

# CITY OF TURLOCK

## REGIONAL WATER QUALITY CONTROL FACILITY

### IN-PLANT WASTE LINE REPAIR

### CITY PROJECT NO. 23-030

#### LEGEND:

(335.21)	EXISTING ELEVATION
AC	ASPHALTIC CONCRETE
ACE	ASPHALT CONCRETE EDGE
C	CONCRETE
CE	CONCRETE EDGE
CIRP	CURED-IN-PLACE PIPE
CW	CONCRETE WALL
E	ELECTRICAL OR EAST
EG	EXISTING GROUND
EXIST	EXIST
FF	FINISH FLOOR
FL	FLOWLINE
GFL	GUTTER FLOWLINE
GRA	GRAVEL SPOT SHOT
HWS	HOT WATER SUPPLY
LIP	LIP OF GUTTER
T	TURF
MISC	MISC SEE NOTE
MH	MANHOLE
MOW	MOWSTRIP
N	NORTH
NE	NORTHEAST
RW	RAW WASTEWATER
S	SEWER OR SOUTH
SDFL	STORM DRAIN FLOWLINE
SDGR	STORM DRAIN GRATE
SDTH	SEWER TRENCH
SW	SOUTHWEST
TC	TOP OF CURB
UTH	UNIDENTIFIED TRENCH/SCAR LINE
VGFL	VALLEY GUTTER FLOWLINE
VGR	VALLEY GUTTER
W	WATER OR WEST
△12.55	SURVEY CONTROL POINT
○2"ELC	DOOR/GATE
○EPC	ELECTRICAL CONDUIT
○EPM	ELECTRICAL MANHOLE
○EPP	ELECTRICAL PANEL
○ICB	IRRIGATION CONTROLLER
○ICD	STORM DRAIN MANHOLE
○ICD	SEWER CLEANOUT
○ICD	SEWER MANHOLE
○ICD	TREE; SPREAD SHOWN GRAPHICALLY AND TRUNK DIAMETER AS SHOWN
○HB	WATER HOSE BIB
○MV	WATER METER
○MV	WATER VALVE
ASPH	ASPHALT CONCRETE PAVING IMPROVEMENTS
CONBLK	CONCRETE BLOCK WALL
BUILD	BUILDING
CONIMP	CONCRETE IMPROVEMENTS
EXIST	EXISTING UTILITY CROSSING PROJECT PIPELINE; DASHED LINES ABOVE AND BELOW SIGNIFY THAT THE ACTUAL DEPTH OF THE CROSSING UTILITY IS UNKNOWN
EDGE	EDGE OF ASPHALT CONCRETE PAVEMENT FLOWLINE AND DIRECTION
HWS	HOT WATER SUPPLY LINE
E	UNDERGROUND ELECTRIC
NO3	GAS LINE; SIZE IN INCHES AS SHOWN IF KNOWN
RW6	RAW WASTEWATER LINE; SIZE IN INCHES AS SHOWN IF KNOWN
SD18	STORM DRAIN LINE; SIZE IN INCHES AS SHOWN IF KNOWN
S12	SEWER LINE; SIZE IN INCHES AS SHOWN IF KNOWN
W8	WATER LINE; SIZE IN INCHES AS SHOWN IF KNOWN
SD18	PROPOSED CURED-IN-PLACE PIPE
S=0.001	SLOPE OF EXISTING PIPE WITH ARROW POINTING DOWNHILL; ARROW DOES NOT NECESSARILY REPRESENT FLOW DIRECTION



**PROJECT LOCATION**

**VICINITY MAP**  
NOT TO SCALE

#### UTILITY NOTE:

UTILITY INFORMATION SHOWN HEREON IS BASED ON RECORD INFORMATION SUPPLIED TO THE ENGINEER BY THE CITY OF TURLOCK, TOGETHER WITH OBSERVATION OF VISIBLE EVIDENCE BY A FIELD SURVEY. THE ENGINEER CAN MAKE NO GUARANTEE AS TO THE ACCURACY OR COMPLETENESS OF THE UNDERGROUND UTILITY FACILITIES SHOWN. PRIOR TO ANY SITE EXCAVATIONS, THE CONTRACTOR SHALL CONTACT THE CITY AND UNDERGROUND SERVICE ALERT (USA) AND REQUEST THAT THEY IDENTIFY THE LOCATION OF ALL UNDERGROUND UTILITIES AT THE SITE.

#### SITE BENCHMARKS:

CTLP# 1 NAIL IN TIN N 1998948.95 E 6454206.49 ELEV. = 99.29	CTLP# 3 NAIL IN TIN N 1998727.25 E 6454481.90 ELEV. = 96.61	CTLP# 5 NAIL IN TIN N 1999449.56 E 6454842.32 ELEV. = 98.54
CTLP# 2 NAIL IN TIN N 1998954.44 E 6454445.43 ELEV. = 94.24	CTLP# 4 NAIL IN TIN N 1998703.58 E 6454157.16 ELEV. = 98.01	

#### SURVEY NOTE:

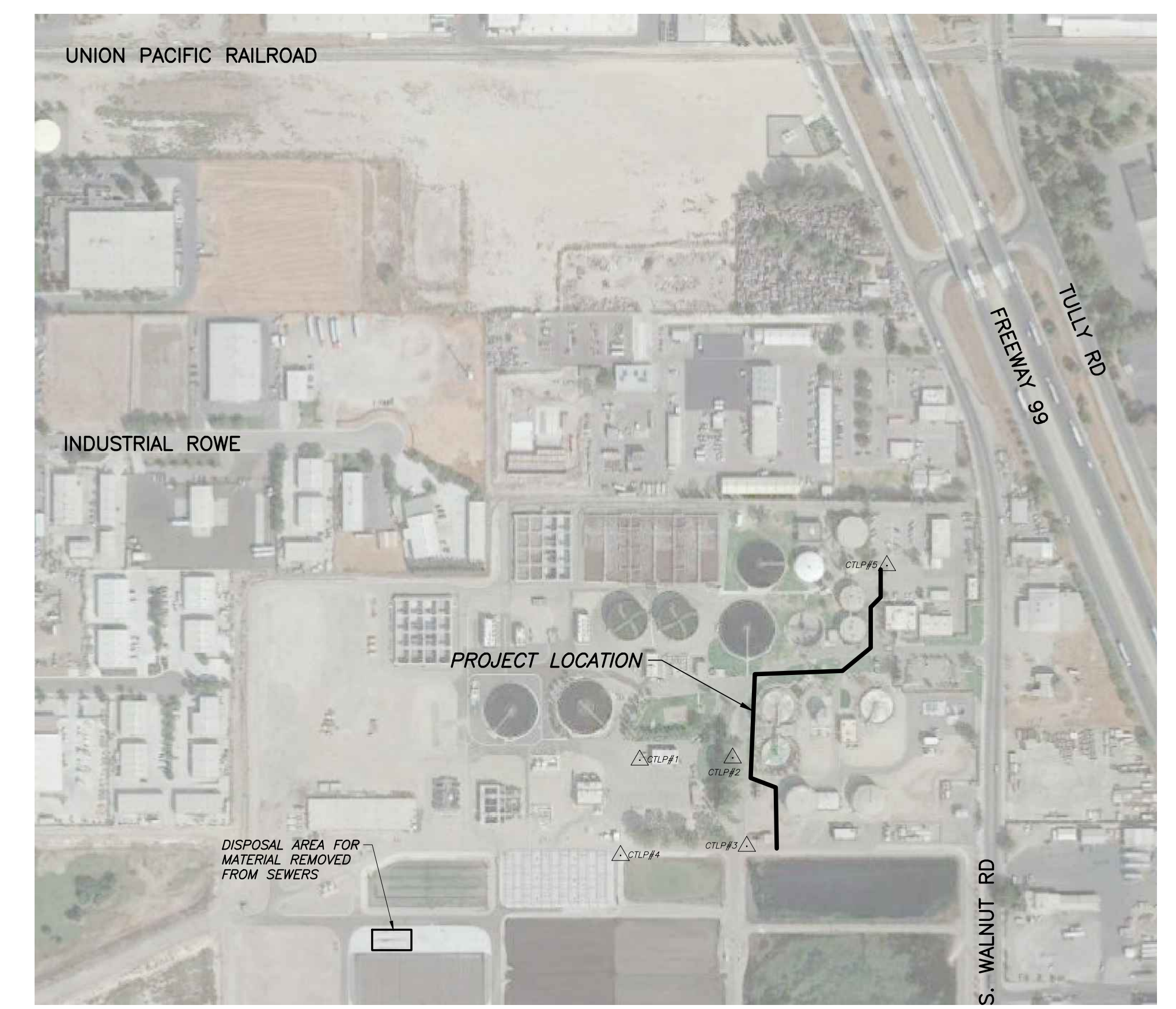
SITE SURVEY INFORMATION, WHERE PROVIDED, WAS CONDUCTED BY BLAIR, CHURCH & FLYNN CONSULTING ENGINEERS.

#### MAPPING NOTE:

THE TOPOGRAPHIC SURVEY LOCATES SPECIFIC PHYSICAL FEATURES OF THE SITE AND THEIR ELEVATIONS AS DETERMINED NECESSARY FOR THE DESIGN. IT IS NOT A COMPLETE TOPOGRAPHIC SURVEY OF THE SITE. THE INFORMATION SHOWN REFLECTS THE DATA OBTAINED BY FIELD SURVEYS, CONDUCTED ON MAY 8, 9 AND 18, 2023 AND SUPPLEMENTED BY CITY PROVIDED RECORD DRAWINGS.

#### GENERAL NOTES:

1. THE CONTRACTOR SHALL NOTIFY THE DEPARTMENT OF MUNICIPAL SERVICES OF THE CITY OF TURLOCK AT 209-668-5590 72 HOURS PRIOR TO THE START OF CONSTRUCTION.
2. ALL WORK INSTALLED SHALL MEET CITY OF TURLOCK IMPROVEMENT STANDARDS.
3. BEFORE COMMENCING WORK, THE CONTRACTOR SHALL NOTIFY ALL UTILITY AUTHORITIES OR UTILITY COMPANIES HAVING POSSIBLE INTEREST IN THE WORK OF THE CONTRACTOR'S INTENTION TO EXCAVATE PROXIMATE TO EXISTING FACILITIES AND THE CONTRACTOR SHALL VERIFY THE LOCATION OF ANY UTILITIES IN THE WORK AREA. THE CONTRACTOR SHALL NOTIFY U.S.A. TWO (2) DAYS PRIOR TO BEGINNING ANY EXCAVATION.
4. DIRT OR DEBRIS TRACKED ONTO EXISTING ROADS FROM THIS PROJECT SHALL BE CLEANED OFF AT THE END OF EACH WORKING DAY TO THE SATISFACTION OF THE CITY INSPECTOR.
5. THE CONTRACTOR SHALL FURNISH ALL NECESSARY MATERIALS, LABOR, EQUIPMENT, TOOLS AND INCIDENTALS, AND SHALL DO ALL WORK NECESSARY TO CONSTRUCT ALL OF THE PROPOSED IMPROVEMENTS SHOWN OR SPECIFIED ON THE PLANS OR IN THE SPECIFICATIONS, WITH THE EXCEPTIONS OF EXISTING IMPROVEMENTS AND THOSE IMPROVEMENTS SPECIFICALLY SHOWN OR SPECIFIED AS "FUTURE" OR AS "BY OTHERS".
6. STATION CONTROL LINES ARE THE CENTERLINES OF THE EXISTING SEWER PIPES, OR AS SHOWN.
7. AERIAL PHOTOGRAPHY SHOWN ON THE PLANS WAS PHOTOGRAPHED IN 2022 AND OBTAINED FROM ONLINE SOURCES.
8. CONTRACTOR'S ACCESS SHALL BE FROM SOUTH KILROY ROAD TO THE WEST OF THE WATER QUALITY CONTROL FACILITY SITE. THE ACCESS ROAD FROM KILROY TO THE PLANT SITE IS PAVED WITH GRAVEL. PARKING OF PERSONAL VEHICLES WILL BE ALLOWED WITHIN THE PLANT SITE. NO ACCESS WILL BE PERMITTED THROUGH THE EAST GATE ON WALNUT ROAD DUE TO SECURITY RESTRICTIONS. NO DELIVERIES WILL BE ACCEPTED BY THE CITY STAFF AT EITHER THE EAST OR WEST GATES.



**SITE MAP**  
NOT TO SCALE

REVIEWED BY: [Signature] 09/15/2023  
DAVID HUFF, WQC DIVISION MANAGER DATE

APPROVED BY: [Signature] 09/18/23  
WILLIAM D. MORRIS, CITY ENGINEER DATE



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1	COVER SHEET
2	TEMPORARY HANDLING OF WASTEWATER FLOWS PLAN
3	PLAN AND PROFILE
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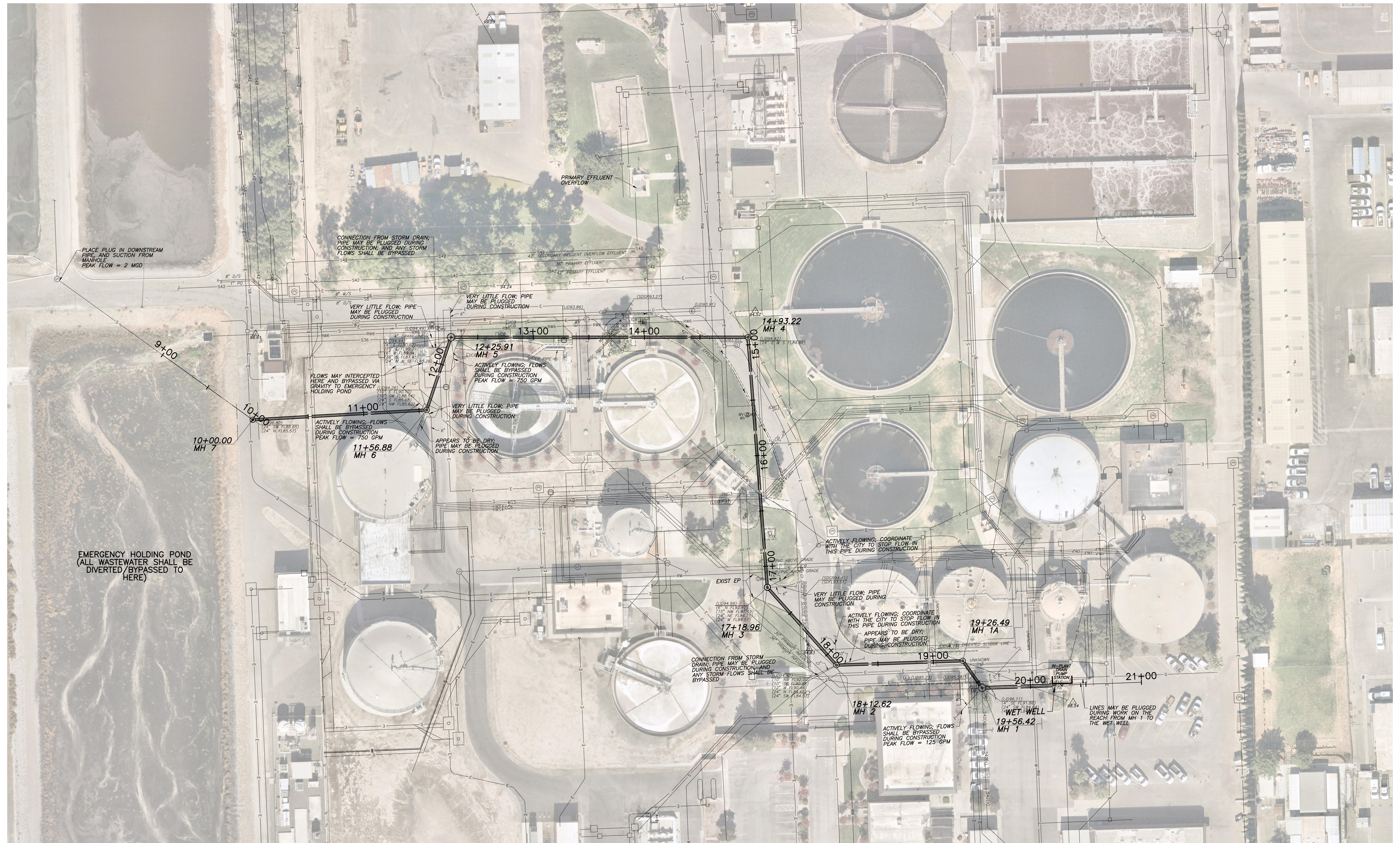
**Blair, Church & Flynn**  
CONSULTING ENGINEERS

REGISTERED PROFESSIONAL ENGINEER  
No. 61,604  
CIVIL  
STATE OF CALIFORNIA

9-12-2023  
Date Signed

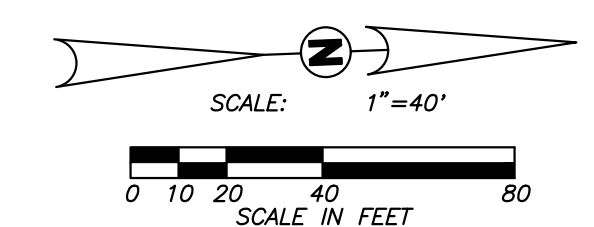
CONSULTANT	REF. & REV.	<b>CITY OF TURLOCK</b>
Blair, Church & Flynn Consulting Engineers 451 Clovis Avenue, Suite 200 Clovis, California 93612 Tel (559) 326-1400 Fax (559) 326-1500		
REGIONAL WATER QUALITY CONTROL FACILITY IN-PLANT WASTE LINE REPAIR COVER SHEET		DR. BY: AYY CH. BY: TJE DATE: 8/16/2023 SCALE AS NOTED
		SHEET NO. 1 OF 4 SHEETS





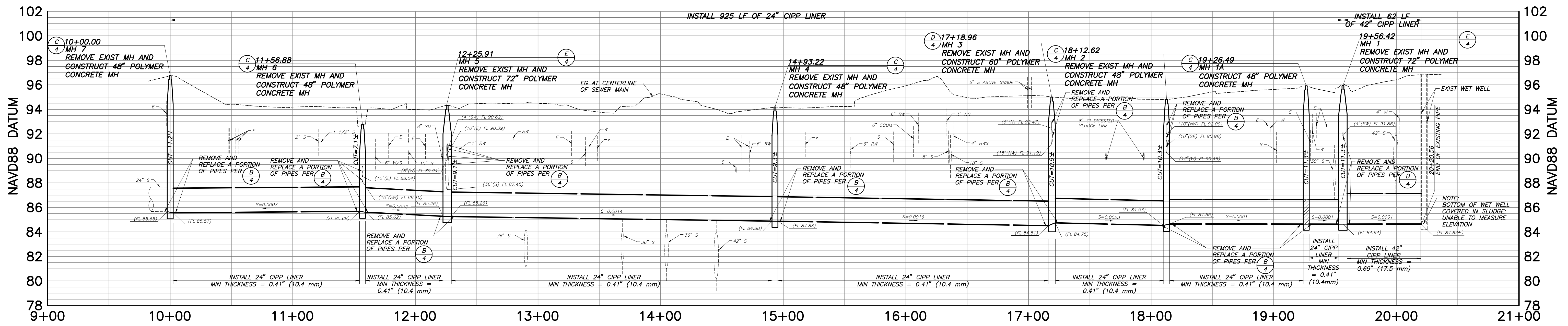
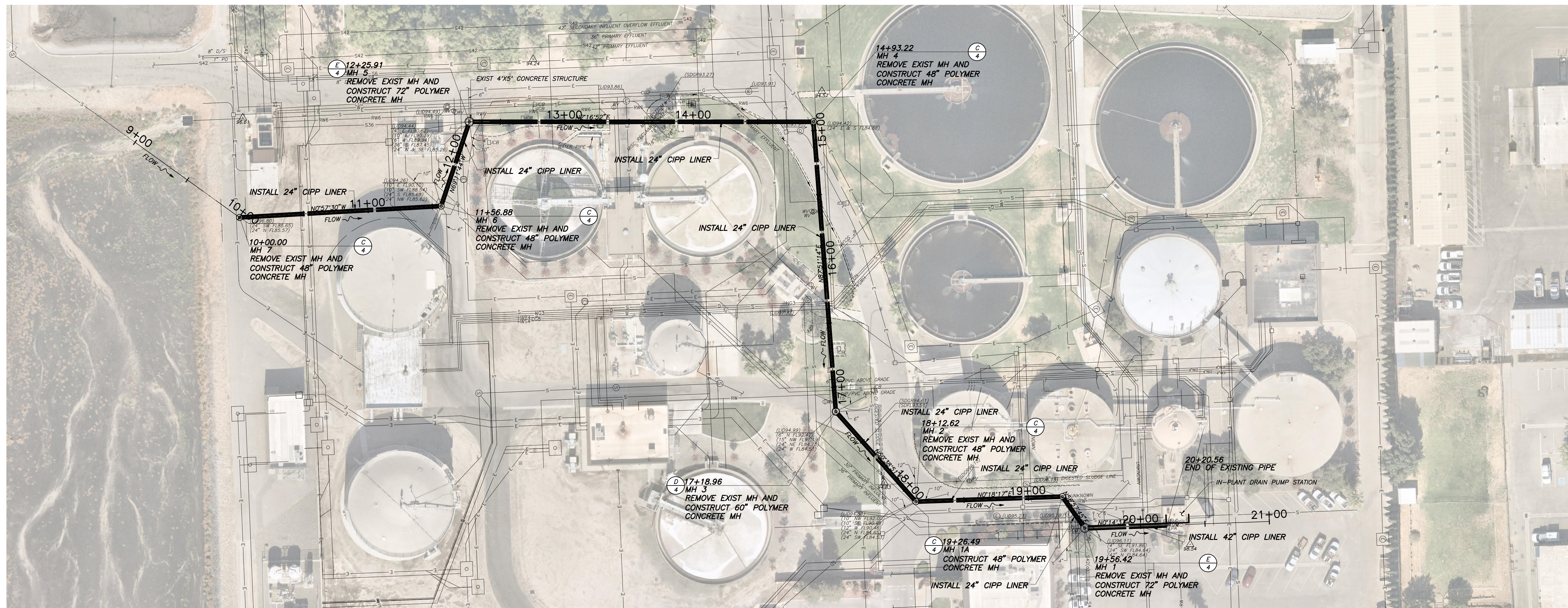
**NOTES:**

1. SEE THE TECHNICAL SPECIFICATIONS FOR COMPLETE SPECIFICATIONS REGARDING THIS WORK.
2. THE CONTRACTOR SHALL PREPARE DETAILED TEMPORARY WASTEWATER HANDLING SYSTEM PLANS AND CALCULATIONS, AND THEY SHALL BE SIGNED AND SEALED BY A LICENSED CIVIL ENGINEER AS SPECIFIED.
3. WHERE REQUIRED BY THE CITY, BYPASS LINES MAY NEED TO EITHER BE BURIED OR USE ABOVE-GROUND ROAD CROSSINGS TO ALLOW FOR VEHICLE CROSSINGS.
4. PUMPS, BACKUP PUMPS, AND REPLACEMENT BACKUP PUMPS SHALL BE PROVIDED FOR EACH SEPARATE BYPASS OPERATION AS SPECIFIED.
5. WASTEWATER IN BYPASS PIPING SHALL NOT EXCEED 10 FEET PER SECOND.
6. PEAK FLOW RATES ARE SHOWN AT EACH BYPASS LOCATION. CONTRACTOR SHALL PROVIDE A BYPASS SYSTEM THAT IS CAPABLE OF CONVEYING THE PEAK FLOW RATE, AND LOWER, IN CONFORMANCE WITH THE REQUIREMENTS OF THE TECHNICAL SPECIFICATIONS.
7. ALL BYPASSED/DIVERTED WASTEWATER SHALL BE DISCHARGED TO THE EMERGENCY HOLDING POND SHOWN ON THIS SHEET. THE CONTRACTOR SHALL MONITOR THE LEVEL OF THE WASTEWATER IN THE POND, AND COORDINATE WITH THE CITY TO HAVE THE CITY LOWER THE WASTEWATER LEVEL WHEN REQUIRED.
8. UNDERGROUND UTILITIES SHOWN ON THIS SHEET ARE TAKEN FROM RECORDS PROVIDED BY THE CITY. CONTRACTOR SHALL VERIFY EXISTENCE AND LOCATIONS OF UTILITIES PRIOR TO ANY EXCAVATION FOR BURYING BYPASS LINES.

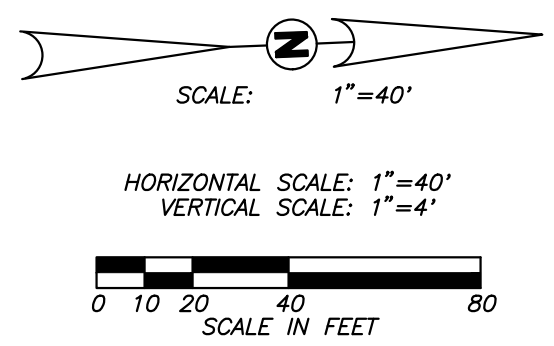


<p><b>Blair, Church &amp; Flynn</b> CONSULTING ENGINEERS</p>		CONSULTANT	REF. & REV.	<b>CITY OF TURLOCK</b>
		REGIONAL WATER QUALITY CONTROL FACILITY IN-PLANT WASTE LINE REPAIR TEMPORARY HANDLING OF WASTEWATER FLOWS PLAN	DR. BY: AYY CH. BY: TJE DATE: 8/16/2023 SCALE AS NOTED	SHEET NO. <b>2</b> OF <b>4</b> SHEETS



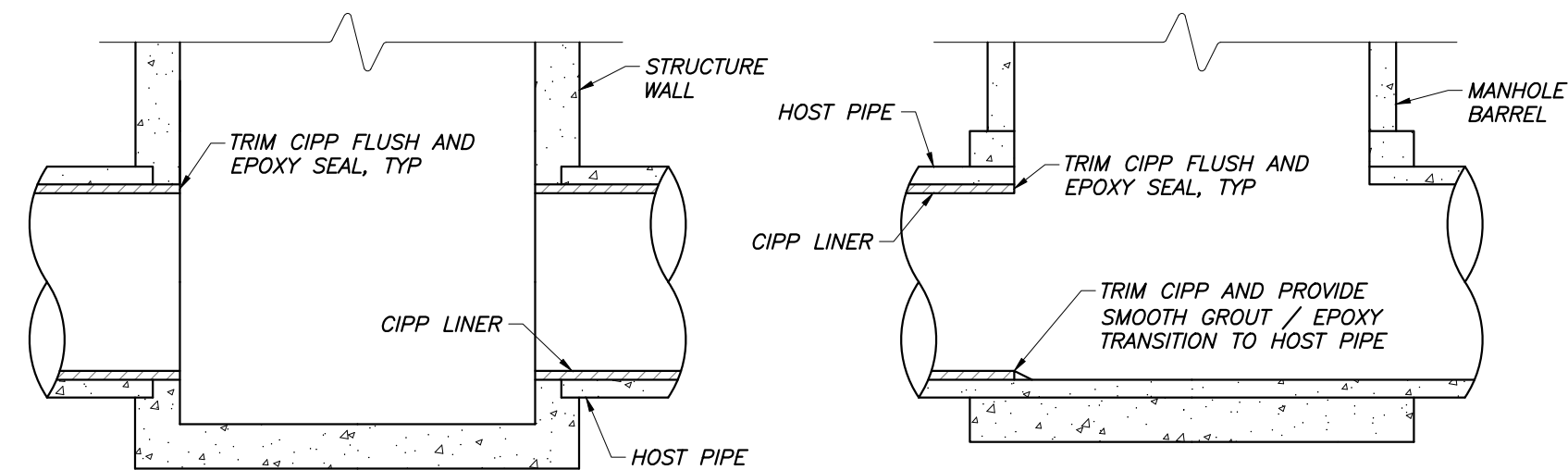


- NOTES:**
- EXISTING CROSSING UTILITIES (EXCEPT SEWER) SHOWN IN PROFILE ARE SHOWN AT TYPICAL EXPECTED DEPTHS, AND THERE ARE NO RECORDS OR POTHOLE DATA AVAILABLE.
  - EXISTING CROSSING SEWERS SHOWN IN PROFILE ARE SHOWN FOR REFERENCE ONLY, AND ARE PLACED TO NOT CONFLICT WITH THE PROJECT SEWER; NO RECORDS OR POTHOLE DATA ARE AVAILABLE.
  - MANHOLES HAD HIGH FLOWS AND SLUDGE DEPOSITS DURING SURVEYING MAKING ACCURATE MEASUREMENT OF FLOWLINE ELEVATIONS DIFFICULT. FLOWLINE ELEVATIONS WERE MEASURED AND ARE SHOWN ON THE PLANS, BUT THEY SHOULD BE CONSIDERED APPROXIMATE ONLY. CONTRACTOR SHALL CLEAN SEWERS AND MANHOLES AS FIRST ORDER OF WORK PRIOR TO TAKING REQUIRED MEASUREMENTS AND ORDERING NEW MANHOLE MATERIALS. CONTRACTOR SHALL ALSO PROVIDE THE UPDATED INFORMATION TO THE CITY WHEN IT IS AVAILABLE.
  - SIZES OF SEWER MAINS ENTERING PROJECT MANHOLES WERE ESTIMATED FROM ABOVE GROUND, AND ACTUAL MEASUREMENTS WERE NOT MADE.



<p>Blair, Church &amp; Flynn Consulting Engineers 481 Clovis Avenue, Suite 200 Clovis, California 93612 Tel (559) 326-1400 Fax (559) 326-1500</p>	CONSULTANT	REF. & REV.	<p><b>CITY OF TURLOCK</b></p> <p>REGIONAL WATER QUALITY CONTROL FACILITY IN-PLANT WASTE LINE REPAIR PLAN AND PROFILE</p>	DR. BY: AYY CH. BY: TUF DATE: 8/16/2023 SCALE AS NOTED	SHEET NO. <b>3</b> OF <b>4</b> SHEETS

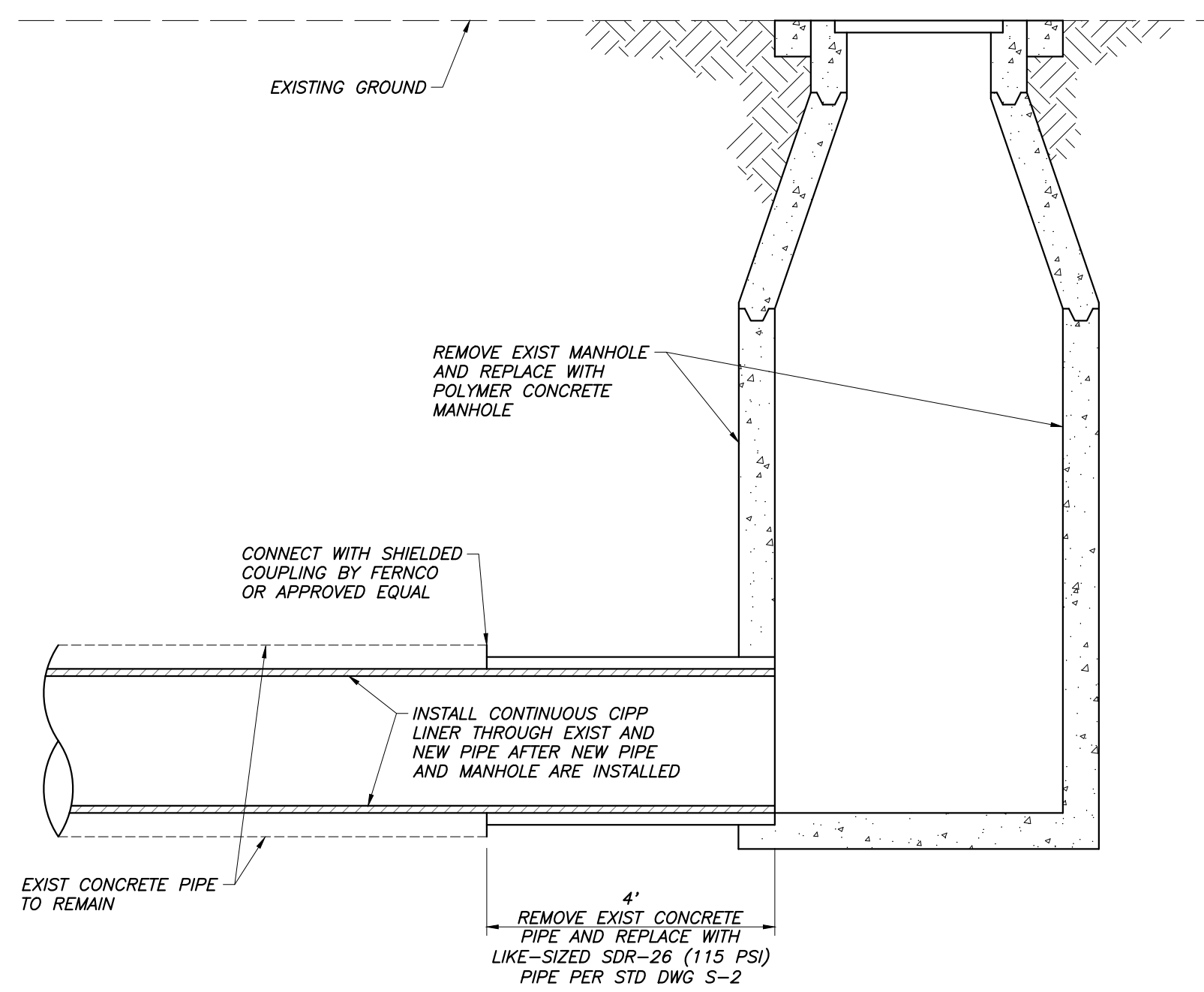




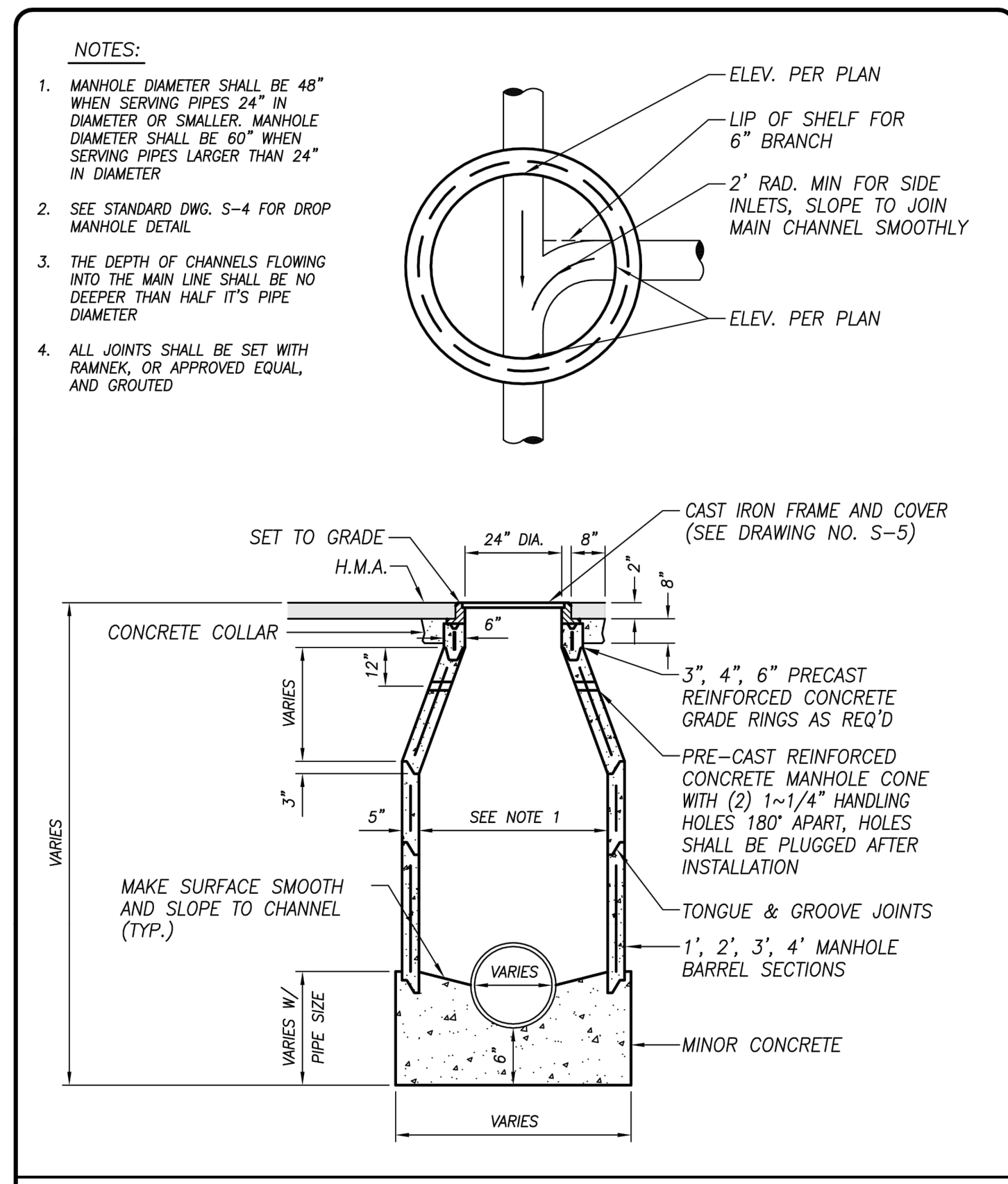
CIPP LINER TRIMMED TO STRUCTURE WALL

CIPP LINER TERMINATION

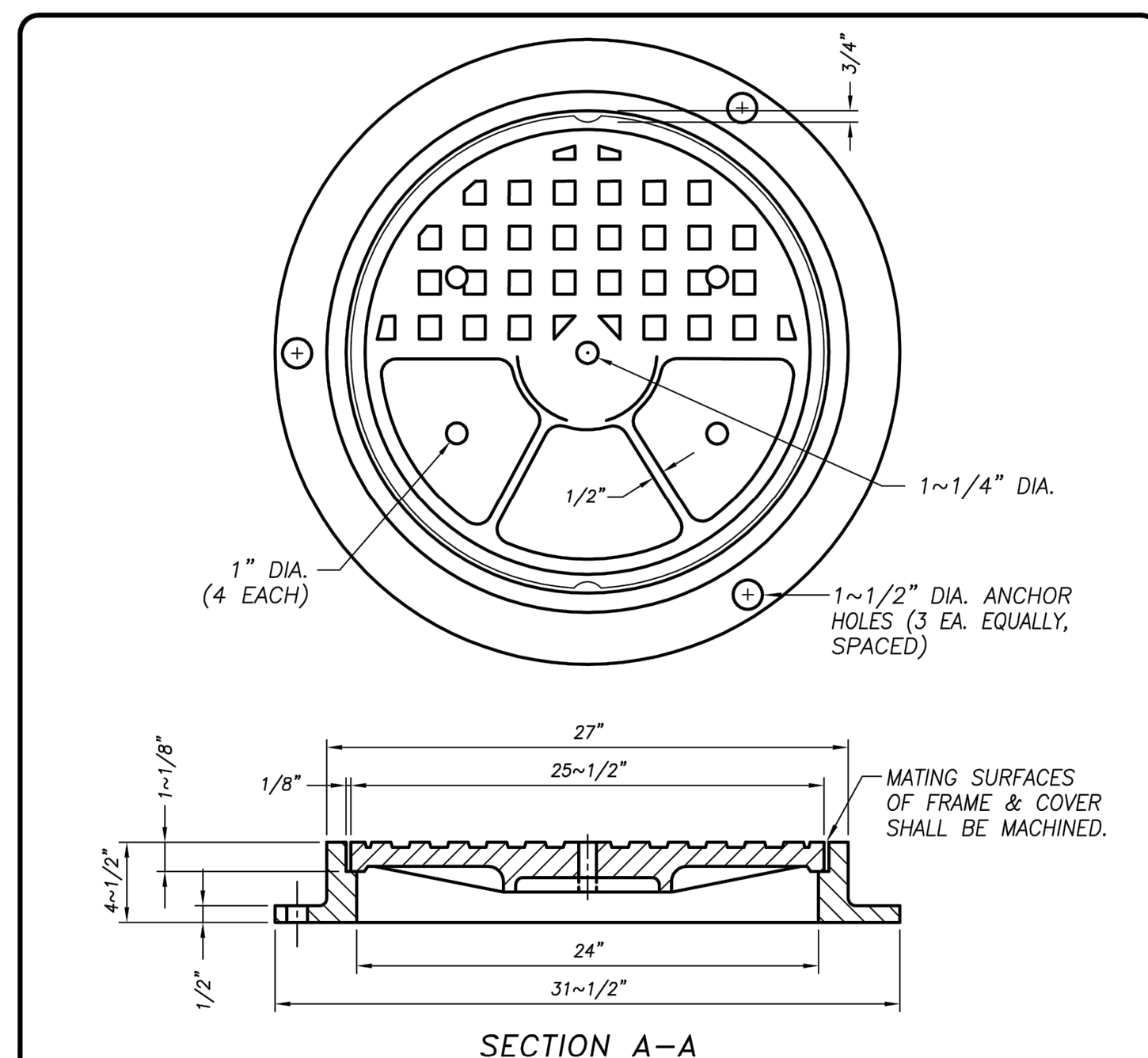
**A** CURED-IN-PLACE PIPE (CIPP) DETAILS  
NOT TO SCALE



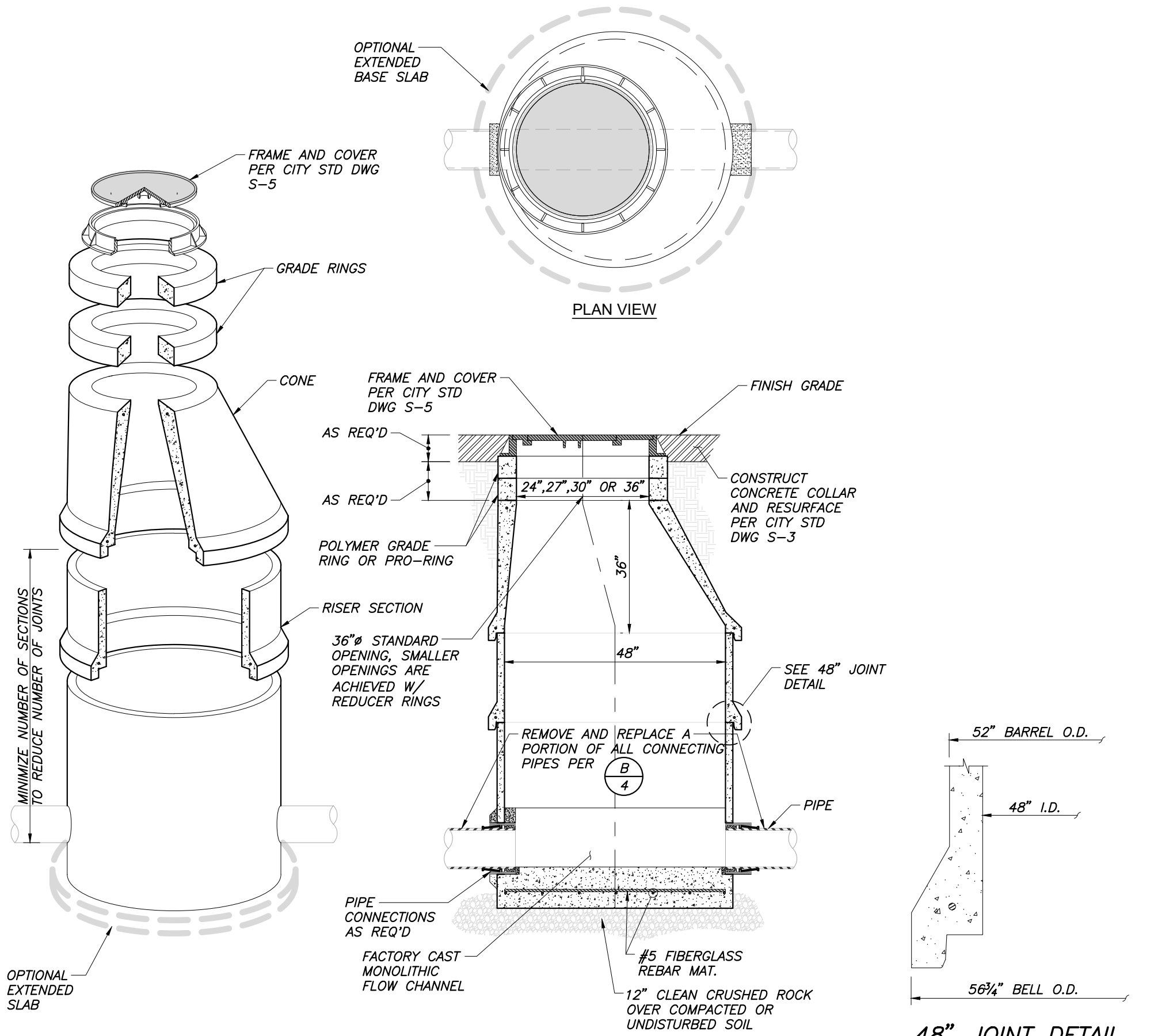
**B** PORTION OF SEWER MAIN REMOVAL AND REPLACEMENT AT MANHOLES  
NOT TO SCALE



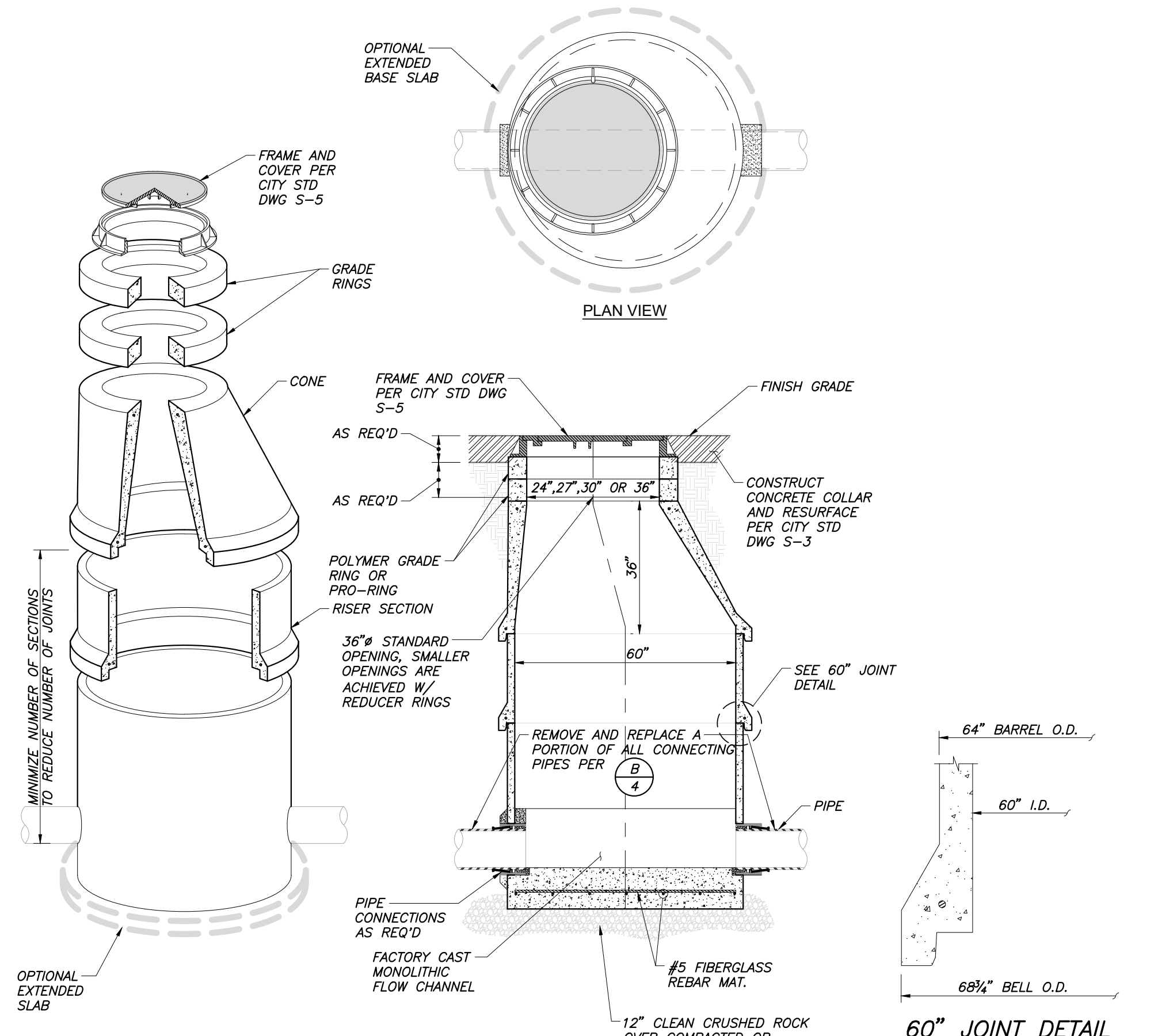
**STANDARD MANHOLE**  
DRAWN BY: JSH  
CHECK BY: NBB  
SCALE: NONE  
CITY ENGINEER - MICHAEL G. PITCOCK - RCE 52694  
CITY OF TURLOCK  
APPROVED BY: *M. P. ...*  
CITY ENGINEER - MICHAEL G. PITCOCK - RCE 52694  
DRAWING NO. S-3  
COUNCIL APPROVAL DEC, 2015



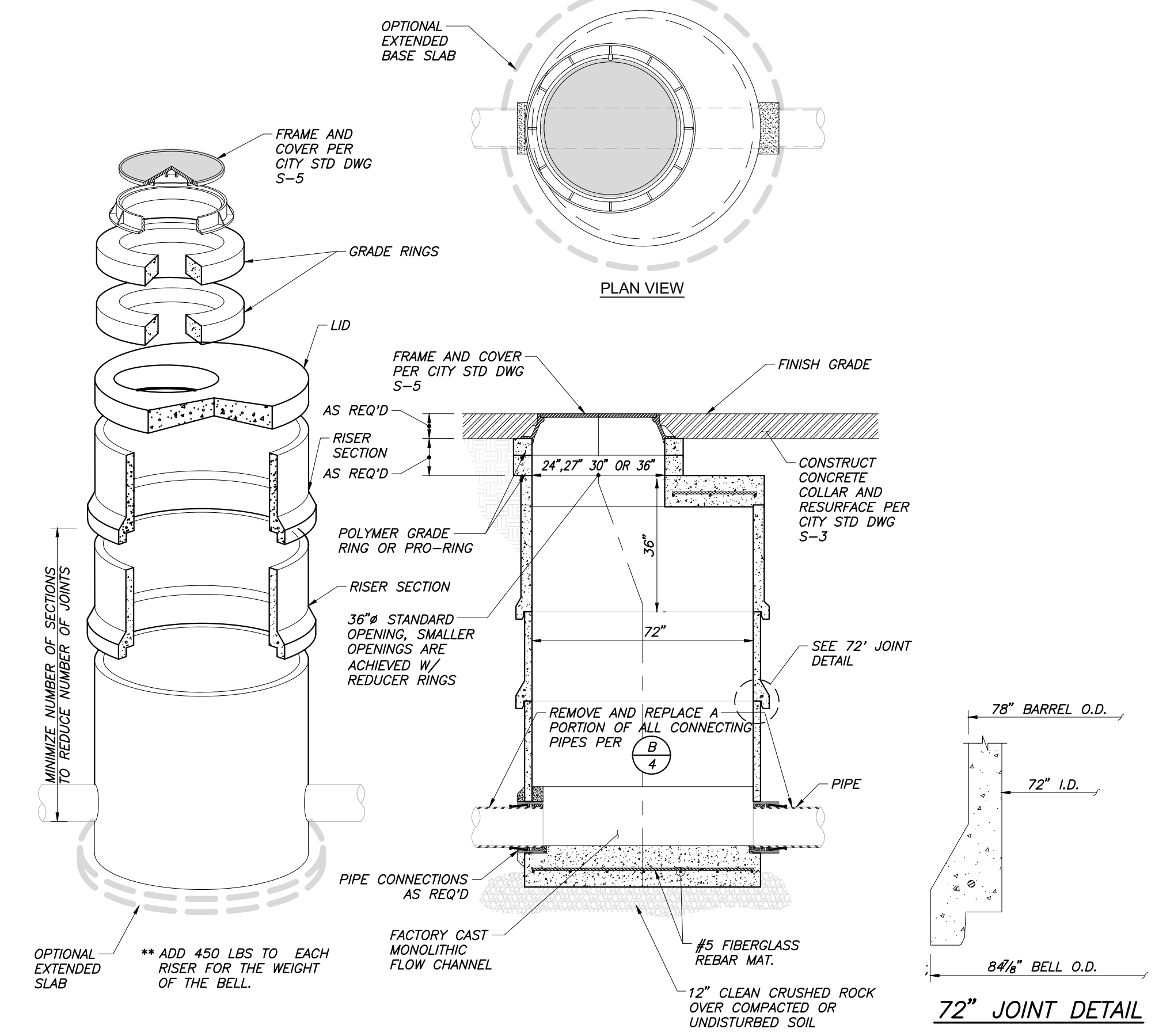
**MANHOLE FRAME AND COVER**  
DRAWN BY: JSH  
CHECK BY: NBB  
SCALE: NONE  
CITY ENGINEER - MICHAEL G. PITCOCK - RCE 52694  
CITY OF TURLOCK  
APPROVED BY: *M. P. ...*  
CITY ENGINEER - MICHAEL G. PITCOCK - RCE 52694  
DRAWING NO. S-5  
COUNCIL APPROVAL DEC, 2015



**C** 48" POLYMER CONCRETE MANHOLE  
NOT TO SCALE



**D** 60" POLYMER CONCRETE MANHOLE  
NOT TO SCALE



**E** 72" POLYMER CONCRETE MANHOLE  
NOT TO SCALE

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	<p>DR. BY: AYY CH. BY: TJE DATE: 8/16/2023 SCALE: AS NOTED</p>	<p>SHEET NO. 4 OF 4 SHEETS</p>