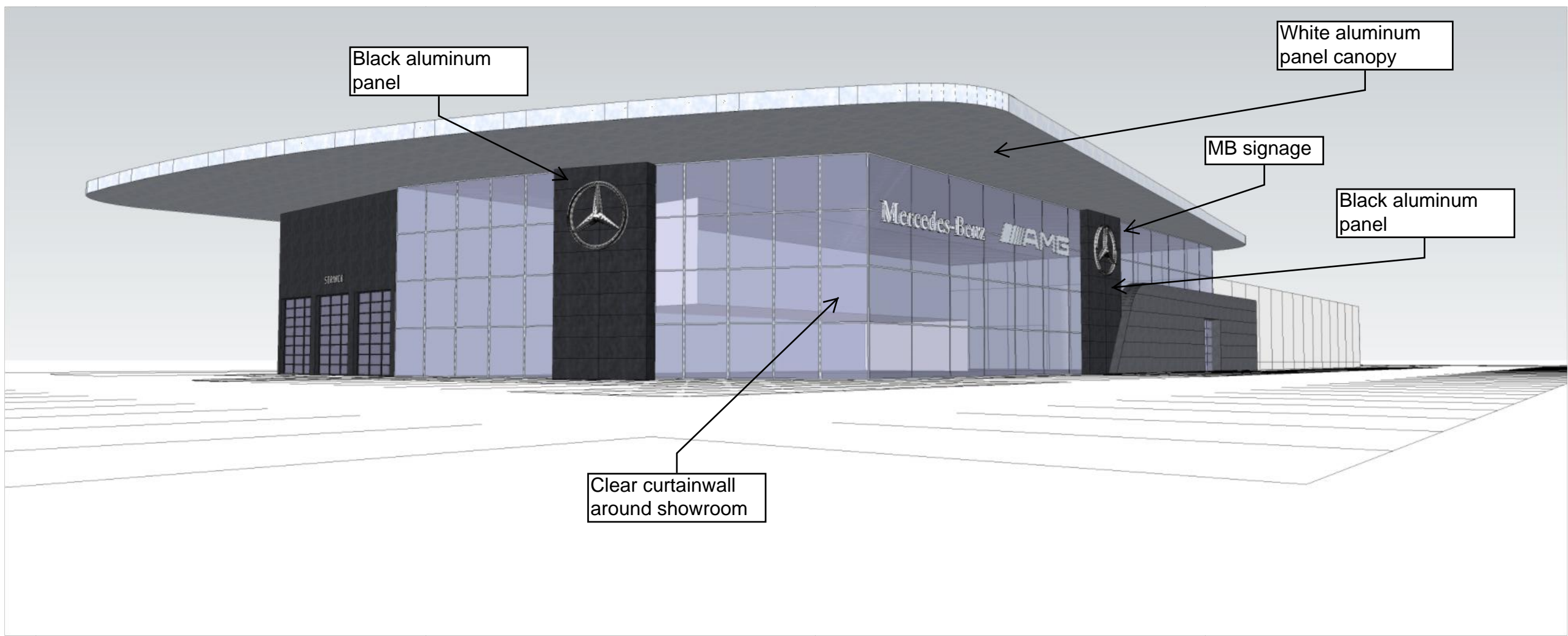
RENDERING OVERALL
SCALE: NTS

1



RENDERING AT SERVICE DRIVE
SCALE: NTS

3



RENDERING AT SHOWROOM
SCALE: NTS

2

PROJECT:



Mercedes-Benz

AMG
SPRINTER

Mercedes Benz Sprinter of Romeoville
Weber Road
Romeoville, IL

ARCHITECT:



500 Lake Cook Road, Suite 350
Deerfield, IL 60015

Tel: 847-571-3814
design@simon-arch.com

STRUCTURAL:

MECH/PLUMB:

ELECTRICAL:

JULY 08, 2020 - CITY DESIGN REVIEW

EXTERIOR RENDERING

A4.10



EXAMPLE AT SHOWROOM
SCALE: NTS

1



EXAMPLE AT SHOWROOM
SCALE: NTS

2

PROJECT:



Mercedes-Benz

AMG
SPRINTER

Mercedes Benz Sprinter of Romeoville
Weber Road
Romeoville, IL

ARCHITECT:



500 Lake Cook Road, Suite 350
Deerfield, IL 60015

Tel: 847-571-3814
design@simon-arch.com

STRUCTURAL:

MECH/PLUMB:

ELECTRICAL:

JULY 08, 2020 - CITY DESIGN REVIEW

MANUFACTURER
STANDARDS

A4.11