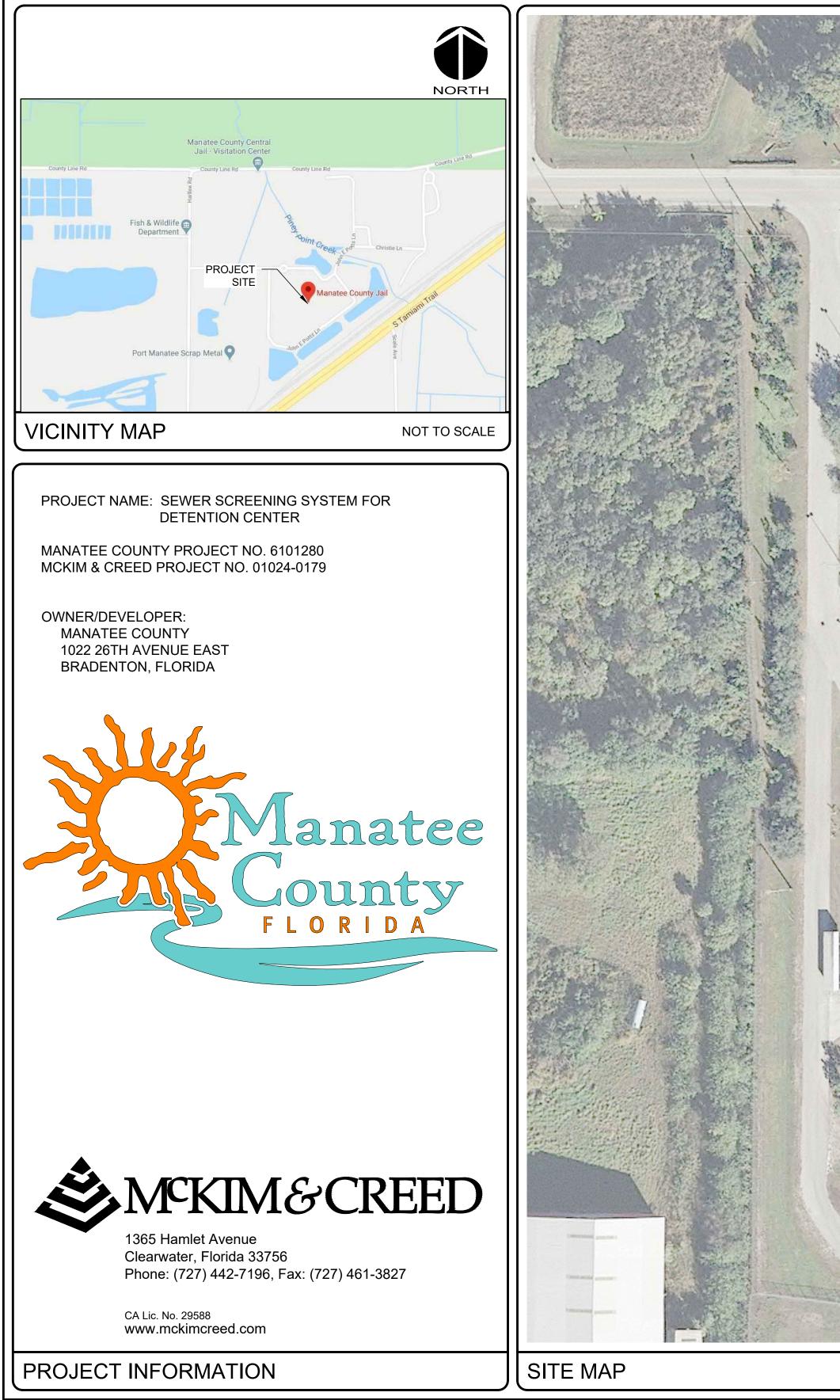
MANATEE COUNTY SEWER SCREENING SYSTEM FOR DETENTION CENTER COUNTY PROJ. NO. 6101280 DECEMEBER 2020 **ISSUED FOR BIDDING – FOR CONSTRUCTION**



MANATEE COUNTY DETENTION CENTER

LOCATION

ON THE DATE ADJACENT TO THIS SEAL

DIGITALLY SIGNED AND SEALED BY:

IE ITEM HAS BEEN

PRINTED COPIES OF THIS ITEM ARE NOT CONSIDERED SIGNED AND SEALED AND THE SIGNITURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES. McKIM & CREED, INC.

3903 NORTHDALE BLVD., SUITE 115E

TAMPA, FL 33624 PHONE NO.: 813-549-3740 CERTIFICATE OF AUTHORIZATION: 29588 ADRIELL SHRIKISSOON, PE NO. 80552

SHEET NO. G00.0 G00.1 C00.0 C00.1 M00.0 M00.1 M00.2

M00.3

D00.0

D00.1

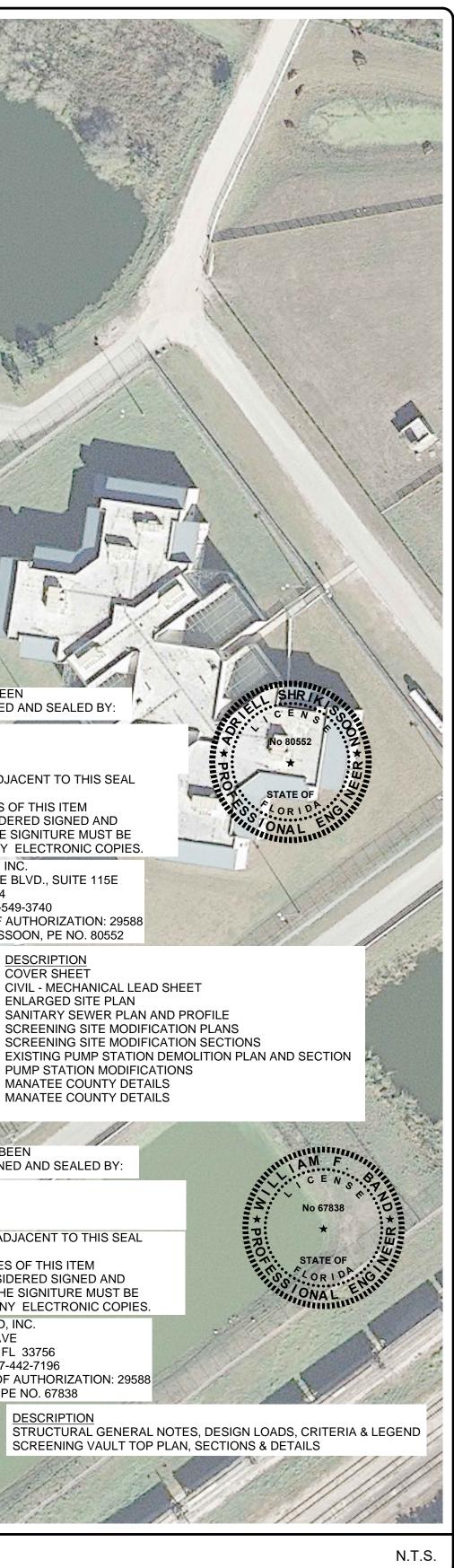
DESCRIPTION COVER SHEET CIVIL - MECHANICAL LEAD SHEET ENLARGED SITE PLAN SANITARY SEWER PLAN AND PROFILE SCREENING SITE MODIFICATION PLANS SCREENING SITE MODIFICATION SECTIONS PUMP STATION MODIFICATIONS MANATEE COUNTY DETAILS MANATEE COUNTY DETAILS

THE ITEM HAS BEEN DIGITALLY SIGNED AND SEALED BY:

ON THE DATE ADJACENT TO THIS SEAL

PRINTED COPIES OF THIS ITEM ARE NOT CONSIDERED SIGNED AND SEALED AND THE SIGNITURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES. McKIM & CREED, INC. 1365 HAMLET AVE CLEARWATER, FL 33756 PHONE NO.: 727-442-7196 CERTIFICATE OF AUTHORIZATION: 29588 WILLIAM BAND PE NO. 67838

SHEET NO. S00.0 SCREENING VAULT TOP PLAN, SECTIONS & DETAILS S10.0



	Sheet List Table
Sheet Number	Sheet Title
GENERAL	
G00.0	COVER SHEET
G00.1	CIVIL - MECHANICAL LEAD SHEET
CIVIL: CIVIL SITE	
C00.0 C00.1	ENLARGED SITE PLAN SANITARY SEWER PLAN AND PROFILE
MECHANICAL	SANITARY SEWER PLAN AND PROFILE
M00.0	SCREENING SITE MODIFICATION PLANS
M00.1	SCREENING SITE MODIFICATION SECTIONS
M00.2	EXISTING PUMP STATION DEMOLITION PLAN AND SECTION
M00.3	PUMP STATION MODIFICATIONS
STRUCTURAL	
S00.0	STRUCTURAL GENERAL NOTES, DESIGN LOADS, CRITERIA & LEGEND
S10.0	SCREENING VAULT TOP PLAN, SECTIONS & DETAILS
S10.1 ELECTRICAL	EXIST. WETWELL TOP LAYOUT MODS, PLAN, SECTIONS & DETAILS
E00.0	ELECTRICAL NOTES, ABBREVIATIONS AND SYMBOLS
E00.1	ELECTRICAL PLAN
E00.2	WIRING DIAGRAMS-ELECTRICAL
E00.3	WIRING DIAGRAM-GROUNDING
E00.4	GROUNDING PLAN
E00.5	DEMOLITION
100.0	INSTRUMENTATION LEGEND AND SYMBOLS
I00.1 DETAILS	SCHEMATIC DIAGRAM - RTU MODIFICATIONS
D00.0	MANATEE COUNTY DETAILS
D00.1	MANATEE COUNTY DETAILS
SEALED AND TH VERIFIED ON AN McKIM & CREED 1365 HAMLET AV CLEARWATER, I PHONE NO.: 727	IDERED SIGNED AND HE SIGNITURE MUST BE NY ELECTRONIC COPIES. 0, INC. VE FL 33756 7-442-7196 F AUTHORIZATION: 29588
SHEET IN	The second state of the second stat

I:\01024\0179\WATER\80-DRAWINGS\GENERAL\G00.0.DWG ---- 12/17/2020 10:48:22 DOREEN PADGETT

SFD	1 STORY FRAMED DWELLING	╶┤┠
SBKBUS	1 STORY BRICK BUSINESS	
.C L OR ALUM	ASBESTOS CEMENT ALUMINUM	
RV SPH	AIR RELEASE VALVE ASPHALT	
C FV	BACK OF CURB BUTTERFLY VALVE	
K LD	BRICK	
0	BLIND BOLLARD	
OV V	BLOW OFF VALVE BALL VALVE	
ATV B	CABLE TELEVISION CATCH BASIN	-
¦&G ∺HN	CURB AND GUTTER CHAIN	
1	CURB INLET	
:/L, <u>뗥</u> :MP	CENTERLINE CORRUGATED METAL PIPE	
MU O	CONCRETE MASONRY UNIT	-
ON	CONCENTRIC CONCRETE	\neg
PLG	COUPLING	
PP S	CORRUGATED PLASTIC PIPE COMPOST SOCK	
SF V	COMBO SILT / TREE PROTECTION FENCE CHECK VALVE	
WTD	CLEAN WATER TEMPORARY DIVERSION	-
I	DROP INLET / DUCTILE IRON DUCTILE IRON PIPE	$\exists $
	DUCT BANK	
WG	DRIVE WAY DRAWING	-
L OR ELEV OG	ELEVATION EDGE OF GRAVEL	7
OI	END OF INFORMATION] (
P, EOP W	EDGE OF PAVEMENT EYEWASH	╡╿┝
X. XP	EXISTING EXPANSION	
Р Т	LIGHT POLE LIGHT	$\neg $
CA D	FLANGE COUPLING ADAPTER FLOOR DRAIN	$\exists $
DC	FIRE DEPARTMENT CONNECTOR	
FE H	FINISHED FLOOR ELEVATION FIRE HYDRANT	
HA IN	FIRE HYDRANT ASSEMBLY FINISHED	_
LG LEX	FLANGE FLEXIBLE	$\neg $
LR M	FLOOR FORCE MAIN	$\exists $
RP	FIBERGLASS REINFORCED PIPE	
0 0T	FIBER OPTIC FLAT ON TOP	
M	GUTTER LINE GAS METER	-
RAV TS	GRAVEL GAS TEST STATION	$\exists $
V V	GAS VALVE GATE VALVE	
W	GUY WIRE	
B B	HOSE BIB HOT BOX	
DPE P	HIGH-DENSITY POLYETHYLENE HIGH POINT	-
WL NV	HIGH WATER LEVEL INVERT ELEVATION	\neg
PF	IRON POST FOUND JUNCTION BOX	
B T	JOINT	$\parallel \mid \mid$
F OD	LINEAR FEET LIMITS OF DISTURBANCE	-
PR	LOW POINT LONG RADIUS	
SA WL	LANDSCAPE AREA LOW WATER LEVEL	$\exists $
IB IAX	MAIL BOX MAXIMUM	$\exists $
IH	MANHOLE	$\exists $
IIN IJ	MINIMUM MECHANICAL JOINT	
IOV ITL	MOTOR OPERATED VALVE METAL	-
.C. .O.	NORMALLY CLOSED	$\exists $
IC	NOT IN CONTRACT	
WL HE/OE	NORMAL WATER LEVEL OVER HEAD ELECTRIC	
/F JU	OVERFLOW OVER HEAD UTILITIES	-
E IV	PLAIN END POST INDICATOR VALVE	$\exists $
OLY	POLYMER	$\exists $
P RV	POWER POLE PRESSURE REDUCING VALVE	
TFE V	POLYTETRAFLUOROETHYLENE PLUG VALVE	_
VC W	POLY VINYL CHLORIDE POTABLE WATER	$\exists $
CP	REINFORCED CONCRETE PIPE	
EC ED	PER RECORD REDUCER	<u> </u>
		``
.NO.	DESCRIPTION	

1 ABBREVIATIONS C	ONTINUED	D 3 EXISTING LINE	LEGEND	6 PROFILE LINE LEGEND 10 NOTES
RFCA RESTRAINED FLANGE COU RJ RESTRAINED JOINT	JPLING ADAPTER	DESCRIPTION	LINETYPE	DESCRIPTION LINETYPE GENERAL NOT
RK ROCK R/W, ROW RIGHT OF WAY		UNDERGROUND CABLE TV UNDERGROUND PER RECORD CABLE		EXISTING GRADE PAVEMENT PROFILE
S SIGN SDMH STORM DRAIN MANHOLE		UNDERGROUND ELECTRIC PER RECORD UNDERGROUND ELECTR UDERGROUND FIBER OPTIC	RIC	THEORETICAL 1:1 SLOPE OBTAIN THE ENGINE WETLAND CROSSING 2. THE CONTRACTOR SI
SF SILT FENCE SS SANITARY SEWER		PER RECORD UNDERGROUND FIBER OF SANITARY SEWER FORCEMAIN		3. CONTRACTOR SHALL
S.S. STAINLESS STEEL SSF SUPER / HIGH HAZARD	SILT FENCE	PER RECORD SANITARY SEWER FORCE UNDERGROUND GAS		7 AREA LEGEND PATH FOR ALL SURF 4. ALL PIPE LINES SHA
SSMH SANITARY SEWER MANHO STA STATION		UNDERGROUND PER RECORD GAS	G(R) —	WETLANDS
SUE SUBSURFACE UTILITY EN S/W SIDE WALK	GINEERING	RECLAIMED WATER LINE PER RECORD RECLAIMED WATER LIN GRAVITY SANITARY SEWER		$\psi \psi \psi \psi \psi \psi \psi \psi = ENTRY" CONDITION.$
SVC SERVICE TBM TEMPORARY BENCH MAR	K	PER RECORD GRAVITY SANITARY SEV STORM DRAINAGE		RIP-RAP 6. CONTRACTOR SHALL PER MANUFACTURER
TC TERRA COTTA TLP TRAFFIC LIGHT POLE		UNDERGROUND TELEPHONE UNDERGROUND PER RECORD TELEPHO	T DNET(R)	ADJACENT TO FLANC + + + + + + + + 7. TRAFFIC FLOW SHALL
TOB TOP OF BANK TOC TOP OF CONCRETE		UNDERGROUND UNKNOWN WATER LINE		TEMP. SLOPE STABILIZATION
TOG TOP OF GRATING TOS TOP OF SLAB		PER RECORD WATER LINE FENCE GUARD RAIL	W(R)	STRAW WITH NET LINER 9. CONTRACTOR SHALL
TOW TOP OF WALL TH TEST HOLE		BACK OF CURB EASEMENT		10. THE CONTRACTOR SI APPLICATION SUBMIT
TPF TREE PROTECTION FENCE TSBOX TRAFFIC SIGNAL BOX	Ξ	EDGE OF GRAVEL EDGE OF PAVEMENT		APPROVED RED-LINE
TYP TYPICAL UNO UNLESS NOTED OTHERWIS	SE	PROPERTY LINE RIGHT OF WAY ROAD CENTER LINE		8 PROCESS ABBREVIATIONS OF CONSTRUCTION T SYSTEM AND LIFT S
UNK UNKNOWN VAR VARIABLE		100 YEAR FLOODPLAIN		A PROCESS AIR SYSTEMS INTO OPER ALUM WTP ALUM SLUDGE 12. ALL PROPOSED WOR
VCP VITRIFIED CLAY PIPE WD WOOD		MAJOR CONTOUR MINOR CONTOUR		AS ACTIVATED SLUDGE 13. THE CONTRACTOR SI
WL WATER LINE WM WATER METER		RIPARIAN BUFFER ZONE 1 RIPARIAN BUFFER ZONE 2	Z1 Z2	BWD BACKWASH DRAIN
WV WATER VALVE XP CROSS LIGHT POLE		TOP OF BANK TREELINE WATERCOURSE &		BWS BACK WASH SUPPLY USE TEMPORARY PLU BWW BACK WASH WASTE 16. CONTRACTOR SHALL
WWF WELDED WIRE FABRIC YI YARD INLET		WATERCOORSE VE WETLAND BOUNDARY	w_b	D DRAIN THE BMPS IDENTIFIED EXP EXPANSION 17. CONTRACTOR SHALL
				FA FOUL AIR FF FILLENT
2 EXISTING SYMBOL		4 PROPOSED SYN		FI FILTER INFLUENT
DESCRIPTION	SYMBOL	DESCRIPTION	SYMBOL	FFM FILTRATE FORCE MAIN 19. ALL WORK SHALL BE 2020. FTD FILTER DRAIN 2020.
11.25° HORIZONTAL BEND 22.50° HORIZONTAL BEND	H H	11.25° HORIZONTAL BEND 22.50° HORIZONTAL BEND	<u>н</u> И	FTE FILTER EFFLUENT 20. ALL ITEMS AND/OR GR GRIT 20. ALL ITEMS AND/OR
45° HORIZONTAL BEND		45° HORIZONTAL BEND	4	GV GATE VALVE EXISTING UTIL
90° HORIZONTAL BEND AC UNIT		90° HORIZONTAL BEND	<u> </u>	HWR HOT WATER RETURN HWS HOT WATER SUPPLY I. UNDERGROUND UTILITAND OTHERS. THIS I
BENCH MARK	•	AIR RELEASE VALVE		IFM INFLUENT FORCE MAIN INVESTIGATION MAY ML MIXED LIQUOR POTENTIAL CONFLICT
TEMP. BENCH MARK BLOW OFF VALVE		VALVE BLOWOFF VALVE	M M•	NAOCL SODIUM HYPOCHLORITE 2. THE CONTRACTOR SI NAOH SODIUM HYDROXIDE (CAUSTIC SODA) 3. THE CONTRACTOR SI
BOLLARD TEST BORE HOLE LOCATION	ово ● ^{В−} #	HYDRANT YARD HYDRANT	୍ <u>ତୁ</u> ଫ	NG NATURAL GAS
CABLE TV PEDISTAL CATCH BASIN		CROSS	 	NRCY NITRIFIED RECYCLE UTILITY OWNER (WHE
CLEAN OUT	<i>CO</i> O	TEE TAPPING SLEEVE AND VALVE	 译	PD PROCESS DRAIN 4. CONTRACTOR SHALL PE PRIMARY EFFLUENT 4. CONTRACTOR SHALL
CONCRETE MONUMENT FOUND CONTROL POINT		REDUCER		PS PRIMARY SLUDGE 5. THE CONTRACTOR SI PTE PRELIMINARY TREATMENT EFFLUENT 5. THE CONTRACTOR SI
CROSS CURB INLET		CAP/PLUG POTABLE WATER SERVICE METER		PTFE POLYTETRAFLUOROETHYLENE
ELECTRIC BOX	Ē	RECLAIMED WATER SERVICE METER	ß	PW POTABLE WATER RAS RETURN ACTIVATED SLUDGE CALL LOCAL
ELECTRIC MANHOLE END OF INFORMATION	(E) •	EXISTING UTILITY SERVICE RECONNECTION CONCENTRIC SANITARY SEWER MANHOL		RW RAW WASTEWATER UTILITY NOTIFICATION SBR SEQUENCING BATCH REACTOR UTILITY NOTIFICATION
FLAG POLE GAS METER	ofp GM()	ECCENTRIC SANITARY SEWER MANHOL		SD STORM DRAIN SPD SUMP PUMP DISCHARGE
GUY POLE	-0			SR SCRUBBER RECIRCULATION
GUY WIRE HANDHOLE		ARC FILTER CHECK DAM	<u> </u>	SRD SCRUBBER RECIRCULATION DISCHARGE 6. ALL UTILITY CONSTR SRP SCRUBBER RECIRCULATION PUMP 7. ALL BELOW GROUND
HYDRANT	0IPF	INLET PROTECTION	Č.	SRS SCRUBBER RECIRCULATION SUCTION RESTORATION
IRON POST FOUND IRON ROD FOUND	OIPF	PIPE INLET PROTECTION SILT FENCE OUTLET		SW SEAL WATER 1. ALL RESTORATION W
LIGHT POLE MAIL BOX	OLP MBD	WATTLE	B	UV ULTRAVIOLET 2. CONTRACTOR SHALL WAS WASTE ACTIVATED SLUDGE 3. CONTRACTOR SHALL
MONITOR WELL POWER POLE		5 PROPOSED LIN		
WATER MANHOLE				1. ALL SOIL EROSION AND
PK FOUND RAIL ROAD SPIKE	OPKF • RRSPIKE	DESCRIPTION	LINETYPE	9 MECHANICAL SYMBOLS 2. CONTRACTOR SHALL
SANITARY SEWER MANHOLE SHRUB	S G	PERMANENT EASEMENT		3. HAY BALES AND/OR
SIGN STORM DRAIN MANHOLE		SANITARY SEWER FORCE MAIN RECLAIMED WATER LINE	FM	VALVE SYMBOL DESCRIPTION WORK. NI 4. CONTRACTOR SHALL
TAPPING SLEEVE AND VALVE	X	GRAVITY SANITARY SEWER		BUTTERFLY VALVE ANY CONSTRUCTION 5. CONTRACTOR SHALL
TEE TELEPHONE MANHOLE	<u> </u>	TO BE ABANDONED	· /· /· /· /· /· /· /· /·	CHECK VALVE SHOWING APPLICABL
TELEPHONE PEDESTAL TRAFFIC SIGNAL BOX		DIVERSION DITCH		GATE VALVE
TRANSFORMER		COMBINATION SILT FENCE/TREE PROTEC TEMPORARY SILT FENCE	TIONCSF	
DECIDUOUS TREE PINE TREE		TEMPORARY SUPER SILT FENCE	SSF	
UTILITY POLE	<u>م</u>	COMPOST SOCK	cs	BALL VALVE
VALVE WATER METER		PERMANENT FENCE GUARD RAIL		GLOBE VALVE
WATER METER WATER WELL	(()			
YARD HYDRANT)	
DATE				
			KIM&CR	$\mathbf{EED} \parallel \qquad $
		1365 Ha	mlet Avenue	Manatee
DEC 2020 NOV 2020			ter, Florida 33756 727) 442-7196, Fax: (727) 461-38	
OCT 2020 JULY 2020		EB0006691	1	FLORIDA

www.mckimcreed.com

DESCRIPTION	SYMBOL
11.25" HORIZONTAL BEND	
22.50° HORIZONTAL BEND	
45° HORIZONTAL BEND	
90° HORIZONTAL BEND	<u> </u>
AC UNIT	
BENCH MARK	•
TEMP. BENCH MARK	•
BLOW OFF VALVE	×₀
BOLLARD	0B0
TEST BORE HOLE LOCATION	● ^{B−#}
CABLE TV PEDISTAL	C
CATCH BASIN	
CLEAN OUT	<i>CO</i> O
CONCRETE MONUMENT FOUND	⊡ CMF
CONTROL POINT	<u> </u>
CROSS	<u> </u>
CURB INLET	
ELECTRIC BOX	E
ELECTRIC MANHOLE	E
END OF INFORMATION	۲
FLAG POLE	OFP
GAS METER	GM()
GUY POLE	-0
GUY WIRE	Λ
HANDHOLE	HH
HYDRANT	<u> </u>
IRON POST FOUND	0IPF
IRON ROD FOUND	OIPF
	OLP
MAIL BOX	MBD
MONITOR WELL	X
POWER POLE	OPP
WATER MANHOLE	 (W)
PK FOUND	
RAIL ROAD SPIKE	OPKP ORRSPIKE
SANITARY SEWER MANHOLE	S
SHRUB	
SIGN	
STORM DRAIN MANHOLE	0
TAPPING SLEEVE AND VALVE	
TELEPHONE MANHOLE	1
TELEPHONE PEDESTAL	
TRAFFIC SIGNAL BOX	
	<u> </u>
DECIDUOUS TREE	
PINE TREE	
UTILITY POLE	
VALVE	
WATER METER	
WATER WELL	
YARD HYDRANT	

REV.NO.	DESCRIPTION	DATE
0	ISSUED FOR BIDDING	DEC 2020
D	100% DESIGN SUBMITTAL	NOV 2020
С	90% REVISED RESUBMITTAL	OCT 2020
В	90% DESIGN SUBMITTAL	JULY 2020
Α	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020

TES:

SHALL REVIEW AND VERIFY ALL LAYOUTS. DIMENSIONS AND ELEVATIONS ON THE PLANS WITH FINAL APPROVED EQUIPMENT DRAWINGS AS WELL SPECIFICATIONS PRIOR TO STARTING CONSTRUCTION AND SHOULD DISCREPANCIES EXIST, THE CONTRACTOR SHALL NOTIFY THE ENGINEER TO EERS CLARIFICATION BEFORE COMMENCING WITH CONSTRUCTION.

SHALL COORDINATE ALL RELATED DISCIPLINE DRAWINGS TO ENSURE ACCURATE INSTALLATION OCCURS.

ALLOW ACCESS TO EXISTING STRUCTURES AND EQUIPMENT AT ALL TIMES DURING CONSTRUCTION. CONTRACTOR SHALL MAINTAIN A CLEAR RFACE WATER DRAINAGE STRUCTURES AND DITCHES DURING CONSTRUCTION.

ALL HAVE A MINIMUM COVER OF 36" UNLESS OTHERWISE NOTED OR DIRECTED. OLES, INLET STRUCTURES, BASINS, WET WELLS ETC. SHALL BE CONSIDERED "CONFINED SPACE ENTRY" AND SHALL BE MARKED AS SUCH BY IG MANHOLE COVERS AND PLACING PERMANENT SIGNAGE ON THE VAULTS, BASINS OR STRUCTURES WARNING OF THE "CONFINED SPACE

BE RESPONSIBLE FOR ALL PIPE SUPPORTS WHETHER SHOWN ON THE CONTRACT DOCUMENTS OR NOT. PIPE SUPPORTS SHALL BE INSTALLED R'S RECOMMENDATIONS FOR SPACING AND SUPPORT. ADDITIONALLY, PROVIDE SUPPORT WHERE ABOVE GRADE PIPING CHANGES DIRECTION, IS IGED VALVES OR OTHER APPURTENANCES OR AT EQUIPMENT CONNECTIONS AND HEAVY FITTINGS.

LL BE MAINTAINED AT ALL TIMES DURING CONSTRUCTION. IF TRAFFIC FLOW IS TO BE RE-DIRECTED, CONTRACTOR SHALL COORDINATE C FLOW PATTERNS WITH OWNER AND ENGINEER.

SLOPE GRAVITY LINES AS INDICATED ON THE DRAWINGS OF IF NOT INDICATED ON THE DRAWINGS SLOPE SHALL BE AT POSITIVE GRADE TO TENDED DRAINAGE BETWEEN STRUCTURES. CONTRACTOR SHALL CONFIRM ALL INVERTS PRIOR TO STARTING CONSTRUCTION. RESTRAIN ALL UNDERGROUND PRESSURE PIPING AT ALL FITTINGS AND PIPE JOINTS.

SHALL PROVIDE CERTIFIED RECORD DRAWINGS AS OUTLINED IN THE SPECIFICATIONS. RED-LINE DRAWINGS SHALL BE CURRENT WITH EACH PAY ITTED AND WILL BE CHECKED AS PART OF THE PAY APPLICATION REVIEW PROCESS. PAYMENT WILL NOT BE MADE TO CONTRACTOR WITHOUT NE DRAWINGS.

SHALL INCLUDE IN HIS BID; BY-PASS PUMPING FACILITIES, PUMPS, FITTINGS, LABOR, ETC, AS NECESSARY, BASED ON METHOD AND SEQUENCE TO COMPLETE ALL WORK. WASTEWATER CONVEYANCE FROM THE DETENTION FACILITY AND ANCILLARY FACILITIES SERVED BY THIS COLLECTION STATION SHALL BE MAINTAINED AT ALL TIMES, EXCEPT FOR TEMPORARY SHUTDOWNS REQUIRED TO MAKE TIE-INS AND TO PLACE NEW RATION. CONTRACTOR SHALL DEVELOP PLANS FOR MAINTENANCE OF SERVICE AND RETAIN APPROVAL FROM THE COUNTY.

RK SHALL BE COORDINATED WITH MANATEE COUNTY UTILITIES DEPARTMENT AT LEAST TWO WEEKS IN ADVANCE OF PROPOSED CONSTRUCTION. SHALL NOT ALLOW ANY DISCHARGE OF WASTEWATER TO LANDS AND/OR ADJACENT WATER BODIES OR STORM DRAINS.

PIPING SHALL BE PAINTED WITH DESIGNATED COLORS ASSOCIATED WITH THEIR USAGE AS PROVIDED IN THE SPECIFICATIONS.

SHALL BE FLUSHED, PRESSURE TESTED, AND APPROVED PRIOR TO TIE-INS TO EXISTING FACILITIES. THE CONTRACTOR WILL BE ALLOWED TO LUGS FOR PRESSURE TESTING.

SUBMIT A DEWATERING PLAN FOR FILING PRIOR TO BEGINNING CONSTRUCTION. DEWATERING SHALL BE CONDUCTED IN ACCORDANCE WITH ED IN CHAPTER 5, "BMPS FOR DEWATERING" OF "THE FLORIDA STORMWATER EROSION AND SEDIMENTATION CONTROL INSPECTOR'S MANUAL". EMPLOY A PROFESSIONAL SURVEYOR, LICENSED IN THE STATE OF FLORIDA TO PERFORM CONSTRUCTION STAKING IN ACCORDANCE WITH RULE OF THE FLORIDA ADMINISTRATIVE CODE.

WN ON PLAN VIEW DRAWINGS ARE IN LINEAR FEET AND DO NOT TAKE INTO ACCOUNT VERTICAL ELEVATION CHANGES, DEFLECTIONS, BENDS,

BE IN ACCORDANCE WITH MANATEE COUNTY PUBLIC WORKS STANDARDS, PART I UTILITIES STANDARDS MANUAL APPROVED FEBRUARY 25,

MATERIALS FURNISHED AND INSTALLED SHALL CONFORM TO THE MANATEE COUNTY APPROVED PRODUCTS LIST. ALL ITEMS IN THE SUBMITTAL DER EACH SECTION SHALL BE REQUIRED TO BE SUBMITTED FOR REVIEW AND OR ACCEPTANCE ACCORDING TO THE SPECIFICATIONS.

ILITIES:

ITIES SHOWN ON THE PLANS HAVE BEEN MADE AVAILABLE FROM VARIOUS ENTITIES THAT MAY INCLUDE UTILITY OWNERS, RECORD DRAWINGS INFORMATION MAY NOT ALL-INCLUSIVE AND THE CONTRACTOR IS ADVISED THAT ADDITIONAL UNDERGROUND UTILITIES AND CABLES BE NECESSARY PRIOR TO STARTING CONSTRUCTION. THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD IMMEDIATELY OF ALL

SHALL FIELD VERIFY SIZE, DEPTH, LOCATION AND MATERIAL OF ALL UNDERGROUND UTILITIES PRIOR TO THE START OF CONSTRUCTION. SHALL CAREFULLY SUPPORT AND PROTECT ANY UTILITIES. STRUCTURES. POWER POLES. PIPE LINES AND CONDUITS WHICH MAY BE ING COMPLETION OF THE WORK AT NO ADDITIONAL COST TO THE OWNER. THE CONTRACTOR SHALL APPLY NECESSARY MEANS TO PROTECT DURING CONSTRUCTION . ANY DAMAGE RESULTING FROM THE CONTRACTOR'S OPERATIONS SHALL BE REPAIRED BY THE CONTRACTOR OR IERE REQUIRED) TO THE SATISFACTION OF THE ENGINEER AND UTILITY OWNER AT THE CONTRACTOR'S EXPENSE.

TAKE STEPS NECESSARY TO PROTECT EXISTING UTILITIES. MUCH OF THE CONSTRUCTION WILL OCCUR PARALLEL TO THE EXISTING SEWER ACTOR WILL BE RESPONSIBLE FOR ALL DAMAGED UTILITIES, SPILLS, CONTAMINATIONS, CLEANUP, VIOLATIONS, FINES, ETC. CAUSED BY THIS PROJECT.

SHALL BE RESPONSIBLE FOR COORDINATING WITH THE FOLLOWING JURISDICTIONAL BODIES AND UTILITY COMPANIES:

MANATEE COUNTY UTILITIES OPERATIONS KATHY McMAHON BRADENTON, FL 34210

MANATEE COUNTY PUBLIC WORKS DEPT. SCOTT MAY, P.E. 4422-C 66TH STREET W. 1022 26TH AVENUE EAST BRADENTON, FL 34208 (941) 708–7450 EXT. 7650 (813) 470–5875 FAX: (941) 708-7415

DEPARTMENT OF ENVIRONMENTAL PROTECTION ED WATSON 13051 N. TELECOM PKWY TEMPLE TERRACE, FL 33637 FAX: (813) 470-5993

RUCTION SHALL BE IN CONFORMANCE WITH THE LATEST VERSION OF THE MANATEE COUNTY UTILITY STANDARDS. DUCTILE IRON PIPE SHALL BE ENCASED IN A POLYETHYLENE WRAP IN ACCORDANCE WITH AWWA STANDARDS.

IN AND MISCELLANEOUS NOTES:

WORK PERFORMED THROUGHOUT THE PROJECT SHALL CONFORM TO EXISTING LINES AND GRADES UNLESS OTHERWISE NOTED.

RESTORE GRADE TO PRECONSTRUCTION ELEVATIONS UNLESS OTHERWISE NOTED.

REPLACE ALL EXISTING PAVING, STABILIZED EARTH, CURBS, SIDEWALKS, FENCES, LANDSCAPING AND OTHER IMPROVEMENTS WITH THE SAME OF MATERIAL THAT WAS REMOVED DURING CONSTRUCTION OR AS DIRECTED BY THE ENGINEER.

D SEDIMENT CONTROL:

AND SEDIMENTATION CONTROL MEASURES SHALL BE IN PLACE PRIOR TO THE START OF ANY CONSTRUCTION, DEMOLITION, DEWATERING, OR /ITIES, MAINTAINED THROUGHOUT CONSTRUCTION AND SHALL REMAIN IN PLACE UNTIL WORK IS COMPLETE. FOLLOW BEST MANAGEMENT PRACTICES THROUGHOUT DEMOLITION AND CONSTRUCTION.

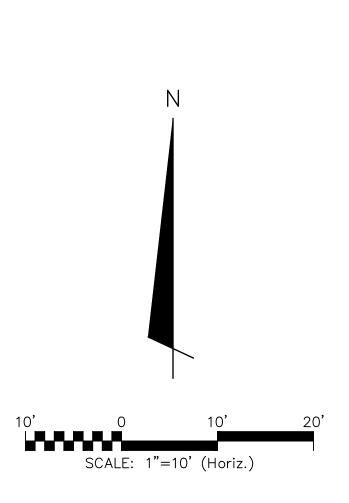
OR SILT SCREENS SHALL BE INSTALLED ADJACENT TO THE WORK AREAS TO PREVENT SEDIMENT TRANSPORT PRIOR TO THE COMMENCEMENT OF

PREPARE AND SUBMIT A STORM WATER POLLUTION PREVENTION PLAN (SWPPP) FOR REVIEW AND APPROVAL PRIOR TO COMMENCEMENT OF ACTIVITIES AND PROVIDE APPROVED FDEP NOI TO COUNTY.

PREPARE AND SUBMIT A DISPOSAL PLAN FOR EXCAVATION MATERIAL INCLUDING THE LOCATION OF DISPOSAL SITE(S) AND DISPOSAL PLANS LE BEST MANAGEMENT PRACTICES FOR REVIEW AND APPROVAL PRIOR TO ANY EARTHWORK ACTIVITIES.

REF SYMBOLOGY	
= SECTION CUT SYMBOL $X.XXX.X = STRUCTURE / BUILDING ELEVATION$	X.XXX.X = DETAIL
SEWER SCREENING SYSTEM FOR DETENTION CENTER	PROJ. START DATE: 2020, DEC MCE PROJ. # 01024-0179 DRAWN DMP DESIGNED AFS CHECKED ASL
GENERAL CIVIL - MECHANICAL LEAD SHEET	CHECKED AGL PROJ. MGR. ASL N/A O STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION





NOTES:

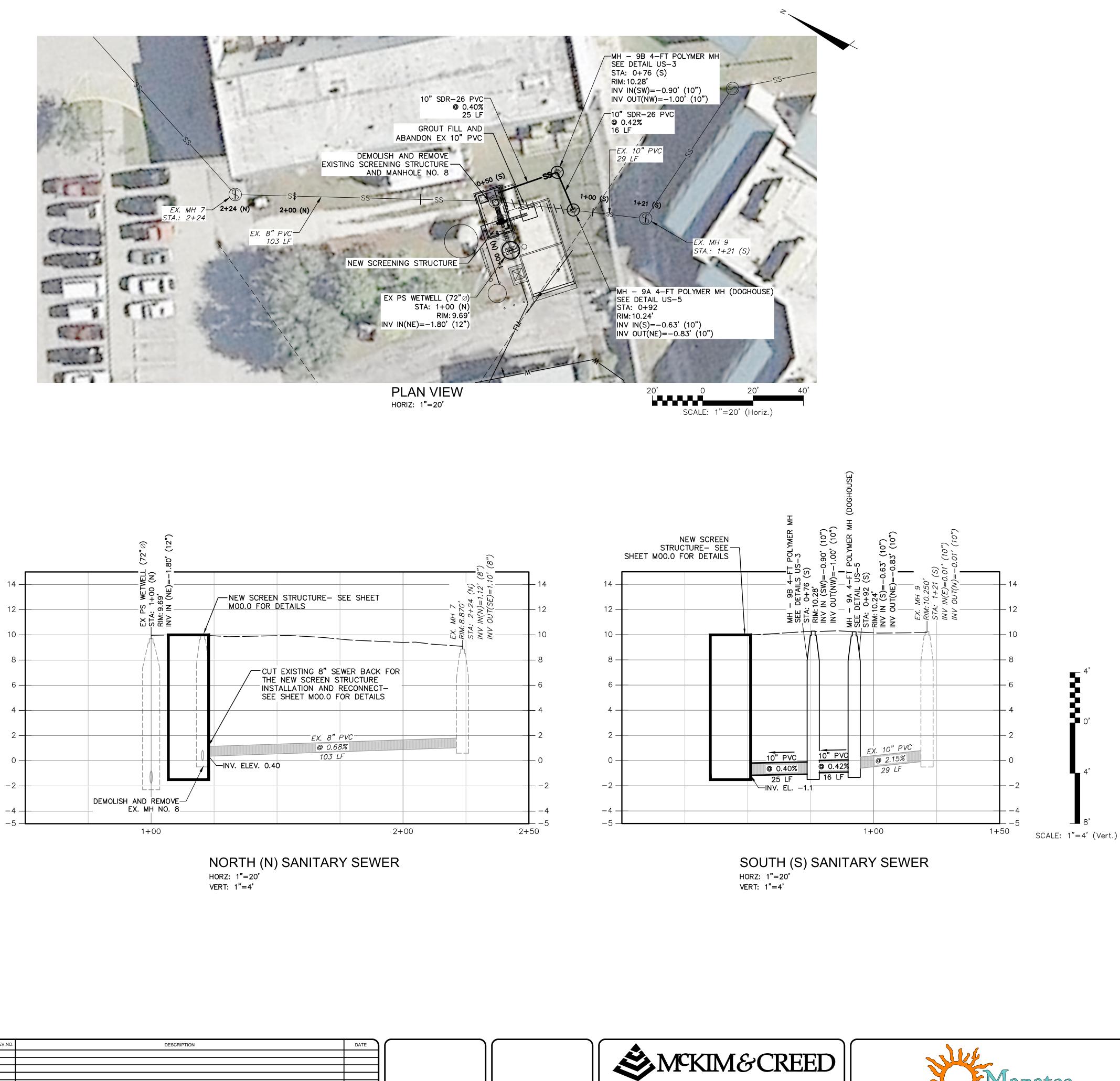
1. ANY DAMAGES INCLUDING ROAD OR EQUIPMENT SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE.

2. CONTRACTOR TO VERIFY THE LOCATION AND ELEVATION OF ALL EXISTING PIPING AND EQUIPMENT.

3. CONTRACTOR TO ADHERE TO ALL PERMIT REQUIREMENTS.

4. CONTRACTOR TO SATISFY THE ENGINEER AND COUNTY'S PUNCH LIST ITEMS TO RECEIVE SUBSTANTIAL COMPLETION OF THIS PROJECT.

PROJ. START DA	TE: 2020, DEC	SCALE	
MCE PROJ. # DRAWN	01024-0179 DMP	HORIZONTAL:	C00.
DESIGNED	AFS	AS NOTED	DRAWING NUM
CHECKED	ASL	VERTICAL:	0
PROJ. MGR.	ASL	N/A	REVISION
			HE HOIGHT
STATUS:			
	FOR (CONSTRUC	TION



0	ISSUED FOR BIDDING
D	100% DESIGN SUBMITTAL
С	90% REVISED RESUBMITTAL
В	90% DESIGN SUBMITTAL
Δ	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION

REVISIONS

DEC 2020 NOV 2020 OCT 2020 JULY 2020 17 APR 2020





NOTES:

1. CONTRACTOR SHALL COORDINATE WITH THE COUNTY FOR ANY DOWN TIME DURING THE BY-PASS INSTALLATIONS. MINIMIZE DOWN TIME AND HAVE A PUMPER TRUCK ON-CALL IF NEEDED.

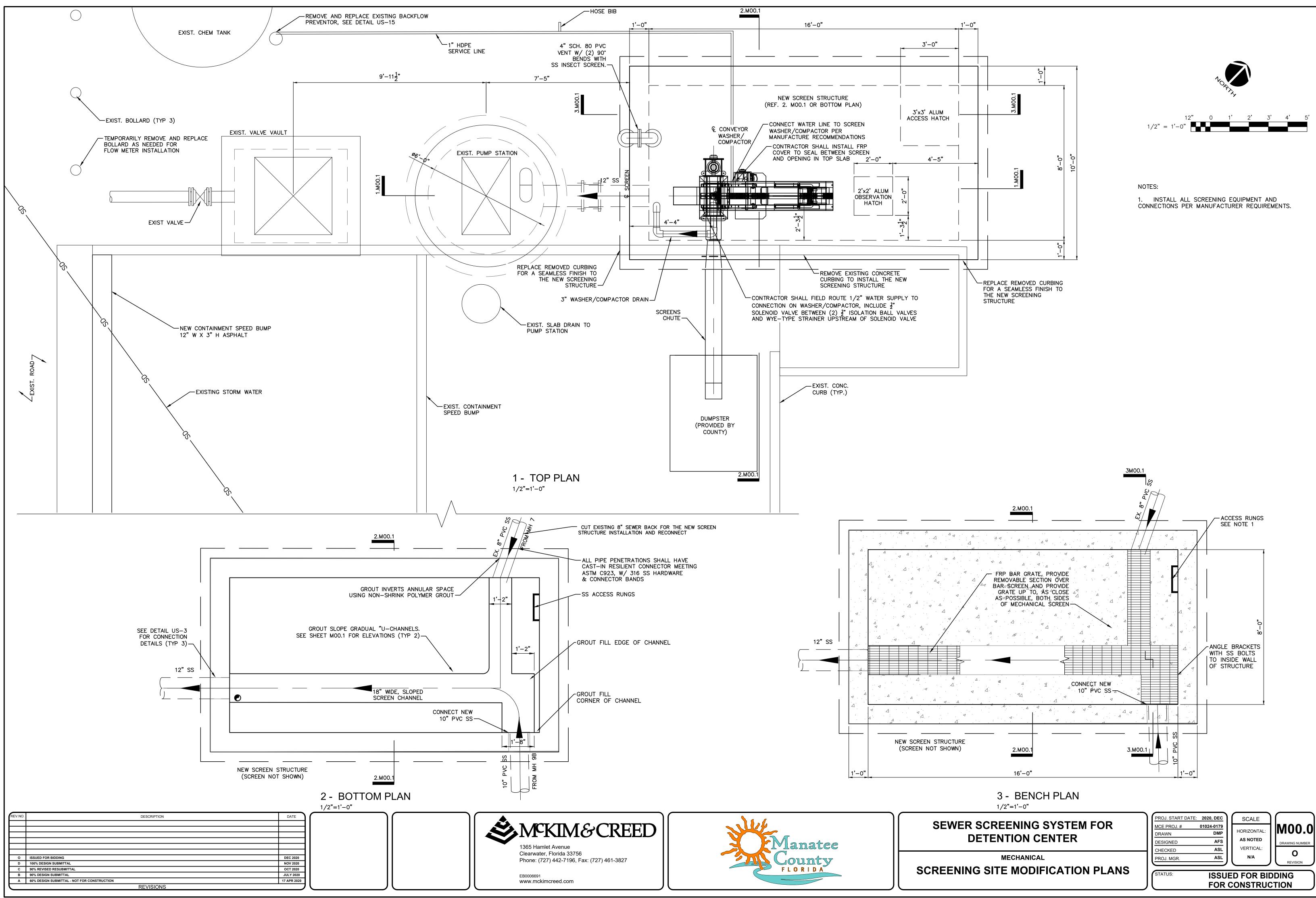
2. ALL PIPING SHALL BE PRESSURE TESTED AND FLUSHED PRIOR TO BEING PLACED IN SERVICE.

SUGGESTED CONSTRUCTION SEQUENCE AND BY-PASS PLAN:

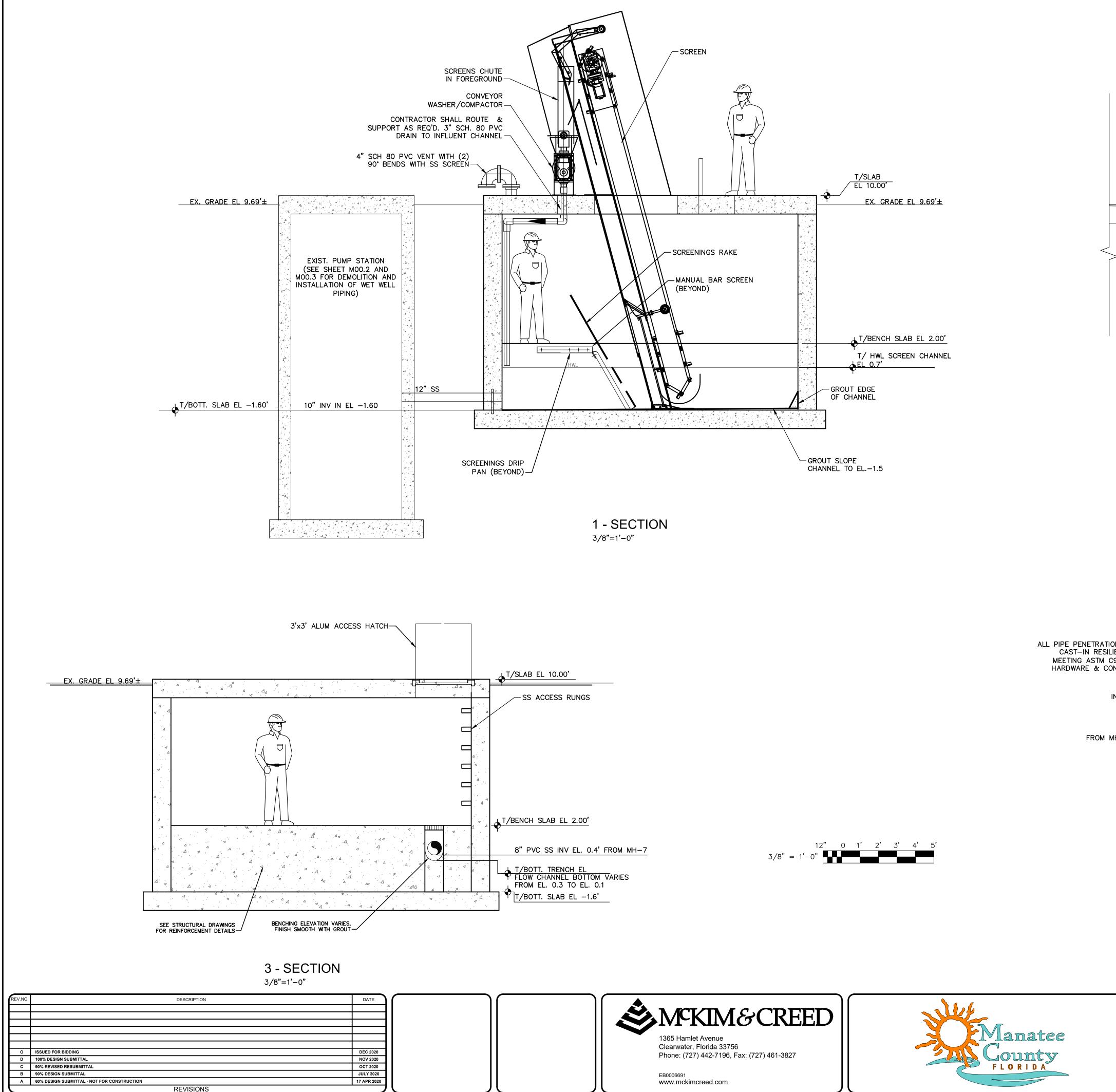
<u>STAGE 1 – WET WELL BY PASS:</u>

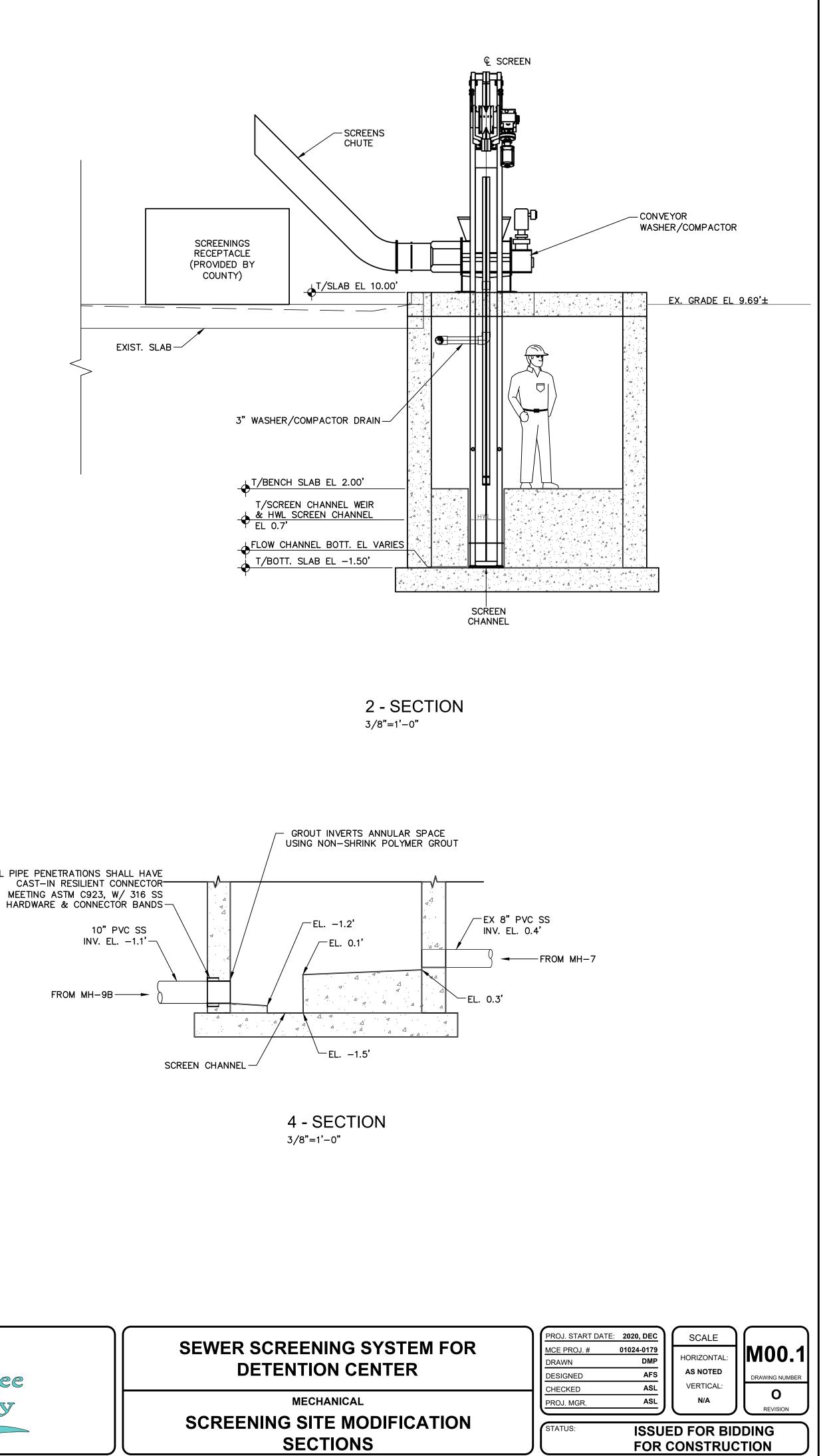
- 1. PREPARE FOR THE WET WELL BY-PASS BY CONNECTING TO THE EXISTING VALVE VAULT BY-PASS VALVE.
- 2. PLUG FLOW TO THE EXISTING WET WELL.
- 3. BY-PASS FROM EXISTING SCREENING STRUCTURE TO THE EXISTING VALVE VAULT BY-PASS VALVE.
- 4. REMOVE AND INSTALL WET WELL UPGRADES.
- 5. ONCE THE WET WELL UPGRADES HAS BEEN TESTED AND ACCEPTED BY THE COUNTY, REMOVE THE BY-PASS SYSTEM.
- STAGE 2 SCREENING STRUCTURE BY-PASS:
- 1. INSTALL DOGHOUSE MANHOLE #9A ON EXISTING 10" PVC GRAVITY SEWER PIPELINE.
- 2. PLUG THE FLOW TO THE SCREENING STRUCTURE AT MANHOLES #7 AND #9A.
- 3. PROVIDE BY-PASS PUMPING FOR THE NEW SCREENING SYSTEM CONSTRUCTION WORKS FROM MANHOLES #7 AND 9A TO THE WET WELL. CONTRACTOR SHALL PROVIDE EQUIPMENT AND MAINTENANCE OF EQUIPMENT TO PROVIDE FOR DEBRIS REMOVAL FROM WASTEWATER DURING BY-PASS PUMPING OPERATION. CONTRACTOR SHALL SUBMIT A PLAN FOR DEBRIS HANDLING FOR APPROVAL BY THE ENGINEER PRIOR TO STARTING CONSTRUCTION. THE USE OF CHOPPER PUMPS OR TEMPORARY SCREENS MAY BE CONSIDERED ALONG WITH METHODS TO CONTINUOUSLY MONITOR FOR OPERATION AND PROVIDE FOR SYSTEM MAINTENANCE 24 HOURS PER DAY TO AVOID SEWER SYSTEM BACK-UPS..
- 4. REMOVE EXISTING SCREENING SYSTEM AND COMPACTOR, REMOVE EXISTING MANHOLE AND INSTALL THE NEW SCREENING SYSTEM.
- 5. ONCE THE NEW SCREENING SYSTEM HAS BEEN TESTED AND ACCEPTED BY THE COUNTY, REMOVE THE BY-PASS SYSTEM.

SEWER SCREENING SYSTEM FOR DETENTION CENTER	PROJ. START DATE: 2020, DEC MCE PROJ. # 01024-0179 DRAWN DMP DESIGNED AFS CHECKED ASL
CIVIL SITE SANITARY SEWER PLAN AND PROFILE	CHECKED AGL PROJ. MGR. ASL N/A O REVISION STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION



I:\01024\0179\WATER\80-DRAWINGS\MECHANICAL\M00.0-M00.1.DWG 12/17/2020 09:47:45 DOREEN PADGETT





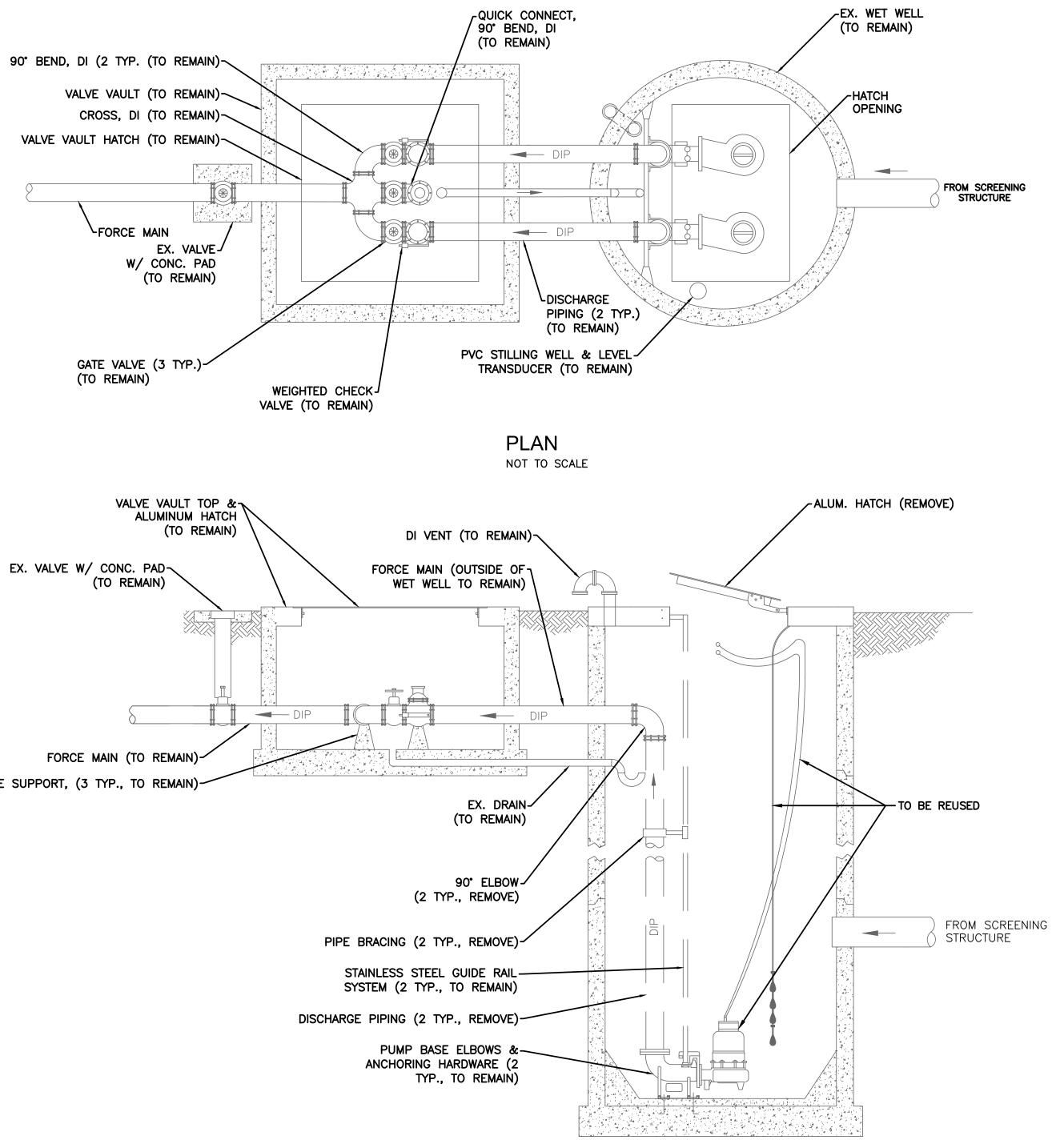
ALL PIPE PENETRATIONS SHALL HAVE

I:\01024\0179\WATER\80-DRAWINGS\MECHANICAL\M00.0-M00.1.DWG 12/17/2020 09:47:51 DOREEN PADGETT

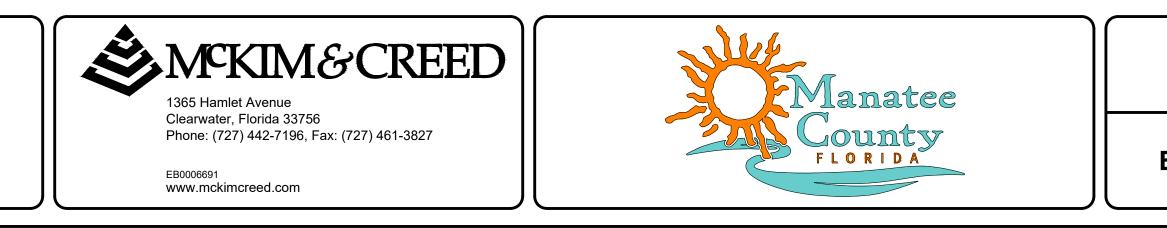
EX. VALVE W/ CONC. PAD (TO REMAIN)

CONCRETE SUPPORT, (3 TYP., TO REMAIN)~

REV.NO.	DESCRIPTION	DATE
0	ISSUED FOR BIDDING	DEC 2020
D	100% DESIGN SUBMITTAL	NOV 2020
C	90% REVISED RESUBMITTAL	OCT 2020
В	90% DESIGN SUBMITTAL	JULY 2020
Α	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020
	REVISIONS	



SECTION NOT TO SCALE



NOTES:

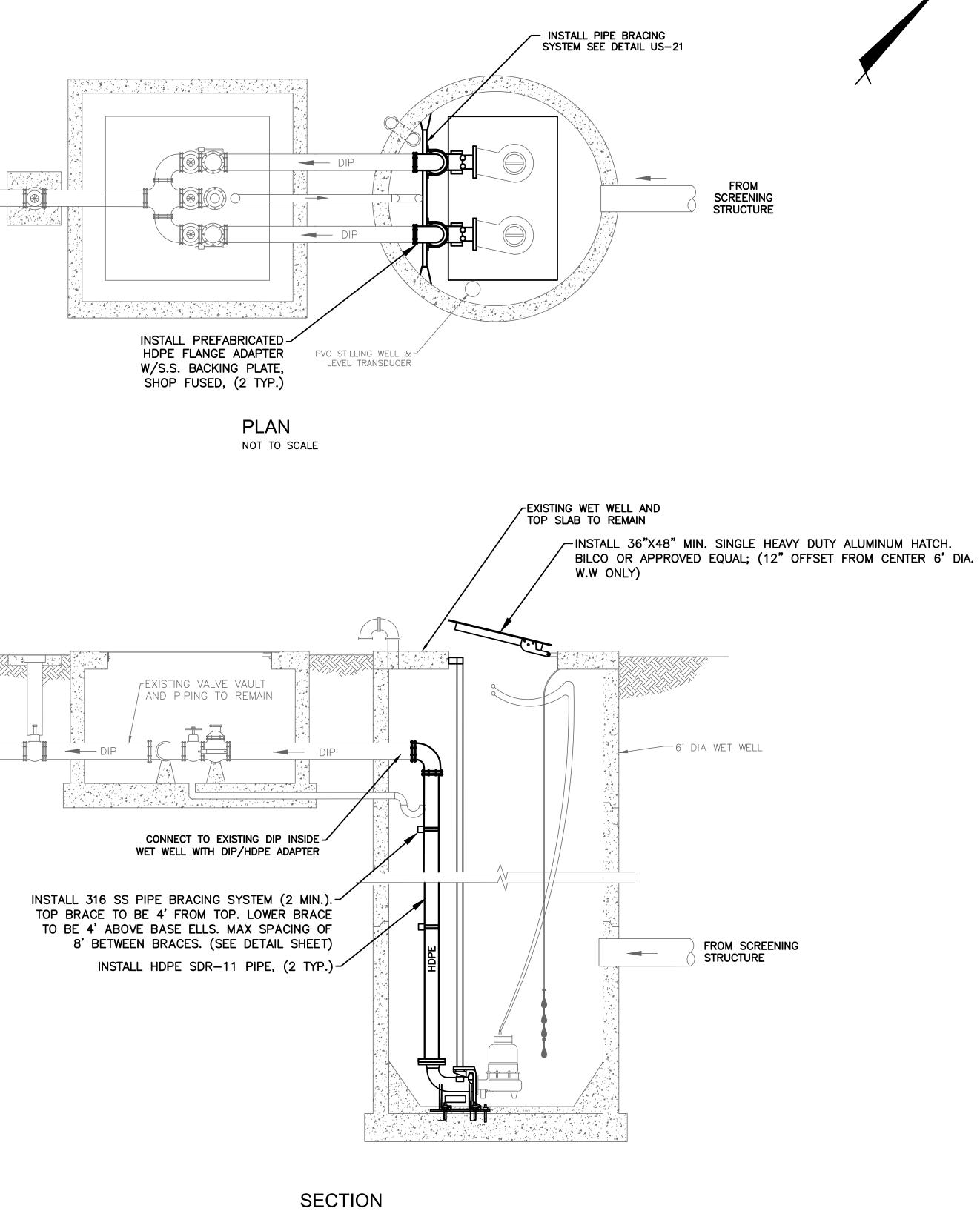
- 1. THE WET WELL CONFIGURATION SHOWN ON THESE GRAPHICS IS FOR IDENTIFICATION OF COMPONENTS TO BE REMOVED. THE CONTRACTOR SHALL FIELD VERIFY ALL EXISTING CONDITIONS, ELEVATIONS, CONFIGURATION, ETC. FOR ACCURACY.
- 2. THE CONTRACTOR SHALL FIELD VERIFY ALL EXISTING CONDITIONS AND
- DIMENSIONS. 3. THE CONTRACTOR SHALL DETERMINE THE DISCHARGE PIPING ELEVATIONS DURING
- THE SITE VISITS.
- 4. REMOVAL AND REINSTALLATION OF THE PUMPS DURING THE REHABILITATION SHALL BE DONE BY MANATEE COUNTY PERSONNEL IN COORDINATION WITH THE CONTRACTOR
- 5. BY-PASS PUMPING IS THE RESPONSIBILITY OF THE CONTRACTOR.
- 6. THE CONTRACTOR IS RESPONSIBLE FOR RESTORING ANY DAMAGED LANDSCAPING TO EXISTING OR DESIGN CONDITIONS

SEWER SCREENING SYSTEM FOR **DETENTION CENTER**

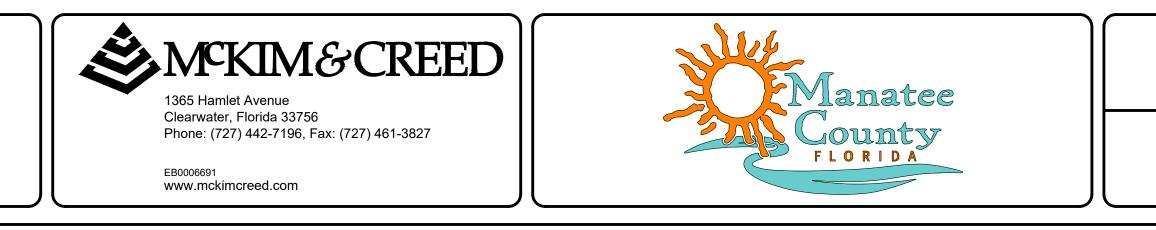
MECHANICAL **EXISTING PUMP STATION DEMOLITION** PLAN AND SECTION

PROJ. START DAT MCE PROJ. # DRAWN DESIGNED	01024-0179 DMP AFS	SCALE HORIZONTAL: AS NOTED	MO0.2
CHECKED PROJ. MGR.	ASL ASL	VERTICAL: N/A	O REVISION
STATUS:		ED FOR BID	-

REV.NO.	DESCRIPTION	DATE
0	ISSUED FOR BIDDING	DEC 2020
D	100% DESIGN SUBMITTAL	NOV 2020
С	90% REVISED RESUBMITTAL	OCT 2020
В	90% DESIGN SUBMITTAL	JULY 2020
Α	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020
	REVISIONS	



NOT TO SCALE



NOTES:

1. ALL MATERIALS AND INSTALLATION SHALL BE IN ACCORDANCE WITH THE LATEST MANATEE COUNTY PUBLIC WORKS UTILITY STANDARDS.

SEWER SCREENING SYSTEM FOR	MCE PROJ. #	01024-0179
	DRAWN	DMP
DETENTION CENTER	DESIGNED	AFS
	CHECKED	ASL
MECHANICAL	PROJ MGR	ASL

PUMP STATION MODIFICATIONS

PROJ. START DAT	E: 2020, DEC	SCALE	
MCE PROJ. # DRAWN	01024-0179 DMP	HORIZONTAL:	M00.3
DESIGNED	AFS	AS NOTED	DRAWING NUMBER
CHECKED	ASL	VERTICAL:	0
PROJ. MGR.	ASL	N/A	REVISION
STATUS:		ED FOR BID	

I:\01024\0179\WATER\80-DRAWINGS\MECHANICAL\M00.0-M00.1.DWG 12/17/2020 09:47:55 DOREEN PADGETT

1	GENERAL NOTES		3	FOUNDATIONS CTD.	
	WORK IS TO BE PERFORMED IN A GOOD, WORKMANLIKE DFESSIONAL MANNER.		OF ALL E	ITRACTOR IS TO VERIFY THE ELEVATION AND LOCATION EXISTING AND PROPOSED UTILITIES PRIOR TO CTION. ANY "KNOWN" UTILITY LINES DAMAGED WILL BE	6. CC
THE REQ LATEST	CONSTRUCTION SHALL BE IN STRICT COMPLIANCE WITH UIREMENTS OF THE FLORIDA BUILDING CODE (FBC), EDITION, OR LOCAL BUILDING CODE REQUIREMENTS IF		REPLACE UTILITY L	D AT THE CONTRACTOR'S EXPENSE. IF ANY "UNKNOWN" INES ARE ENCOUNTERED WHEN EXCAVATING THE TOR IS TO CEASE ALL EXCAVATION ACTIVITY UNTIL THE	6. H/
1.3 THES	RINGENT. SE DRAWINGS DO NOT SHOW PROVISIONS FOR SAFETY		PROVIDED	AND OWNER ARE NOTIFIED AND INSTRUCTIONS ARE ABOUT HOW TO PROCEED.	
GENERAL SHORING	CONSTRUCTION. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO PROVIDE THE REQUIRED BRACING, , AND SAFETY DEVICES THROUGHOUT THE JCTION OF THIS PROJECT.		BEFORE I UNDERGR	CONTRACTOR SHALL OBTAIN THE OWNER'S PERMISSION ENCASING OR BACK FILLING AROUND ANY EXISTING OUND STRUCTURE, PIPING, ELECTRICAL, OR OTHER OUND WORK.	N
2	COORDINATION) () (
	JCTURAL DRAWINGS SHALL BE USED IN CONJUNCTION	┥┝	4	REINFORCING STEEL	N
WITH & DRAWING OTHER C	COORDINATED WITH CIVIL, ELECTRICAL AND MECHANICAL S, INCLUDING VENDOR SUBMITTAL DRAWINGS AND CONTRACT DOCUMENTS. RDINATE THE EXACT SIZE AND LOCATION OF ALL		DOMESTIC SPECIFIC FOR CON	S SHALL BE ROLLED FROM NEW BILLET-STEEL OF C MANUFACTURE CONFORMING TO "STANDARD ATION FOR DEFORMED AND PLAIN BILLET STEEL BARS CRETE REINFORCEMENT," ASTM A615, GRADE 60 AND ENTARY REQUIREMENT S-1.	
SLEEVES WITH ELE	AND OPENINGS THROUGH WALLS OR CONCRETE SLABS ECTRICAL AND MECHANICAL DRAWINGS, INCLUDING SUBMITTAL DRAWINGS AND OTHER CONTRACT		WITH THE	ALL AND FABRICATE REINFORCING STEEL IN ACCORDANCE AMERICAN CONCRETE INSTITUTE "ACI DETAILING LATEST PUBLICATION.	
THOSE S	DISCREPANCIES BETWEEN ACTUAL CONDITIONS AND SHOWN ON THESE DRAWINGS ARE TO BE BROUGHT TO ENTION OF THE STRUCTURAL ENGINEER BEFORE WORK DS, INCLUDING ORDERING AND FABRICATING MATERIALS.			FORCING STEEL IN PLACE SHALL BE REVIEWED BY THE CONSTRUCTION REPRESENTATIVE PRIOR TO PLACEMENT RETE.	10
2.4 INDE PROVIDEI	PENDENT TESTING/REVIEW OF MATERIALS SHALL BE D AS DEFINED IN PROJECT SPECIFICATIONS IF BLE. IN GENERAL PROJECT INVOLVES THE FOLLOWING:		SPECIFIC	DED WIRE FABRIC SHALL CONFORM TO "STANDARD ATION FOR WELDED STEEL WIRE FABRIC FOR CONCRETE CEMENT," ASTM A1064.	BE "C RE
A. SC 2.5 IF C	DIL/FILL COMPACTION & BEARING. OORDINATION OF INFORMATION PRESENTED CONFLICTS		SLABS-C	E WELDED WIRE FABRIC AT CENTER OF N-GRADE AND ELEVATED SLAB TOPPINGS OVER METAL NLESS NOTED OTHERWISE.	AC W, EC
PRECEDE 2.6 IN G	ENERAL CALL-OUTS ARE FOR NEW CONSTRUCTION		& FOOTIN	VIDE BARS AT CORNERS AND INTERSECTIONS OF WALLS NGS OF THE SAME NUMBER AND SIZE AS LONGITUDINAL N.O. ON THE DRAWINGS.	EC OF AS
DIMENSIC RECORD	EXISTING CONSTRUCTION CALL-OUTS, ELEVATIONS AND ONS OF EXISTING STRUCTURES ARE BASED ON EXISTING DRAWINGS PROVIDED TO MCKIM & CREED. THE (*)			RICATE CONTINUOUS BARS IN SLABS, WALLS AND S TO THE LONGEST PRACTICABLE LENGTHS.	10 M. C/ EN
INDICATE ELEVATIO	ON INDIVIDUAL FACILITY "STRUCTURAL" DRAWINGS S EXISTING CONSTRUCTION CALL-OUTS, CONDITIONS, DNS AND DIMENSIONS TO BE FIELD VERIFIED BY THE			FORCING STEEL SHALL NOT BE BENT AFTER BEING Y EMBEDDED IN HARDENED CONCRETE.	F/
INCLUDIN DRAWING	CONTRACTOR U.N.O. PRIOR TO CONSTRUCTION, IG ORDERING AND FABRICATING MATERIALS. RECORD IS PROVIDED BY MANATEE COUNTY UTILIZED INCLUDES:			S SHALL BE COLD BENT AND SHALL NOT BE HEATED	TH SU
:	AANATEE COUNTY DETNTION FACILITY" BY JERRY N. ZOLLER, AIA, PA (DTD. APRIL 1994).		4.11 REF	RENCE DRAWINGS FOR REQUIREMENTS FOR LAP	10 Pl F(
SOILS, R STRUCTU BUILDING	CIAL INSPECTIONS (IF APPLICABLE): ALL FOUNDATION EINF. STEEL, C.I.P. CONCRETE, CONCRETE MASONRY, IRAL STEEL & PRE-CAST CONCRETE SS/STRUCTURES WORK SHALL BE REVIEWED AS STATED UNCTION w/ THEIR RESPECTIVE NOTES BELOW.		CONFORM TO LAP	REINFORCING STEEL IN CONCRETE. ALL "LCS" SHALL I TO CLASS B SPLICE CRITERIA. IT IS ACCEPTABLE TO SPLICE NON "LCS" A MINIMUM OF 50 BAR DIAMETERS NOTED OTHERWISE.	RI 10 SI
	UNCTION W/ THEIR RESPECTIVE NOTES BELOW.	ļ	4.12 LAP	SPLICED BARS IN CONCRETE ARE TO BE WIRE TIED.	SI 10
3	FOUNDATIONS		5	CONCRETE	
IN ACCO PREPARE NO. DES	GN ALLOWABLE SOIL BEARING PRESSURE – 3,000 PSF RDANCE w/ THE PROJECT GEOTECHNICAL REPORT AS ED BY DRIGGERS ENGINEERING SERVICES, INC. (PROJECT 208542, DTD. APRIL 30, 2020). THE CONTRACTOR IS SIBLE FOR VERIFYING THIS VALUE PRIOR TO FOUNDATION		COMPRES "DESIGN	ENERAL CONCRETE SHALL DEVELOP 3,000 PSI MINIMUM SIVE STRENGTH AT 28 DAYS. IN ADDITION REFERENCE CRITERIA" THIS DWG. & PROJECT SPECIFICATIONS FOR TION & SPECIFIC CONCRETE MIX DESIGN REQUIREMENTS.	Pf Al 10 Fl
CONSTRU THIS BEA DEPTHS ENGINEER	JCTION. IN AREAS WHERE THE SOIL DOES NOT YIELD ARING STRESS VALUE, ADJUSTMENT IN THE FOOTING AND FOUNDATION DIMENSION MAY BE MADE BY THE R BEFORE WORK PROCEEDS. CONTRACTOR IS SIBLE FOR PERFORMING ANY SUCH ADJUSTMENTS.		REQUIREN "CODE RI	CRETE WORK SHALL CONFORM TO "BUILDING CODE MENTS FOR REINFORCED CONCRETE", ACI 318 & TO EQUIREMENTS FOR ENVIRONMENTAL ENGINEERING E STRUCTURES", ACI 350 (LATEST EDITIONS).	
PROJECT ENGINEEF	PARE THE EXISTING SUBGRADE IN ACCORDANCE w/ THE GEOTECHNICAL REPORT AS PREPARED BY DRIGGERS RING SERVICES, INC. (PROJECT NO. DES 208542, DTD. D, 2020). IN THE EVENT UNUSUAL SOIL CONDITIONS ARE			E 1/2 INCH EXPANSION JOINT MATERIAL BETWEEN F CONCRETE AND VERTICAL SURFACES UNLESS NOTED SE.	N
UNCOVER FOUNDAT PROCEED FOUNDAT	RED, NOTIFY THE OWNER AND ENGINEER PRIOR TO TION CONSTRUCTION FOR INSTRUCTIONS HOW TO D. ADJUSTMENT IN THE FOOTING DEPTHS AND GENERAL TION CONSTRUCTION MAY BE MADE BY THE ENGINEER		WALLS A 5.5 CHAN	VIDE CONSTRUCTION OR CONTROL JOINTS IN SLABS & T LOCATIONS SHOWN ON DRAWINGS.	· ·
PERFORM	WORK PROCEEDS. CONTRACTOR IS RESPONSIBLE FOR MING ANY SUCH ADJUSTMENTS. TING & BASE SLAB EXCAVATIONS AND FORMS SHALL BE		5.6 CON ⁻	THERWISE. IRACTOR SHALL BE RESPONSIBLE FOR PROPER CURING CONCRETE. CURING METHODS SHALL CONFORM TO	N
REVIEWEI	D BY AN OWNER'S CONSTRUCTION REPRESENTATIVE O PLACEMENT OF CONCRETE. TING & BASE SLAB ELEVATIONS SHALL NOT BE RAISED		"BUILDIN ACI 318, ENGINEEF	CODE REQUIREMENTS FOR REINFORCED CONCRETE" "CODE REQUIREMENTS FOR ENVIRONMENTAL RING CONCRETE STRUCTURES" ACI 350 AND "STANDARD	•
OR LOWE ENGINEEF	RED WITHOUT APPROVAL OF THE STRUCTURAL R.		5.7 UNLE	FOR CURING CONCRETE," ACI 308 (LATEST EDITIONS). TSS NOTED OTHERWISE DOWELS SHALL BE THE SAME AND SIZE AS THE LARGEST VERTICAL BAR TO WHICH	13 13 5 5
BEFORE FILL SHA	EXCAVATIONS SHALL BE ADEQUATELY DEWATERED PLACEMENT OF CONCRETE. NO CONCRETE OR CONCRETE ALL BE PLACED IN STANDING WATER. ACCUMULATION NG 1 INCH SHALL BE PUMPED OUT.		THEY AR	E SPLICED.	
BUILDING SHALL B SCRAPS,	FILL MATERIAL, IF REQUIRED, INSIDE THE S'S/STRUCTURE'S FOOTPRINT AND BELOW FOUNDATION'S E SELECT MATERIAL FREE FROM ROOTS, TRASH WOOD AND OTHER EXTRANEOUS MATERIALS. PLACE FILL IN DT EXCEEDING THE RECOMMENDATIONS OF THE PROJECT		5.9 CON ⁻ APPROVA	TRACTOR SHALL SUBMIT REBAR SHOP DRAWINGS FOR L TO OWNER PRIOR TO FABRICATION. DO NOT TE REINFORCING PRIOR TO RECEIPT OF APPROVED SHOP	P
GEOTECH ENGINEEF APRIL 30	INICAL REPORT AS PREPARED BY DRIGGERS RING SERVICES, INC. (PROJECT NO. DES 208542, DTD.), 2020).		CONSTRU CONCRET	ICRETE MIXES TO BE REVIEWED BY THE OWNER'S CTION REPRESENTATIVE PRIOR TO PLACEMENT OF E. COMPRESSIVE STRENGTH TEST CYLINDERS TO BE BY THE OWNER'S CONSTRUCTION REPRESENTATIVE	
SUPPORT	FOOTINGS & PIERS SHALL BE CENTERED UNDER THE TED WALL/COLUMN MEMBER UNLESS NOTED OTHERWISE.			OUT CONCRETE CONSTRUCTION OF THE PROJECT.	
FOOTING	STRUCTION JOINTS IN FOUNDATION SLABS, WALLS & S SHALL BE MADE AT LOCATIONS SHOWN ON DRAWINGS.				
	HOR BOLTS SHALL BE SET BY MEANS OF TEMPLATE. IG" ANCHOR BOLTS INTO PLACE IS PROHIBITED.				
REV.NO.	DESCRIPTION	_			
		_			
	FOR BIDDING ESIGN SUBMITTAL - FOR CONSTRUCTION			DEC 2020 NOV 2020	
B 90% RE	VISED SUBMITTAL - NOT FOR CONSTRUCTION SIGN SUBMITTAL - NOT FOR CONSTRUCTION REVISIONS	_		OCT 2020 WILLIAM F. BAND, P.E. JULY 2020 No. 67838	

REVISIONS

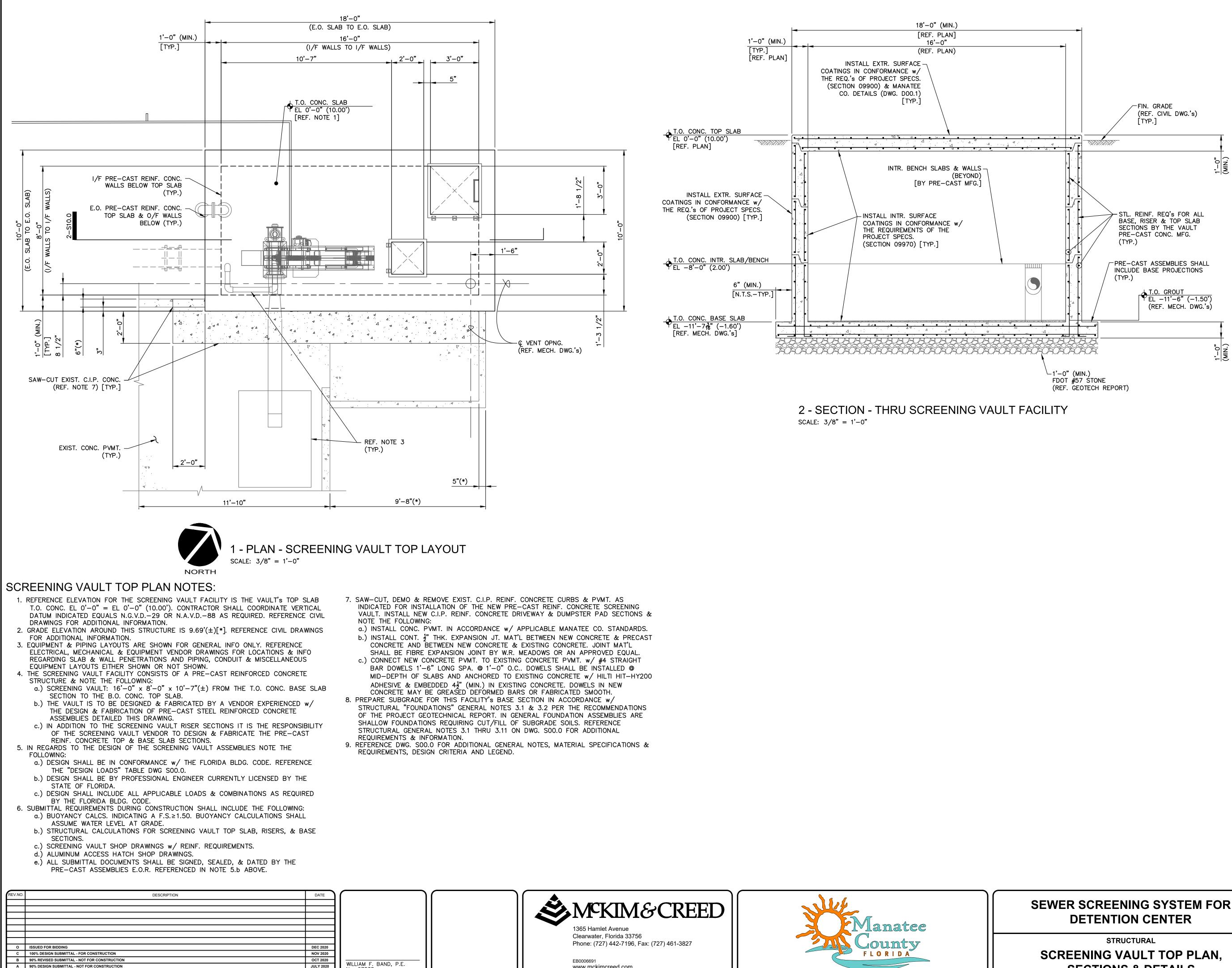
6	GROUT	14	ABBREVI
	UT WHERE REQUIRED SHALL BE NON-SHRINK GROUT IN MANCE TO ASTM C1107.	INTENDED	FOLLOWING LIST OF TO REPRESENT AL
	UT SHALL BE NON-METALLIC AND NON-STAINING AND MINIMUM COMPRESSIVE STRENGTH OF 5,000 PSI.	ABBREVI/ ADD'L = AL =	ALUMINUM
7	MASONRY	ALT. = BLDG. = BLK. = BM. =	BUILDING BLOCK
NOT APP	PLICABLE.	B.O. = BRG. = C.I.P. = CLR. =	BOTTOM OF BEARING CAST-IN-PLACE
8	STRUCTURAL STEEL	CMU = C.O. = COL. =	CONC. MAS. UNI CLEAN OUT COLUMN
NOT APP	PLICABLE.	CONC. = CONN. = CONST. = CONT. =	CONNECTION CONSTRUCTION CONTINUOUS
9	ALUMINUM	COORD.= CTR. = CTR'D. = DBL. =	CENTER CENTERED DOUBLE
NOT API	PLICABLE.	DIR. = DWG. = DWG.'s. = EA. =	DRAWING DRAWINGS
10	PRECAST CONCRETE	EL = E.O. = EQ. =	ELEVATION EDGE OF EQUAL
BE DESI DESIGN RESPECT ACCORD W/ THE EQUIPME FOR CAL EQUIPME	E-CAST CONCRETE FIELD ASSEMBLED STRUCTURES TO GNED BY THE PRE-CAST MANUFACTURER UTILIZING LOADS" PROVIDED THIS DRAWING AND/OR THE TIVE FACILITY STRUCTURAL DRAWINGS AND IN ANCE w/ THE PROJECT SPECIFICATIONS. COORDINATE CIVIL, ELECTRICAL, MECHANICAL AND VENDOR INT DRAWINGS FOR ADDITIONAL MATERIALS REQUIRED CULATION OF THE DEAD LOADS, LIVE LOADS AND INT LOADS, THAT MAY BE SUSPENDED FROM THE SIDES PANELS AND UNDERSIDE OF THE TOP SLAB PANELS LICABLE.	EQUIP. = EXIST. = EXP. = FLG. = FDN. = F.S. = FT. = FTG. = GA. = GALV ² D = HORZ. = H.P. =	EXISTING EXPANSION FLANGE FOUNDATION FAR SIDE FEET FOOTING GAGE GALVANIZED GALVANIZED HORIZONTAL HIGH POINT
MANUFA CALCULA ENGINEE FABRICA COMPON	E-CAST CONCRETE FIELD ASSEMBLED STRUCTURES CTURER IS REQUIRED TO SUBMIT DRAWINGS AND ATION PACKAGES SEALED, SIGNED AND DATED BY AN R CURRENTLY LICENSED BY THE STATE OF FLORIDA. TION OF THE PRE-CAST FIELD ASSEMBLED STRUCTURES ENTS SHOULD NOT OCCUR UNTIL "FINAL" APPROVAL OF NUFACTURER'S DRAWINGS AND CALCULATIONS ALS.	HRS. = I/F = INFO. = JNTR. = JST. = JT. = LCS = LLH =	INSIDE FACE INFORMATION INTERIOR JOIST JOINT KNEE BRACE LIQUID CONTAINM STRUCTURES
PRE-CA FOUNDA	FERENCE MECHANICAL AND STRUCTURAL DRAWINGS FOR ST CONCRETE FIELD ASSEMBLED STRUCTURES TION SYSTEMS AND BEARING ELEVATIONS, DIMENSIONS, ND TOP SLAB OPENINGS & TOP SLAB SLOPE MENTS.	LLIT = LLV = L.P. = LSL = MAS. = MAT ² L. = MFG. =	LONG LEG VERTIG LOW POINT LONG SLOTTED MASONRY MATERIAL
SPECIFIC	FERENCE MECHANICAL DRAWINGS & PROJECT CATIONS FOR ALL INTERIOR AND EXTERIOR WALL AND CCTIONS FINISH REQUIREMENTS.	MIN. = MIN. = MTL. = NA = N/A =	MINIMUM METAL NOT APPLICABLE
	E-CAST FIELD ASSEMBLED STRUCTURES WALL AND SLAB S TO HAVE A MINIMUM 28 DAY COMPRESSIVE STRENGTH 0 PSI.	NOM. = N.S. = N.T.S. = O.C. =	NOMINAL NEAR SIDE NOT TO SCALE
PRE-CA	FERENCE ALL PROJECT SPECIFICATIONS RELATED TO THE ST CONCRETE FIELD ASSEMBLED STRUCTURES FOR NAL REQUIREMENTS AND INFORMATION.	0/F = 0/H = 0/0 = 0PNG. =	OUTSIDE FACE OVERHANG OUT TO OUT
FIELD AS	NSTRUCTION ACTIVITIES RELATED TO THE PRE-CAST SSEMBLED STRUCTURES TO BE REVIEWED BY THE THE CONSTRUCTION REPRESENTATIVE THROUGHOUT TE CONSTRUCTION OF THE PROJECT.	OPP. = ORIENT.= PLCS. = P.P. = RAD. = REF. =	OPPOSITE ORIENTATION PLACES PUMP PAD RADIUS
11	PRE-ENGR. TIMBER TRUSS	REINF. = REQ'D. = RET. =	REINFORCING REQUIRED RETAINING
NOT API	PLICABLE.	ROT. = SIM. = SPA. = SPECS. =	SIMILAR SPACED SPECIFICATIONS
12	PRE-ENGR. METAL BLDGS.	S.S. = SSL = STD. = STL. =	SHORT SLOTTED STANDARD STEEL
NOT APP	PLICABLE.	T&B = T/D = THK. = THK'D =	TOP & BOTTOM TURN DOWN THICK
13	MISC. BUILDING MATERIALS	THK D = T.O. = T.O.S = TYP. = U.N.O. =	TOP OF TOP OF STEEL TYPICAL
SITE & SITE AS	MISCELLANEOUS MATERIALS ARE TO BE DELIVERED TO STAGED ON SITE PRIOR TO INSTALLATION. STORE ON REQUIRED BY THE MATERIAL MANUFACTURER TO AVOID PRIOR TO INSTALLATION.	XB = VERT. = W.P. =	OTHERWISE CROSS OR "X"-I VERTICAL
"NP 1"	ULK & SEALANT MATERIAL SHALL BE MASTERSEAL ONE COMPONENT, MOISTURE CURING HIGH PERFORMANCE RETHANE SEALANT, OR AN APPROVED EQUAL.		





ATIONS	15	DESIGN LOADS
F ABBREVIATIONS IS NOT L THOSE USED ON THE MENT THE MORE COMMON	FLORID	N LOADS BASIS OF DESIGN: DA BUILDING CODE (FBC) — 2017 EDITION JM DESIGN LOADS FOR BUILDINGS & OTHER STRUCTURES — ASCE 7—10
	EQUIP. LIVE LC ROOF L SNOW L	LOAD: 4.4 k (SCREEN) OAD: 16.0 k (H-20 WHEEL LOAD) OR 300 PSF (UNIFORM PRESSURE LOAD) LOAD: NOT APPLICABLE LOAD: NOT APPLICABLE LOAD: 160 mi/hr, EXPOSURE C, OCCUPANCY/RISK CATEGORY III CALCULATED WIND BASE SHEARS: Vx = Vy = NOT APPLICABLE
г		COMPONENTS & CLADDING WIND PRESSURES: ZONE 1, ZONE 2 & ZONE 3 ROOF PRESSURES = NOT APPLICABLE ZONE 4 & ZONE 5 WALL PRESSURES = NOT APPLICABLE
	SEISMIC SOIL BE	C: NOT APPLICABLE BEARING: FIELD TEST PER PROJECT GEOTECH REPORT = 3,000 PSF REF. "FOUNDATIONS" NOTE 3.1 DWG. S00.0
	16	DESIGN CRITERIA
	SLABS- PIPE EN SLABS BEAMS NON-LO BELOW SIDEWA REINFOI WELDED STRUCT ALUMIN BOLTS TYPE 3 ANCHOF ASTM A STEEL ALUMIN	RETE 28 DAY COMPRESSIVE STRENGTH: $-ON-GRADE & NON LCS SLABSf'c = 3,000 PSI f'c = 3,000 PSI N/AF'c = 3,000 PSI N/Af'c = 4,500 PSI N/AF'c = 4,500 PSI N/Af'c = 4,500 PSI N/AF'c = 4,500 PSI N/Af'c = 4,000 PSI N/Af'c = 3,000 PSIF'c = 3,000 PSIN/AF'c = 3,000 PSIN/AF're = 3,000 PSIN'A$
ENT	17	LEGEND
ONTAL CAL	DETAIL CONC. BRICK CONC. GROUT GRATING DETAIL	MASONRY BLOCK = $(EXISTING)$ VENEER = $(EXISTING)$ WALL, SLAB, ETC. = $(EXISTING)$ = $(EXISTING)$ (EXISTING)
	PROJEC	CT NORTH =
-	ELEVAT	TION DATUM =
	ELEVAT REFERE	TION NO./SHEET NO. = X-SYY.Y
BRACE	STEP IN STL. FR	TIONS X'-X" (Y.YY') = $X'-X"$ = DISTANCE TO/FROM FACILITY REFERENCE EL 0'-0" Y.YY' = EQUIVALENT SITE EL VERTICAL DATUM IN FOOTING ELEVATION = \$ RAMING COL./BM. = \blacktriangleright
SEWER SCREE DETENT	ION CE	DRAWN DAR / WFB HORIZONTAL: SUUL DESIGNED WFB NA DRAWING NUMBER CHECKED WFB / AEA VERTICAL: O
STRUCTURAL GEN LOADS, CRI		NOTES, DESIGN

I:\01024\0179\WATER\80-DRAWINGS\STRUCTURAL\S000-SG001-10240179.DWG 12/17/2020 09:48:11 DOREEN PADGETT



REVISIONS

No. 67838

www.mckimcreed.com

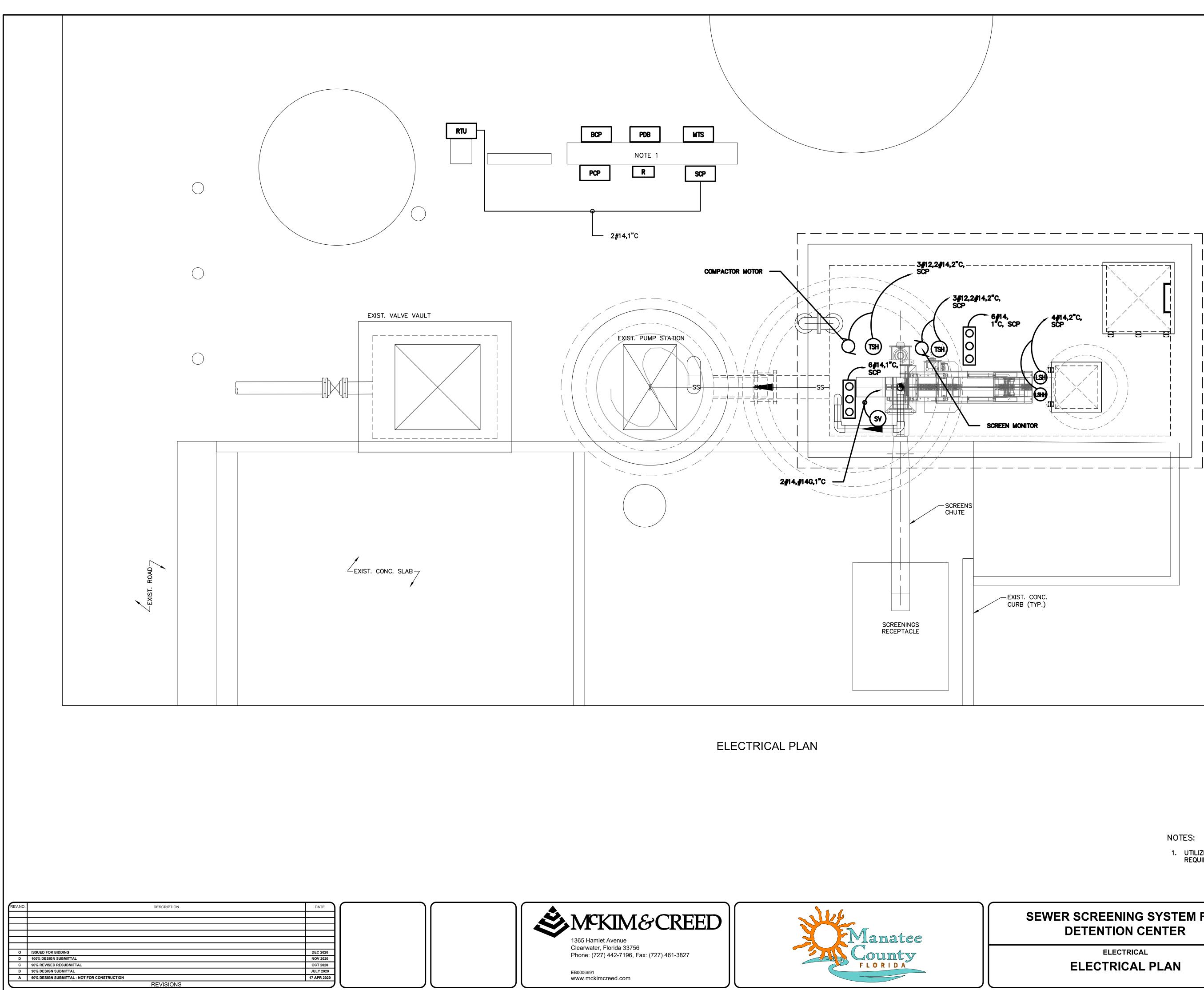
SEWER SCREENING SYSTEM FOR DETENTION CENTER	PROJ. START DATE: 2020, DEC MCE PROJ. # 01024-0179 DRAWN DAR / WFB DESIGNED WFB CHECKED WFB / AEA
STRUCTURAL	PROJ. MGR. ASL NA O
SCREENING VAULT TOP PLAN, SECTIONS & DETAILS	STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION

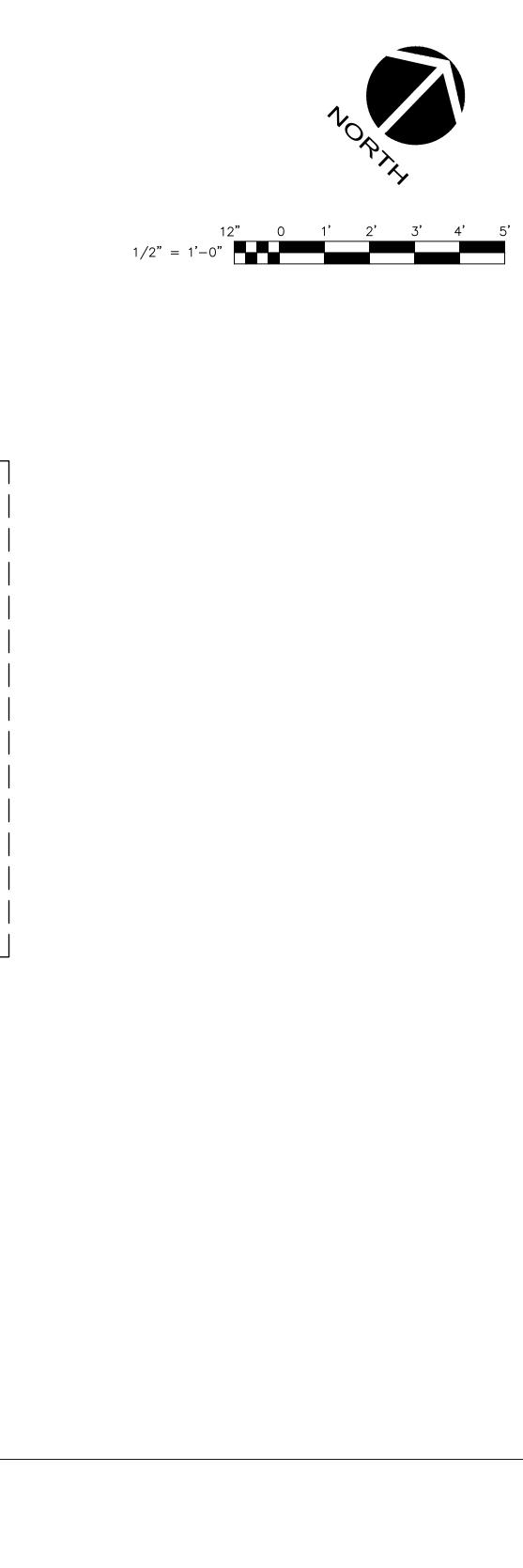
I:\01024\0179\WATER\80-DRAWINGS\STRUCTURAL\S100-SC101-10240179.DWG 12/17/2020 09:48:28 DOREEN PADGETT

	1	ABBREVIATIONS	2	TYPICAL DEVICE SYMBOLS
		ABBREVIATIONS MAY NOT BE UTILIZED FOR THIS	 \$	LIGHTING CONTROL SWITCHES:
	A, AMP AFD AFG AIT AHU	ADJUSTABLE FREQUENCY DRIVE ABOVE FINISHED GRADE ANALYTICAL INDICATION TRANSMITTER AIR HANDLING UNIT	\$\$	SWITCH DESIGNATION. LOWER-RIGHT CHARACTER "4" DENOTES SWITCH CONTROL 4 3 - THREE-WAY SWITCH CONTROL 4 - FOUR-WAY SWITCH CONTROL
	AL ARMS ATS	ALUMINUM ARC—FLASH REDUCTION SYSTEM AUTOMATIC TRANSFER SWITCH		M - MOTOR RATED SWITCH
	BKR C CAB	BREAKER CONDUIT CABINET		HEAT-TRACE OR SPECIAL PURPOSE RECEPTACLE
	CCTV CKT CLG	CLOSED CIRCUIT TELEVISION CIRCUIT CEILING		
	CR CS	CONTROL RELAY, CORROSION RESISTANT CONTROL SWITCH		
	CU DETD EF ELTU EMER	COPPER DUAL ELEMENT TIME DELAY EXHAUST FAN ELECTRONIC TRIP UNIT EMERGENCY		WIRING DEVICE NOTES: IF SHOWN, UPPER-LEFT CHARACTERS DENOTE PANEL BOARD CIRCUIT FOR POWER OUTLETS. IF SHOWN, LOWER-RIGHT
	ENCL EQUIP EWC	ENCLOSURE EQUIPMENT ELECTRIC WATER COOLER		AND/OR RECEPTACLE CONFIGURATION.
	EPRF FA FAAP	EXPLOSION PROOF FIRE ALARM FIRE ALARM ANNUNCIATOR PANEL		
	FLA FVNR	FULL LOAD AMPS FULL VOLTAGE NON-REVERSING STARTER		
	FMC FWE	FLEXIBLE METALLIC CONDUIT FURNISHED WITH EQUIPMENT		
	G, GND GFIC	GROUND GROUND FAULT CIRCUIT INTERRUPTER		FLOAT/FLOW SWITCH
	HOA HP	HAND-OFF-AUTO HORSE POWER		LIMIT SWITCH
	HPS	HIGH PRESSURE SODIUM	PS	PRESSURE SWITCH
	JB	JUNCTION BOX		
EBC UDUETING THE MEEL WETAL CONDUCT EFAC LOUDTOTH FLEXEEL WETAL CONDUCT LP LOUDTOTH FLEXEEL WETAL CONDUCT LP LOUDTOTH FLEXEEL MOMETALLE CONDUCT LP LOUDTOTH FLEXEEL MOMETALLE CONDUCT LP LOUDTOTH FLEXEEL MOMETALLE CONDUCT LP LOUTTOTH FLEXEEL MOMETALLE CONDUCT MGD MONTOR CONTROL MGD MANN STREEMEND PARLE WFR MANN STREEMEND PARLE WFR MANN STREEMEND PARLE MGD MANN STREEMEND PARLE MGD MANN STREEMEND PARLE MFR MANN STREEMEND MGD MANN STREEMEND MGD MANN STREEMEND MGD MANN STREEMEND MGD MONNELLY CLEXE MGD MONNE	kCMIL kA	THOUSAND CIRCULAR MILLS KILOVOLT AMPERE		
	LED LFMC	LIGHT-EMITTING DIODE LIQUIDTIGHT FLEXIBLE METAL CONDUIT		
	LIT LP	LEVEL INDICATION TRANSMITTER LIGHTING PANEL, LIGHT POLE		
Mi-0 MANILLES ONLY Mi-0 MANILLES ONLY MI-0 MANILLES ONLY MI-0 MANILLES ONLY MI-0 MOUNTED / JOURTING MI-1 MOUNTED / JOURTING MI-1 MOUNTED / JOURTING MI-1 MOUNTED / JOURTON MI-1 MOUNTED / JOURTON MI-1 MOUNTED / JOURTON MI-1 MOUNTED / JOURTON MOUNTED / JOURTON MOUNTED / JOURTON MOUNTED / JOURTON MOUNTED / JOURTON MI-1 MOUNTED / JOURTON MI-1 MOUNTED / JOURTON P-1 POLE P-1 <th>MCP MDP</th> <th>MOTOR CIRCUIT PROTECTOR MAIN DISTRIBUTION PANEL</th> <th></th> <th></th>	MCP MDP	MOTOR CIRCUIT PROTECTOR MAIN DISTRIBUTION PANEL		
	MH MLO	MANHOLE MAIN LUGS ONLY		
	MTD MTS	MOUNTED/MOUNTING MANUAL TRANSFER SWITCH		STOP-START STATION
NO NORMALLY OPEN NIC NOT IN CONTRACT NTO TO SCALE △ PA PUBL ADDRESS PP POWER FACTOR PA PANEL PT POTENTIAL TRANSFORMER R/S REQUED SCCR SUPERIANTAGE SOTT STARTER RSC REQUED SCCR SUPERVSCRY CONTROL AND DATA ACOULSTION SECC STANLESS STELL SW STANLESS STELL SW SWTCH GRAR SW SWTCH COR RCUND UH UHT HEATER V VOLUTIS VITU VITU UG UDREGROUND UH UHT HEATER V VITU VH WATHER ORDER VH WATHER ORDER VH WATHER ORDER VH WATHER ORDER VH <t< th=""><th>N, NEU NA</th><th>NEUTRAL NOT APPLICABLE</th><th></th><th>LOCK-OUT-STOP SWITCH</th></t<>	N, NEU NA	NEUTRAL NOT APPLICABLE		LOCK-OUT-STOP SWITCH
PA POLEL PA PUBLIC ADDRESS POE PUBLIC ADDRESS PO PUBLIC ADDRESS PO POWER OTOR PH PARE PH PARESURE INDICATION TRANSMITTER PLC PROCRAMMABLE LOGIC CONTROLLER PH PARESURE INDICATION TRANSMITTER PLC PROCRAMMABLE LOGIC CONTROLLER PH PARE RXS REDUCED VOLTACE SOFT STARTER RCG REQURED SCCCA SSEDECTICATION SSC SUBCT CALCUT CURRENT RATIO SCCCA SSEDECTICATION SSC SELECTOR SWICH SST STANLESS STEL SW SWICH SW SWICH TYP< THERMAL-MAGNETIC THIP UNIT TYP	NO NIC	NORMALLY OPEN NOT IN CONTRACT		
PT PRESSURE INDICATION TRANSMITTER PLC PROGRAMMABLE LOGC CONTROLLER PNL PAREL PP POWER PANEL, POWER POLE PY POTENTIAL TRANSFORMER RNS RELYCTOR PANEL STARTER ROCK SCODA SCODA SUPERVISION TRUE LIMETRY UNIT SCCAR SUPERVISION TELEMETRY UNIT SCCAR SUPERVISION CONTROL AND DATA ACQUISITION SEE SCECTOR SPECIFICATION SYST STAINLESS STELL SW SWITCH GEAR SW SWITCH GEAR TUP THERMAL-MARKETC TRIP UNIT TYP THELEPHONE TTN THERMAL-MAGNETIC TRIP UNIT TYP TYPICAL UG UNDERGROUND UH UNIT HEATER V VOLTS VT VARIABLE PREQUENCY DRIVE WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR <tr< th=""><th>P PA PB PCP PF</th><th>POLE PUBLIC ADDRESS PULL BOX, PUSH-BUTTON PUMP CONTROL PANEL</th><th></th><th></th></tr<>	P PA PB PCP PF	POLE PUBLIC ADDRESS PULL BOX, PUSH-BUTTON PUMP CONTROL PANEL		
RYSS REDUCED VOLTAGE SOFT STATER REC RECURED REC REGURED SCR SHORT CIRCUIT CURRENT RATING SCR SECTOR SWITCH SST SELECTOR SWITCH SW SWITCH SW SWITCH SWW SWITCH SWE SWITCH SWE SWITCH SWE SWITCH SWE SWITCH SWE SWITCH	PIT PLC PNL PP PT	PRESSURE INDICATION TRANSMITTER PROGRAMMABLE LOGIC CONTROLLER PANEL POWER PANEL, POWER POLE POTENTIAL TRANSFORMER	0 0 0 0 0 0 0 0	
SCADA SUPERVSORY CONTROL AND DATA ACQUISITION SPEC SPECICATION SPEC SPECICATION SYS SELECTOR SWITCH SW SWITCH SWBD SWITCHBOARD SWRR SWITCHBOARD SWRR SWITCHBOARD SWRR SWITCHBOARD SWRR SWITCH GEAR TEL TELFHONE THEL TELFHONE TOY TYPE UG UNDERGROUND UH UNT HEATER V VOLTS WH WATT-HOUR WH WATT-HOUR WP WATT-HOUR WP WATT-HOUR WP WATT-HOUR WH WATT-HOUR WAR TRANSFORMER SFR TRANSFORMER EXEMPTION DATE BASIESTOR BEDING DESCREPTION DESCREPTION DATE SFR TRANSFORMER	RVSS REQ RMC	REDÚCED VOLTAGE SOFT STARTER REQUIRED RIGIDREMOTE TELEMETRY UNIT	3	TYPICAL DEVICE MOUNTING HEIGHTS
SST STAINLESS STEEL SW SWITCH SWBD SWITCH SWBD SWITCH GEAR TEL TELEPHONE TMTU THERMAL-MACNETIC TRIP UNIT TYP TYPICAL UG UNOT HEATER VH UNIT HEATER VFD VARABLE FREQUENCY DRIVE WH WATT-HOUR WP WATT-HOUR WP WATHERPROOF XFMR TRANSFORMER EVMO DESCRIPTION DESCRIPTION DATE Image: Construction of the server and the server	SCADA SPEC	SUPERVISORY CONTROL AND DATA ACQUISITION SPECIFICATION		· ·
SWGR SWITCH GEAR TEL TELPHONE TMU THERMAL-MAGNETIC TRIP UNIT TYP TYPICAL UG UNDERGROUND UH UNIT HEATER VFD VARIABLE FREQUENCY DRIVE WH WATT-HOUR WP WEATHERPROOF XFMR TRANSFORMER	SST SW	STAINLESS STEEL SWITCH	LIGHT SWIT	CHES 48" AFF
Typ TypICAL Io AFF UG UNDERGROUND EXIT LIGHTS (WALL MOUNT) 16" ABOVE DOOR V VOLTS VOLTS EXIT LIGHTS (WALL MOUNT) 96" AFF VFD VARIABLE FREQUENCY DRIVE WH WATT-HOUR 96" AFF WP WCATHERPROOF WFM INANSFORMER DIMENSIONS ARE TO DEVICE BOTTOM UNLESS NOTED OTHERWISE. IN CONCRETE BLOCK OR BRICK WALL CONSTRUCTION, CONTRACTOR SHALL COORDINATE DEVICE BOX INSTALLATION WITH MORTAR AND CONSTRUCTION JOINTS. EEVINO DESCRIPTION DATE Image: Insue for BIDDING DESCRIPTION DATE Image: Insue for BIDDING DESCRIPTION DEC 2020 Image: Insue for BIDDING DEC 2020 OCT 2020 Image: Insue for BIDDING DEC 2020 OCT 2020 Image: Insue for BIDDING Image: Insue for BIDDING Image: Insue for BIDDING Image: Insue for BIDDING Image: Insue for BIDDING Image: Insue for BIDDING Image: Ins	TEL	TELEPHONE	PHONE OUT	ILETS (WALL MOUNT) 64" AFF
V VOLTS VFD VARIABLE FREQUENCY DRIVE WH WATT-HOUR WP WEATHERPROOF XFMR TRANSFORMER MILL COORDINATE DEVICE BOTTOM UNLESS NOTED OTHERWISE. IN CONCRETE BLOCK OR BRICK WALL CONSTRUCTION, CONTRACTOR SHALL COORDINATE DEVICE BOX INSTALLATION WITH MORTAR AND CONSTRUCTION JOINTS. REV.MO. DESCRIPTION DISUED FOR BIDDING DATE Image: Construction of the submittal in table in the submittal i	TYP UG	TYPICAL UNDERGROUND	EXIT LIGHTS	S (WALL MOUNT)
WP WEATHERPROOF XFMR TRANSFORMER DIMENSIONS ARE TO DEVICE BOTTOM UNLESS NOTED OTHERWISE. IN CONCRETE BLOCK OR BRICK WALL CONSTRUCTION, CONTRACTOR SHALL COORDINATE DEVICE BOX INSTALLATION WITH MORTAR AND CONSTRUCTION JOINTS. REV.NO DESCRIPTION DESCRIPTION DATE O ISSUED FOR BIDDING D IONE DESCRIPTION O ISSUED FOR BIDDING D IONE DESCRIPTION O ISSUED FOR BIDDING D IONE DESCRIPTION O ISSUED FOR BIDDING D IONE DESIGN SUBMITTAL S 99% NO BESIGN SUBMITTAL OCT 2020 JULY 2020 I TO YAPE REVED B S 99% DESIGN SUBMITTALKOT FOR CONSTRUCTION	VFD	VOLTS VARIABLE FREQUENCY DRIVE		LIGHTS (WALL MOUNT) - 96° AFF
Image: ConstructionImage: Construc			DIMENSIONS CONCRETE E SHALL COOF	BLOCK OR BRICK WALL CONSTRUCTION, CONTRACTOR RDINATE DEVICE BOX INSTALLATION WITH MORTAR AND
Image: ConstructionImage: Construc				
Image: ConstructionImage: Construc				
D100% DESIGN SUBMITTALNOV 2020C90% REVISED RESUBMITTALOCT 2020B90% DESIGN SUBMITTALJULY 2020A60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION17 APR 2020	REV.NO.	DESCRIPTION		
D100% DESIGN SUBMITTALNOV 2020C90% REVISED RESUBMITTALOCT 2020B90% DESIGN SUBMITTALJULY 2020A60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION17 APR 2020				
C90% REVISED RESUBMITTALOCT 2020B90% DESIGN SUBMITTALJULY 2020A60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION17 APR 2020				
	C 90% REV B 90% DES	ISED RESUBMITTAL DIGN SUBMITTAL		OCT 2020 JULY 2020

4 GENERAL ELECTRICAL SYMBOLS	7	GENERAL ELECTRICAL NOTES	
Image: Contact - Normally Closed Contact - Normally Open Contact - Normally Open Contact - Normally Open Image: Contact - Normally Open Image: Contact - Normally Open Contact - Second Contact Contact - Second Contact Image: Contact - Normally Open Image: Contact - Second Contact Contact - Second Contact Contact - Second Contact Image: Control Power Transformer Control Power Transformer Control Control Contact Control Control Contact Image: Control Power Transformer Control Control Control Control Control Control Control Power Transformer Control Cont	UIT HOMERUN TO EQUIPMENT SHOWN. LINE TYPE 1.1. NATES CONCEALED, EXPOSED, ETC. NUMBERS/TEXT 1.1. NATE HOMERUN EQUIPMENT (I.E. PANEL BOARD 1.2. IT NUMBER). 1.2. RAL CONDUIT RUN CONCEALED IN FURRED WALLS AND 1.3. IGS, EXPOSED ELSEWHERE UNLESS OTHERWISE NOTED 1.4. SEALED CONDUIT IN FLOOR SLAB, UNDERGROUND, ETC. 1.4. NG CABLE OR CONDUIT 1.5. UIT TURNED DOWN 1.6. UIT TURNED UP 1.6. SITE ELECTRICAL 1.7. EXISTING SITE ELECTRICAL 2. ELI SITE TELEPHONE 2.1. SITE TELEPHONE 2.3. OVERHEAD ELECTRICAL UTILITY 2.4. UNDERGROUND ELECTRICAL UTILITY 3. PC UNDERGROUND TELEPHONE UTILITY 3.1. SITE GROUND 3.4. SITE GROUND 3.4. SITE GROUND 3.6. UNDERGROUND TELEPHONE UTILITY 3.6. UNDERGROUND TELEPHONE UTILITY 3.6. UNDERGROUND TELEPHONE UTILITY 3.6. UNDERGROUND TELEPHONE UTILITY 3.6. USED OR FUSED DISCONNECT SWITCH: TOP NUMBER 3.6.	ONTRACTOR RESPONSIBILITIES: REFERENCE ALL SPECIFICATIONS, DRAWINGS AND CONTRACT DOCUMENTS FOR ADDITIONAL TO COMMENCING WORK. THE GENERAL NOTES STATED ON THIS DRAWING ARE APPLICABLE TO ALL DRAWINGS AND NOTED OTHERWISE. ALL ELECTRICAL WORK SHALL COMPLY WITH THE CURRENT NFPA, NEC, NESC AND LOCAL REQUIREMENTS. CONTRACTOR SHALL COORDINATE WITH THE LOCAL ELECTRICAL UTILITY TO ESTABLISH NE' PROVIDE UTILITY POWER AS REQUIRED TO INCLUDE ESTABLISHING TEMPORARY UTILITY AC AND COMMISSIONING. THE ELECTRICAL INSTALLATION SHALL EXCEED THE REQUIREMENTS OF ALL APPLICABLE N CONTRACTOR SHALL PLAN AND COORDINATE ELECTRICAL CONSTRUCTION WITH ALL CRAFT ELECTRICAL INSTALLATION. THE SCHEDULING AND DURATION OF ANY PROCESS OR FACILITY SHUTDOWN TO REMOVE / ADVANCE WITH FACILITY MANAGEMENT, ENGINEER, OWNER OR OWNER REPRESENTATIVE. LECTRICAL EQUIPMENT: 600V RATED ELECTRICAL EQUIPMENT SHALL HAVE AN AMPERE INTERRUPTING CAPACITY (EQUIPMENT SHALL BE ARRANGED AND INSTALLED TO COMPLY WITH ALL CODE-REQUIRED, CLEARANCES. EQUIPMENT INSTALLATIONS AND PLACEMENTS SHALL COMPLY WITH NEC ARTICLE 110 FOR EQUIPMENT INSTALLATIONS AND PLACEMENTS SHALL COMPLY WITH NEC ARTICLE 110 FOR EQUIPMENT SHALL FIT INTO THOSE SPACES AS SHOWN ON THE CONTRACT DRAWINGS. CO WHICH MEETS THE SPACE REQUIREMENTS. CONTRACTOR SHALL PROVIDE ALL NECESSARY COMPONENTS REQUIRED FOR MAKING FINAL AND/OR MODIFIED UNDER CONTRACT. OWER AND CONTROL SYSTEM RACEWAYS: EXPOSED CONDUIT SHALL BE RIGID ALUMINUM CONDUIT (RAC), GRS, IMC AND EMT ARE N	 SCOPE OF WORK UNDER THIS CONTRACT UNLESS CODES INCLUDING OWNERS STANDARDS AND W ELECTRICAL SERVICE(S) AND FINAL CONNECTIONS TO COUNT TO PROVIDE ELECTRICAL POWER FOR START-UP ECA/NEIS STANDARDS. /TRADE TO ACHIEVE AN EFFICIENT AND EFFECTIVE AND/OR INSTALL EQUIPMENT SHALL BE COORDINATED IN AIC) RATINGS AS SHOWN ON THE CONTRACT DRAWINGS. MANUFACTURER-RECOMMENDED AND HEAT-DISSIPATION ALL CLEARANCE REQUIREMENTS. ONTRACTOR IS RESPONSIBLE TO PROVIDE EQUIPMENT L CONNECTIONS FOR ALL EQUIPMENT INSTALLED NOT ACCEPTABLE. CONDUIT. OR DUCTS, RACEWAY, CONDUIT, ETC., TO INCLUDE ONTRACTOR SHALL REFERENCE ALL EQUIPMENT REMENTS. IN THE DRAWINGS. CONTRACTOR SHALL DEVELOP CT, WIRE-WAY, TRENCH/FLOOR DUCT, RACEWAY, TURAL ELEMENTS. CONTRACTOR SHALL SUBMIT THESE ENGINEER REVIEW PRIOR TO INSTALLATION. INIMIZE CROSS-OVERS AND SADDLES. RACEWAY MINATIONS.
S SOLENOID VALVE S SOLENOID VALVE CIRCUIT S SOLENOID VALVE S SOLENOID VALVE CIRCUIT S SOLENOID VALVE S S SOLENOID VALVE S SOLENOID VALVE S S S SOLENOID VALVE S S S S S S S S S S S S S S S S S S S	ATION MAGNETIC MOTOR STARTER OR MOTOR PROTECTOR WITH DISCONNECT SWITCH: LEFT R DENOTES NEMA STARTER SIZE. TOP NUMBER SIZE OR MCP. BOTTOM NUMBER DENOTES SIZE. RIGHT NUMBER DENOTES NEMA ENCLOSURE.3.11.VOLTAGE NON-REVERSING MOTOR STARTER. LEFT R DENOTES NEMA STARTER SIZE.4. CA4.1. 4.1.4.1.4.1. 4.1.14.1.14.1.14.1.14.1.24.1.2	 PROVIDE FLEXIBLE RACEWAY CONNECTIONS TO ALL EQUIPMENT SUBJECT TO MOVEMENT ALL CONNECTIONS COMPLETE AND IN ACCORDANCE WITH THE SPECIFICATIONS. CONTRACTOR SHALL PROVIDE ALL REQUIRED PULL BOXES, TERMINAL BOXES AND JUNCTION ACCORDANCE WITH THE SPECIFICATIONS THOUGH ALL BOXES MAY NOT BE INDICATED OF SPARE CONDUITS SHALL BE CAPPED OR PLUGGED WITH A PVC FITTING AND INCLUDE 2000 ABLES/CONDUCTORS/WIRES: GENERAL QUANTITY AND SIZING OF CONDUCTORS, CABLING, WIRING AND RESPECTIVE RACEWAYS SELECTED STANDARD ELECTRICAL COMPONENTS OR EQUIPMENT WITH DIRECT ROUTED BY ENGINEER AND PRIOR TO INSTALLATION, LOGICAL CONDUCTOR AND RACEWAY GROUND STANDARDS AND SPECIFICATIONS WITHOUT ADDITIONAL COST TO OWNER. 	ND/OR VIBRATION. CONTRACTOR SHALL MAKE RACEWAY ON BOXES FOR INSTALLATION FOR THE WIRING SYSTEMS ON THE DRAWINGS. D# TEST POLYPROPYLENE PULL STRING. S DEPICTED ON THE DRAWINGS ARE BASED UPON CONNECTIONS. CONTRACTOR MAY SUBMIT FOR REVIEW UPINGS IN COMPLIANCE WITH APPLICABLE CODES,
Image: GROUND ROD 52 ANSI/IEE Image: DB110 RACEWAY SYSTEM CALL-OUTS: CT - CABLE TRAY BD - BUS DUCT DB - DUCTBANK EC - EXPOSED CONDUIT WW - WIRE WAY/TROUGH Image: Database of the second	4.2.1EE TYPE-52 AC POWER CIRCUIT BREAKER4.2.1 <td< td=""><td> CONTRACTOR SHALL NOT EXCEED CABLE MANUFACTURER SPECIFICATIONS FOR SIDE-V CABLES INTO RACEWAYS. CONTRACTOR SHALL DRAW POWER CABLES AND CONDUCTORS WITHIN RACEWAYS UTIL .3. NO SPLICES TO POWER CONDUCTORS AND/OR CABLING SHALL BE MADE WITHOUT ENC BELOW GRADE WITHOUT APPROVAL OF ENGINEER. POWER/BRANCH </td><td>IZING POLYWATER LUBRICANT J OR APPROVED EQUAL. GINEER APPROVAL. NO JUNCTIONS SHALL BE MADE TYPICALLY SHOWN ON THE CONTRACT DRAWINGS BUT ICE FITTINGS, BRACES OR BRACKETS FOR CONDUIT AND BE PROVIDED AND INSTALLED WITH ASSOCIATED ARDS, PANELBOARDS, TRANSFORMERS, CONTROL PANELS,</td></td<>	 CONTRACTOR SHALL NOT EXCEED CABLE MANUFACTURER SPECIFICATIONS FOR SIDE-V CABLES INTO RACEWAYS. CONTRACTOR SHALL DRAW POWER CABLES AND CONDUCTORS WITHIN RACEWAYS UTIL .3. NO SPLICES TO POWER CONDUCTORS AND/OR CABLING SHALL BE MADE WITHOUT ENC BELOW GRADE WITHOUT APPROVAL OF ENGINEER. POWER/BRANCH 	IZING POLYWATER LUBRICANT J OR APPROVED EQUAL. GINEER APPROVAL. NO JUNCTIONS SHALL BE MADE TYPICALLY SHOWN ON THE CONTRACT DRAWINGS BUT ICE FITTINGS, BRACES OR BRACKETS FOR CONDUIT AND BE PROVIDED AND INSTALLED WITH ASSOCIATED ARDS, PANELBOARDS, TRANSFORMERS, CONTROL PANELS,
ADDITIONAL SYMBOLS NOT SHOWN ON THIS DRAWING MAY BE SHOWN ELSEWHERE ON THE ELECTRICAL DRAWINGS. 5 ANSI/IEEE DEVICE NUMBERS 6 LIGHTIN (27) UNDER VOLTAGE (59) OVER VOLTAGE (6) LIGHTIN (38) BEARING PROTECTION (74) ALARM RELAY (74) ALARM RELAY (74) ALARM RELAY (74) (46) PHASE UNBALANCE (81) FREQUENCY (11)	AND THE UTILIZED FOR THIS PROJECT. S NOT SHOWN ON THIS DRAWING MAY BE SHOWN ELSEWHERE DRAWINGS. IF REQUIRED, IEC RATINGS WILL INCLUDE THE IX. NG SYMBOLS UGHT FIXTURES (VARIOUS TYPES) - UPPERCASE 6. RE 6.1. 6.1 6.2 6.2	STRUCTURAL MEMBERS SHALL NOT BE DRILLED, CUT, WELDED TO, OR OTHERWISE MODIFIE RECORD. ECEPTACLES/SWITCHES: GENERAL 1.1 INDOORS OR NON PROCESS AREAS SHALL BE INSTALLED CONCEALED AND FLUSH WITH 1.2 OUTDOORS OR IN PROCESS AREAS SHALL BE INSTALLED WITHIN WEATHER-PROOF, CO IN-USE AND/OR WATER-TIGHT DEVICE COVER PLATES. RECEPTACLES/GROUND FAULT CURRENT INTERRUPTING (GFCI) 2.1 SHALL BE INDIVIDUAL GFCI RECEPTACLE DEVICES RATED FOR 20A/120V WITH LED PO 2.2 GFCI RECEPTACLE DEVICES SHALL NOT SHARE NEUTRAL CONDUCTORS ON THREE-PHA	H STAINLESS-STEEL DEVICE COVER PLATES. DRROSION RESISTANT DEVICE BOXES WITH METALLIC WER INDICATOR.
TIMED GROUND FAULT	TYPE, REFER TO LIGHTING SCHEDULE OR NOTES. NUMBER DENOTES LIGHTING PANEL CIRCUIT.	SEWER SCREENING SYSTEM FOR DETENTION CENTER ELECTRICAL ELECTRICAL NOTES, ABBREVIATIONS AND SYMBOLS	PROJ. START DATE: 2020, DEC MC 01024-0179 DRAWN JG NA NA VERTICAL: NA NIA Q REVISION STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION

I:\01024\0179\WATER\80-DRAWINGS\ELECTRICAL\E00.0 ELECTRICAL.DWG 12/17/2020 09:48:42 DOREEN PADGETT

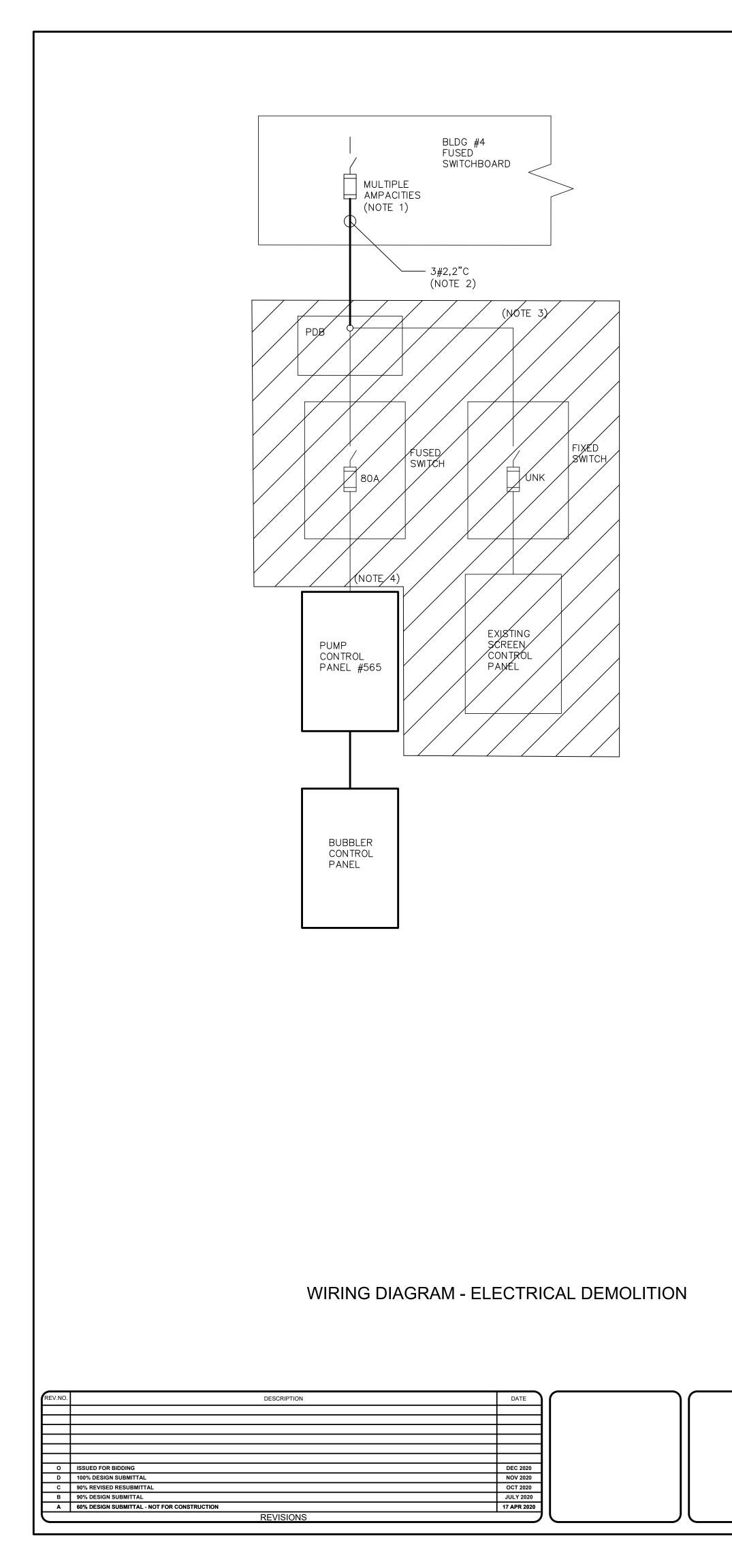


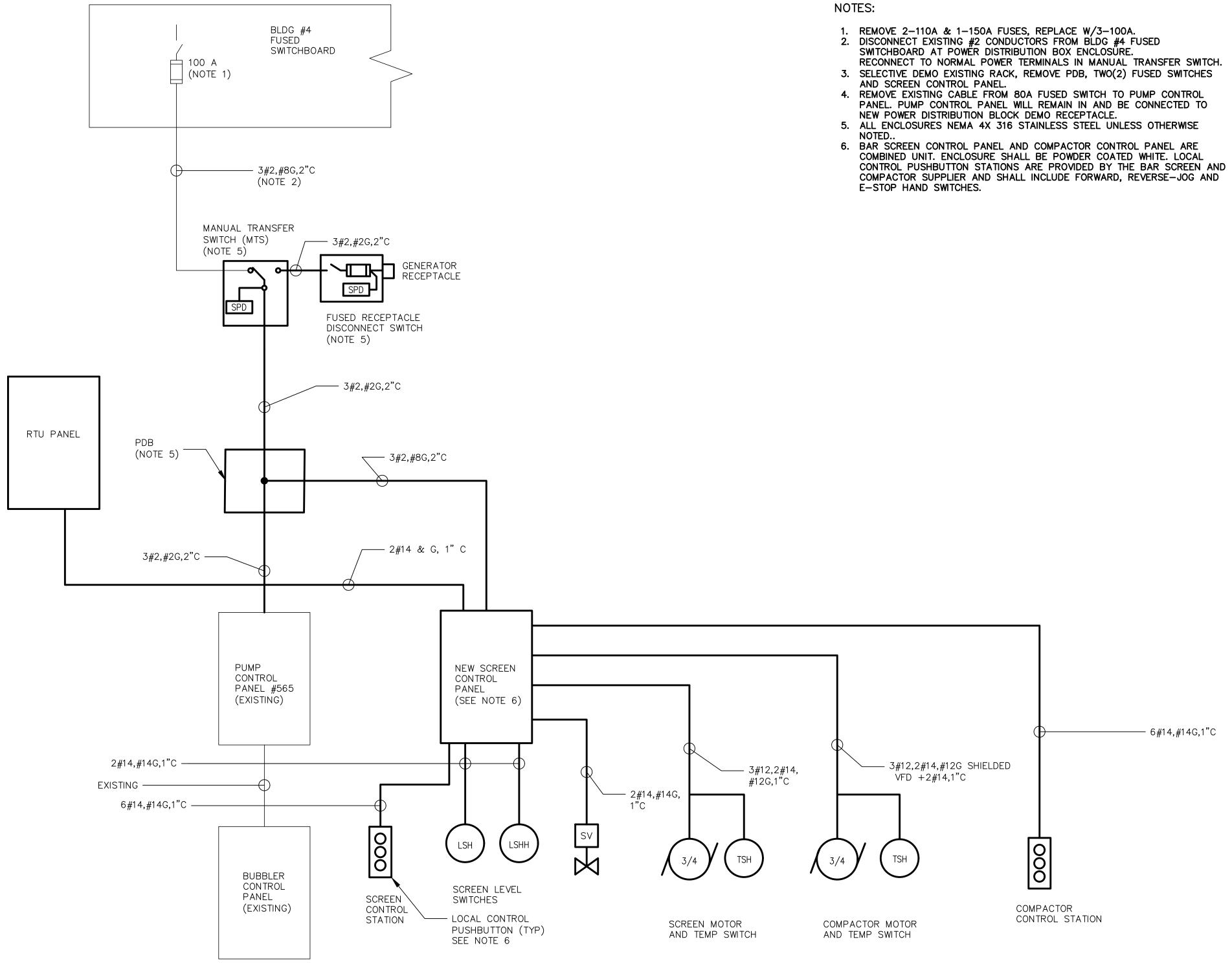


1. UTILIZE WIRING DIAGRAM ON SHEET E00.2 FOR RACK CONDUIT & CABLE REQUIREMENT.

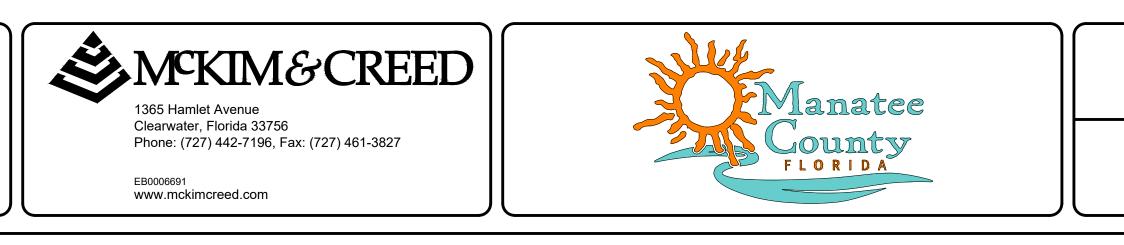
SEWER SCREENING SYSTEM FOR DETENTION CENTER	PROJ. START DATE: MCE PROJ. # DRAWN DESIGNED CHECKED	2020, DEC 01024-0179 JG MF MF	SCALE HORIZONTAL: AS NOTED VERTICAL:	E00.1
ELECTRICAL ELECTRICAL PLAN	PROJ. MGR.	s∟ ISSUI	ED FOR BID	

I:\01024\0179\WATER\80-DRAWINGS\ELECTRICAL\E00.5 INSTRUMENTATION 1.DWG 12/17/2020 09:49:06 DOREEN PADGETT



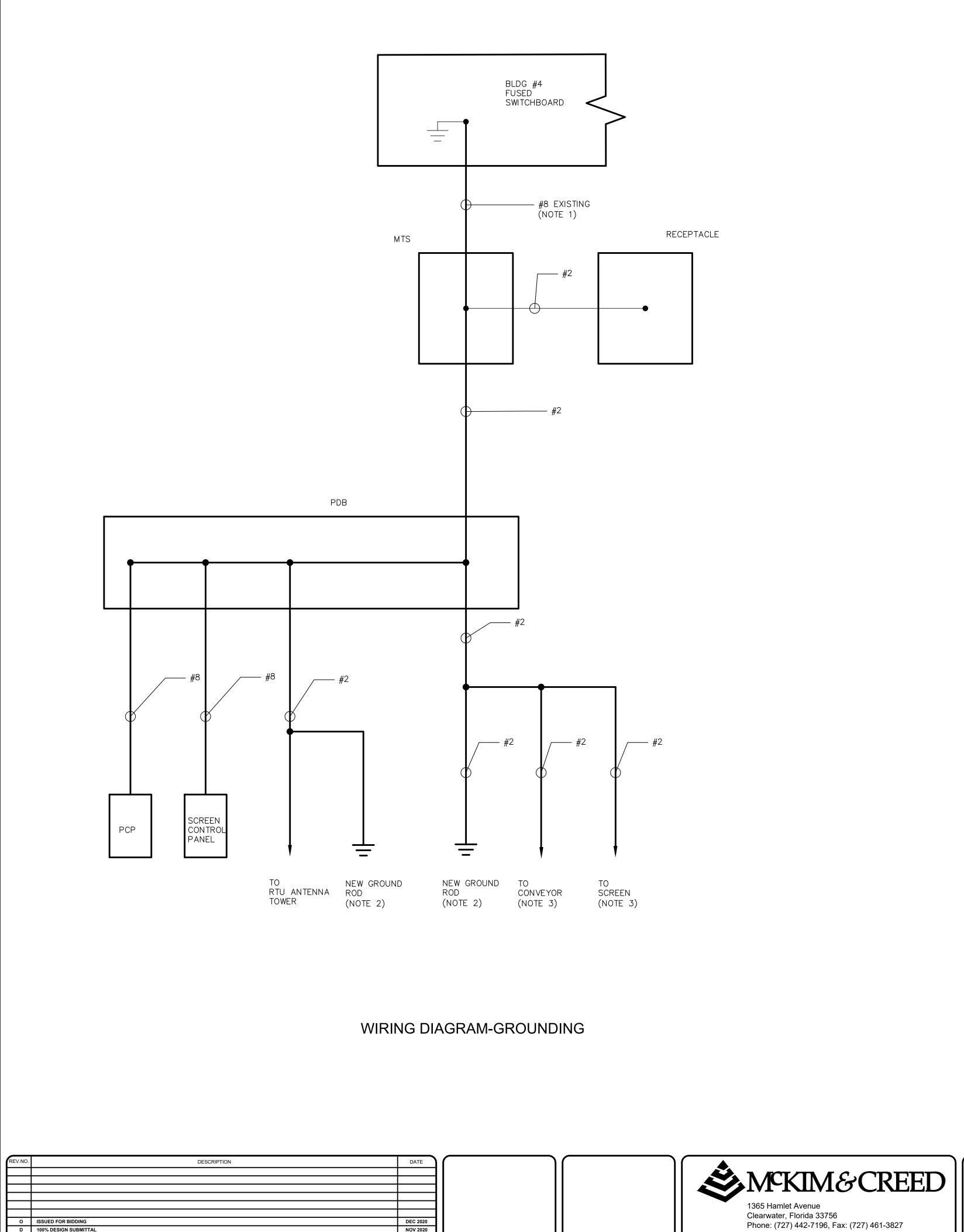


WIRING DIAGRAM - NEW ELECTRICAL



SEWER SCREENING SYSTEM FOR DETENTION CENTER	PROJ. START DATE: 2020, DEC MCE PROJ. # 01024-0179 DRAWN JG DESIGNED MF CHECKED MF SCALE HORIZONTAL: N/A VERTICAL:
ELECTRICAL WIRING DIAGRAMS-ELECTRICAL	CHECKED Imilian PROJ. MGR. SL N/A O STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION

I:\01024\0179\WATER\80-DRAWINGS\ELECTRICAL\E00.0 SINGLE LINE DIAGRAM.DWG 12/17/2020 09:49:20 DOREEN PADGETT



 O
 ISSUED FOR BIDDING

 D
 100% DESIGN SUBMITTAL

 C
 90% REVISED RESUBMITTAL

 B
 90% DESIGN SUBMITTAL
 A 60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION

REVISIONS

DEC 2020 NOV 2020 OCT 2020 JULY 2020 17 APR 2020

EB0006691 www.mckimcreed.com



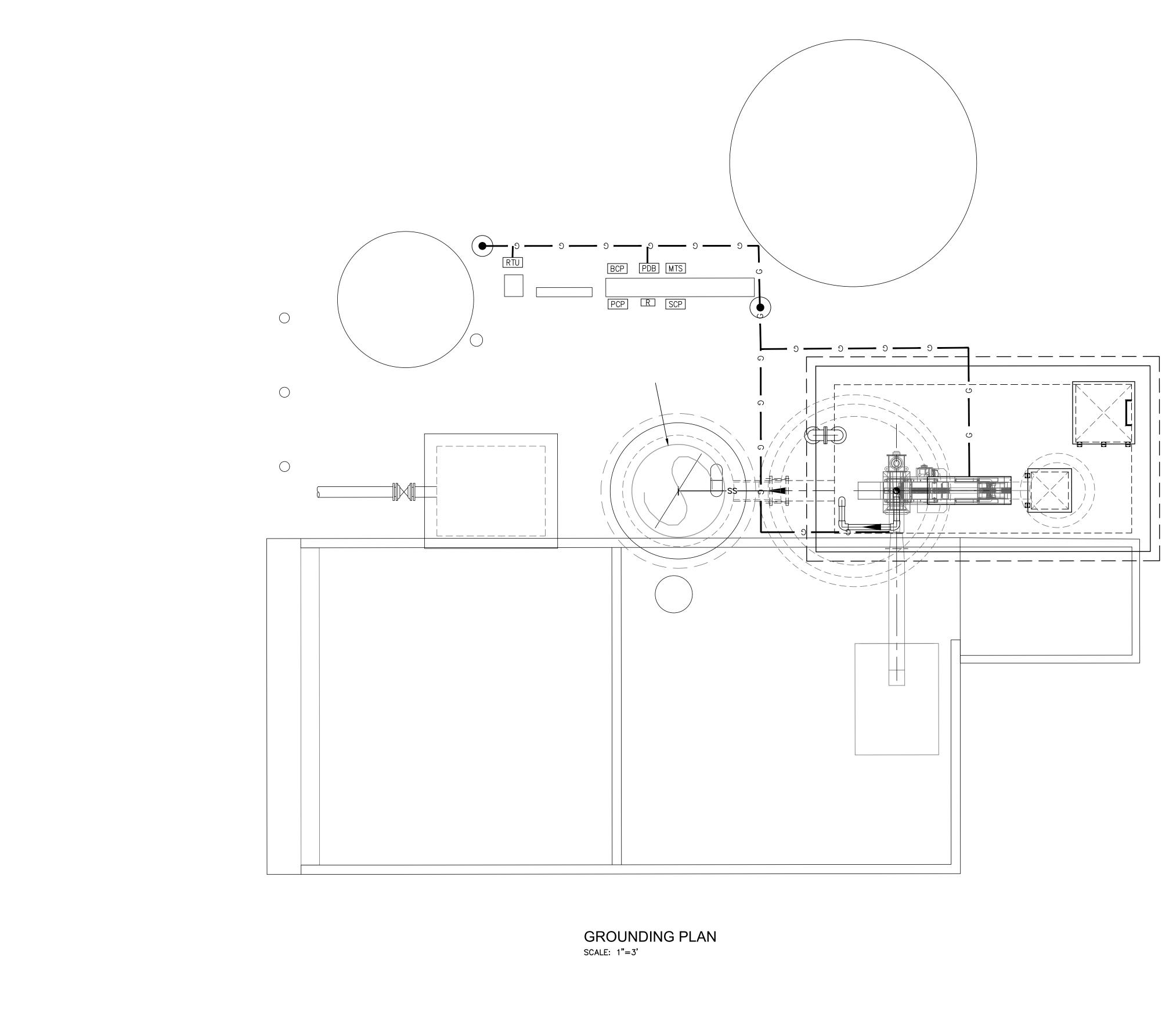
NOTES:

- RECONNECT EXISTING GROUNDING CONDUCTOR FROM PDB TO NEW MTS.
 PROVIDE INTERCONNECTED GROUNDING CONDUCTOR TO ALL EQUIPMENT AND RODS.
- 3. CONNECT GROUNDING CONDUCTOR TO DEVICE.

SEWER SCREENING SYSTEM FOR **DETENTION CENTER**

ELECTRICAL WIRING DIAGRAM-GROUNDING

STATUS:			
PROJ. MGR.	SL	N/A	
CHECKED	MF	VERTICAL:	
DESIGNED	MF	N/A	DRAWING NUMBER
DRAWN	JG	HORIZONTAL:	
MCE PROJ. #	01024-0179		E00.3
PROJ. START DATE:	2020, DEC	SCALE	

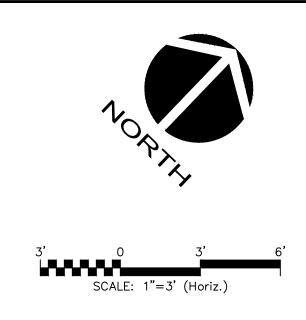


REV.NO.	DESCRIPTION	DATE
0	ISSUED FOR BIDDING	DEC 2020
D	100% DESIGN SUBMITTAL	NOV 2020
С	90% REVISED RESUBMITTAL	OCT 2020
В	90% DESIGN SUBMITTAL	JULY 2020
Α	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020
	REVISIONS	

		_







NOTES:

1. SEE GROUNDING WIRING DIAGRAM FOR CONDUCTOR SIZING AND MINIMUM CONNECTION LOCATIONS.

SEWER SCREENING SYSTEM FOR **DETENTION CENTER**

ELECTRICAL **GROUNDING PLAN**

	BIGNED ECKED	MF MF	AS NOTED VERTICAL:	
DRA	AWN	JG	HORIZONTAL: AS NOTED	
	DJ. START DATE	E: 2020, DEC 01024-0179	SCALE	Enc



ELECTRICAL RACK NORTH DEMO NOT TO SCALE

REV.NO.	DESCRIPTION	DATE
0	ISSUED FOR BIDDING	DEC 2020
D	100% DESIGN SUBMITTAL	NOV 2020
С	90% REVISED RESUBMITTAL	OCT 2020
в	90% DESIGN SUBMITTAL	JULY 2020
Α	60% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020
	REVISIONS	





ELECTRICAL RACK SOUTH DEMO

LEGEND





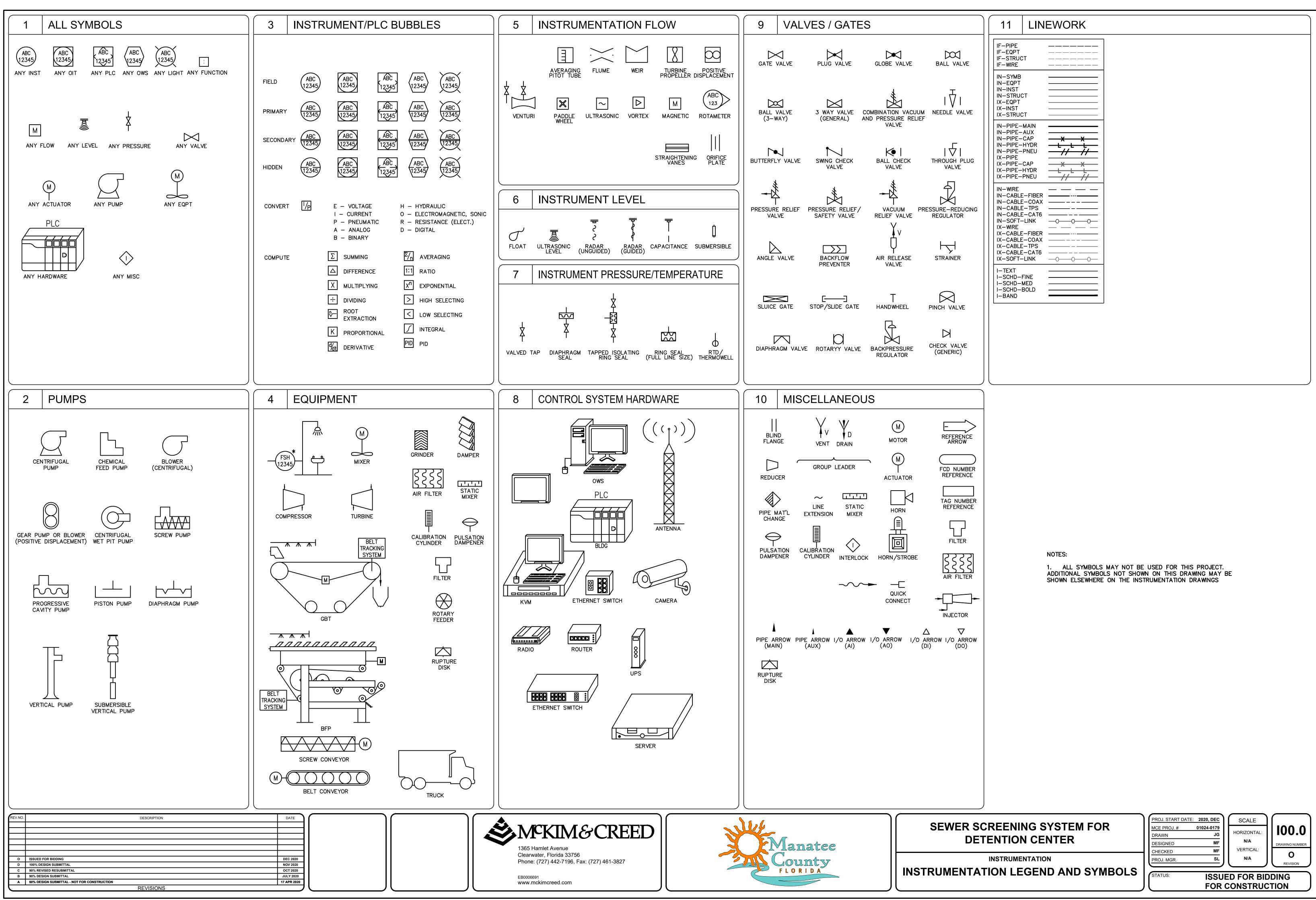


SEWER SCREENING SYSTEM FOR
DETENTION CENTER

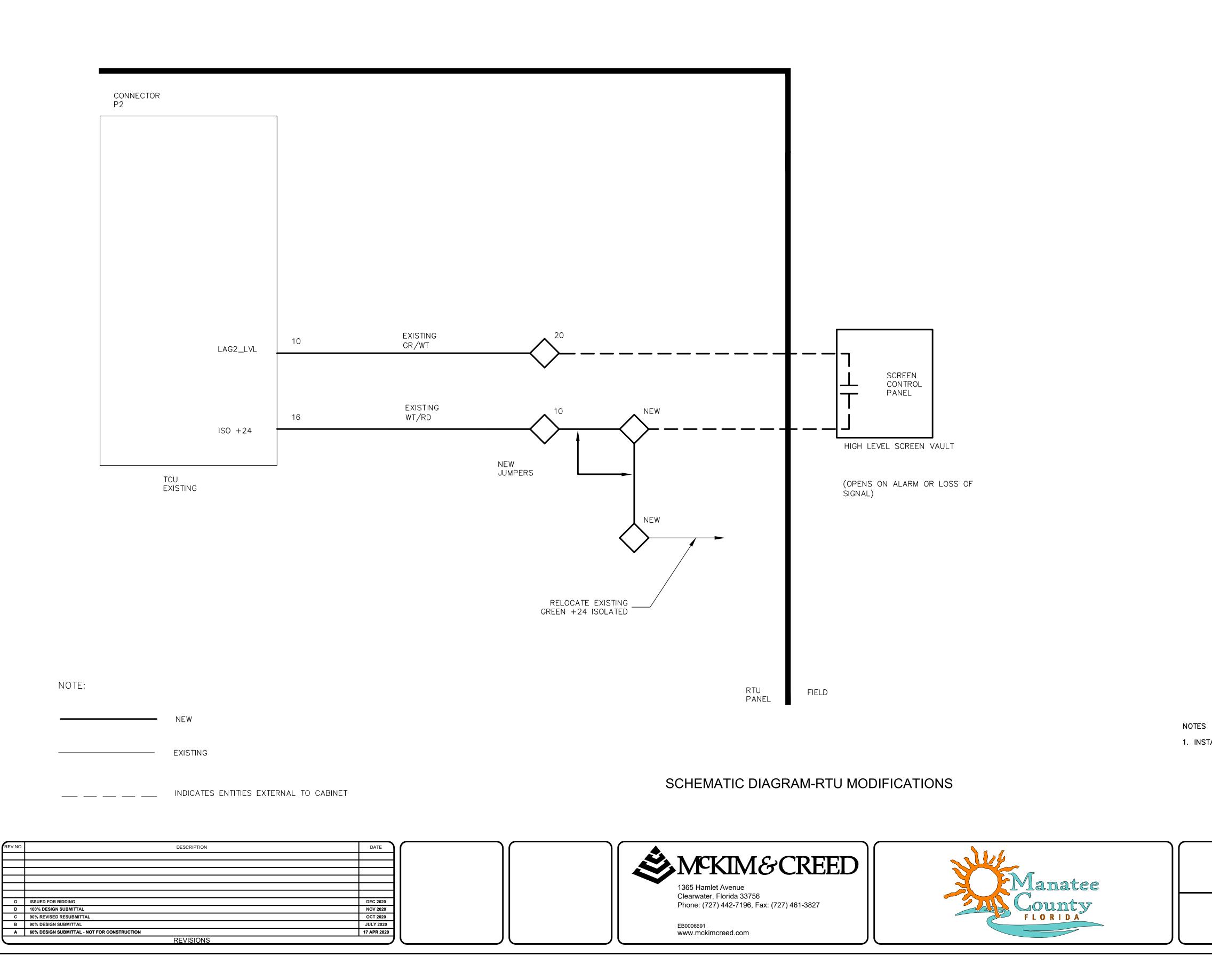
ELECTRICAL DEMOLITION

PROJ. START DATE	2020, DEC	SCALE		
MCE PROJ. # DRAWN	01024-0179 JG	HORIZONTAL:	E00.5	
DESIGNED	MF	N/A	DRAWING NUMBER	
CHECKED	MF	VERTICAL:		
PROJ. MGR.	SL	N/A	REVISION	
			REVISION	
STATUS: ISSUED FOR BIDDING FOR CONSTRUCTION				

I:\01024\0179\WATER\80-DRAWINGS\ELECTRICAL\E00.5 DEMOLIATION.DWG 12/17/2020 09:50:14 DOREEN PADGETT



I:\01024\0179\WATER\80-DRAWINGS\INSTRUMENTATION\INSTRUMENTATION LEGEND AND SYMBOLS.DWG 12/17/2020 09:50:32 DOREEN PADGETT



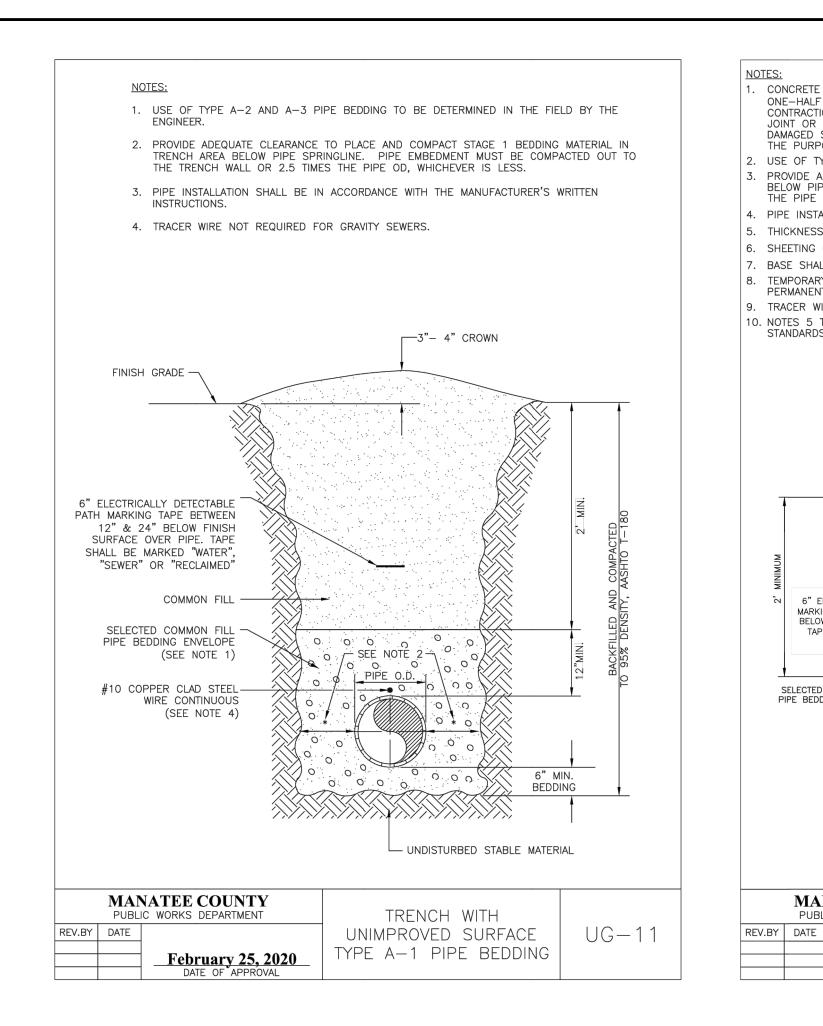
I:\01024\0179\WATER\80-DRAWINGS\ELECTRICAL\E00.2 RTU WIRING.DWG 12/17/2020 09:50:45 DOREEN PADGETT

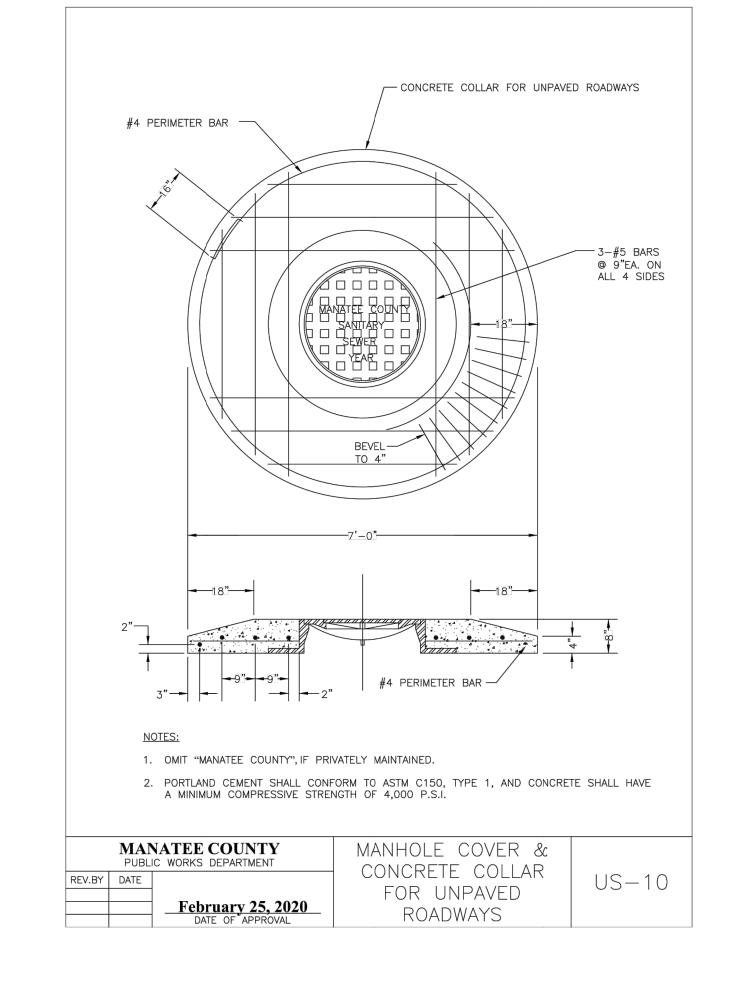
INSTRUMENTATION
SCHEMATIC DIAGRAM - RTU
MODIFICATIONS

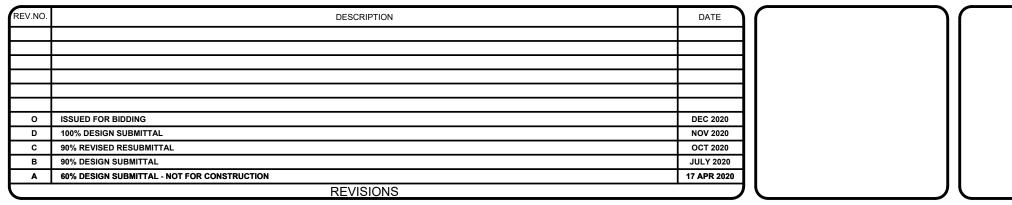
SEWER SCREENING SYSTEM FOR **DETENTION CENTER**

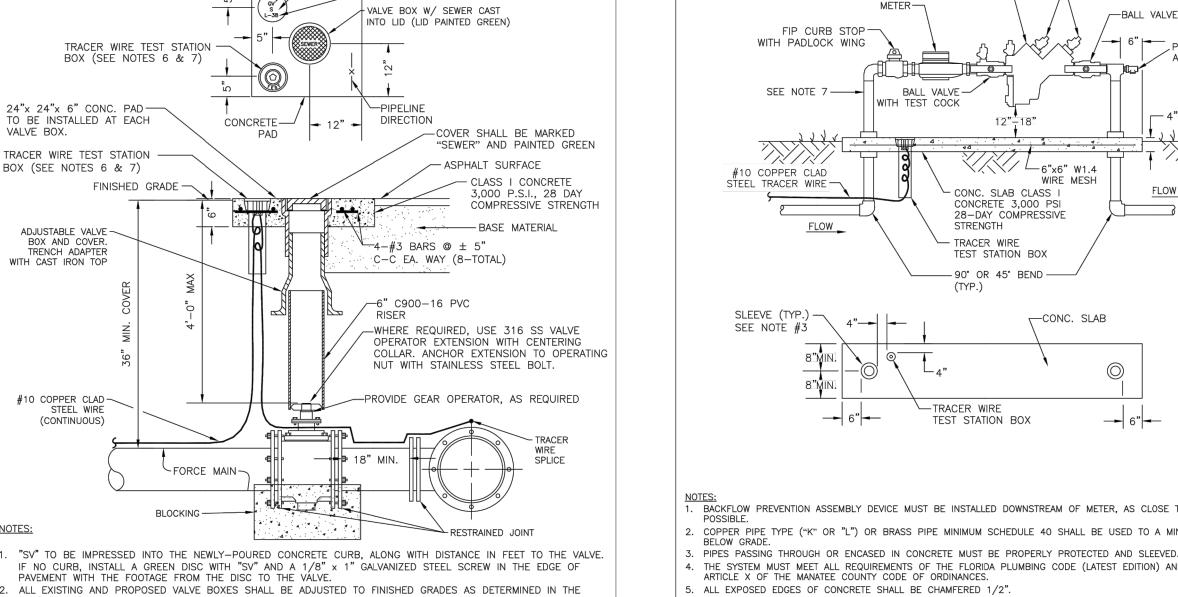
PROJ. START DATE: 2020, DEC SCALE MCE PROJ. # 100.1 01024-0179 HORIZONTAL: DRAWN JG N/A DESIGNED MF DRAWING NUMBER VERTICAL: MF CHECKED 0 SL N/A PROJ. MGR. REVISION **ISSUED FOR BIDDING** STATUS: FOR CONSTRUCTION

1. INSTALL INSTRUMENTATION PER MANATEE STANDARD DETAILS.

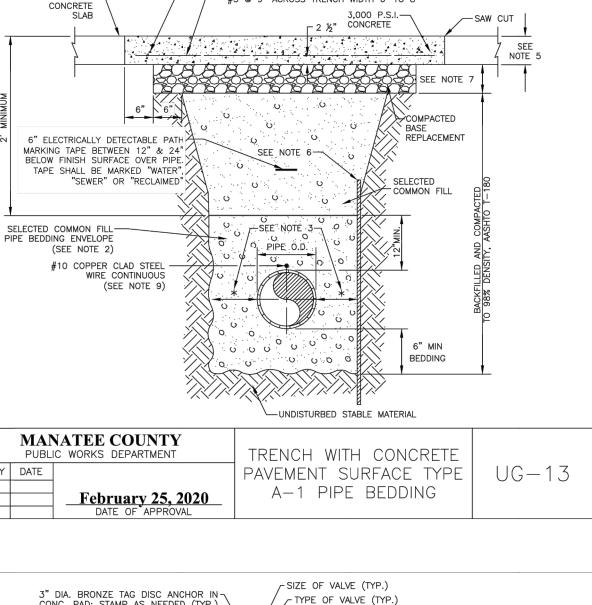








US-11



- SERVICE TYPE-"S"(SEWER)- (PLANT VALVE ID#)

DIRECTION & NO. OF TURNS TO OPEN (TYP.)

CONC. PAD; STAMP AS NEEDED (TYP

VALVES SHALL NOT BE PLACED IN HANDICAPPED RAMPS, CURBS OR GUTTERS.

. USE NON-TRAFFIC RATED BOXES FOR NORMAL YARD SERVICE. WHERE VALVE WILL BE IN STREET OR PARKING UNDER VEHICLE TRAFFIC, USE TRAFFIC RATED BOXES. WHERE POSSIBLE, LOCATE TRACE WIRE TESTING STATION

TRACER WIRE BOX SHALL BE LOCATED OUTSIDE THE ROADWAY ON THOROUGHFARES, LOCAL ARTERIAL AND STATE

THE BRASS TAG SHALL HAVE A "PLANT VALVE ID# WHEN VALVES ARE INSTALLED WITHIN THE COUNTY TREATMENT

PLANT LIMITS. THE PLANT VALVE ID# SHALL BE SHOWN ON THE CONSTRUCTION PLANS AND RECORD DRAWINGS.

REFER TO SECTION 1.11 IN THE PUBLIC WORKS UTILITY STANDARDS MANUAL FOR FURTHER DETAILS.

OUTSIDE OF TRAVEL LANE OR IN MEDIAN, CENTERED IN SEPARATE CONCRETE PAD SIMILAR TO STANDARD VALVE BOX

VALVE, BOX,

COVER AND TAG

PRECAST CONCRETE PADS AND THRUST BLOCKS SHALL NOT BE USED.

ALL EXPOSED EDGES OF CONCRETE SHALL BE CHAMFERED 1/2".

February 25, 2020

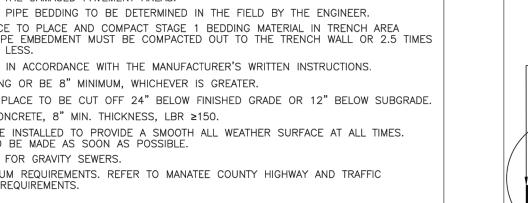
MANATEE COUNTY

PUBLIC WORKS DEPARTMENT

NOTES

ROADWAYS.

REV.BY DATE



1. CONCRETE PAVEMENT SHALL BE REMOVED WITH SAWED EDGES AND CUT AT A MINIMUM DEPTH OF ONE AND ONE-HALF (1-1/2"). IF A SAW CUT IN CONCRETE PAVEMENT FALLS WITHIN THREE FEET (3') OF A CONTRACTION JOINT, COLD JOINT, EXPANSION JOINT OR EDGE, THE CONCRETE SHALL BE REMOVED TO THE JOINT OR EDGE. THE EDGES OF EXISTING CONCRETE PAVEMENT ADJACENT TO TRENCHES, WHICH HAD BEEN DAMAGED SUBSEQUENT TO SAW CUTTING OF PAVEMENT, SHALL BE SAW CUT TO NEAT STRAIGHT LINES FOR THE PURPOSE OF REMOVING THE DAMAGED PAVEMENT AREAS.

USE OF TYPE A-2 AND A-3 PIPE BEDDING TO BE DETERMINED IN THE FIELD BY THE ENGINEER. PROVIDE ADEQUATE CLEARANCE TO PLACE AND COMPACT STAGE 1 BEDDING MATERIAL IN TRENCH AREA BELOW PIPE SPRINGLINE. PIPE EMBEDMENT MUST BE COMPACTED OUT TO THE TRENCH WALL OR 2.5 TIMES THE PIPE OD, WHICHEVER IS LESS.

PIPE INSTALLATION SHALL BE IN ACCORDANCE WITH THE MANUFACTURER'S WRITTEN INSTRUCTIONS. THICKNESS TO MATCH EXISTING OR BE 8" MINIMUM, WHICHEVER IS GREATER.

6. SHEETING ORDERED LEFT IN PLACE TO BE CUT OFF 24" BELOW FINISHED GRADE OR 12" BELOW SUBGRADE. 7. BASE SHALL BE CRUSHED CONCRETE, 8" MIN. THICKNESS, LBR ≥150.

8. TEMPORARY PATCHES WILL BE INSTALLED TO PROVIDE A SMOOTH ALL WEATHER SURFACE AT ALL TIMES. PERMANENT REPLACEMENT TO BE MADE AS SOON AS POSSIBLE.

- #4 @ 15" PARALLEL WITH TRENCH

-#5 @ 15" ACROSS TRENCH WIDTH UP TO 4'

5 @ 9" ACROSS TRENCH WIDTH 6' TO 8'

@ 12" ACROSS TRENCH WIDTH 4' TO 6'

TRACER WIRE NOT REQUIRED FOR GRAVITY SEWERS.

10. NOTES 5 THRU 8 ARE MINIMUM REQUIREMENTS. REFER TO MANATEE COUNTY HIGHWAY AND TRAFFIC STANDARDS FOR ADDITIONAL REQUIREMENTS.

- RAINWATER INSERT SFALANT STRIPFS: MIN. WITH GASKET 3" WIDE x 1/2" THICK - EXTERNAL HEAT SHRINK MIN. JOINT WRAP (18" MIN.) PRECAST MANHOLE SHALL -INTERNAL JOINT -HAVE POLYMER CONCRETE, - INTERNAL JOINT SEALANT MIN. 9,000 P.S.I. 28 DAY SEALANT COMPRESSIVE STRENGTH CONFORMING TO ASTM C-497 GASKETED TONGUE AND <u>GROOVE SMOOTH WALL JOINT</u> GASKETED BE RUBBER -<u>⊷</u>^. - RUBBER AND SPIGOT JOIN GASKET GASKET EXTERNAL NON-SHRINK -LIFT HOLES OR INSERTS -4'-0" DIA. (8"-16" PIPE) SHALL NOT PENETRATE JOINT WRAP (12" MIN.) 5'-0" DIA. (LARGER THAN 16") MANHOLE WALL PRE-CAST POLYMER-NEW MANHOLES SHALL HAVE -SECTIONS FACTORY-BUILT BENCH AND CHANNEL FLOW DETAILS CHANNEL BE MADE OF POLYMER CONCRETE - GROUT INVERTS ANNULAR ALL PIPE PENETRATIONS -SPACE USING NON-SHRINK POLYMER GROUT SHALL HAVE CAST-IN Α RESILIENT CONNECTOR MEETING ASTM C923. W/ 316 SS HARDWARE & CONNECTOR BANDS OR GREATER FLOW 12" MIN. #57 STONE PLACED ON SOIL 6" MIN. COMPACTED TO 98% 12" 8" MIN. BEDDING DENSITY. AASHTO T-180 🔆 NOTE: I. DROP MANHOLES, MANHOLES WITH OPPOSING TURBULENT FLOW (DETAILS D & E), MANHOLES UPSTREAM OF A LIFT STATION WET WELL (SEE US-17A), MANHOLES WITH GRAVITY SEWERS GREATER THAN 12 INCHES IN DIAMETER, FORCE MAIN TERMINAL MANHOLE AND THE NEXT TWO DOWNSTREAM MANHOLES SHALL BE MADE OF POLYMER CONCRETE MANHOLES SHALL HAVE A GASKETED BELL & SPIGOT OR TONGUE & GROOVE SMOOTH WALL JOINT DESIGN. . ALL JOINTS SHALL MEET THE REQUIREMENTS OF ASTM C-443 AND ASTM C-990 FOR CONCRETE SEWER AND CULVERT PIPE USING RUBBER GASKETS AND FLEXIBLE JOINT SEALANTS.

RIM ELEVATION -

PRE-CAST POLYMER

IN BUTYL RUBBER

CONCRETE RINGS SET

INDICATED ON PLAN

FRAME AND COVER, HEAVY -

THREE (3) 316 SS LOCKING

MARKED "MANATEE COUNTY

OMIT "MANATEE COUNTY" IF

SANITARY SEWER & YEAR";

DUTY COMPOSITE, MIN.

BOLTS, COVER TO BE

PRIVATELY MAINTAINED

ALL FRP/STEEL REINFORCEMENT, MANHOLE RISERS, CONES, BASES, AND FLAT LIDS SHALL BE DESIGNED BY MANUFACTURER TO MEET LOADING REQUIREMENTS OF ASTM C-478, ASTM C-857, ACI 350, AND ACI 440.1R

AS MODIFIED FOR POLYMER CONCRETE MANHOLES. MANATEE COUNTY

		NATEE COUNTY	STANDARD PRE-CAST POLYMER CONCRETE	
REV.BY	DATE			US-3
			SANITARY SEWER MANHOLE	00 0
		<u>February 25, 2020</u>	FOR TURBULENT FLOW	
		DATE OF APPROVAL		

BACKFLOW

PREVENTION

ASSEMBLY

TEST COCKS (TYP.)

FLOW

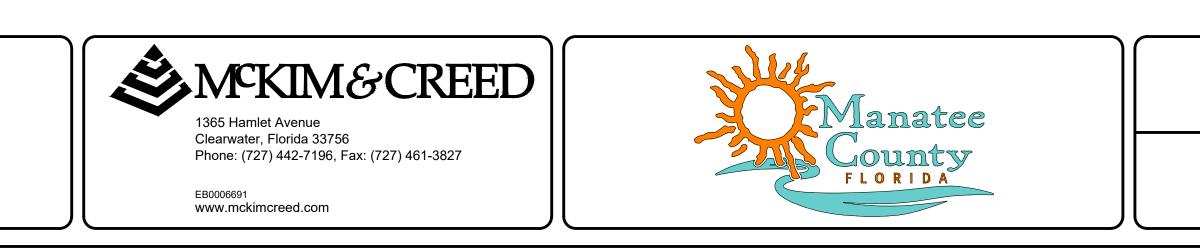
(SEE NOTE 4

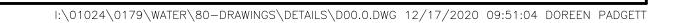
CONC. SLAB \bigcirc ━ 6" ◄ BACKFLOW PREVENTION ASSEMBLY DEVICE MUST BE INSTALLED DOWNSTREAM OF METER, AS CLOSE TO METER AS

COPPER PIPE TYPE ("K" OR "L") OR BRASS PIPE MINIMUM SCHEDULE 40 SHALL BE USED TO A MINIMUM DEPTH OF 12" PIPES PASSING THROUGH OR ENCASED IN CONCRETE MUST BE PROPERLY PROTECTED AND SLEEVED.

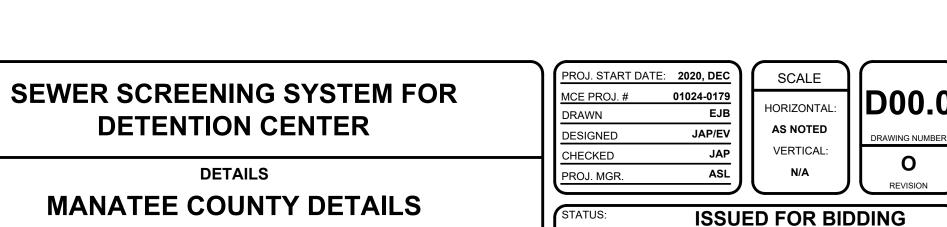
- THE SYSTEM MUST MEET ALL REQUIREMENTS OF THE FLORIDA PLUMBING CODE (LATEST EDITION) AND CHAPTER 2-31,
- ALL EXPOSED EDGES OF CONCRETE SHALL BE CHAMFERED 1/2".
- BACKFLOW PREVENTER SHALL BE TESTED AT THE TIME OF INSTALLATION. PRESSURE REDUCING VALVE REQUIRED UPSTREAM OF BACKFLOW PREVENTION ASSEMBLY, IF SYSTEM PRESSURE EXCEEDS 80 PSI. AND CLEAR OPENING FOR ACCESS FROM STREET.
- 8. 3' MIN. CLEARANCE FROM LANDSCAPING PLANTS AND 10' MIN. CLEARANCE FROM TREES TO EDGE OF CONCRETE SLAB THE WATER METER AND BACKFLOW PREVENTION ASSEMBLY SHALL BE LOCATED AT THE ROW LINE. THE BACKFLOW PREVENTION ASSEMBLY FOR PRIVATE LIFT STATIONS SHALL BE LOCATED ADJACENT TO THE ROW LINE OR WITHIN AN EASEMENT OUTSIDE OF THE FENCING.
- 0. SATELLITE LIFT STATIONS SHALL HAVE A 5/8-INCH WATER METER, WITH A 3/4-INCH REDUCED PRESSURE (RPZ) BACKFLOW PREVENTION ASSEMBLY. STATIONS WITH WETWELL DIAMETERS 12 FEET AND LARGER TO HAVE A 2-INCH METER
- AND RPZ BACKFLOW PREVENTION ASSEMBLY. 1. BACKFLOW PREVENTION ASSEMBLIES USED FOR POTABLE APPLICATIONS SHALL BE LEAD FREE AS DEFINED IN THE REDUCTION OF LEAD IN DRINKING WATER ACT, SECTION 1417 OF THE SAFE DRINKING WATER ACT, 42 U.S.C. 300g MAY BE AMENDED, AND IN COMPLIANCE WITH ALL APPLICABLE REGULATIONS

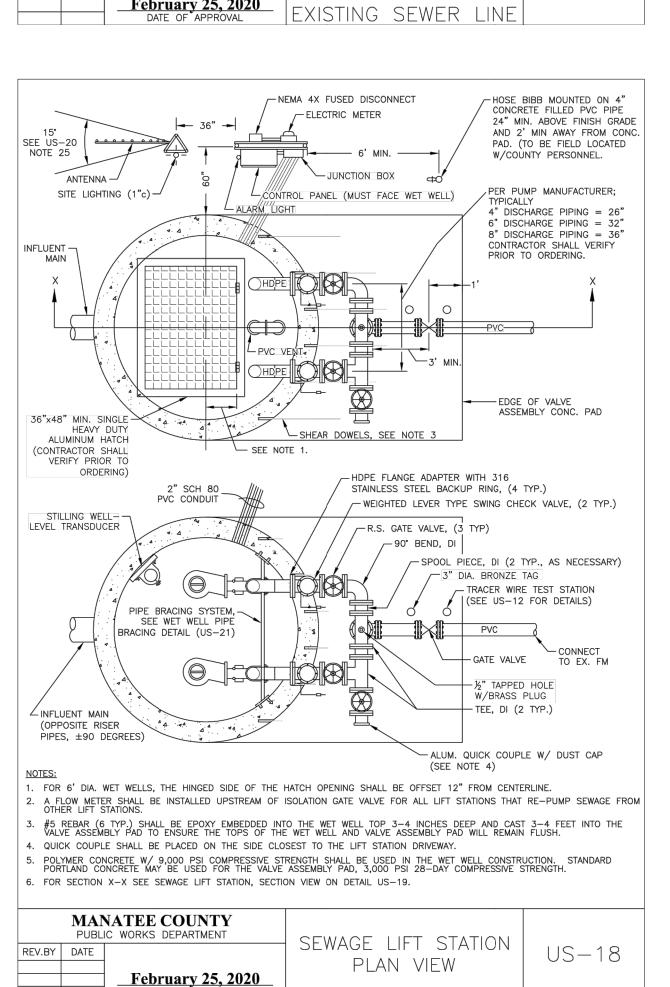
		OF LEAD IN DRINKING WATER ACT, SEC NDED, AND IN COMPLIANCE WITH ALL /	TION 1417 OF THE SAFE DRINKING WATER ACT, 42 APPLICABLE REGULATIONS	U.S.C. 300g-6, AS
		NATEE COUNTY	WATER METER & BACKFLOW PREVENTION	
REV.BY	DATE		ASSEMBLY	US-15
		February 25, 2020 DATE OF APPROVAL	FOR LIFT STATIONS	



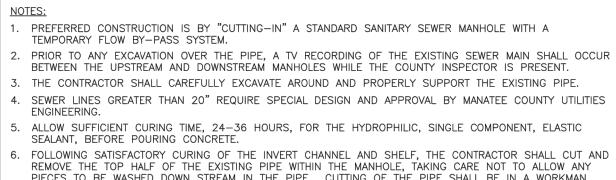


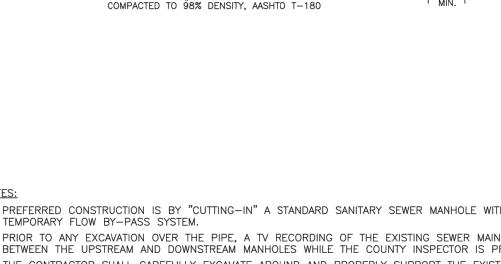
FOR CONSTRUCTION





		ER, PROVIDING A SMOOTH AND E	VEN FINISHED PRODUCT.	IN A WORKMAN
IN			LL ALSO OCCUR AFTER CONSTRUCTION WHILE SHALL NOT DEVIATE BY MORE THAN 1 INCH	
8. T	HERE SH	ALL BE NO VISIBLE LEAKS IN THE	MANHOLE.	
		NATEE COUNTY	SANITARY SEWER	
		C WORKS DEPARTMENT	MANHOLE	
REV.BY	DATE			US-5
			CONSTRUCTED OVER	0000
		February 25, 2020 DATE OF APPROVAL	EXISTING SEWER LINE	





WATERSTOP

12" MIN. #57 STONE PLACED ON SOIL -

4'-0" DIA. (8"-15"PIPE)

- WATERSTOP: 1/2"x1" BEAD OF -

YDROPHILIC, SINGLE COMPONENT,

ELASTIC SEALANT. CAST MANHOLE

SECTION AROUND PIPE

5'-0" DIA. (16"-2

FORM JOINT TO RECEIVE

PRE-CAST RISER MANHOLE

DETAIL US-2 FOR JOINTS),

TYPE OF CONCRETE, AND

COMPRESSIVE STRENGTH,

-CONSTRUCT STANDARD

MANHOLE INVERT AND

SHELF TO THE SPRING

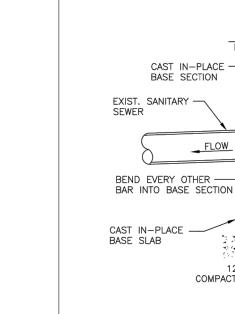
∽#4 @ 9°C.C

BOTH WAYS

LINE OF THE PIPE

ETC.)

AND GASKETS (SEE STD



CAST IN-PLACE -

FLOW

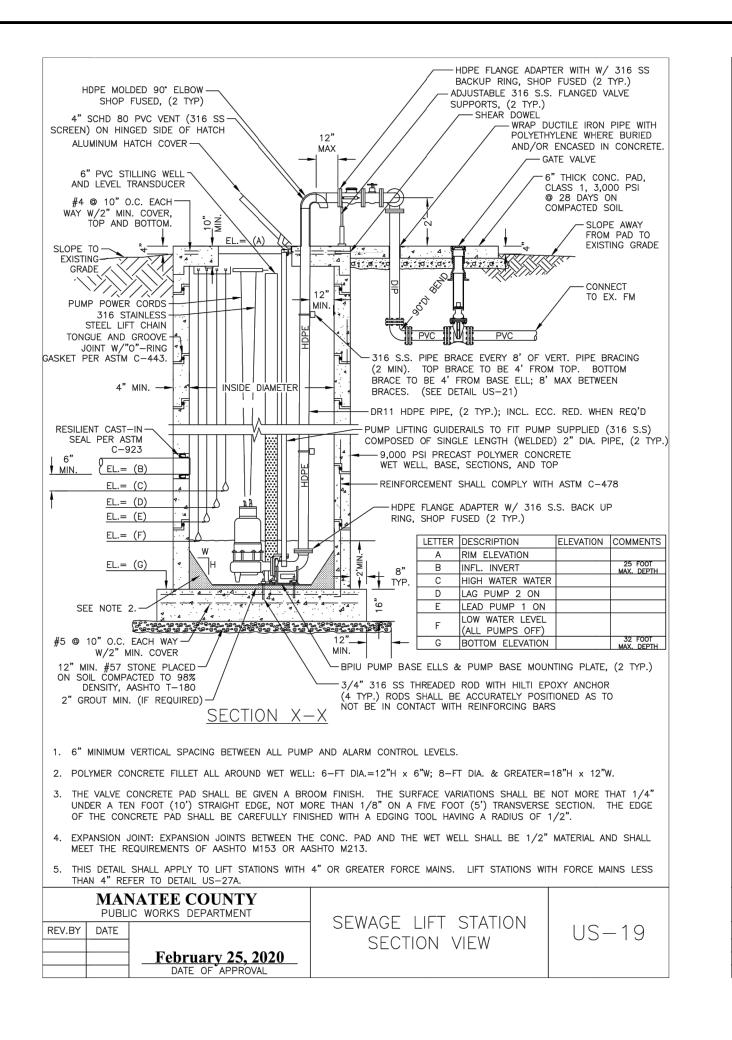
BASE SECTION

-FINISH GRADE

- ENCASE RIBS IN CEMENT

MORTAR COLLAR ALL AROUND

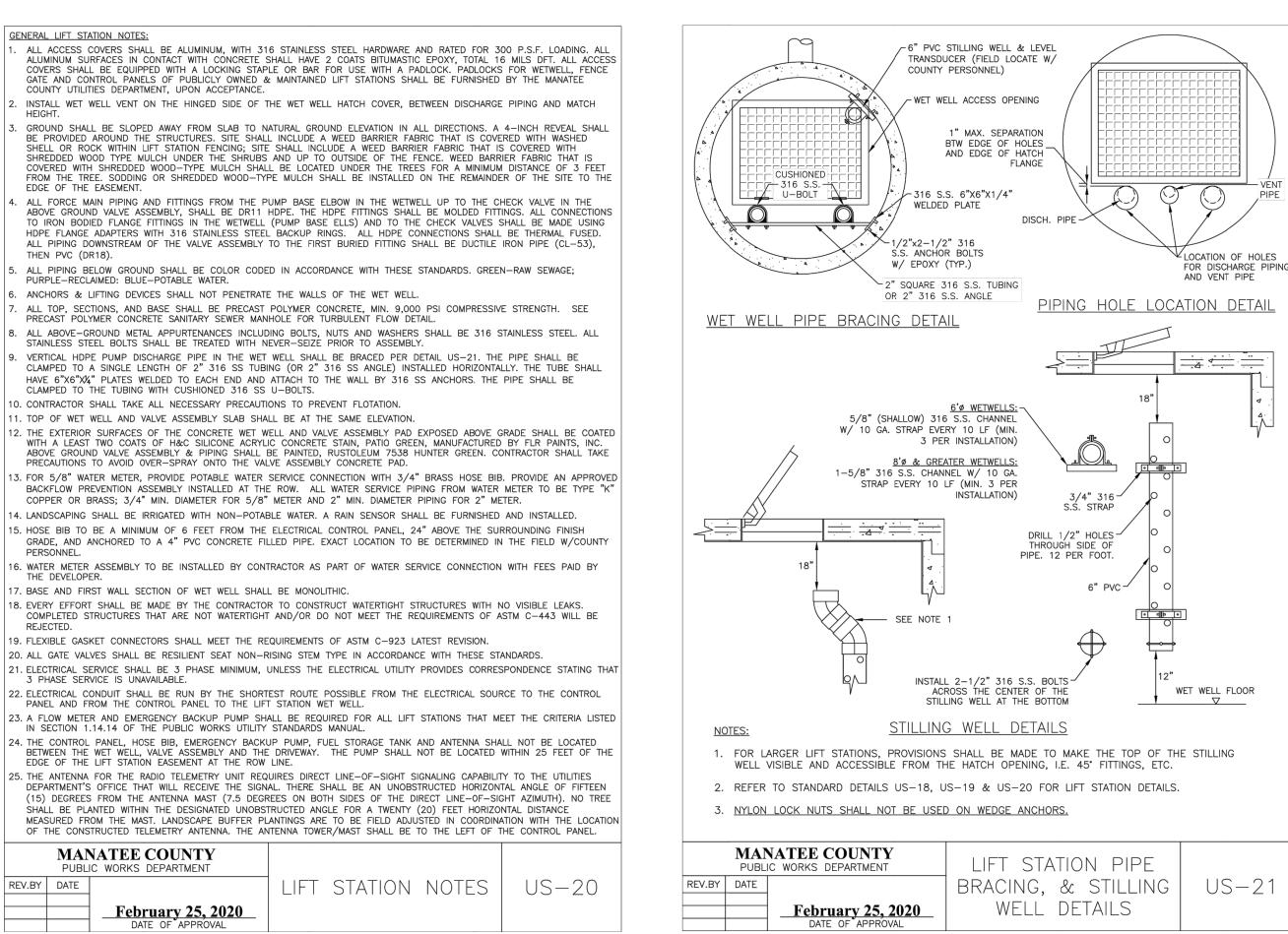
/--- 6" ---- PRESSURE RELIEF VALVE AS PER FPC 607.3



HFIGH

REJECTED.

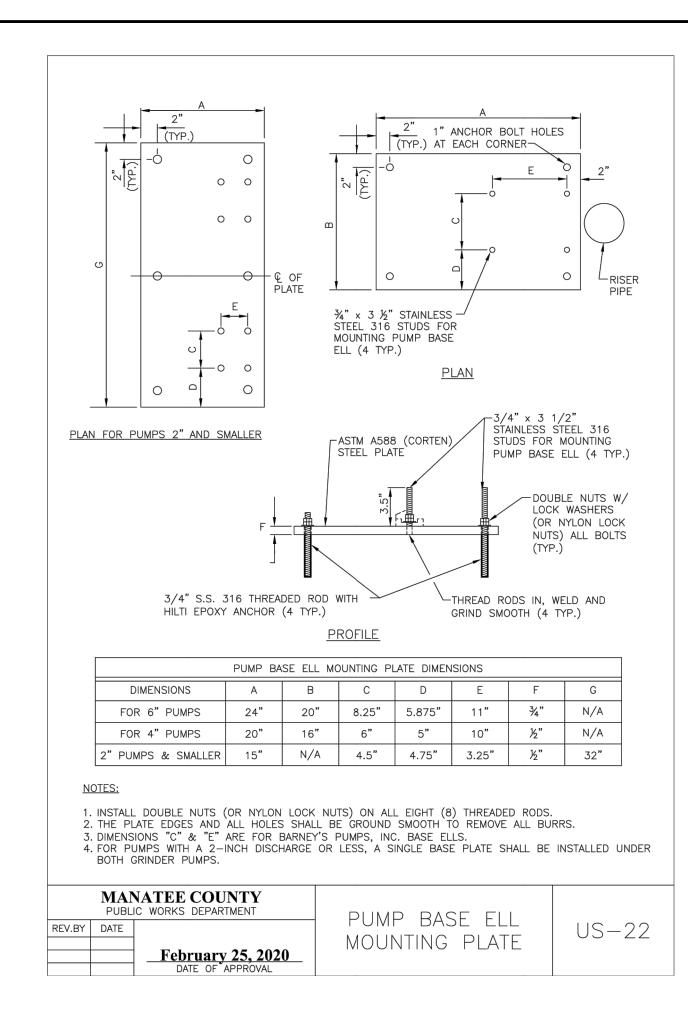
REV.NO.	DESCRIPTION	DATE
O IS	SUED FOR BIDDING	DEC 2020
D 10	0% DESIGN SUBMITTAL	NOV 2020
C 90	% REVISED RESUBMITTAL	OCT 2020
В 90	% DESIGN SUBMITTAL	JULY 2020
A 60	% DESIGN SUBMITTAL - NOT FOR CONSTRUCTION	17 APR 2020
	REVISIONS	



NOTE: 1. LIFT STATION DETAILS ARE PROVIDED FOR REFERENCE TO APPLICABLE ELEMENTS, REFER TO SHEET MOOO.3 FOR EXTENT OF WORK







DETAILS MANATEE COUNTY DETAILS

STATUS:	ISSUI		
PROJ. MGR.	ASL	N/A	В
CHECKED	ASL	VERTICAL:	
DESIGNED	AFS	AS NOTED	DRAWING NUMBER
DRAWN	DMP	HORIZONTAL:	D00.1
MCE PROJ. #	01024-0179		
PROJ. START DA	TE: 2020, DEC	SCALE	

I:\01024\0179\WATER\80-DRAWINGS\DETAILS\D00.0.DWG 12/17/2020 09:51:12 DOREEN PADGETT