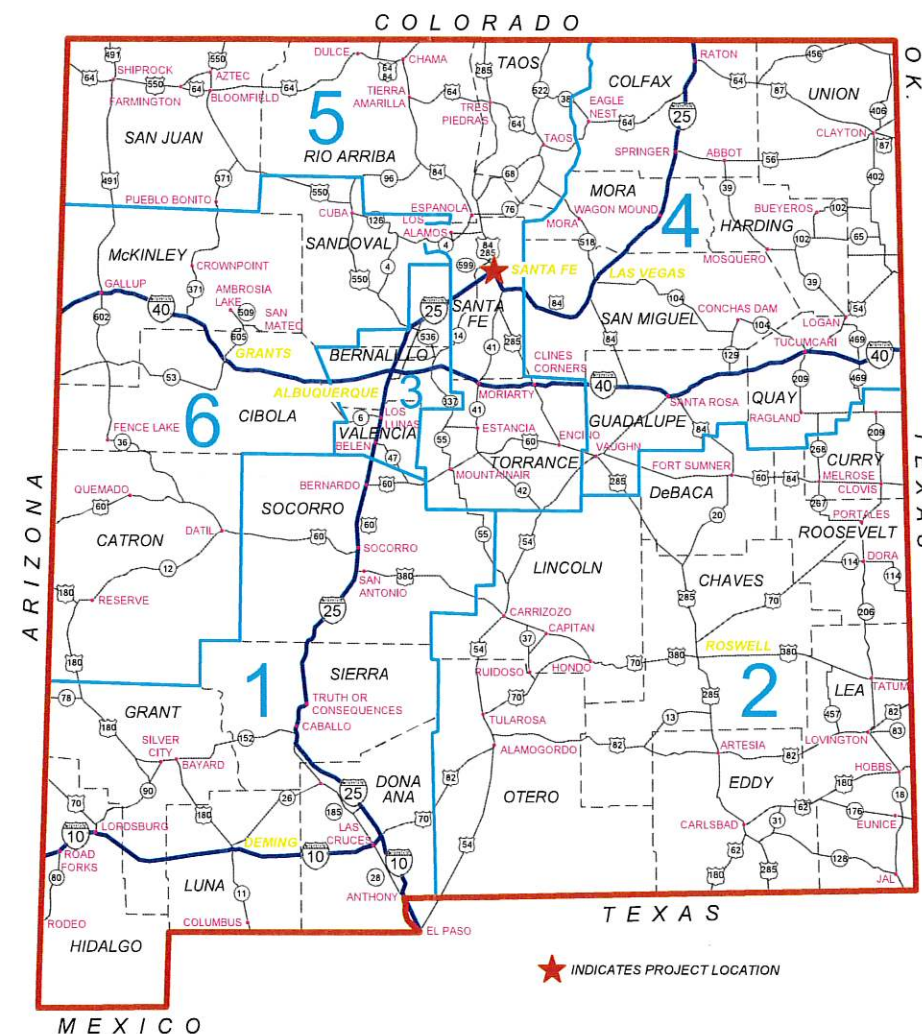




SANTA FE COUNTY COLLEGE DRIVE EXTENSION CONSTRUCTION PLANS

SANTA FE COUNTY, NEW MEXICO



THESE PLANS ARE APPROVED FOR CONSTRUCTION

[Signature]

Apr 23, 2025

SANTA FE COUNTY PUBLIC WORKS DIRECTOR

DATE

[Signature]

SANTA FE COUNTY LAND USE DIRECTOR

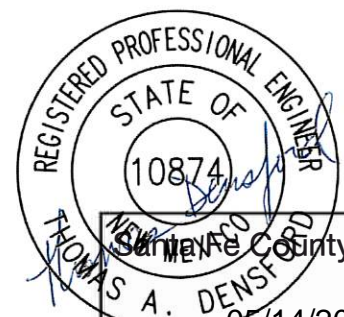
5/14/2025

THESE DETAILED PLANS AND SPECIFICATIONS WERE PREPARED UNDER MY DIRECTION
AND SUPERVISION ON BEHALF OF EARTH & STEEL DESIGN, LLC

[Signature]
THOMAS A. DENSFORD, P.E.
ENGINEER OF RECORD

3/30/2025

DATE



05/14/2025
3/30/2025

LENGTH OF PROJECT 0.577 miles
THIS PROJECT BEGINS IN SECTION 21, T.16N, R.9E, N.M.P.M.
THIS PROJECT ENDS IN SECTION 21, T.16N, R.9E, N.M.P.M.

DESIGN SPEED = 30 MPH

ROADWAY CLASSIFICATION = URBAN MINOR COLLECTOR



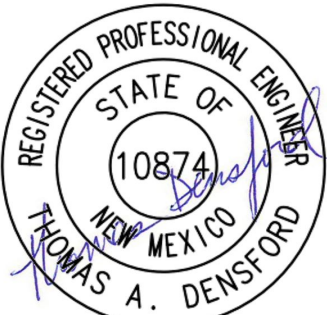
BEGINNING of PROJECT (BOP)
STA. 17+80.52

END of PROJECT (EOP)
STA. 48+27.90

VICINITY MAP

INTENT OF PROJECT
THE SCOPE OF THIS PROJECT INCLUDES NEW ROADWAY CONSTRUCTION OF THE EXTENSION OF COLLEGE DRIVE. CONSTRUCTION INCLUDES RAISED MEDIANS, RIGHT AND LEFT TURN LANES, BICYCLE LANES, PEDESTRIAN PATH, MISCELLANEOUS DRAINAGE IMPROVEMENTS, WATER LINE, AND PERMANENT SIGNING AND STRIPING.

PROJECT CONTACT INFORMATION
SANTA FE COUNTY PROJECT MANAGER
Curt Temple
Office: (505) 992-9853
or
DESIGN CONSULTANT
Ivan P. Trujillo
Earth & Steel Design, LLC
Cell: (505) 470-5506



General Notes

No.	Revision/Issue	Date



Vicinity Map

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025
Approved	By: <i>[Signature]</i>

SHEET NO. 1

SUMMARY OF QUANTITIES			ROADWAY		CONSTRUCTION ENGINEERING		CONSTRUCTION SIGNING		PERMANENT SIGNING		PROJECT TOTAL	
ITEM NO.	DESCRIPTION	BID UNIT	ESTIMATE	FINAL	ESTIMATE	FINAL	ESTIMATE	FINAL	ESTIMATE	FINAL	ESTIMATE	FINAL
201000	CLEARING AND GRUBBING	LS	LS								LS	
203000	UNCLASSIFIED EXCAVATION	C.Y.	2,810								2,810	
203100	BORROW	C.Y.	3,265								3,265	
207000	SUBGRADE PREPARATION	S.Y.	17,000								17,000	
303160	BASE COURSE 6"	S.Y.	16,240								16,240	
407000	ASPHALT MATERIAL FOR TACK COAT	TON	5								5	
408100	PRIME COAT MATERIAL	TON	30								30	
416104	MINOR PAVING TYPE I, HMA SP-IV	TON	3,240								3,240	
570024	24" CULVERT PIPE	L.F.	606								606	
570025	24" CULVERT PIPE END SECTION	EACH	10								10	
601000	REMOVAL OF STRUCTURES AND OBSTRUCTIONS	LS	LS								LS	
602000	RIPRAP CLASS A	C.Y.	27								27	
603051	CLEAN WATER ACT COMPLIANCE WORK PLAN	LS	LS								LS	
603262	COMPOSTED MULCH SOCKS	L.F.	3047								3,047	
603281	SWPPP PLAN PREPARATION AND MAINTENANCE	LS	LS								LS	
604300	GEOGRID REINFORCEMENT	S.Y.	13,430								13,430	
607014	WOVEN WIRE FENCE 4'	L.F.	3,047								3,047	
608004	CONCRETE SIDEWALK 4"	S.Y.	17								17	
608304	CONCRETE MEDIAN PAVEMENT 4" (COLORED)	S.Y.	421								421	
609006	CONCRETE CURB 6"	L.F.	1,279								1,279	
618000	TRAFFIC CONTROL MANAGEMENT	LS			LS						LS	
621000	MOBILIZATION	LS			LS						LS	
623000	MEDIAN DROP INLET TYPE I (URBAN) H=0'0" TO 3'0"	EACH	2								2	
632000	CLASS A SEEDING	ACRE	6								6	
663206	WATER SYSTEM	LS	LS								LS	
701000	PANEL SIGNS	S.F.							40		40	
701100	STEEL POST AND BASE POST FOR ALUMINUM PANEL SIGNS	L.F.							90		90	
702810	TRAFFIC CONTROL DEVICES FOR CONSTRUCTION	LS					LS				LS	
703001	OBJECT MARKER TYPE 1	EACH							10		10	
704000	RETROREFLECTORIZED PAINTED MARKINGS 4"	L.F.							17069		17,069	
704002	RETROREFLECTORIZED PAINTED MARKINGS 6"	L.F.							1210		1,210	
704706	HOT THERMOPLASTIC PAVEMENT MARKINGS 12"	L.F.							22		22	
704717	HOT THERMOPLASTIC PAVEMENT MARKING RIGHT ARROW	EACH							2		2	
704718	HOT THERMOPLASTIC PAVEMENT MARKING LEFT ARROW	EACH							2		2	
704719	HOT THERMOPLASTIC PAVEMENT MARKING THRU ARROW	EACH							4		4	
801000	CONSTRUCTION STAKING BY THE CONTRACTOR	LS			LS						LS	
802000	POST CONSTRUCTION PLANS	LS			LS						LS	

General Notes

No.	Revision/Issue	Date



Summary of Quantities

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

By: *Thomas A. Densford*



3/30/202
5

ROADWAY CONSTRUCTION

1. ALL ROADWAY CONSTRUCTION AND RE-CONSTRUCTION SHALL COMPLY WITH THE NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION 2019 EDITION AND SUBSEQUENT REVISIONS.

2. A TRAFFIC CONTROL PLAN STAMPED BY A NM PROFESSIONAL ENGINEER IS REQUIRED FOR ALL PROJECTS WITHIN ANY SANTA FE COUNTY RIGHT OF WAY.

3. THE CONTRACTOR MUST ADHERE TO ALL REQUIREMENTS AS SET FORTH IN ORDINANCE 2003-1 EXCAVATION/RESTORATION ORDINANCE FOR ALL WORK WITHIN SANTA FE COUNTY RIGHT OF WAY.

4. THE CONTRACTOR SHALL PROVIDE ALL TRAFFIC CONTROL DEVICES IN ACCORDANCE WITH N.M. DOT STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION AND ANY APPLICABLE SPECIAL PROVISION AND/OR SUPPLEMENTAL SPECIFICATION, AS WELL AS THE MOST CURRENT EDITION OF THE MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. UNLESS OTHERWISE SPECIFIED HEREIN, ALL COSTS RELATED TO TRAFFIC CONTROL SHALL BE INCLUDED IN ITEM 618000, TRAFFIC CONTROL MANAGEMENT.

5. DRAINAGE PIPE SPECIFIED AS CORRUGATED METAL PIPE (CMP) SHALL BE 16-GAUGE MINIMUM AND STORM DRAIN MANHOLES SHALL HAVE STANDARD 56 COUNTY COVERS AND RINGS.

6. CONTRACTOR SHALL NOT BEGIN ANY CONSTRUCTION ACTIVITY WITHOUT THE APPLICABLE PERMITS FROM THE SANTA FE COUNTY. A COPY OF THE APPROVED DRAWINGS SHALL ALWAYS BE AVAILABLE AT THE CONSTRUCTION SITE DURING BUSINESS HOURS AND ORGANIZED BY THE PROJECT ENGINEER.

7. A SANTA FE COUNTY INITIATED PRECONSTRUCTION CONFERENCE SHALL BE CONDUCTED IN THE PRESENCE OF THE PROJECT ENGINEER AND OR THE OWNERS PROJECT REPRESENTATIVE (OPR) PRIOR TO THE INITIATION OF ANY CONSTRUCTION ACTIVITY. IN ADDITION, THE CONTRACTOR SHALL NOTIFY THE COUNTY NO LESS THAN 24 HRS FROM THE BEGINNING OF ANY CONSTRUCTION WORK.

8. THE OPR SHALL BE RESPONSIBLE FOR INITIATING ANY NECESSARY REVISIONS TO THE APPROVED DESIGN DRAWINGS, ALL APPROPRIATE DRAWINGS AND DESIGN CRITERIA TO SUPPORT SUCH CHANGES. ALL CHANGESUPPORTING DOCUMENTATION SHALL BE STAMPED BY A LICENSED ENGINEER IN NEW MEXICO AND APPROVED BY SANTA FE COUNTY AS A CHANGE ORDER PRIOR TO EXECUTING ANY WORK.

9. THE CONTRACTOR SHALL RETAIN THE SERVICES OF A NEW MEXICO PROFESSIONAL SURVEYOR FOR VERIFICATION OF CRITICAL HORIZONTAL AND VERTICAL CONTROL AND THE CERTIFICATION OF RECORD DRAWINGS. CRITICAL ELEVATIONS OR HORIZONTAL CONTROL MAY BE IDENTIFIED IN THE DRAWINGS, OR MAY BE IDENTIFIED BY THE COUNTY PROJECT MANAGER OR OPR AT HIS/HER DISCRETION. THE CONTRACTOR SHALL MAINTAIN AT THE SITE A COPY OF ALL FIELD NOTES, TO BE MADE AVAILABLE FOR REVIEW BY THE COUNTY PROJECT MANAGER OR OPR AT ANY TIME DURING THE EXECUTION OF THE PROJECT. THE UPDATING OF SUCH DRAWINGS AND FIELD NOTES SHALL BE DONE FREQUENTLY, NOT LESS THAN EVERY TWO WEEKS PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. CONTRACTOR SHALL SUBMIT TO THE OPR COMPLETE RECORD DRAWINGS, SHOWING ANY REVISED CRITICAL X,Y, AND Z DATA FOR PIPE INVERTS, MANHOLE RIMS, VALVE BOXES, SERVICE CONNECTIONS ETC. THESE DATA SHALL BE STAMPED BY A NEW MEXICO REGISTERED PROFESSIONAL SURVEYOR, AND SUBMITTED TO THE COUNTY PROJECT MANAGER OR OPR IN PRELIMINARY FORM FOR REVIEW AND APPROVAL. ANY REVISIONS NECESSARY SHALL BE RE-SUBMITTED IN THE FINAL PROJECT CLOSEOUT SUBMITTAL PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. FINAL AS-BUILTS SHALL BE SUBMITTED ON 24x36 AND IN PDF FORMAT.

10. IF EXISTING UTILITIES HAVE BEEN SHOWN ON THESE DRAWINGS THEY ARE FOR REFERENCE PURPOSES ONLY. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE SPOT-LOCATION OF ALL EXISTING UNDERGROUND UTILITIES BY THE APPROPRIATE UTILITY COMPANY. CONTRACTOR SHALL CONTACT NEW MEXICO UTILITY CALL AT (800)329-3537, TO COORDINATE SPOT LOCATION OF UNDERGROUND UTILITIES NO LESS THAN 2 DAYS PRIOR TO INITIATING ANY WORK.

11. FOR ALL CONCRETE USED, THE DESIGN COMPRESSIVE STRENGTH AT 7 DAYS 1,500 PSI MINIMUM, AND 4,000 PSI AT 28 DAYS. THE CONCRETE SHALL BE A 6 BAG MIX AND MAXIMUM 3/4 INCH AGGREGATE SIZE. AIR ENTRAINMENT SHALL BE BETWEEN 4 AND 7 PERCENT.

12. THREE (3) CONCRETE CYLINDER SAMPLES SHALL BE TAKEN FOR EVERY 500 CUBIC YARDS OF CONCRETE INSTALLED, OR A MINIMUM OF ONE SAMPLE PER DAY, WHICHEVER IS GREATER. CONCRETE CYLINDERS SHALL BE TEST-BROKEN AT 7 DAY INTERVALS. TEST RESULTS SHALL BE SUBMITTED DIRECTLY TO THE OPR, AND TO THE COUNTY IN THE FINAL PROJECT CLOSEOUT SUBMITTAL, PRIOR TO FINAL ACCEPTANCE OF THE PROJECT.

13. NOT LESS THAN 5 DAYS PRIOR TO INITIATING ANY WORK, THE CONTRACTOR SHALL SUBMIT A DUST SUPPRESSION AND EROSION CONTROL PLAN FOR THE PROJECT MANAGER AND OR OPR'S APPROVAL. ALL CONSTRUCTION WORK SHALL BE PERFORMED IN SUCH A MANNER THAT WILL HAVE NO ADVERSE EFFECT UPON ADJACENT PROPERTIES OR PUBLIC ROADWAYS.

14. CLEARING SHALL BE KEPT TO A MINIMUM, AND STABILIZATION OF BARE SURFACES SHALL BEGIN PROMPTLY AFTER COMPLETION OF CONSTRUCTION ACTIVITIES, AND IN COMPLIANCE WITH EPA REQUIREMENTS IN THE PROJECT'S SWPPP.

15. CONTRACTOR SHALL CONFINE ALL CONSTRUCTION OPERATIONS TO THE LIMITS OF THE PROJECT DEFINED IN THESE DRAWINGS, AND IN NO WAY ENCRoACH ONTO ADJACENT PROPERTIES, UNLESS LEGAL EASEMENTS ARE PROVIDED. CONTRACTOR SHALL BE HELD SOLELY RESPONSIBLE FOR ANY ACTIONS NEEDED, OR DAMAGE CAUSED BY CONSTRUCTION ACTIVITIES TO PUBLIC OR PRIVATE PROPERTY, INCLUDING ROADS AND UTILITIES.

16. OVER EXCAVATION OF ANY UTILITY TRENCHES SHALL NOT BE PERMITTED, UNLESS IT IS DETERMINED, TO THE SATISFACTION OF THE DESIGN ENGINEER, THAT THE SUBSOIL IS NOT SUITABLE FOR PIPE BEDDING AND MUST BE REPLACED WITH IMPORTED FILL. OVER-EXCAVATION PERFORMED UNNECESSARILY BY THE CONTRACTOR SHALL BE REMEDIED WITH CLASSIFIED FILL AND COMPACTION AS REQUIRED FOR CLASS-D BEDDING OR BETTER, AT THE CONTRACTOR'S EXPENSE.

17. ONE SET OF BACKFILL DENSITY TESTS SHALL BE PERFORMED FOR EVERY 12 INCH LIFT FOR EACH 200 LINEAR FEET OF PIPELINE, OR FOR ANY STRUCTURE THAT REQUIRES COMPACTED FOUNDATION OR CONTROLLED BACKFILL. FOR PIPELINES OR UTILITIES IN ROADWAYS THE TESTING INTERVAL SHALL BE FOR EACH 100 LINEAR FEET.

18. SUBGRADE, BASE MATERIAL, ASPHALT-TREATED BASE, AND ASPHALT SURFACE COURSE (MARSHALL) SHALL BE TESTED FOR COMPACTION EVERY 100 LINEAR FEET. ONE ASPHALT SAMPLE SHALL BE TAKEN FOR EVERY 500 TONS INSTALLED, OR ONE A DAY, WHICHEVER IS LESS. SAMPLES SHALL BE TESTED AND THE RESULTS SENT TO THE OPR.

19. BASECOURSE SHALL BE COMPACTED TO NO LESS THAN 98% OF MAXIMUM DENSITY USING AASHTO, T-180 MODIFIED MOISTURE DENSITY TEST. BASECOURSE SHALL MEET GRADATION REQUIREMENTS SPECIFIED IN TABLE 421 CLASS-B, NMSHTD, "STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION".

20. CONTRACTOR SHALL SUBMIT ASTM OR AASHTO CERTIFICATES OF MATERIALS' COMPLIANCE TO THE OPR, BUT NO LESS THAN 5 DAYS PRIOR TO INITIATING ANY WORK INVOLVING SUCH MATERIALS. OPR SHALL SUBMIT THESE MATERIAL CERTIFICATES TO THE COUNTY IN THE FINAL PROJECT CLOSEOUT SUBMITTAL, PRIOR TO FINAL ACCEPTANCE OF THE PROJECT.

21. CONTRACTOR SHALL TAKE ALL NECESSARY MEASURES TO PROTECT HORIZONTAL AND VERTICAL CONTROL SURVEY MONUMENTS (MARKS) FROM DAMAGE DURING CONSTRUCTION. IF DURING THE EXECUTION OF THE PROJECT, THE CONTRACTOR'S ACTIVITIES DISTURB OR DESTROY SUCH MARKS, A NEW MEXICO LICENSED SURVEYOR HIRED BY THE CONTRACTOR, AT THE CONTRACTOR'S EXPENSE, SHALL RE-ESTABLISH THE MARKS IN ACCORDANCE WITH THE STANDARDS SET FORTH BY THE "GEOEDTIC MARK PRESERVATION GUIDEBOOK". FOR MORE INFORMATION CONTACT NGS MARK PRESERVATION CENTER, NOAA (505) 768-2606.

22. CONTRACTOR SHALL PROTECT AND MAINTAIN ALL EXISTING STRUCTURES FREE OF DUST AND/OR CONSTRUCTION DEBRIS AT ALL TIMES DURING THE EXECUTION OF THE PROJECT. ALL EXISTING AND NEW STRUCTURES SHALL BE CLEANED PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. ALL COSTS RELATED TO THIS ITEM SHALL BE INCIDENTAL TO THE WORK AND NO EXTRA PAYMENTS SHALL BE MADE TO THE CONTRACTOR.

23. CONTRACTOR SHALL REPAIR ANY EXISTING STRUCTURE OR UTILITY CONDUIT, AND ITS UTILITY CORRIDOR/EASEMENT DAMAGED AS A RESULT OF THE EXECUTION OF THE PROJECT, AT NO ADDITIONAL COST TO SANTA FE COUNTY OR THE RESPECTIVE UTILITY. EXISTING ROADS ACCESS FOR ADJACENT PROPERTIES SHALL BE MAINTAINED UNDER ALL TYPICAL WEATHER CONDITIONS.

24. ALL AREAS DISTURBED BY THE CONSTRUCTION ACTIVITIES OF THIS PROJECT SHALL BE RESTORED, RE-GRADED, PER THE RE-VEGETATION PLAN, OR IN A MANNER ACCEPTABLE TO SANTA FE COUNTY, AND IN COMPLIANCE WITH PROJECT'S SWPPP.

25. CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR EROSION CONTROL INCIDENTAL TO THE CONSTRUCTION ACTIVITIES. THE CONTRACTOR SHALL SUBMIT TO SANTA FE COUNTY A STORM WATER POLLUTION PREVENTION PLAN (SWPP) THAT WILL ADDRESS ALL CONSTRUCTION PHASES. THIS SHALL BE DONE IN ACCORDANCE WITH THE MOST CURRENT NATIONAL POLLUTION DISCHARGE ELIMINATION SYSTEM (NPDES) GENERAL CONSTRUCTION PERMIT (2012 GCP) REQUIREMENTS FOR ALL CONSTRUCTION ACTIVITIES. IN ADDITION, THE CONTRACTOR SHALL PROCURE A STORM WATER POLLUTION PERMIT FROM USEPA, A MINIMUM OF 30 DAYS PRIOR TO INITIATING ANY SITE WORK.

26. CONTRACTOR SHALL PROVIDE AN AREA TO STORE CONSTRUCTION DEBRIS WHERE IT WILL NOT BE A NUISANCE TO THE SURROUNDING NEIGHBORHOOD. ALL DEBRIS SHALL BE CONTAINED IN SUCH A MANNER THAT WILL PREVENT SCATTERING, AND BE IN COMPLIANCE WITH THE PROJECT'S SWPPP. ALL DEBRIS, INCLUDING TREES AND UNDERGROWTH SHALL BE DISPOSED OF PROPERLY WITHIN AN APPROVED LANDFILL, AND REMOVED FROM THE SITE PRIOR TO FINAL INSPECTION.

27. CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR THE PROTECTION OF THE WORK MATERIALS AND EQUIPMENT PRIOR TO AND AFTER THEIR INSTALLATION AS APPLICABLE, UNTIL THE PROJECT'S FINAL ACCEPTANCE BY SANTA FE COUNTY.

28. THE MAXIMUM DEVIATION OF THE TOP OF SURFACE AT THE CURB AND GUTTER SHALL NOT EXCEED 1/8 INCH PER 10 FEET, NOR SHALL THE INSIDE FACE DEVIATE MORE THAN 1/4 INCH PER 10 FEET FROM A STRAIGHT LINE. PRIOR OR DURING THE COUNTY'S FINAL INSPECTION, ALL CURB AND GUTTER SHALL BE TESTED FOR POSITIVE WATER FLOW. ANY AREAS THAT FAIL THIS TEST SHALL BE REJECTED.

29. UTILITY LINES SHALL BE BORED UNDER ALL EXISTING STREETS, CONCRETE FEATURES, AND A MINIMUM 12-INCH SEPARATION SHALL BE MAINTAINED BETWEEN LINES. ALL CURB, GUTTER, SIDEWALK AND ASPHALT DAMAGE IN COUNTY, STATE OR PRIVATE RIGHT OF WAY RESULTING FROM ANY CONSTRUCTION ACTIVITY SHALL BE REPAIRED BEFORE FINAL INSPECTION AT THE CONTRACTORS EXPENSE.

30. BEFORE PAVEMENT IS INSTALLED THE SANITARY SEWER TUV INSPECTION SHALL OCCUR. A COMPLETION LETTER FROM EACH UTILITY COMPANY SHALL BE SUBMITTED TO THE GROWTH MANAGEMENT DEPARTMENT PRIOR TO PAVING ACTIVITIES.

31. NO ALTERATION OR MODIFICATION TO ANY DRAINAGE WAY OR ARROYO SHALL BE PERMITTED WITHOUT FIRST OBTAINING A WRITTEN APPROVAL FROM THE COUNTY FLOOD PLAN ADMINISTRATOR.

32. THE DESIGN ENGINEER AND SANTA FE COUNTY WAIVE ANY AND ALL RESPONSIBILITY AND IS NOT LIABLE FOR PROBLEMS THAT MAY ARISE FROM THE CONTRACTOR'S FAILURE TO FOLLOW THESE DRAWINGS, SPECIFICATIONS, THE DESIGN INTENT THEY CONVEY, OR FOR PROBLEMS ARISING FROM FAILURE TO OBTAIN AND/OR FOLLOW THE ENGINEER'S WRITTEN RESPONSE TO REQUESTS FOR INFORMATION OR CLARIFICATION WITH RESPECT TO ANY ERRORS, OMISSIONS, INCONSISTENCIES, AMBIGUITIES OR CONFLICTS.

33. ALL ACCESS AND EXCAVATION PERMITS ARE TO BE OBTAINED FROM THE SANTA FE COUNTY PUBLIC WORKS DEPARTMENT. SUCH PERMITS SHALL BE REQUESTED FOR ALL CURB CUTS OR DRIVEWAYS TO BE BUILT IN COUNTY RIGHT OF WAY. DRIVEWAYS SHALL NOT BE INSTALLED PRIOR TO COUNTY'S APPROVAL OF SITE SPECIFIC PLANS AND THE CONTRACTOR HAS PROCURED A PERMIT FROM THE COUNTY PUBLIC WORKS DEPARTMENT.

WATERLINE CONSTRUCTION

1. ALL WATER LINE AND FITTING MATERIALS AND THEIR INSTALLATION SHALL COMPLY WITH THE AMERICAN WATERWORKS ASSOCIATION (AWWA) STANDARDS, THE NEW MEXICO STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION, (NMAPWA) 2006 EDITION, OR SUBSEQUENT REVISIONS, AND THE SANTA FE COUNTY WATER UTILITY CONSTRUCTION STANDARD AND SPECIFICATIONS MANUAL, UNLESS OTHERWISE INDICATED ON THESE DRAWINGS. WHEN CONFLICT ARISES AMONG THESE, THE LATTER SHALL PREVAIL.

2. LOCATION OF LINES AND FITTINGS SHALL BE IN ACCORDANCE WITH THE DETAILS SHOWN ON THESE DRAWINGS.

3. UNLESS OTHERWISE INDICATED ON THESE DRAWINGS, PIPELINES AND ALL APPURTENANT FITTINGS SHALL BE DUCTILE IRON, PVC C-900, WITH CLASS-D BEDDING OR BETTER, MECHANICAL OR MEGALUG (R) JOINTS, OR THERMAL FUSION JOINING, RESPECTIVELY (HOPE). EXCAVATION SHALL BE PROPERLY MADE TO ACCOMMODATE THE PIPES BELL ENDS AS NECESSARY. WATERLINES SHALL BE 6" DIAMETER OR LARGER.

4. ALL WATER LINES SHALL BE INSTALLED IN THEIR OWN TRENCH, WITH NO OTHER UTILITIES IN THE TRENCH, BURIED UNDER A MINIMUM 48 INCHES OF COMPACTED BACKFILL.

5. WHEN CROSSING, WATER LINES SHALL ALWAYS BE ABOVE SEWER LINES, AND A MINIMUM 18-INCH CLEARANCE SHALL BE ALLOWED BETWEEN THE BOTTOM OF THE WATER LINE AND THE TOP OF ANY SANITARY SEWER, UNLESS SPECIAL CROSSING PROVISIONS ARE SHOWN ON THESE DRAWINGS.

6. TYPICAL HORIZONTAL SEPARATION BETWEEN WATER LINES AND ANY SANITARY SEWER LINE SHALL BE MINIMUM 10 FEET, AND SEPARATE TRENCHES SHALL BE EXCAVATED IN ALL CASES.

7. CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR DISINFECTION AND PRESSURE TESTING OF ALL NEW WATER LINES, IN ACCORDANCE WITH AWWA STANDARDS. COUNTY UTILITY PERSONNEL SHALL BE PRESENT DURING SUCH TESTING, AND AN INSPECTION REPORT SHALL BE SUBMITTED BY THE CONTRACTOR TO THE COUNTY UTILITIES PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. THE CONTRACTOR SHALL BE RESPONSIBLE FOR COORDINATING WITH THE COUNTY UTILITY STAFF FOR THEIR PRESENCE DURING FIELD TESTING OF LINES. BACTERIA TEST RESULTS OVER 30 DAYS OLD, BY THE COMPLETION OF THE PROJECT SHALL BE RETESTED AT NO ADDITIONAL EXPENSE TO THE OWNER.

8. ALL VALVES 12" DIAMETER OR SMALLER SHALL BE FULL-PORT GATE TYPE, RESILIENT SEATING, MECHANICAL OR MEGALUG (R) JOINTS, PIPE, AND INSTALLED IN COMPLIANCE WITH THE COUNTY WATER SYSTEM DETAILS.

9. UPON COMPLETION ONE VALVE SHALL BE TIED TO ONE OR MORE OF THE SANTA FE COUNTY'S PERMANENT SURVEY MONUMENTS, (OR OTHER VISIBLE WATER FEATURES OR FIXTURES) SUCH AS FIRE HYDRANTS AND WATER METERS WITH DISTANCES BETWEEN ALL FITTINGS AND APPURTENANCES PROVIDED AS REQUIRED IN THE UTILITY DEPARTMENTS CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL. THE WORK SHALL BE PERFORMED BY A REGISTERED NEW MEXICO LICENSED SURVEYOR, OR ENGINEER WITH INFORMATION PROVIDED BY THE CONTRACTOR.

10. ALL FIRE HYDRANTS SHALL BE SUPPLIED WITH NPT CONNECTORS, AND NUMBERED (NUMBER SUPPLIED BY THE COUNTY FIRE DEPARTMENT). HYDRANTS SHALL BE INSTALLED TO ALLOW A MINIMUM HORIZONTAL CLEARANCE OF 3 FEET ALL AROUND THEM.

11. WATER SERVICE CONNECTIONS AND METERS SHALL BE 1-INCH MINIMUM DIAMETER FOR LOTS THAT WILL BE THE SITE FOR RESIDENTIAL BUILDINGS EQUIPPED WITH FIRE SUPPRESSION SYSTEMS. OTHERWISE, CONNECTIONS AND METERS SHALL BE STANDARD 5/8 INCH DIAMETER. METER SETTERS SHALL BE PER STANDARD REQUIRED IN SANTA FE COUNTY UTILITY DEPARTMENT'S CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL. METERS SHALL BE NEPTUNE MACHO-RADIO TRANSMITTER.

12. LOCATE WIRES SHALL BE INSTALLED ON ALL WATER LINES. THE LOCATE WIRE MUST BE VISIBLE IN ALL VALVE VAULTS, MANHOLES OR OTHER ACCESS STRUCTURES. THIS WILL BE VERIFIED DURING THE PRELIMINARY INSPECTION PRIOR TO PAVING. THE LOCATE WIRE SHALL BE A CONTINUOUS, 10 GAUGE, SOLID STRAND INSULATED COPPER WIRE. SPLICES OF THE LOCATE WIRE SHALL FOLLOW THE SPECIFICATIONS IN THE SANTA FE COUNTY UTILITY DEPARTMENTS' CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL.

13. BLUE CARSONITE MARKERS WITH SFCU I.D. STICKERS ARE REQUIRED ON ALL VALVES AND APPURTENANCES, AND EVERY 200 FEET ALONG PIPELINES THAT ARE NOT IN ROADWAY.

SANITARY SEWER LINE CONSTRUCTION

1. ALL SANITARY SEWER LINE INSTALLATION SHALL BE IN COMPLIANCE WITH THE NEW MEXICO STANDARD SPECIFICATIONS FOR PUBLIC WORKS CONSTRUCTION (NMAPWA), 2006 EDITION, SUBSEQUENT REVISIONS AND THE SANTA FE COUNTY WATER UTILITIES STANDARD DETAILS AND REQUIREMENTS, UNLESS OTHERWISE SPECIFIED ON THESE DRAWINGS.

2. PUBLIC SANITARY SEWER LINES SHALL BE A MINIMUM 8-INCH DIAMETER, PVC SDR 26, OR GRAY HDPE DR 11, WITH CLASS D BEDDING OR BETTER, UNLESS OTHERWISE SHOWN ON THESE DRAWINGS. SEWER SERVICE CONNECTIONS SHALL BE OF CAST IRON TAPPING SADDLE WITH STAINLESS STEEL TENSION STRAP TYPE, OR APPROVED EQUIVALENT BY ENGINEER.

3. SANITARY SEWER MANHOLES SHALL HAVE STANDARD 56 COUNTY COVERS AND RINGS.

4. CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR THE PRESSURE TESTING IN ACCORDANCE WITH NMAPWA STANDARDS, AND TELEVISION INSPECTION OF ALL SEWER LINES, PRIOR TO PAVING OF THE ROADS UNDER WHICH SEWER LINES HAVE BEEN INSTALLED. COUNTY UTILITY PERSONNEL SHALL BE PRESENT DURING SUCH TESTING AND AN INSPECTION REPORT SHALL BE SUBMITTED BY THE PROJECT ENGINEER TO THE PROJECT MANAGER AND COUNTY WATER UTILITIES DEPARTMENT PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. SANTA FE COUNTY SHALL REVIEW THE VIDEOS AND TESTS IN DETAIL TO IDENTIFY ANY DEFICIENCIES AND THE CONTRACTOR SHALL CORRECT THEM AS NECESSARY. ALL VIDEO AND TESTS SHALL BE PREPARED IN A RATIONAL SEQUENCE AND PROPERLY LABELED LINES AND MANHOLES SHALL BE IDENTIFIED BY THE NAMES AND STATIONING GIVEN IN THE DESIGN DRAWINGS. VIDEOS SHALL THEN BE TURNED INTO THE COUNTY FOR REVIEW PRIOR TO ACCEPTANCE OF THE SEWER LINES, AND PRIOR TO PAVING.

5. LOW PRESSURE SEWER LINES SHALL NOT LOSE ANY MORE THAN 5 PSI WHEN PRESSURIZED TO 100 PSI FOR A MINIMUM OF ONE HOUR, AN INSPECTION REPORT SHALL BE SUBMITTED TO THE OWNERS PROJECT REPRESENTATIVE (OPR) PRIOR TO PAVING OF THE ROADS UNDER WHICH THESE LINES HAVE BEEN INSTALLED.

6. UPON COMPLETION, ONE MANHOLE SHALL BE TIED TO ONE OR MORE OF THE SANTA FE COUNTY'S PERMANENT SURVEY MONUMENTS (OR OTHER VISIBLE PERMANENT FEATURES OR FIXTURES) AND SUBMITTED IN A TABLE FORMAT WITH THE ASBUILT RECORD DRAWINGS PRIOR TO FINAL ACCEPTANCE OF THE PROJECT. AS PART OF THE FINAL RECORD DRAWINGS, SHOW CORRECTED ASBUILT BEARING AND DISTANCES BETWEEN MANHOLES ALONG THE HORIZONTAL ALIGNMENT OF THE SANITARY SEWER INCLUDING CORRECTED RIM AND INVERT ELEVATIONS AND PIPE SLOPES. THE WORK SHALL BE PERFORMED BY A NEW MEXICO LICENSED SURVEYOR.

7. GREEN CARSONITE MARKERS WITH SFCU I.D. STICKERS ARE REQUIRED ON ALL MANHOLES AND APPURTENANCES, AND EVERY 200 FEET ALONG PIPELINES THAT ARE NOT IN A ROADWAY.

8. WHENEVER SHOWN, LOW PRESSURE SERVICE SANITARY SEWER (LPSAS) LINES SHALL BE PVC SDR 21 PVC SDR 11 HDPE, INSTALLED UNDER A MINIMUM 48-INCH COVER. HIGHER PRESSURE LINES OR FORCE MAINS SHALL BE PVC C-900 CLASS 100 WPR, UNLESS OTHERWISE SPECIFIED IN THESE DRAWINGS.

9. WHEREVER DRAWINGS SHOW A LOW PRESSURE LINE AT A FLUSHING STATION, CONTRACTOR SHALL REFER TO THE MULTI-LINE FLUSHING STATION DETAIL.

10. LOCATE WIRES SHALL BE INSTALLED FOR ALL SANITARY SEWER LINES (GRAVITY AND LOW PRESSURE). THE LOCATE WIRE MUST BE VISIBLE IN ALL MANHOLES OR ACCESS STRUCTURE. THIS WILL BE VERIFIED DURING THE PRELIMINARY MANHOLE INSPECTION PRIOR TO PAVING. THE LOCATE WIRE SHALL BE A CONTINUOUS, 10 GAUGE, SOLID STRAND INSULATED COPPER WIRE. SPLICES OF THE LOCATE WIRE SHALL FOLLOW THE SPECIFICATIONS IN THE SANTA FE COUNTY UTILITY DEPARTMENTS CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL.

11. ALL MANHOLES AND FLUSHING STATIONS SHALL BE MADE A MINIMUM OF 4-FOOT DIAMETER PRE-CAST CONCRETE CYLINDER PIPE SEGMENTS, UNLESS OTHERWISE INDICATED IN THESE DRAWINGS. MANHOLE BOTTOM AND TOP SLABS MAY BE EITHER PRE-CAST OR CAST IN PLACE CONCRETE.

12. A MINIMUM OF ONE FOOT CLEARANCE SHALL BE ALLOWED BETWEEN THE TOP OF A SANITARY SEWER LINE AND THE BOTTOM OF ANY STORM SEWER PIPE OR STRUCTURE.

13. GRINDER PUMPS FOR LOW PRESSURE SEWER SERVICES SHALL BE THE RESPONSIBILITY OF THE INDIVIDUAL LOT OWNER/USER AND SHALL BE PRE-APPROVED BY SFCU IN WRITING.

14. ALL SANITARY SEWER LINES SHALL BE INSTALLED IN THEIR OWN TRENCH, WITH NO OTHER UTILITIES TO SHARE THIS TRENCH, BURIED UNDER A MINIMUM 48 INCHES OF COMPACTED BACKFILL.

15. EXISTING SANITARY SEWER LINES MUST BE VIDEO-INSPECTED PRIOR TO A NEW SERVICE CONNECTION BEING PLACED AS WELL AS RE-VIDEOED AFTER THE SERVICES HAVE BEEN COMPLETED. THIS IS TO ENSURE THAT THE EXISTING SANITARY SEWER LINE HAS NOT BEEN DAMAGED AND THE NEW SERVICE IS INSTALLED CORRECTLY.

16. GRAVITY SEWER LINES, UNLESS OTHERWISE SHOWN ON THE DRAWINGS OR SPECIFICALLY DELETED BY THE ENGINEER, IN WRITING, SHALL BE TESTED FOR LEAKAGE. PLEASE REFER TO SPECIFICATIONS (SECTION 901.7, NMAPWA).

17. NO DISCHARGE INTO THE SANITARY SEWER SHALL BE ALLOWED UNTIL WRITTEN NOTIFICATION BY THE COUNTY WATER UTILITIES THAT DISCHARGE IS ACCEPTABLE.

18. THE OWNER/DEVELOPER WILL BE RESPONSIBLE FOR MAINTAINING REPAIRING AND LOCATING THE SEWER SYSTEM UNTIL SANTA FE COUNTY UTILITIES ACCEPTANCE FOR PERMANENT OPERATIONS AND MAINTENANCE. DAMAGE RESULTING FROM A STOPPAGE IN ANY GRAVITY AND OR PRESSURE SEWER SYSTEM WILL BE THE SOLE RESPONSIBILITY OF THE OWNER/DEVELOPER UNTIL A FINAL ACCEPTANCE LETTER FOR PERMANENT OPERATIONS AND MAINTENANCE HAS BEEN ISSUED BY SANTA FE COUNTY UTILITY.

19. ADDITIONAL GENERAL NOTES ARE CONTAINED IN THE STANDARD COUNTY DETAIL SHEETS FOR SANITARY SEWER CONSTRUCTION.

20. WATER METERS WILL NOT BE PLACED UNTIL A FINAL ACCEPTANCE LETTER HAS BEEN ISSUED FOR ALL SANITARY SEWER NEEDED IN ORDER FOR THIS PROJECT TO CONNECT TO THE SANITARY SEWER SYSTEM.

21. SEWER BACKFLOW CHECK VALVES WILL BE REQUIRED FOR ALL SEWER SERVICE LATERAL CONNECTIONS TO SEWER MAINS 12" OR GREATER IN DIAMETER, OR WHEN A FACILITY OR RESIDENCE IS LOWER THAN THE NEAREST MANHOLES OR ROAD.

22. 20 FOOT WIDE ACCESS GATES SHALL BE PROVIDED AT ALL FENCES, WALLS OR OTHER OBSTRUCTIONS THAT CROSS A PUBLIC SEWER OR WATER LINE. ACCESS GATES TO BE LOCATED WITHIN THE SANITARY SEWER OR UTILITY EASEMENT.

RECLAIMED WATER/EFFLUENT IRRIGATION CONSTRUCTION

1. WHERE INSTALLED ALL RECLAIMED WATER LINES SHALL BE INSTALLED IN ACCORDANCE WITH THE NEW MEXICO STANDARD SPECIFICATION FOR PUBLIC WORKS CONSTRUCTION, THE APPLICABLE AWWA STANDARDS, APPLICABLE REQUIREMENTS OF COUNTY WATER UTILITIES OR THE RECOMMENDATION OF THE PIPE MANUFACTURER. SHOULD THERE BE ANY CONFLICT AMONG THESE DOCUMENTS, THE LATTER SHALL PREVAIL.

2. ALL PIPES, VALVES, AND FITTINGS SHALL BE COLOR-CODED PURPLE (ONE STRIPE) PVC SDR 18 OR HDPE DR 7.3 WITH CHEMICALLY-FUSED JOINTS. WHERE NECESSARY, FLANGED OR MECHANICAL JOINTS, AND OR THRUST BLOCKS SHALL BE INSTALLED IN ACCORDANCE WITH THESE DRAWINGS.

3. ALL VALVES SHALL ALSO HAVE COLOR-CODED PURPLE HANDLES AND BE FULL-PORT BALL TYPE HDPE WITH THERMO-FUSED JOINTS, RINKER POLY-PIPE OAE. CAST IRON VALVE BOX LIDS SHALL BE ENGRAVED "NON-POTABLE".

4. FLUSHING HYDRANTS AND FIRE HYDRANTS OR HOSE BIBS CONNECTED TO RECLAIMED WATER LINES SHALL ALSO BE PAINTED PURPLE AND BARE A SIGN PROMINENTLY PLACED NEXT TO THEM WITH THE FOLLOWING TEXT: "NON POTABLE WATER DO NOT DRINK/PELIGRO - AGUA NO ES PARA BEBER".

5. SERVICE CONNECTIONS SHALL BE 1-INCH, CONSISTENTLY COLOR CODED. THESE SHALL BE THERMO-FUSED WHEN INSTALLED ONTO HDPE PIPES. SERVICE CONNECTIONS ON PVC PIPE SHALL BE MADE WITH THE APPROPRIATE TEES, REDUCERS, VALVES, VALVE BOXES ETC. INDIVIDUAL SERVICE CONNECTIONS SHALL BE METERED. METERS SHALL BE NEPTUNE MACHO-RADIO TRANSMITTER, OR CURRENT MAKE & MODEL REQUIRED BY SFC UTILITY.

6. RECLAIMED WATER/EFFLUENT IRRIGATION LINES SHALL NEVER BE CONNECTED TO THE POTABLE DOMESTIC SUPPLY SYSTEM.

7. ALL RECLAIMED WATER LINES SHALL BE INSTALLED IN THEIR OWN TRENCH, WITH NO OTHER UTILITIES SHARING THIS TRENCH, BURIED UNDER MINIMUM 48 INCHES OF COMPACTED BACKFILL.

8. LOCATE WIRES SHALL BE INSTALLED FOR ALL RECLAIMED WATER LINES. THE LOCATE WIRE MUST BE VISIBLE IN ALL MANHOLES OR ACCESS STRUCTURES. THIS WILL BE VERIFIED DURING THE PRELIMINARY INSPECTION PRIOR TO PAVING. THE LOCATE WIRE SHALL BE A CONTINUOUS, 10 GAUGE, SOLID STRAND INSULATED COPPER WIRE. SPLICES OF THE LOCATE WIRE SHALL FOLLOW THE SPECIFICATIONS IN THE SANTA FE COUNTY WATER UTILITIES CONSTRUCTION STANDARDS AND SPECIFICATIONS MANUAL.

9. PURPLE CARSONITE MARKERS WITH I.D. STICKERS ARE REQUIRED ON ALL VALVES AND APPURTENANCES, AND EVERY 200 FEET ALONG PIPELINES THAT ARE NOT IN ROADWAY.

DRY UTILITIES

1. SHADING AND BEDDING MATERIAL SHALL BE TYPE IV, CLASS 1 FOR DIRECT BURY CABLE, AND TYPE IV, CLASS 2 FOR CABLE IN CONDUIT. TYPE 111 MATERIAL SHALL BE CONSIDERED SUITABLE FOR EITHER TYPE OF INSTALLATION.

2. IF TRENCH-HUN MATERIAL MEETS BACKFILL MATERIAL REQUIREMENTS, 3-INCH BEDDING MAY BE OMITTED, PROVIDED THAT THE TRENCH BOTTOM IS SMOOTH, FLAT, AND WITHOUT SURFACE IRREGULARITIES.

3. SEPARATION BETWEEN JACKETED PRIMARY AND COMMUNICATION CABLES SHALL BE AT LEAST 12 INCHES.

4. WARNING TAPE SHALL BE PLACED A MINIMUM 12 INCHES ABOVE THE UPPER LEVEL OF UTILITIES AT THE CENTER OF THE TRENCH.

5. DRY UTILITY REQUIREMENTS SPECIFIED BY THE RESPECTIVE UTILITY SHALL BE FOLLOWED.

ENVIRONMENTAL EROSION AND SEDIMENT CONTROL REQUIREMENTS

1. THE CONTRACTOR SHALL SUBMIT TO THE PROJECT MANAGER AND OR OPR A SWPP PLAN THAT COMPLIES WITH THE 2012 CONSTRUCTION GENERAL PERMIT AND SUBSEQUENT REVISIONS.

2. AT A MINIMUM, ALL AREAS DENUED AND/OR DISTURBED BY CONSTRUCTION TRAFFIC SHALL BE SPRAYED WITH WATER ON A DAILY BASIS TO CONTROL DUST GENERATION. ADDITIONAL WATER SHALL BE APPLIED ON WINDY DAYS AS NEEDED OR AS REQUIRED BY SANTA FE COUNTY.

3. AS SOON AS FINAL GRADES ARE ACHIEVED, AND PROPER CLMATIC CONDITIONS PREVAIL, NATIVE GRASS SEEDS SHALL BE APPLIED. CONTRACTOR SHALL PERFORM THIS ACTIVITY IN CONFORMANCE WITH THE APPROVED TERRAIN MANAGEMENT PLAN FOR SEED MIX DETAILS, AS WELL AS APPLICATION AND CARE METHODOLOGY.

4. GRAVEL BAGS AND OTHER EPA APPROVED DEVICES SHALL BE INSTALLED AROUND DROP INLET GRATES IMMEDIATELY AFTER THEIR INSTALLATION TO PREVENT SEDIMENT FROM ENTERING THE STORM WATER SYSTEM. SEDIMENT DEPOSITED AROUND GRAVEL BAGS AND OTHER EPA APPROVED DEVICES SHALL BE SWEEPED AND REMOVED IMMEDIATELY UPON DEPOSITION.

5. SILT FENCES OR WADDLES MEETING EPA REQUIREMENTS FOR SEDIMENT CONTROL SHALL BE INSTALLED AT ALL SLOPES IN STRICT ACCORDANCE WITH SWPP PLAN.

6. CONTRACTOR SHALL DISPOSE OF ITEMS DESIGNATED FOR REMOVAL WITHOUT SALVAGE, WHICH ARE UNSUITABLE FOR USE AS CONSTRUCTION MATERIALS IN THIS PROJECT. DISPOSAL SHALL BE PERFORMED IN AN ENVIRONMENTALLY SOUND SITE, SECURED BY THE CONTRACTOR IN CLOSE COORDINATION WITH THE APPROPRIATE REGULATORY AGENCIES. CONTRACTOR SHALL NOTIFY THE PROJECT MANAGER AND/OR OPR, IN WRITING, OF ANY RELEVANT DETAILS IN CONNECTION WITH THE DISPOSAL OPERATIONS.

7. BORROW MATERIAL, CONSTRUCTION WASTE, VEGETATIVE DEBRIS, ETC SHALL NOT BE PLACED IN WETLAND AREAS ARROYOS, OR ANY AREAS ENDANGERED SPECIES, OR HABITAT RESOURCES MAY BE AFFECTED. BORROW AREAS NOT CONTIGUOUS TO THE PROJECT SITE SHALL BE SHOWN IN THE SWPPP.

8. CONTRACTOR SHALL BE RESPONSIBLE FOR CLEANING UP SPILLS ASSOCIATED WITH THE PROJECT'S CONSTRUCTION ACTIVITIES. CONTRACTOR SHALL REPORT AND PROPERLY RESPOND TO SPILLS OF HAZARDOUS MATERIALS SUCH AS GASOLINE, DIESEL, MOTOR OIL, SOLVENTS, TOXIC AND CORROSIVE SUBSTANCES, AND OTHER MATERIALS WHICH MAY REPRESENT A THREAT TO THE HEALTH AND WELFARE OF HIS WORKERS, THE GENERAL PUBLIC, OR THE ENVIRONMENT. CONTRACTOR SHALL REPORT EVIDENCE OF PAST SPILLS ENCOUNTERED DURING CONSTRUCTION, AND PREVENT SPILLS NOT ASSOCIATED WITH THE CONSTRUCTION OF THIS PROJECT. REPORTS SHALL BE MADE IMMEDIATELY TO THE PROJECT MANAGER AND OR OPR AND THE APPROPRIATE STATE AGENCY RESPONSIBLE FOR THE EMERGENCY RESPONSE. CLEAN UP OF ANY UNREPORTED SPILLS THAT MAY HAVE OCCURRED DURING THE CONSTRUCTION OF THIS PROJECT, IDENTIFIED AFTERWARDS SHALL BE THE SOLE RESPONSIBILITY OF THE CONTRACTOR.

9. ALL WORK PERFORMED IN THE VICINITY OF EXISTING STREAMS, WATER IMPOUNDMENTS, WETLANDS OR IRRIGATION WATER SOURCES SHALL BE PERFORMED IN SUCH A MANNER AS TO MINIMIZE VEGETATION DAMAGE OR REMOVAL AS WELL AS ANY SOIL EROSION. CONSTRUCTION EQUIPMENT'S CROSSINGS OF EXISTING STREAMS, WHETHER THE STREAMS ARE EPHEMERAL OR PERENNIAL SHALL BE MINIMIZED, AND IN COMPLIANCE WITH THE CLEAN WATER ACT (CWA), USEAC 404, OR OTHER FEDERAL PERMIT REQUIREMENTS.

10. ALL WORK PERFORMED IN A FLOOD PLAIN SHALL COMPLY WITH THE SANTA FE COUNTY FLOOD PLAIN ORDINANCE.

11. RE-FUELING OPERATIONS AND CONCRETE DUMPING IN THE VICINITY OF ANY BODY OF WATER SHALL BE STRICTLY PROHIBITED.

TERRAIN MANAGEMENT AND RE-VEGETATION WORK REQUIREMENTS

1. ALL AREAS DISTURBED BY THE CONSTRUCTION ACTIVITIES OF THIS PROJECT, INCLUDING ANY TEMPORARY ACCESS ROAD, SHALL BE RE-GRADED TO THEIR ORIGINAL CONTOURS, AND RE-SEEDED IN ACCORDANCE WITH THE FOLLOWING PLAN AFTER COMPLETION OF THE CONSTRUCTION OPERATIONS.

2. CONTRACTOR SHALL BE RESPONSIBLE FOR THE SUCCESSFUL RECOVERY OF DISTURBED AREAS FOLLOWING RE-VEGETATION THROUGH THE FIRST GROWING SEASON AFTER COMPLETION OF THIS PROJECT. IN THE EVENT THAT THE RE-VEGETATION PLAN CANNOT BE ACCOMPLISHED BEFORE SEPTMBER 1 DUE TO CONSTRUCTION DELAYS, AND DISTURBED SURFACES MUST REMAIN EXPOSED AFTER THIS DATE, THE CONTRACTOR SHALL INSTALL TEMPORARY PROTECTION SUCH AS A COVER CROP OR A MULCH TO PREVENT SOIL EROSION, AT NO ADDITIONAL COST TO THE OWNER. A TEMPORARY CONSTRUCTION FENCE SHALL BE MAINTAINED AROUND THE DISTURBED AREA UNTIL THE NEW VEGETATION IS ESTABLISHED.

3. AREAS WITH A SLOPE LESS THAN 4:1 SHALL BE TREATED WITH DRILL SEEDING, WHILE SLOPES EXCEEDING 4:1 SHALL BE TREATED WITH BROADCAST AND HYDRO SEEDING AND SHALL INCLUDE HAND-RAKING OR CHAIN-HARROWING TO COVER SEED TO A DEPTH OF 1/4-INCH TO 1/2-INCH. SLOPES EXCEEDING 3:1 SHALL BE TREATED WITH THE EROSION BLANKET, MEETING NMDOT CLASS D SPECIFICATIONS AND IN COMPLIANCE WITH THE EPA'S (CONSTRUCTION GENERAL PERMIT) FOR FINAL STABILIZATION. ALL TOP SOIL WHICH MUST BE REMOVED OR DISTURBED DURING CONSTRUCTION SHALL BE SAVED AND STOCKPILED AT A LOCATION DESIGNATED BY THE OPR. ANY DISTURBED AREA TO BE SEEDD WHICH HAS LESS THAN 6 INCH TOTAL TOP SOIL DEPTH SHALL BE SUPPLEMENTED TO A 6 INCH DEPTH WITH THE STOCKPILED MATERIAL.

4. THE SEED BED SHALL BE PREPARED TO A MINIMUM 4-INCH DEPTH BY TILLING WITH A DISC, HARROW, OR CHISELING TOOLS. ALL COMPETITIVE VEGETATION SHALL BE UPROOTED DURING THIS PREPARATION, AND THE SOIL SHALL BE UNIFORMLY WORKED TO A SMOOTH, FIRM SURFACE FREE OF CLODS, STONES OR OTHER EXTRANEOUS MATERIALS 4 INCH OR LARGER THAT WOULD INTERFERE WITH SEEDING EQUIPMENT AND GERMINATION. SEED BED PREPARATION BY MECHANICAL MEANS WILL NOT BE REQUIRED ON SLOPES EXCEEDING 3:1 IF, IN THE OPINION OF THE PROJECT MANAGER AND OR OPR, SEED BED PREPARATION ON THESE SLOPES IS IMPRACTICAL OR UNSAFE. ALL TILLING SHALL BE PERFORMED ACROSS THE SLOPE WHEN PRACTICAL AND SHALL BE PERFORMED IN TWO DIRECTIONS WHENEVER ONE PASS IS INSUFFICIENT, IN THE OPR'S OPINION, TO ADEQUATELY BREAK UP THE SOIL. TILLING SHALL NOT BE PERMITTED WHEN THE WIND BLOWS AT MORE THAN 10 MPH CAUSING DUST GENERATION AND MOVEMENT IN TO ADJACENT AREAS. NO WORK SHALL BE PERFORMED WHEN THE SOIL'S MOISTURE CONTENT IS UNFAVORABLE, OR THE GROUND CONDITIONS ARE NOT SUITABLE FOR TILLING.

5. SEED SHALL BE UNIFORMLY APPLIED OVER THE AREA TO BE TREATED. THE CONTRACTOR'S EQUIPMENT SHALL NOT TRAVEL OVER THE SEEDER AREAS. IF RAIN OR OTHER NATURAL PHENOMENA, WHICH MAKE THE SOIL UNSUITABLE FOR SEEDING, THE CONTRACTOR SHALL RE-PREPARE THE SOIL AS DESCRIBED HEREBY AT NO ADDITIONAL COST TO THE OWNER. SEEDS SHALL BE DRILLED TO A MINIMUM OF 1/2-INCH, UNLESS OTHERWISE INDICATED ON THESE DRAWINGS. DIRECTION OF SEEDING SHALL BE ACROSS THE SLOPES AND ON THE CONTOUR WHENEVER POSSIBLE.

6. BROADCAST SEEDING SHALL ONLY BE PERFORMED IN SLOPES EXCEEDING 3:1 OR IN AREAS INACCESSIBLE TO THE SEED DRILL. BROADCAST SEEDING SHALL BE PERFORMED WITH A ROTARY SPREADER OR A SEEDER BOX WITH GEAR FEED MECHANISM IF DRILL SEEDING IS NOT PRACTICAL. RICE HULLS OR OTHER FILLS SHALL BE USED TO PREVENT UNEVEN SEPARATION OF LIGHTER SEED. SEED BED SHALL BE LIGHTLY RAKED IMMEDIATELY FOLLOWING THE SEEDING OPERATION, TO PROVIDE 1/2-INCH SOIL COVER OVER THE SEED.

7. MULCH SHALL BE PLACED OVER ALL SEEDER AREAS. THE MULCH SHALL BE MADE OF STRAW OR HAY, AND APPLIED TO PRODUCE A DEPTH OF 1-1/2-INCH TO 2-INCH. STRAW OR HAY WITH NOXIOUS SEEDS OR PLANTS, ROTTED, BRITTLE, SHORT FIBERED, OR IMPROPERLY CURED IS NOT ACCEPTABLE.

8. SEED MIX AND SEEDING RATE ARE AS FOLLOWS:
DRYLAND BLEND

SEED	PERCENTAGE OF SEED MIX
SIDE OATS GRAMA	20%
BLUE GRAMA	30%
LITTLE BLUESTEM	20%
INDIAN REEDGRASS	10%
SHEEP FESCUE	10%
STREAMBANK WHEATGRASS	4%
ALKALI SACATON	3%
GALLETA	3%
WILD FLOWER MIX	5% OF TOTAL SEED WEIGHT

NOTE: POUNDS PER ACRE OF SEED MIXTURE: 15-20 LBS IF DRILLED; 20-25 LBS. IF BROADCAST, SEED SHALL BE CERTIFIED NOXIOUS WEED FREE.

General Notes

Project

ES_2024-116

Date

05/14/2025

Site

March 2025

Approved

By: *Thomas A. Densford*

SHEET NO. 15

3/30/2025

REGISTERED PROFESSIONAL ENGINEER
STATE OF NEW MEXICO
10874
THOMAS A. DENSFORD

IVAN TRUJILLO
30-Mar-25

Drawing File: C:\USERS\ITRUJILLO\DOCUMENTS\10_IPT WORKING\COLLEGE DRIVE\0_PLAN SHEETS\1-SHEETS (GENERAL)\CADD\COLLEGE DR_GENERAL NOTES (REV1 03.30.2025).DWG
1:08 PM

PROJECT DEVELOPED BY: Earth & Steel Design, LLC

DRAWING SCALE: NONE

ENVIRONMENTAL COMMITMENTS

THE CONTRACTOR SHALL REFER TO SECTION 107 OF THE NMDOT STANDARD SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION - 2019 EDITION, MAKING SPECIAL NOTE OF **SUB-SECTION 107.14: CONTRACTOR'S RESPONSIBILITY FOR ENVIRONMENTAL AND CULTURAL RESOURCE PROTECTION.**

☒

NO ADDITIONAL PROJECT SPECIFIC ENVIRONMENTAL REQUIREMENTS APPLY.

☐

IN ADDITION TO SECTION 107, THE FOLLOWING PROJECT SPECIFIC ENVIRONMENTAL REQUIREMENTS APPLY:

General Notes

No.	Revision/Issue	Date



Environmental Commitments

Santa Fe County Land Use

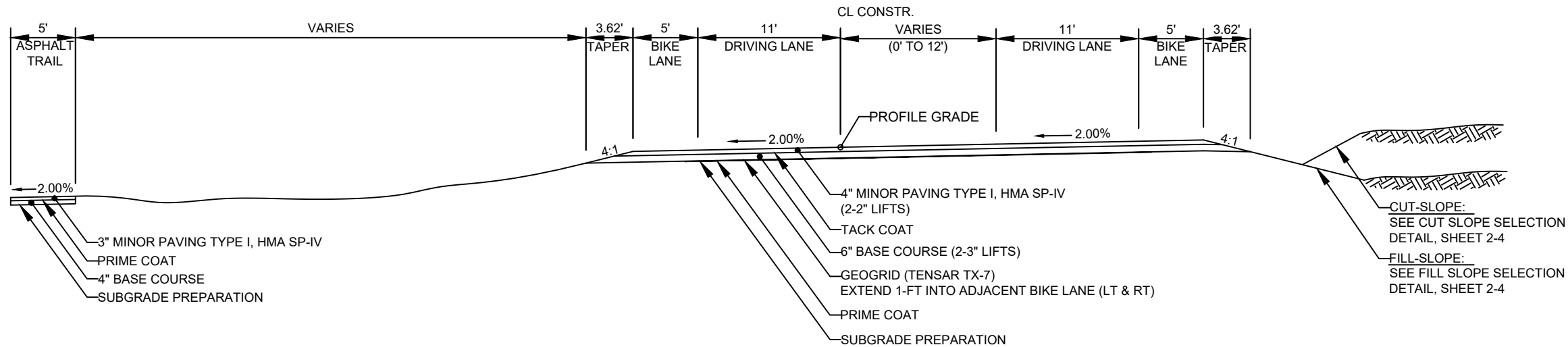
Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

BY SHEET NO. 1-6

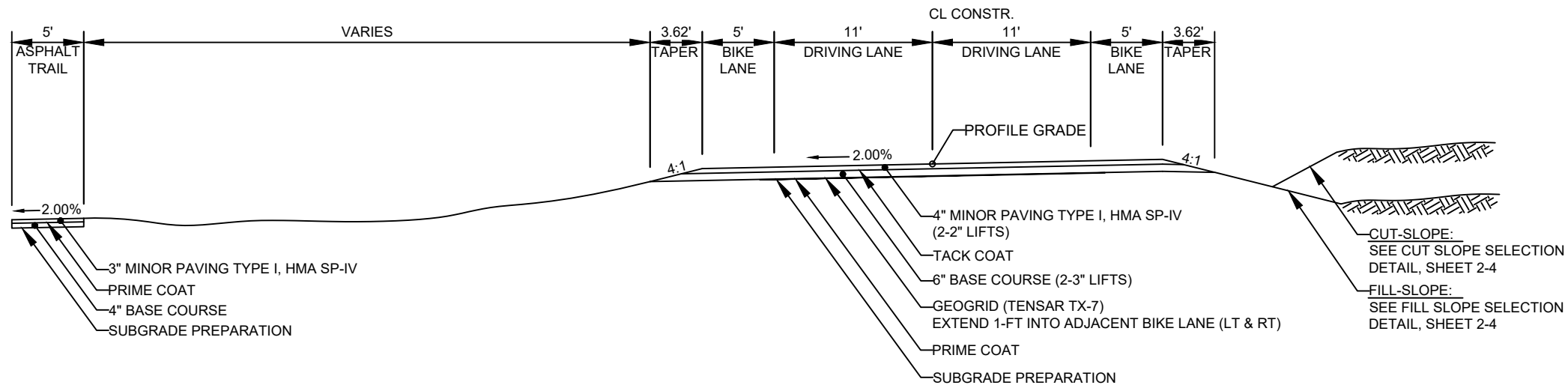


3/30/2025
5



COLLEGE DRIVE - TYPICAL SECTION "B"

STA. 30+57.87 TO STA. 32+38.78 - TRANSITION TYP. SECT. "A" TO "B"



COLLEGE DRIVE - TYPICAL SECTION "A"

STA. 17+80.52 TO STA. 30+57.87
STA. 40+14.16 TO STA. 48+27.90

General Notes

1. THE CONTRACTOR SHALL WARP SLOPES TO REMAIN WITHIN THE RIGHT OF WAY (ROW). IF THE SLOPE REQUIRED IS STEEPER THAN 2:1, THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD FOR DIRECTION.

No.	Revision/Issue	Date
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Typical Sections

Santa Fe County Land Use

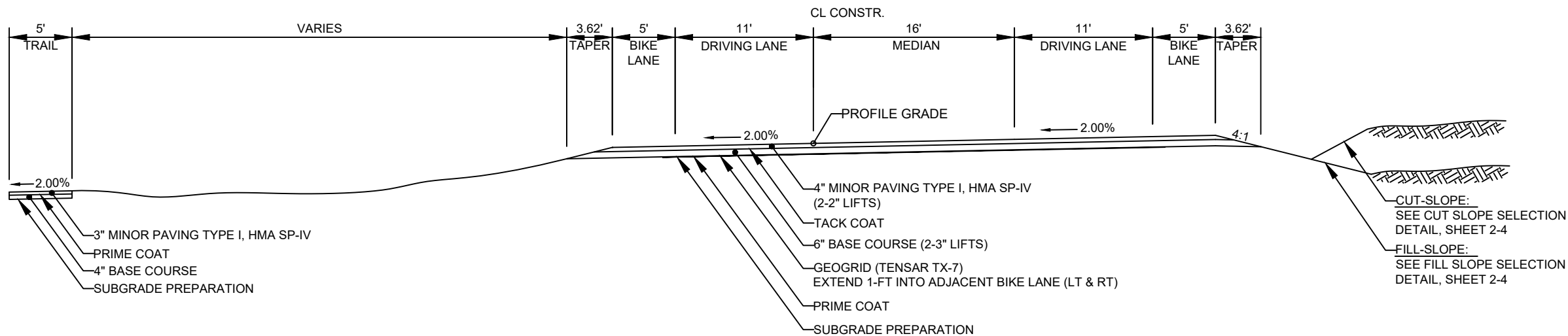
Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

BY SHEET NO. 2-1

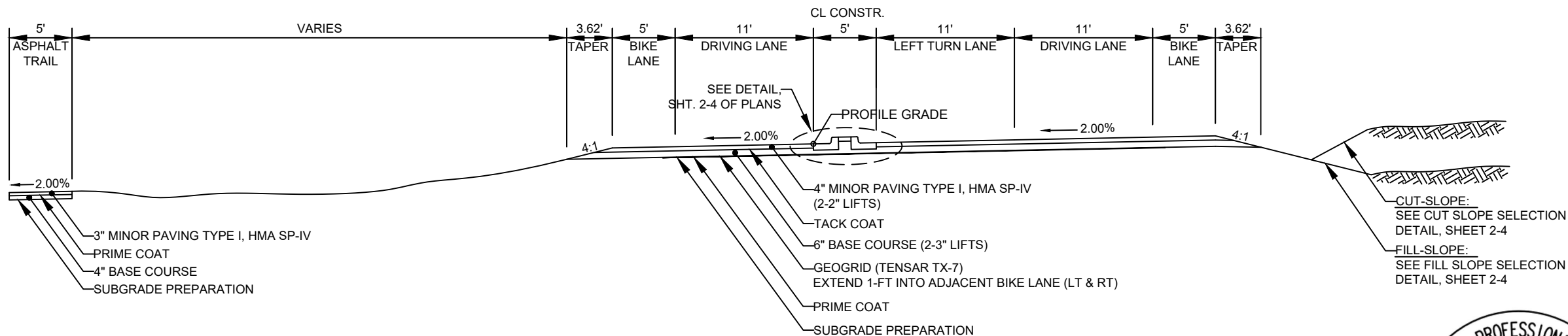


3/30/202
5



COLLEGE DRIVE - TYPICAL SECTION "D"

STA. 35+93.03 TO STA. 36+47.28



COLLEGE DRIVE - TYPICAL SECTION "C"

STA. 32+38.78 TO STA. 34+35.83 - TRANSITION TYP. SECT. "B" TO "C"

STA. 34+35.83 TO STA. 35+85.70

STA. 35+85.70 TO STA. 35+93.03 - TRANSITION TYP. SECT. "C" TO "D"



3/30/202
5

General Notes

1. THE CONTRACTOR SHALL WARP SLOPES TO REMAIN WITHIN THE RIGHT OF WAY (ROW). IF THE SLOPE REQUIRED IS STEEPER THAN 2:1, THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD FOR DIRECTION.

No.	Revision/Issue	Date



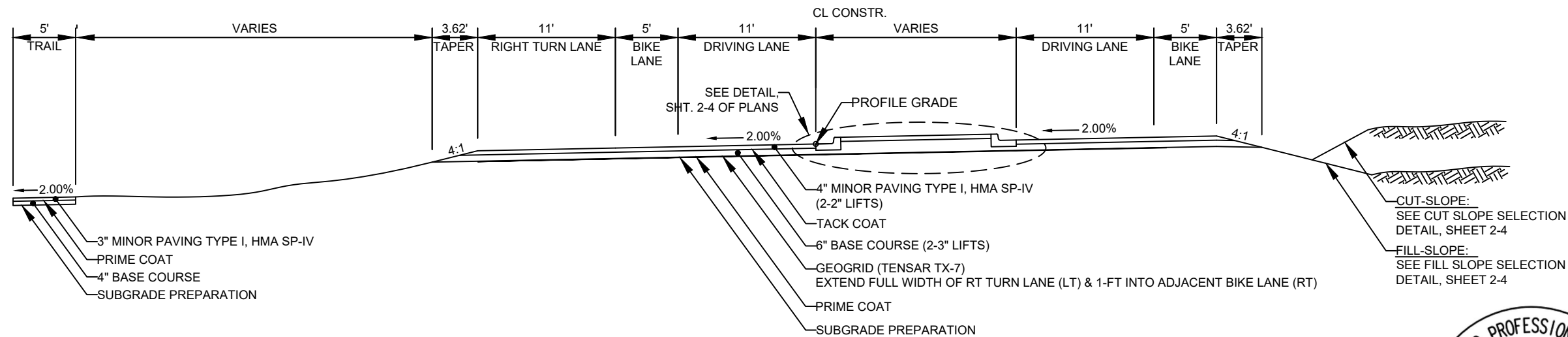
Typical Sections

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

BY SHEET NO. 2-2 Roybal



COLLEGE DRIVE - TYPICAL SECTION "E"

STA. 36+47.28 TO STA. 38+10.03
STA. 38+10.03 TO STA. 40+14.46 - TRANSITION TYP. SECT. "E" TO "A"



General Notes

1. THE CONTRACTOR SHALL WARP SLOPES TO REMAIN WITHIN THE RIGHT OF WAY (ROW). IF THE SLOPE REQUIRED IS STEEPER THAN 2:1, THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD FOR DIRECTION.

No.	Revision/Issue	Date



Typical Sections

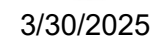
Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

BY SHEET NO. 2-3

3/30/2025



STA. 17+80.52



STA. 48+27.90



General Notes

1. THE CONTRACTOR SHALL WARP SLOPES TO REMAIN WITHIN THE RIGHT OF WAY (ROW). IF THE SLOPE REQUIRED IS STEEPER THAN 2:1, THE CONTRACTOR SHALL NOTIFY THE ENGINEER OF RECORD FOR DIRECTION.
2. THE BOP AND EOP COLD-MILL CONNECTIONS WILL BE CONSIDERED INCIDENTAL TO THE COMPLETION OF THE PROJECT AND NO SEPARATE MEASUREMENT OR PAYMENT WILL BE MADE.

No.	Revision/Issue	Date



Miscellaneous Details

~~Santa Fe County Land Use~~

Project	ES_2024-116
Date	05/14/2025
	March 2025
Scale	

Approved _____
By Gerardo T. Roybal
SHEET NO. 2-4

SURFACING SCHEDULE							207000		303160			416104				****	****	407000		408100	
							SUBGRADE PREPARATION		BASE COURSE 6"			MINOR PAVING TYPE I, HMA SP-IV				PG 76-28 ASPHALT MATERIAL	HYDRATED LIME	ASPHALT MATERIAL FOR TACK COAT	PRIME COAT MATERIAL		
	STATION	TO	STATION		DESCRIPTION	LENGTH (L.F.)	AVG. WIDTH (L.F.)	AREA (S.Y.)	AVG. WIDTH (L.F.)	DEPTH (IN.)	AREA (S.Y.)	AVG. WIDTH (L.F.)	DEPTH (IN.)	AREA (S.Y.)	TON	TON	TON	AVG. WIDTH (L.F.)	TON	AVG. WIDTH (L.F.)	TON
COLLEGE DRIVE																					
	17+80.52	-	48+27.90		COLLEGE DRIVE ROADWAY	3047.38	45.02	15,244	42.81	6.00	14,495	39.15	4.00	13,256.10	2,945.80	144.34	29.46	39.15	4.42	40.69	25.83
	17+80.52	-	48+27.90		COLLEGE DRIVE TRAIL	3135.00	5.00	1,742	5.00	4.00	1,742	5.00	3.00	1,741.67	290.28	14.22	2.90	5.00	0.58	5.00	3.27
						PROJECT TOTAL		16,985			16,237				3,236	159	32		5		29
						PROJECT USE		17,000			16,240				3,240				5		30



~~Santa Fe County Land Use~~

Approved



STORM WATER POLLUTION PREVENTION PLAN INFORMATION

NOI INPUTS

NMDOT PROJECTS REQUIRE ELECTRONIC NOI SUBMISSION - PAPER SUBMISSION REQUIRES PRIOR APPROVAL.	
PERMIT NUMBER: NMR100000 STATE OF NEW MEXICO, EXCEPT INDIAN COUNTRY NMR101000 INDIAN COUNTRY WITHIN THE STATE OF NEW MEXICO, EXCEPT NAVAJO RESERVATION LANDS THAT ARE COVERED UNDER ARIZONA PERMIT AZ100001 AND UTE MOUNTAIN RESERVATION LANDS THAT ARE COVERED UNDER COLORADO PERMIT COR100001.	
OPERATOR NAME: COUNTY OF SANTA FE, NM	
POINT OF CONTACT: SANTA FE COUNTY PUBLIC WORKS DIRECTOR	
NOI PREPARED BY: SANTA FE COUNTY PUBLIC WORKS DIRECTOR	
PROJECT / SITE NAME: SANTA FE COUNTY PROJECT NUMBER	
PROJECT / SITE ADDRESS: COLLEGE DRIVE, SANTA FE, NM	
LATITUDE (XX.XXXX° N):	35.6079° N
LONGITUDE (XXX.XXXX° W):	105.9947° W
ESTIMATED PROJECT START DATE (MM/DD/YYYY):	TO BE DETERMINED BY SF COUNTY PROJECT MANAGER
ESTIMATED PROJECT COMPLETION DATE (MM/DD/YYYY):	TO BE DETERMINED BY SF COUNTY PROJECT MANAGER
ESTIMATED AREA TO BE DISTURBED (Nearest ¼ acre):	4.50 acres
TYPE OF CONSTRUCTION:	PAVED ROAD WITH MULTI-USE PATH
WAS THE PRE-DEVELOPMENT LAND USE USED FOR AGRICULTURE? (YES/NO):	NO
HAVE EARTH-DISTURBING ACTIVITIES COMMENCED? (YES/NO):	NO
PREVIOUS NPDES PERMIT? IF YES, PROVIDE NPDES #:	NO
ARE THERE OTHER OPERATORS COVERED UNDER THIS PERMIT FOR THIS PROJECT? IF YES, PROVIDE NPDES #	NO
WILL THERE BE DEMOLITION OF ANY STRUCTURES, 10,000 SQUARE FEET OR GREATER, BUILT OR RENOVATED BEFORE JANUARY 1, 1980? (YES/NO):	NO
WILL SITE DISCHARGE DEWATERING WATER? (YES/NO)	NO
IF DEWATERING, IS IT FROM A CURRENT OR FORMER FEDERAL OR STATE REMEDIATION SITE? (YES/NO)	NO
MUNICIPAL SEPARATE STORM SEWER SYSTEM (MS4): NAME	NONE
ARE THERE SURFACE WATERS WITHIN 50 FT.? (YES/NO):	NO
RECEIVING WATER:	ARROYO HONDO
IMPAIRED WATERS:	NONE
IMPAIRED WATERS METHOD: CONSULTATION OF NEW MEXICO ENVIRONMENT DEPARTMENT LISTING OF STATEWIDE 303D AND TMDL IMPAIRMENTS.	
TIER 2, TIER 2.5, TIER 3, WATERS: (CONSULT NMDOT DRAINAGE DESIGN BUREAU): TBD	
CHEMICAL TREATMENT INFORMATION: TYPICAL NMDOT PROJECT WILL NOT UTILIZE THESE CHEMICALS.	
SWPPP CONTACT INFORMATION: SANTA FE COUNTY PUBLIC WORKS DIRECTOR	
ENDANGERED SPECIES CRITERIA (A, B, C, D, E, or F): ?	
HISTORIC PRESERVATION: NONE. HISTORIC PROPERTIES WILL NOT BE IMPACTED. THE ENVIRONMENTAL COMMITMENTS WILL INDICATE EXISTENCE OF HISTORIC PROPERTIES. IF HISTORIC PROPERTIES EXIST, THE TESC SHEETS CAN SHOW NO EFFECT ON HISTORIC PROPERTIES. ALL STORMWATER CONTROLS REQUIRE SUBSURFACE DISTURBANCE.	
CERTIFICATION: PER APPENDIX G, SECTION G.11 OF THE 2022 CGP, THE NOI MUST BE CERTIFIED BY A RESPONSIBLE CORPORATE OFFICER, OR A PRINCIPAL EXECUTIVE OFFICER, OR RANKING ELECTED OFFICIAL.	

GENERAL NOTES:

1. THE MORE STRINGENT REQUIREMENT OF EITHER THE 2020 EDITION OF THE NMDOT NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) MANUAL OR SECTION 603 - TEMPORARY EROSION AND SEDIMENT CONTROL OF THE 2019 NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION SHALL BE USED AS MINIMUM REQUIREMENTS TO DEVELOP OR MODIFY THE STORM WATER POLLUTION PREVENTION PLAN (SWPPP).
2. INFORMATION NEEDED TO COMPLETE THE NOTICE OF INTENT (NOI) IS PROVIDED IN THIS PLAN.
3. THE CONTRACTOR SHALL SPECIFICALLY DEFINE ALL REQUIRED CONTROL MEASURES FOR EACH CONSTRUCTION PHASE, AND SHALL COMPLY WITH THE PROVISIONS OF THE LATEST NPDES MANUAL AND THE 2022 CONSTRUCTION GENERAL PERMIT (CGP).
4. THE FINAL SEEDING AND REVEGETATION PLAN, ALONG WITH THE MEASURES SHOWN ON THE FINAL STABILIZATION TESC P SHEETS (IF INCLUDED) SERVE AS THE FINAL SOIL STABILIZATION MANAGEMENT PRACTICE.
5. CLASS 'A' AND CLASS 'C' SEEDING SHOULD USE QUANTITIES SHOWN IN THE 2019 NMDOT STANDARD SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION. QUANTITIES SHOWN IN THE RUSLE2 CALCULATIONS ARE FOR PERMIT COMPLIANCE ONLY.



General Notes		
No.	Revision/Issue	Date

Earth & Steel DESIGN

www.earthandsteeldesign.com
505-470-5506

Civil and Structural Engineering
Project and Construction Management

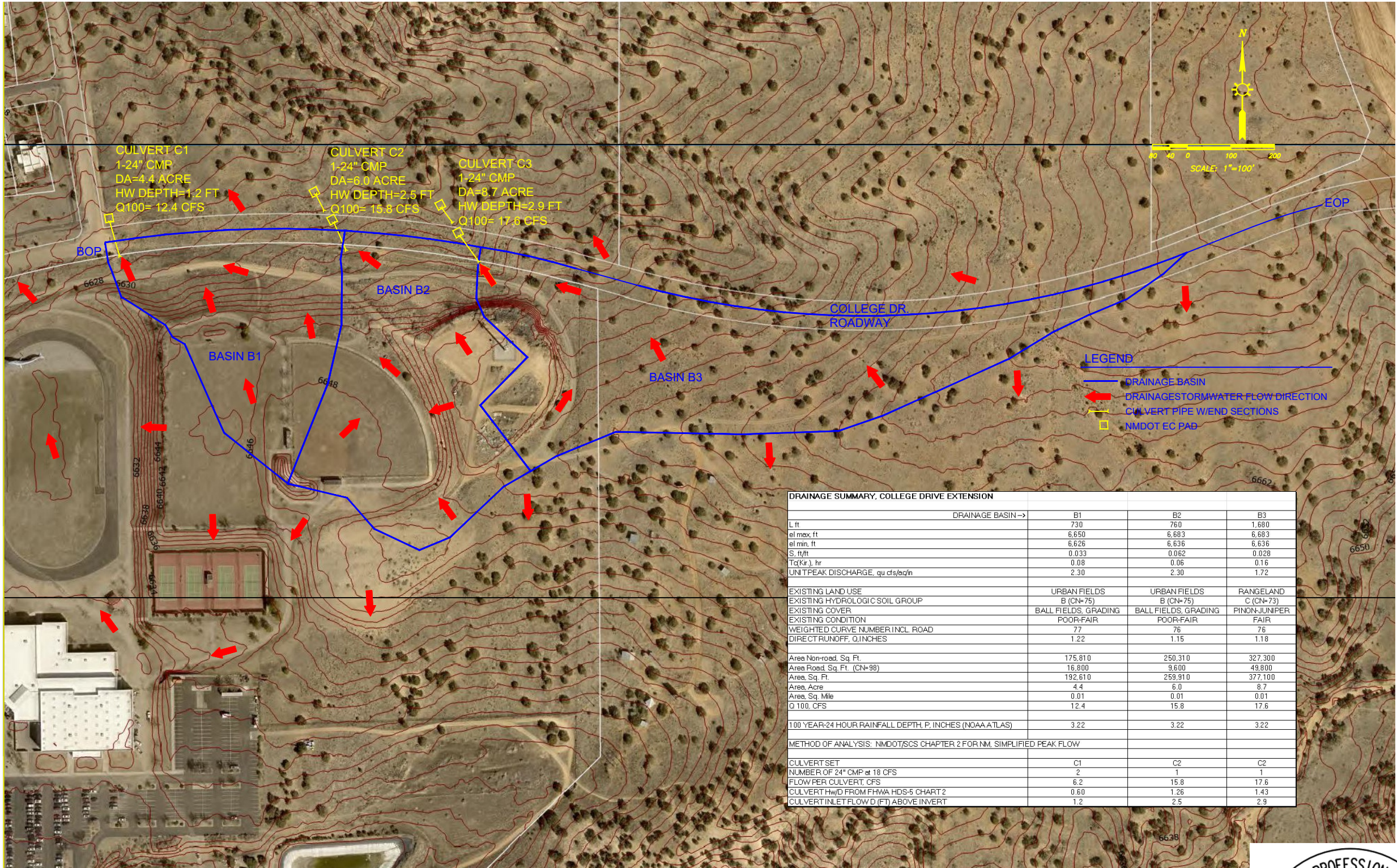
Storm Water Pollution Prevention Plan

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	

Approved

By: Shawn R. Goff



3/30/2025

General Notes

No.

Revision/Issue

Date



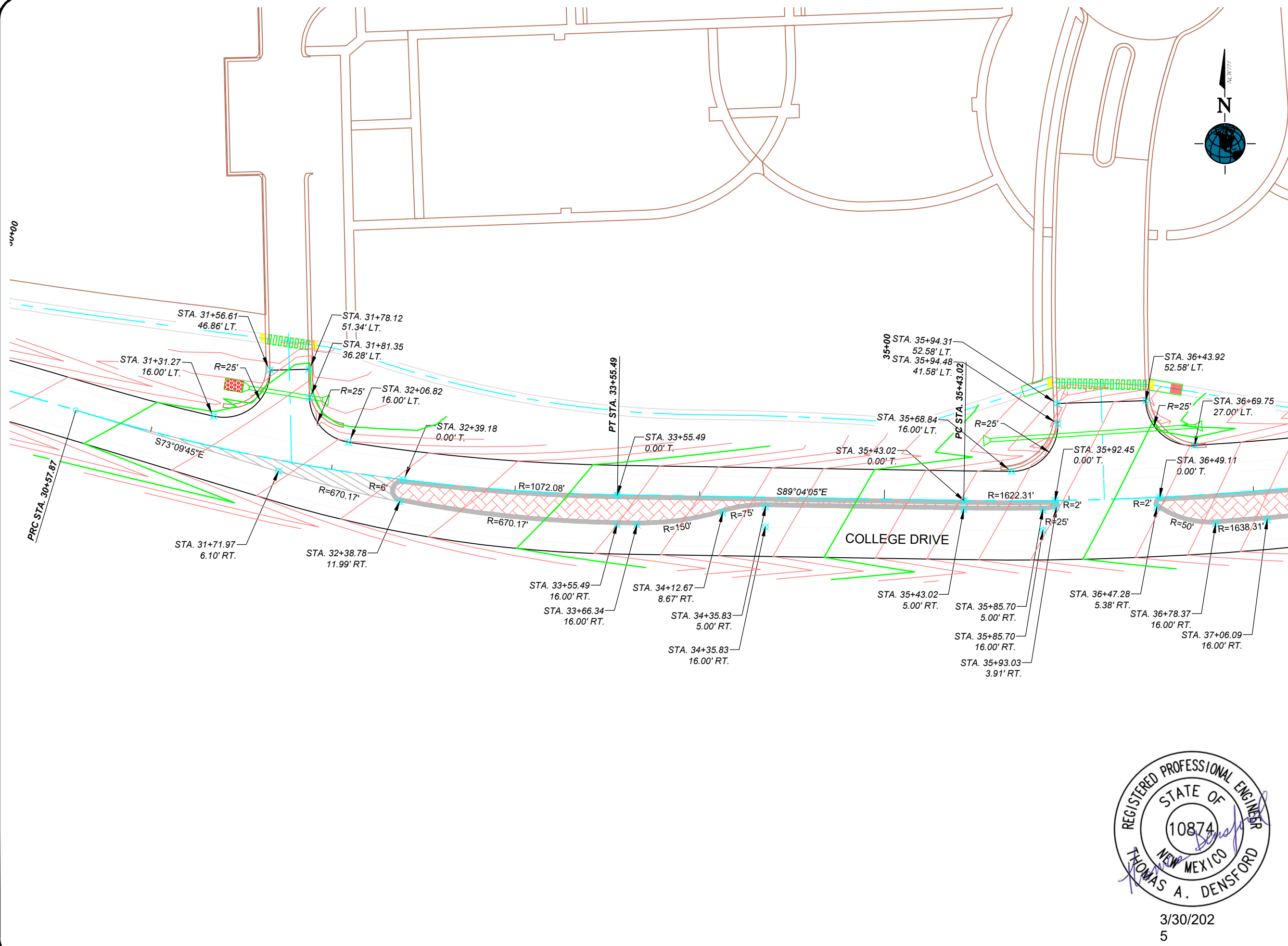
Earth & Steel DESIGN
www.earthandsteel.com
505.470.5506

Civil and Structural Engineering
Project and Construction Management

Drainage Summary

Santa Fe County Land Use

Project ES_2024-116
Date 05/14/2025
Scale
Approved
By: SHEET NO. 2 Roybal



General Notes

1. STATION AND OFFSET INFORMATION SHOWN HEREIN IS LOCATED AT THE LIP OF CURB & GUTTER, WHERE APPLICABLE.

No.	Revision/Issue	Date



3/30/202
5

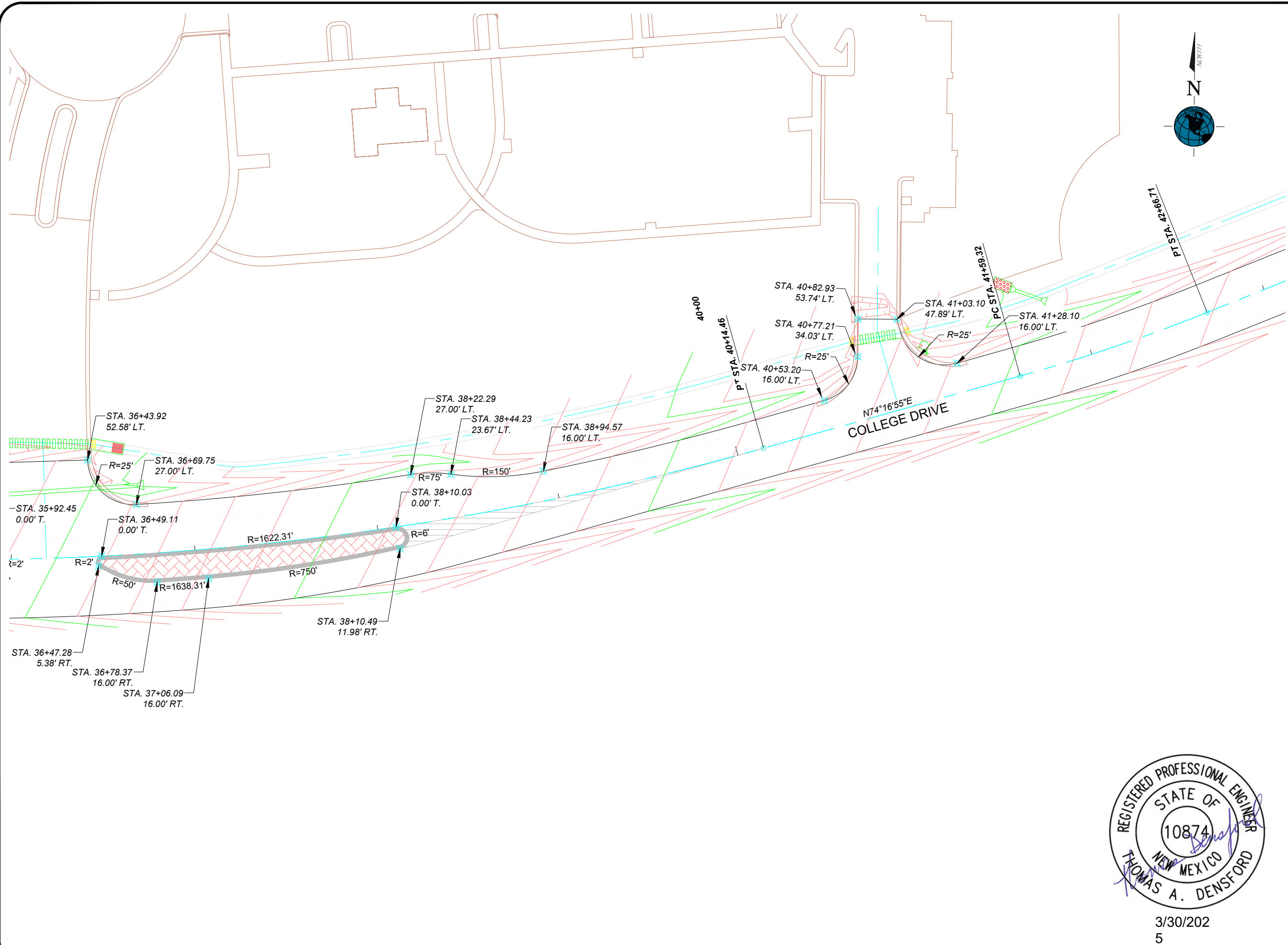
Median
Geometry
Layout

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved

By: SHEET NO. 2-8



General Notes

1. STATION AND OFFSET INFORMATION SHOWN HEREIN IS LOCATED AT THE LIP OF CURB & GUTTER, WHERE APPLICABLE.

No.	Revision/Issue	Date



Median
Geometry
Layout

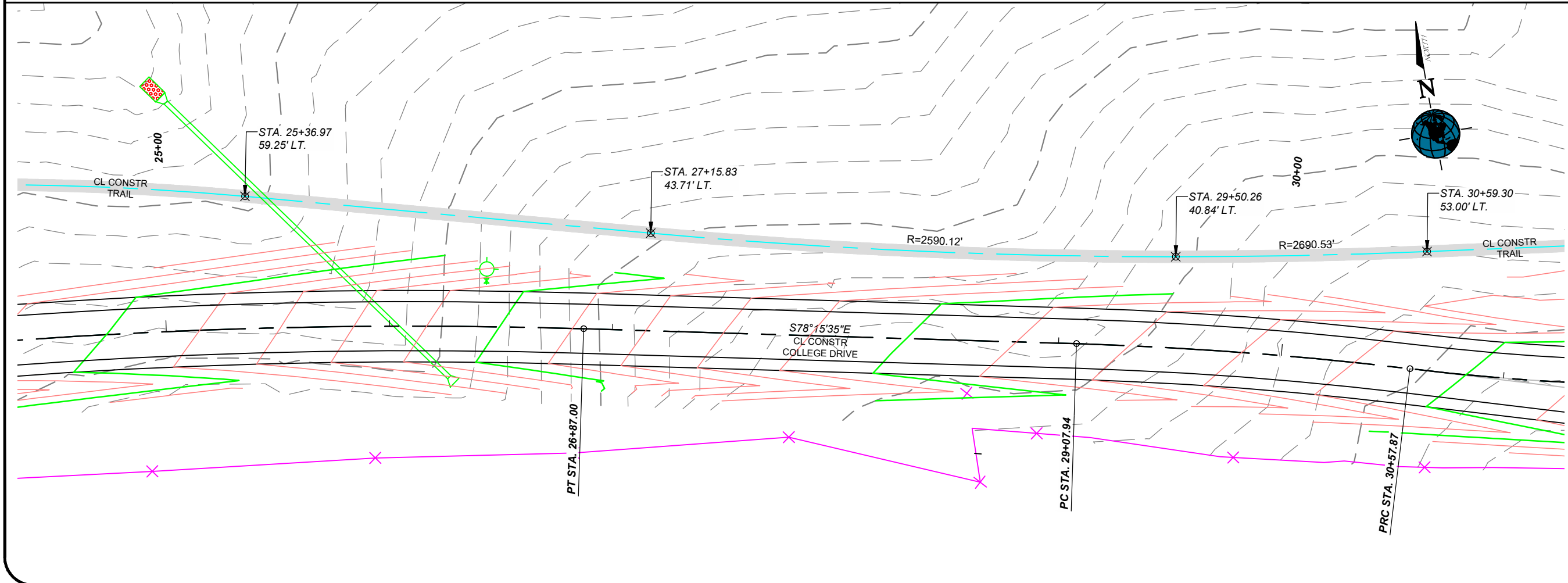
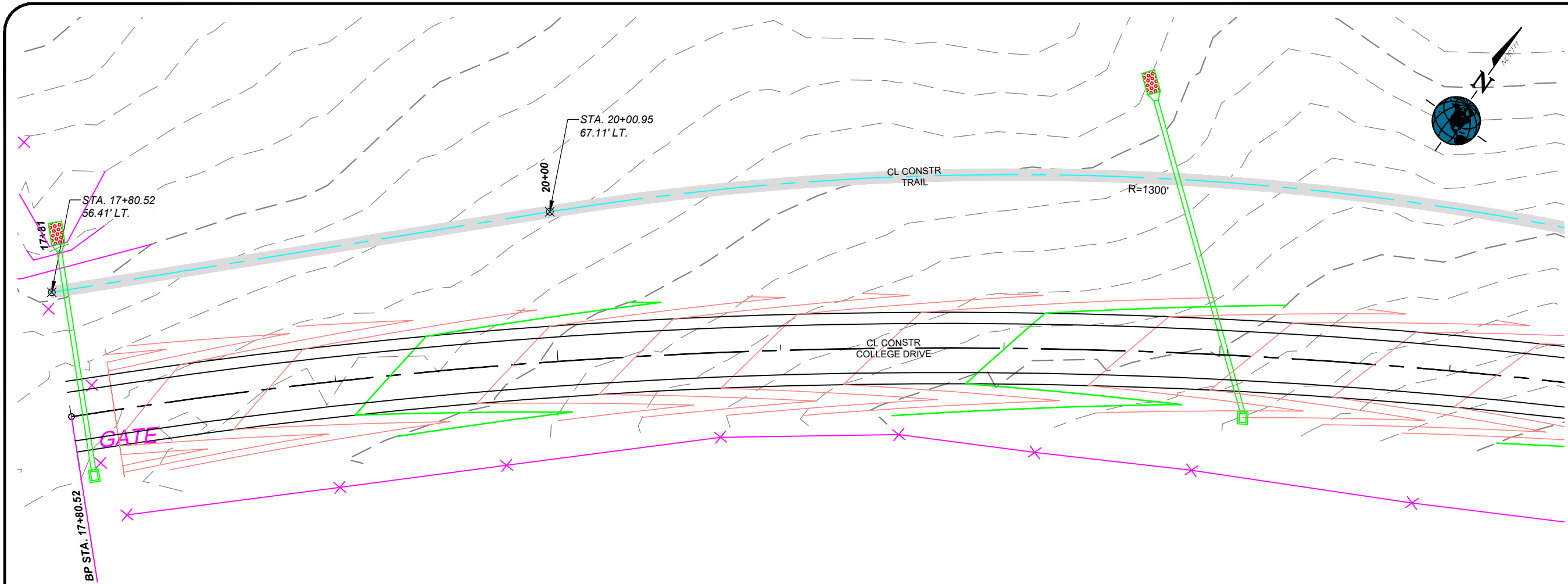
Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	March 2025

Approved
By: *Thomas A. Densford*
SHEET NO. 2 OF 8



3/30/202
5



General Notes

1. STATION AND OFFSETS SHOWN ARE AT CL CONSTR. OF TRAIL.



3/30/2025

No.	Revision/Issue	Date



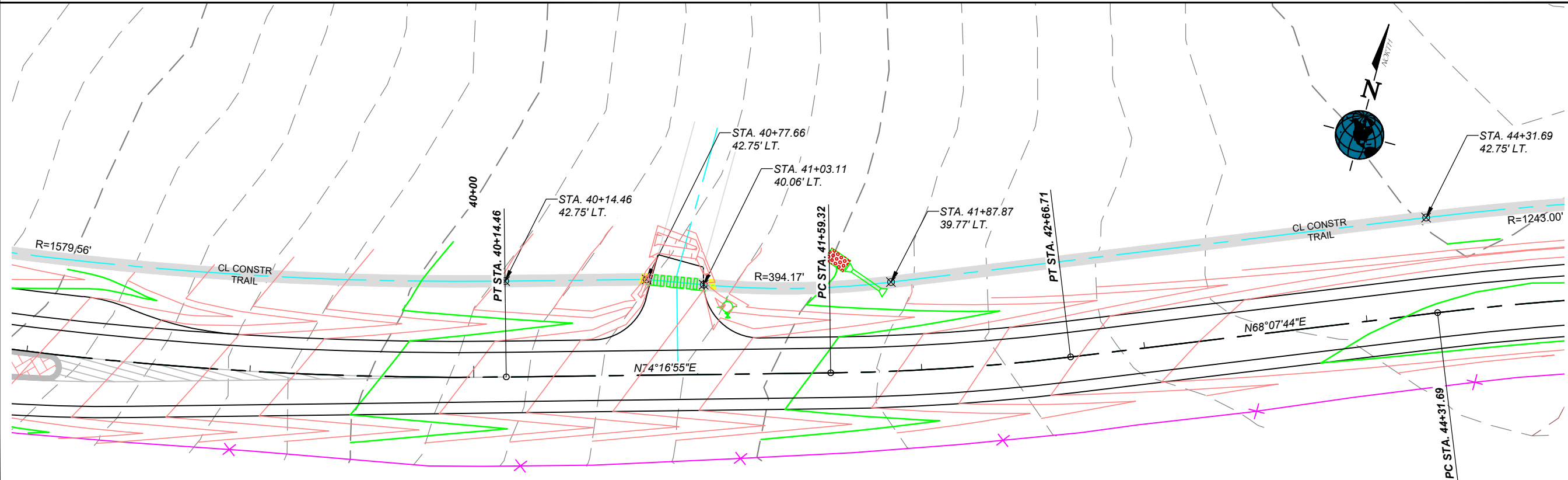
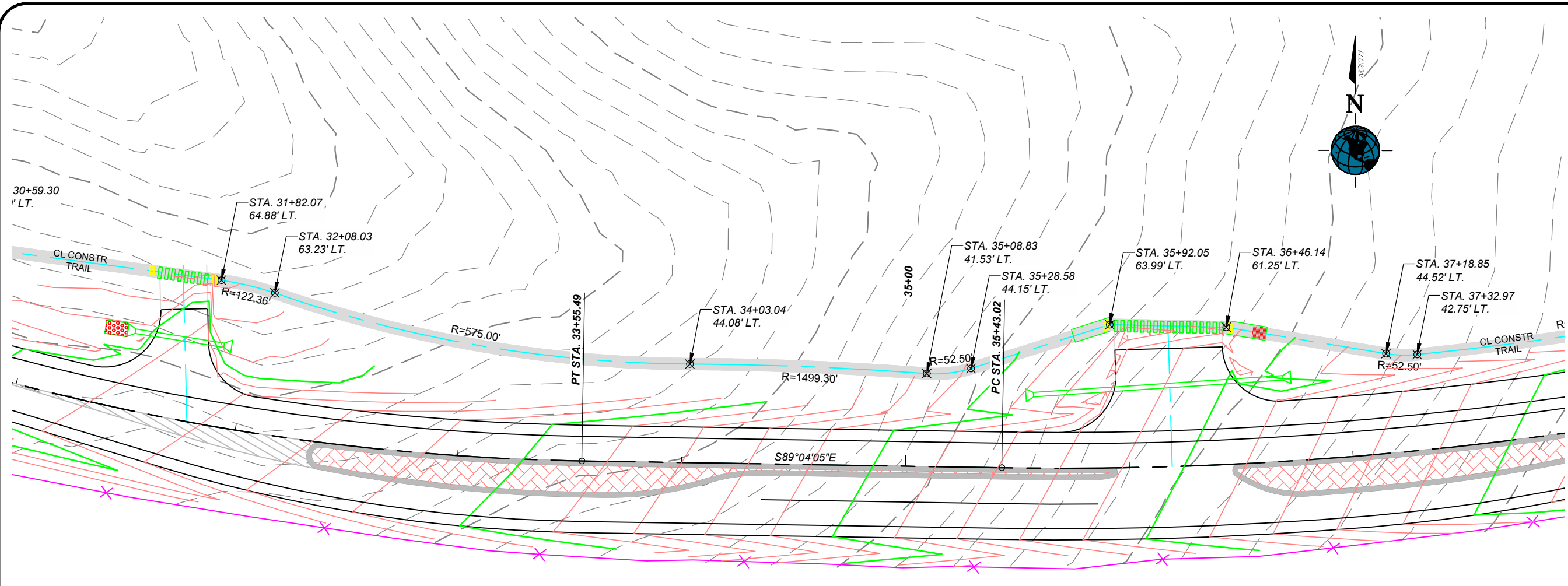
Trail Geometry Layout

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	January 2025

Approved

BY *Thomas A. Denford*



General Notes



3/30/202

5

No.	Revision/Issue	Date



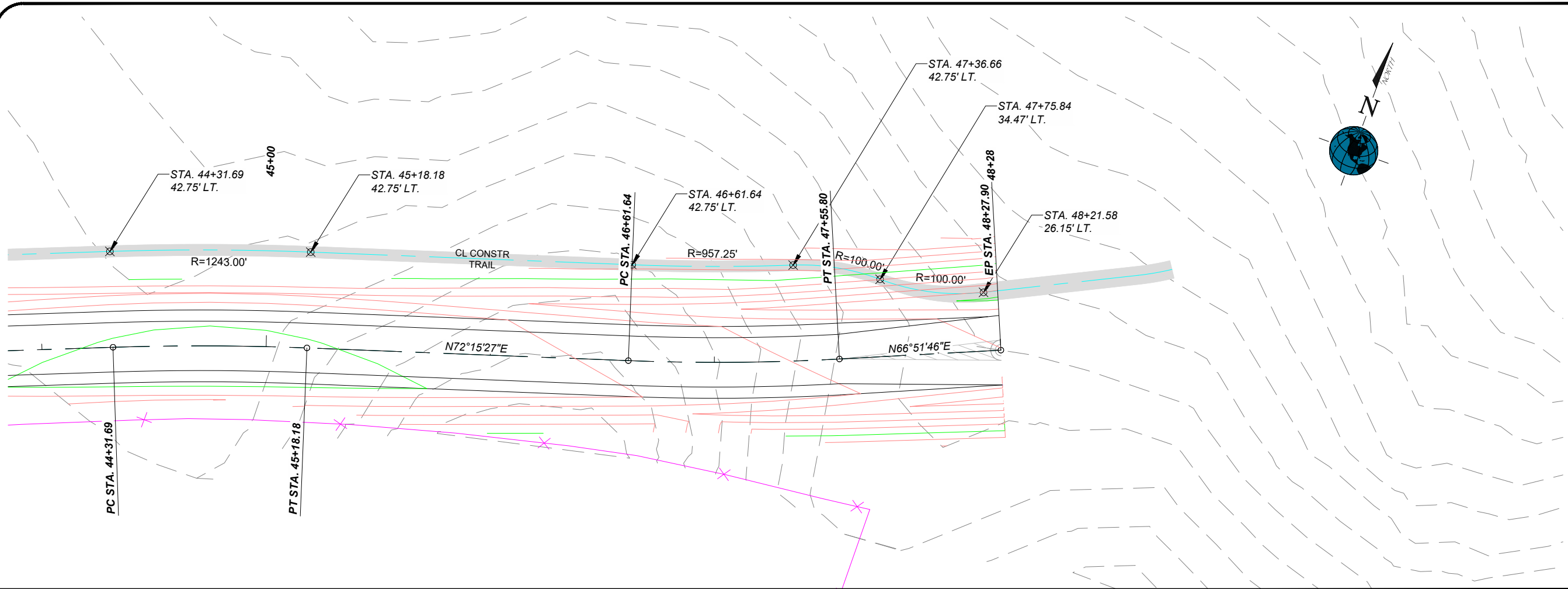
Trail Geometry Layout

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	January 2025

Approved

BY: *Thomas A. Denford*



3/30/202		
5		
No.	Revision/Issue	Date



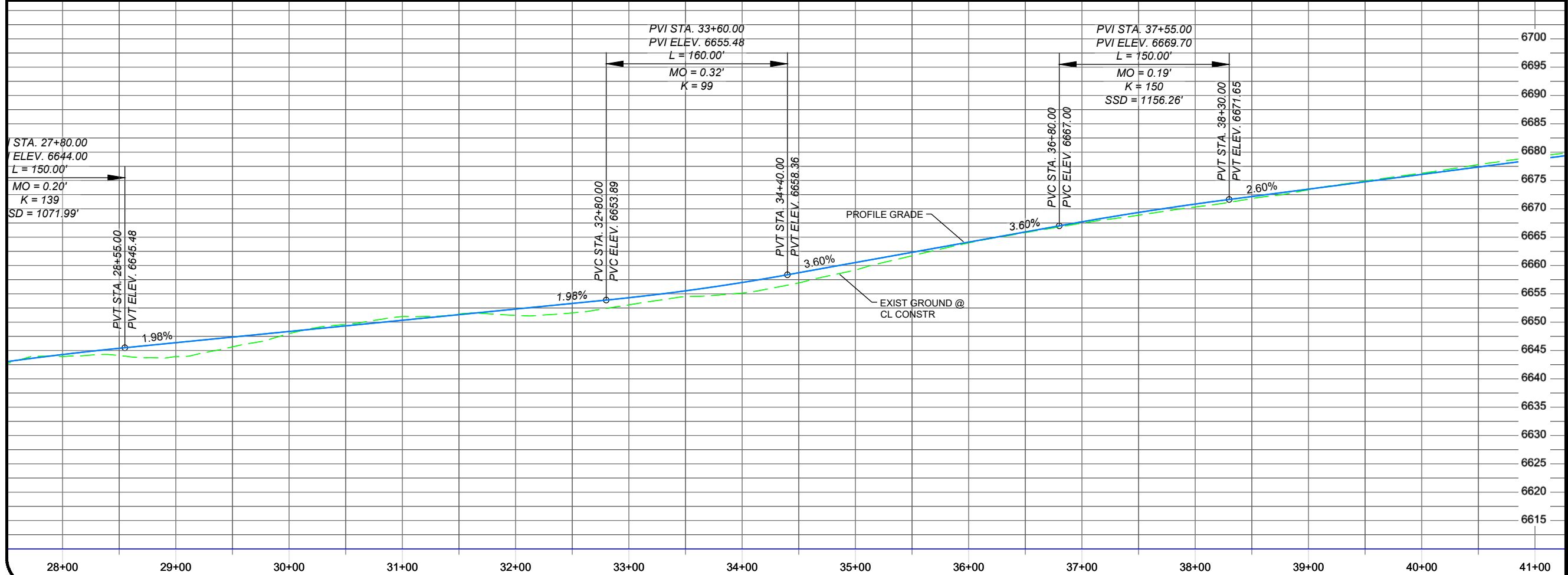
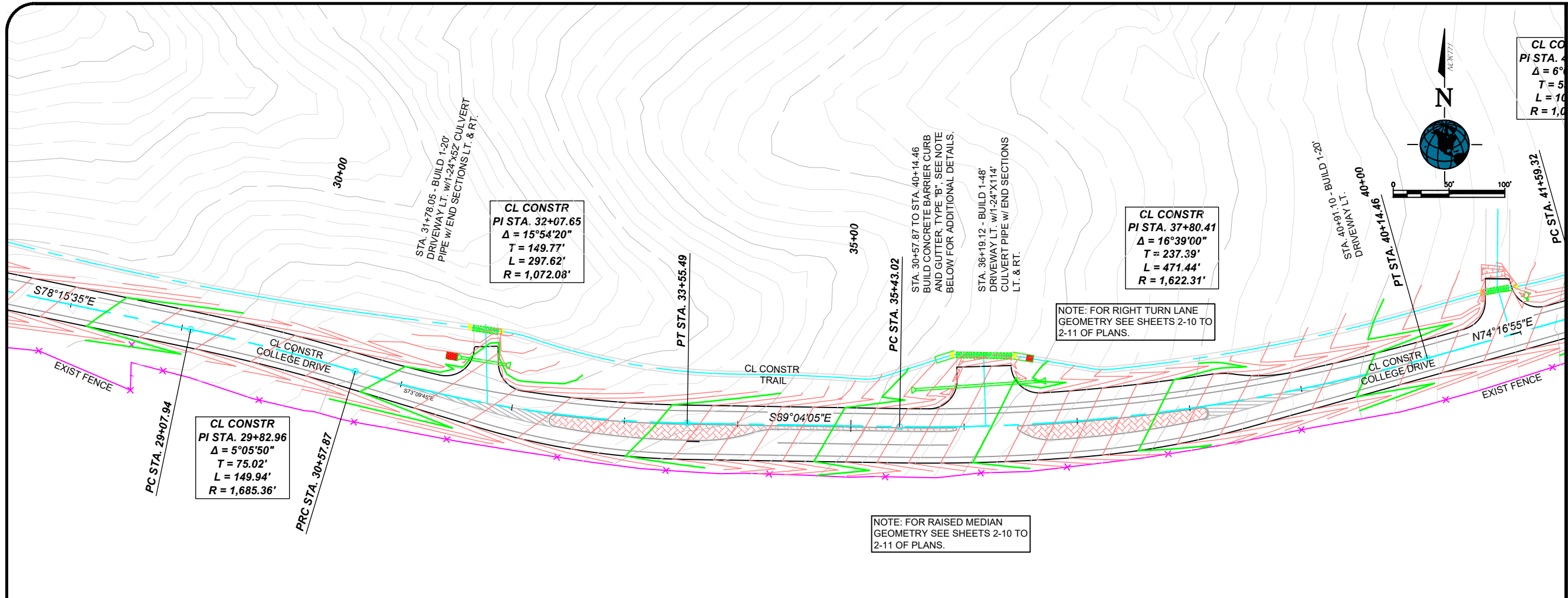
Trail Geometry Layout

Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	January 2025

Approved

BY *Thomas A. Denford*



3/30/2022		
5		
No.	Revision/Issue	Date



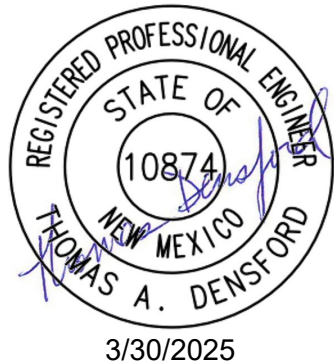
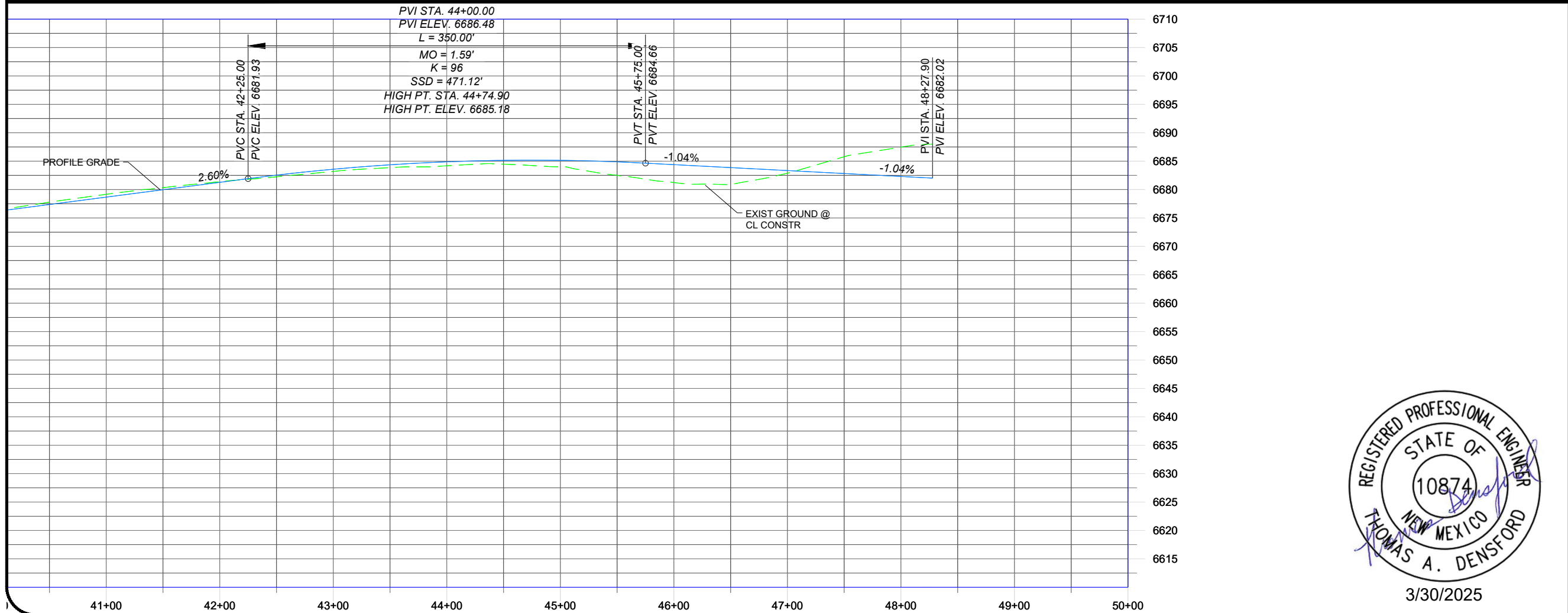
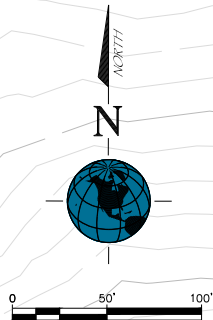
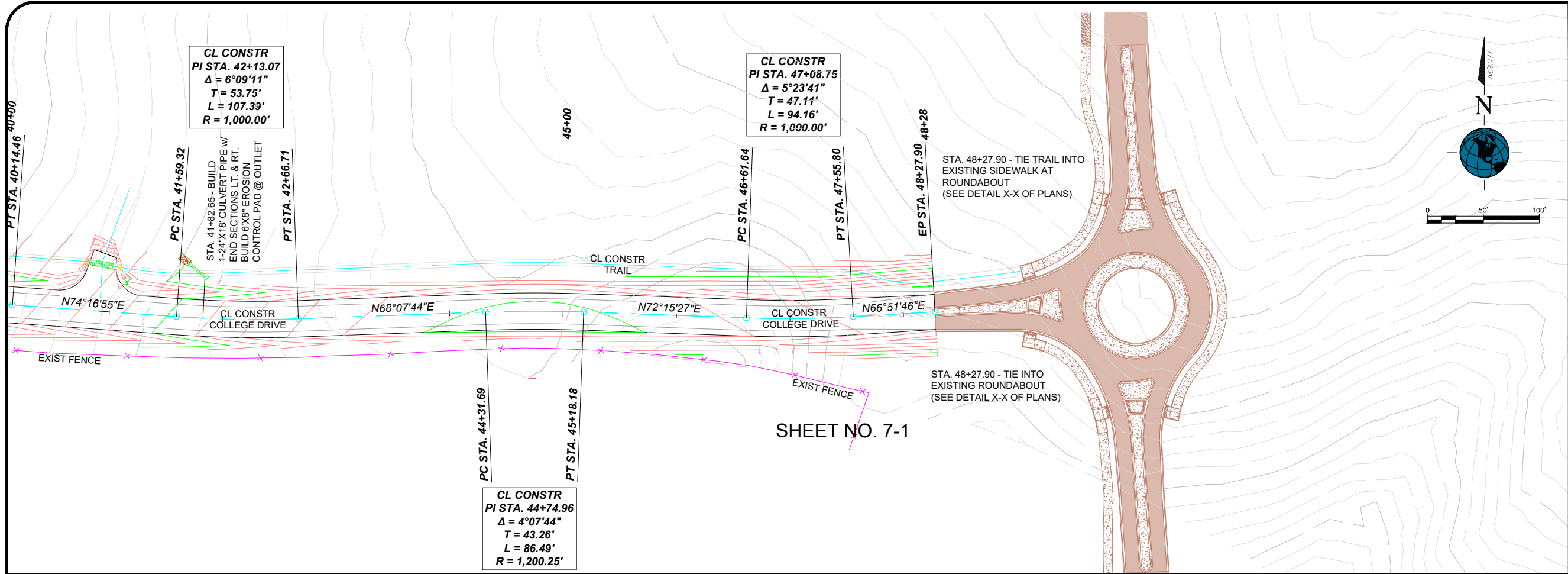
Plan and Profile

Santa Fe County Land Use

Project ES_2024-116

Date March 2025

Scale



General Notes		
No.	Revision/Issue	Date



Plan and Profile

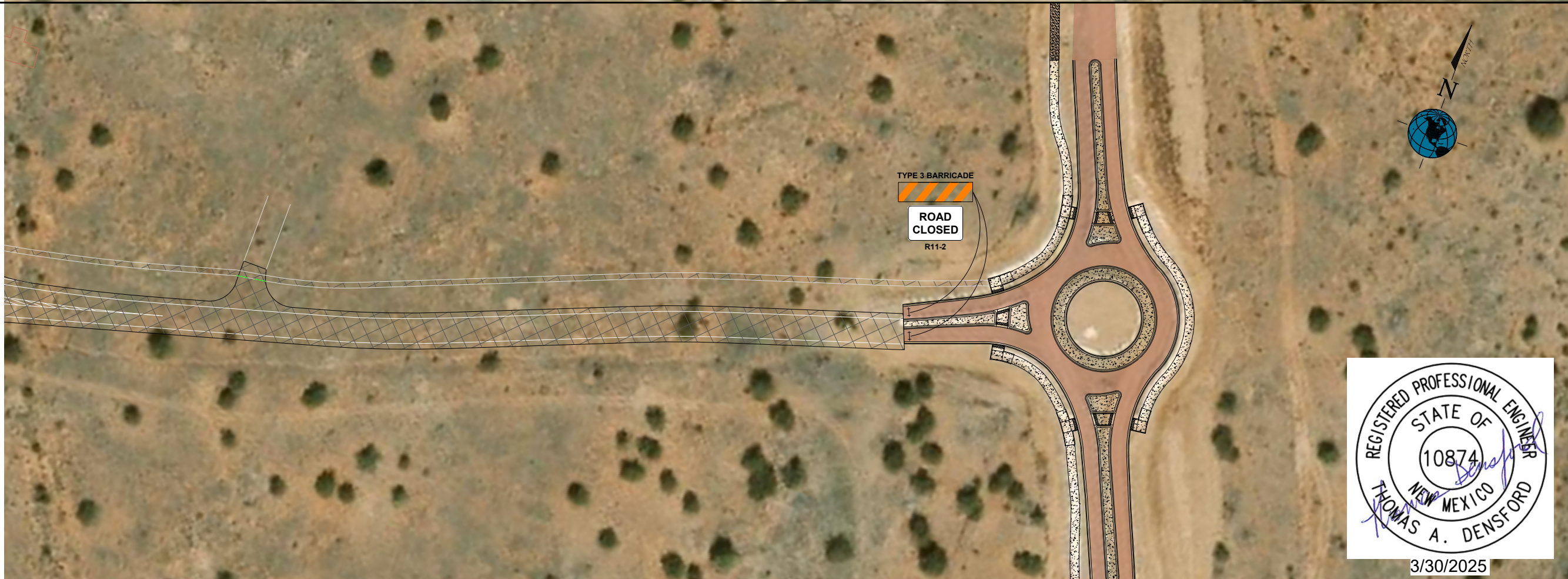
Santa Fe County Land Use

Project ES_2024-116

Date March 2025 05/14/2025

Scale

Approved By: *James R. Roybal*



General Notes

No.	Revision/Issue	Date



TRAFFIC CONTROL

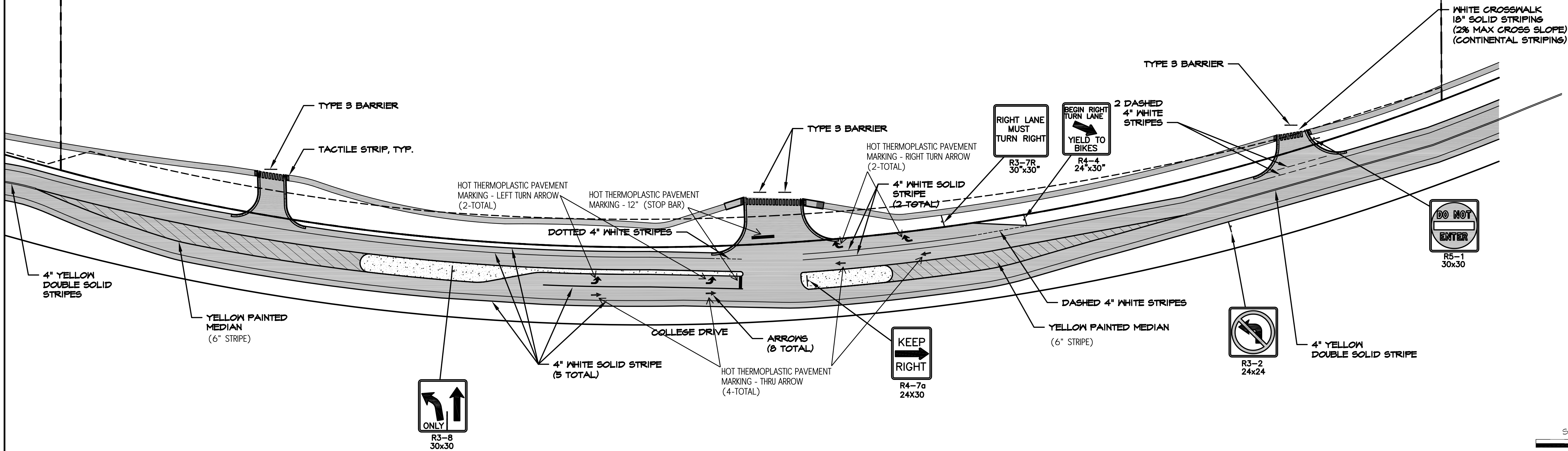
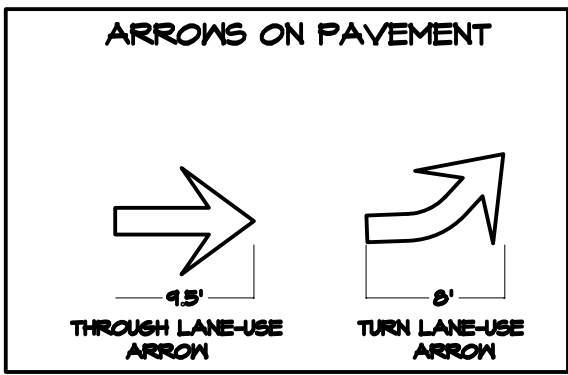
Santa Fe County Land Use

Project	ES_2024-116
Date	05/14/2025
Scale	January 2025

Approved

By: *[Signature]* SHEET NO. 6-1

- NOTES:
1. CONTRACTOR SHALL PREPARE TRAFFIC CONTROL PLAN. TRAFFIC CONTROL PLAN MUST BE SUBMITTED AND APPROVED BY SANTA FE COUNTY PUBLIC WORKS DIRECTOR BEFORE CONSTRUCTION PERMIT IS ISSUED.
 2. STRIPING AND TRAFFIC SIGNAGE PLAN SHALL FOLLOW THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES," ALL PAVEMENT MARKINGS SHALL BE APPROVED BY SANTA FE COUNTY PUBLIC WORKS DIRECTOR AND INSTALLED BY CONTRACTOR.
 3. ALL STRIPING AND PAVEMENT MARKERS ON COLLEGE DRIVE WILL BE A MINIMUM OF 350 MIL THERMOPLASTIC, CURB MARKINGS SHALL BE PAINT.
 4. CURBS SHALL BE PAINTED RED 10-FEET EITHER SIDE OF FIRE HYDRANT.
 5. TRAFFIC SIGNAGE SHALL USE TYPE IX PRISMATIC SHEETING ON ALL SIGN FACES.
 6. ALL PANEL SIGNS MUST BE INSTALLED ON TELSPAR POST ASSEMBLIES USING APPROPRIATE RIVET ANCHOR HARDWARE.
 7. ALL ARROWS, LEGENDS, MEDIAN HASH MARKS, CROSSWALKS AND STOP BARS SHALL BE 300 LBS BY 3M. OR THERMOPLASTIC AS DIRECTED BY SANTA FE COUNTY PUBLIC WORK DIRECTOR.
 8. CONTRACTOR SHALL INSTALL DETECTABLE TACTILE STRIPS AT ALL ADA PEDESTRIAN CROSSINGS.

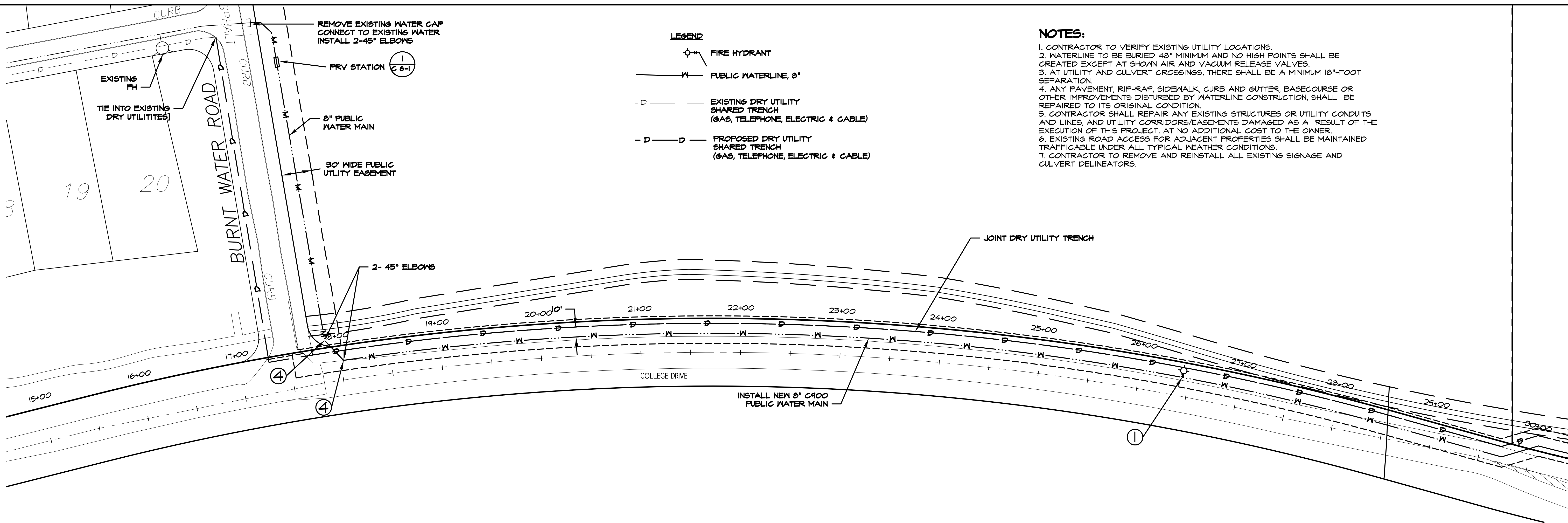


REVISIONS	
DATE	BY
03.29.2025	TD

ADDED STOP BARS AND THERMOPLASTIC MARKING CALL-OUR PER REQUEST OF SFC

DESIGN ENGINEUTY	
1421 LUISA STREET, SUITE E SANTA FE, NEW MEXICO 87505 (505) 191-3951	
COLLEGE DRIVE EXTENSION	
COLLEGE DRIVE STRIPING PAVEMENT MARKINGS & TRAFFIC SIGNAGE PLAN	
SCALE 1" = 50'	DWG NO.
P&DR CASE #	DATE 05/16/2025

SHEET NO. 7-1
Approved By: *Jerome T. Roibal*



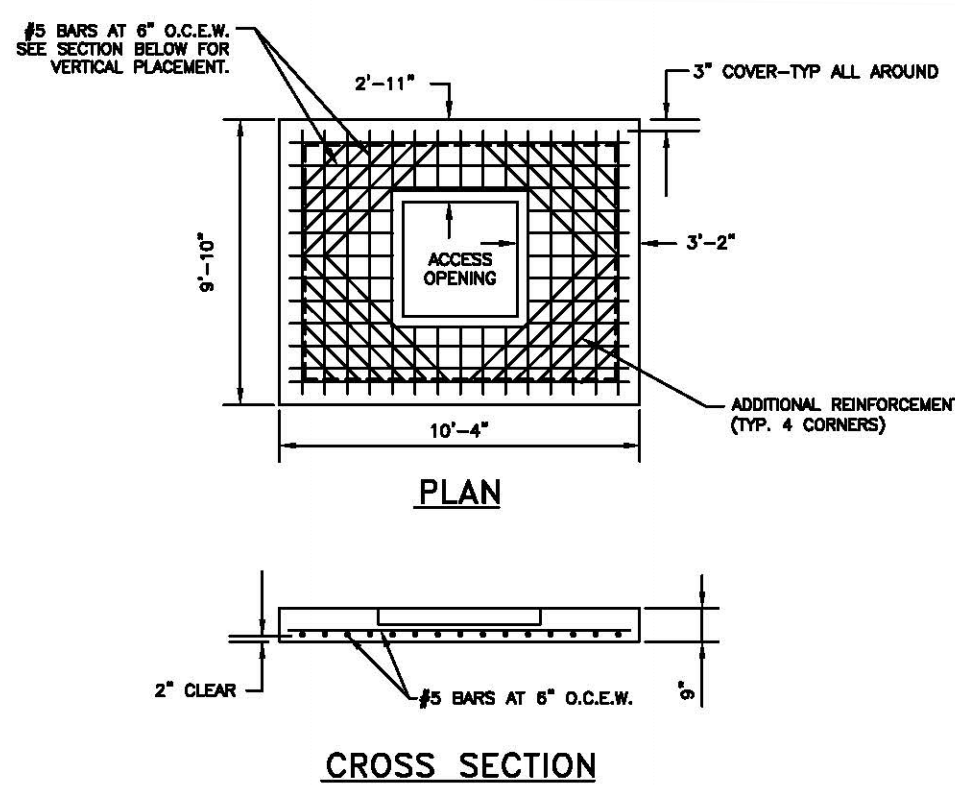
- LEGEND**
- FIRE HYDRANT
 - PUBLIC WATERLINE, 8"
 - EXISTING DRY UTILITY SHARED TRENCH (GAS, TELEPHONE, ELECTRIC & CABLE)
 - PROPOSED DRY UTILITY SHARED TRENCH (GAS, TELEPHONE, ELECTRIC & CABLE)

NOTES:

- CONTRACTOR TO VERIFY EXISTING UTILITY LOCATIONS.
- WATERLINE TO BE BURIED 48" MINIMUM AND NO HIGH POINTS SHALL BE CREATED EXCEPT AT SHOWN AIR AND VACUUM RELEASE VALVES.
- AT UTILITY AND CULVERT CROSSINGS, THERE SHALL BE A MINIMUM 18"-FOOT SEPARATION.
- ANY PAVEMENT, RIP-RAP, SIDEWALK, CURB AND GUTTER, BASECOURSE OR OTHER IMPROVEMENTS DISTURBED BY WATERLINE CONSTRUCTION, SHALL BE REPAIRED TO ITS ORIGINAL CONDITION.
- CONTRACTOR SHALL REPAIR ANY EXISTING STRUCTURES OR UTILITY CONDUITS AND LINES, AND UTILITY CORRIDORS/EASEMENTS DAMAGED AS A RESULT OF THE EXECUTION OF THIS PROJECT, AT NO ADDITIONAL COST TO THE OWNER.
- EXISTING ROAD ACCESS FOR ADJACENT PROPERTIES SHALL BE MAINTAINED TRAFFICABLE UNDER ALL TYPICAL WEATHER CONDITIONS.
- CONTRACTOR TO REMOVE AND REINSTALL ALL EXISTING SIGNAGE AND CULVERT DELINEATORS.

NOTES:

- WALLS AND FLOOR SHALL BE 8" THICK, REINFORCED WITH #5 BARS AT 12" O.C.E.W., CENTERED.
- MINIMUM COVER ON REINFORCING STEEL SHALL BE 2".
- STEEL SHALL BE GRADE 60 DEFORMED BARS, CONCRETE SHALL BE 4000 PSI MINIMUM COMPRESSIVE STRENGTH, WITH 5% AIR ENTRAINMENT, AND 3/4" COARSE AGGREGATE, FOR SPECIFICATION 701 CAST IN PLACE CONCRETE.
- INSTALL HALLIDAY MODEL S2R4848 ENTRY DOOR OR OAE.
- COVERS SHALL NOT BE BONDED TO VAULT WALLS, THEY SHALL BE SEPARATELY FORMED & PLACED ONTO VAULT WALLS. PRIOR TO PLACEMENT, APPLY ONE STRIP OF LOPLAND BLUE STOP WATER STOP MATERIAL TO SEAL COVER TO WALLS. COVER SHALL BE FLUSH W/ FINISHED GRADE.
- COVERS SHALL BE FURNISHED WITH 2" x 4" STEEL VENT, W/180° ELBOW SET 4" ABOVE TOP. PROVIDE STAINLESS STEEL GRATING OVER END SECTION, AND PAINT W/2 COATS OF GREY MARINE PAINT, EXTEND OUTSIDE OF ROADWAY IF NECESSARY.
- INCOMING SYSTEM PRESSURES ARE SIGNIFICANTLY HIGHER THAN SERVICE PRESSURES. PRIOR TO PRESSURIZING THE NEW SYSTEM, THE CONTRACTOR SHALL CONTACT THE LOCAL AUTHORITY/UTILITY HAVING JURISDICTION TO ESTABLISH A TESTING PLAN WHICH WILL ENSURE NO DAMAGE TO DOWNSTREAM CUSTOMERS' PLUMBING.
- HEAVY DUTY RING AND COVER CAST INTO VAULT LID. 475 LB. MINIMUM, 3" CLEAR OPENING, LABELED "WATER".
- SUBGRADE BELOW VAULT FLOOR SHALL BE COMPACTED TO 95% PER SPECIFICATIONS.
- LOCATE WIRE SHALL BE PLACED ALONG BY-PASS AND RAISED IN BY-PASS VALVE BOX AND THROUGH VAULT ALONG PIPING. ALL WIRE SHALL BE ELECTRICALLY CONTINUOUS.



NOTES:

- ADDITIONAL REINFORCING SHALL BE THE SAME SIZE AS DISCONTINUOUS REINFORCING AT OPENING. QUANTITY OF REINFORCING IN EACH DIRECTION SHALL BE EQUAL TO OR GREATER THAN THE NUMBER OF DISCONTINUOUS BARS. PLACE 1/2 OF ADDITIONAL REINFORCING BARS EACH SIDE OF OPENING. PLACE ADDITIONAL REINFORCING AT 3" O.C. (TYPICAL BOTH DIRECTIONS AND ALL LAYERS OF REINFORCING).
- ADDITIONAL REINFORCING SHALL EXTEND BEYOND EDGE OF OPENING AS SHOWN ABOVE UNLESS SHOWN OTHERWISE. ADDITIONAL BARS MAY TERMINATE AT THE END OF THE WALL WITH A STANDARD HOOK WHERE THE LENGTH OF THE WALL WILL NOT PERMIT BARS TO EXTEND AS SHOWN.
- TERMINATE TYPICAL REINFORCING 2" CLEAR TO OPENING.
- AT OPENINGS 12" OR LESS IN SLABS & IN WALLS, NO EXTRA REBARS ARE REQUIRED UNLESS SHOWN OTHERWISE. TYPICAL REINFORCING SHALL BE SPREAD (NOT CUT) TO ALLOW FOR OPENINGS TO BE MADE.
- UNLESS SHOWN OTHERWISE ON DRAWINGS, PROVIDE EXTRA REINFORCING AROUND OPENINGS AS INDICATED.
- ALL FASTENERS SHALL BE TORQUE RATED STAINLESS STEEL.

KEYED NOTES FOR 8" WATER MAIN:

- 8" x 8" x 4" FLANGED TEE.
- 8" GATE VALVE (FL X FL) VALVE.
- 8" PRV, CLA-VAL #890-01 OR 90-1 WITH KD VALVE STEM OPTION. PROVIDE SHOP FABRICATED STEEL SUPPORT.
- 4" GATE VALVE (FL X FL) VALVE.
- 4" PRV, CLA-VAL #890-01 OR 90-1 WITH KD VALVE STEM OPTION. PROVIDE SHOP FABRICATED STEEL SUPPORT.
- 4" 90° STANDARD FLANGED ELBOW. PROVIDE PIPE SUPPORT.
- WALL PENETRATIONS SHALL BE FURNISHED WITH STANDARD, FACTORY FABRICATED WALL SLEEVES WHICH ALLOW CARRIER PIPES TO BE INSERTED AFTER FORMING. SEAL CARRIER PIPE-TO-SLEEVE SPACING WITH LINK SEAL AND NON-SHRINK GROUT.
- PRESSURE GAGES PER NOTE 2 BELOW. INSTALL 1/2 INCH STAINLESS STEEL ISOLATION BALL VALVE AND STAINLESS STEEL NIPPLES AS NEEDED.
- ALL PIPING AND FITTINGS SHALL BE CLASS 350 FLANGED DUCTILE DUCTILE IRON PER AWWA C151 AND AWWA C110.
- A COMBINATION MAIN LINE PRV WITH INTEGRAL LOW FLOW BYPASS VALVE MAY BE SUBSTITUTED, IF APPROVED BY DPL.
- SAMPLING PORT ON DOWNSTREAM SIDE 1" TAPPING SADDLE. 1" CORP. STOP W/ TAPERED THREADS. 8" LG. GOOSENECK (COPPER TYPE "K").

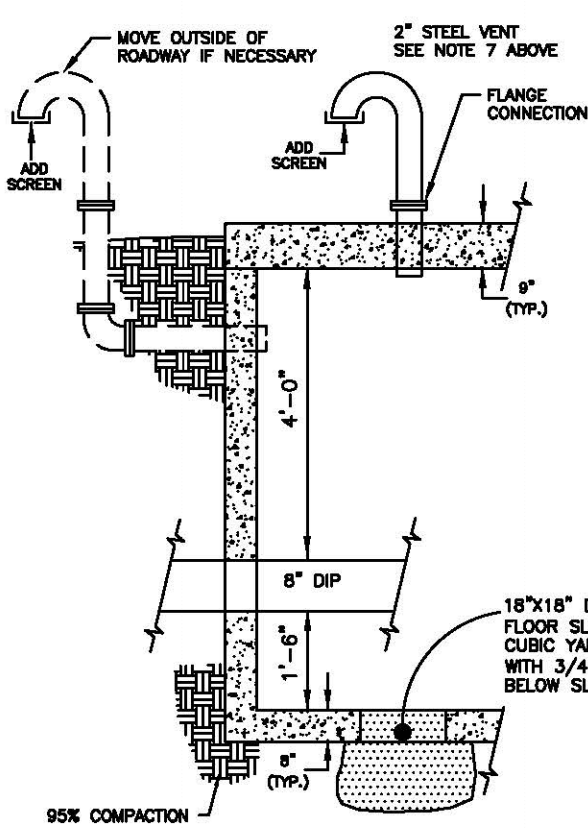
NOTES:

- GATE VALVES INTERNAL TO THE VAULT SHALL BE HAND WHEEL OPERATED WITH NON-RISING STEMS.
- PRESSURE GAGES SHALL BE ABLE TO REGISTER PRESSURES FROM 0 TO 150 PSI AND HAVE GLYCOL FILL, FREEZE PROOF DIALS.
- ALL PIPING AND VALVING SHALL BE SET SO THAT LARGEST DIAMETER PIPES IN STATIONS ARE SET 18" ABOVE FLOOR TO BOTTOM OF PIPE.

WATER SYSTEM KEY

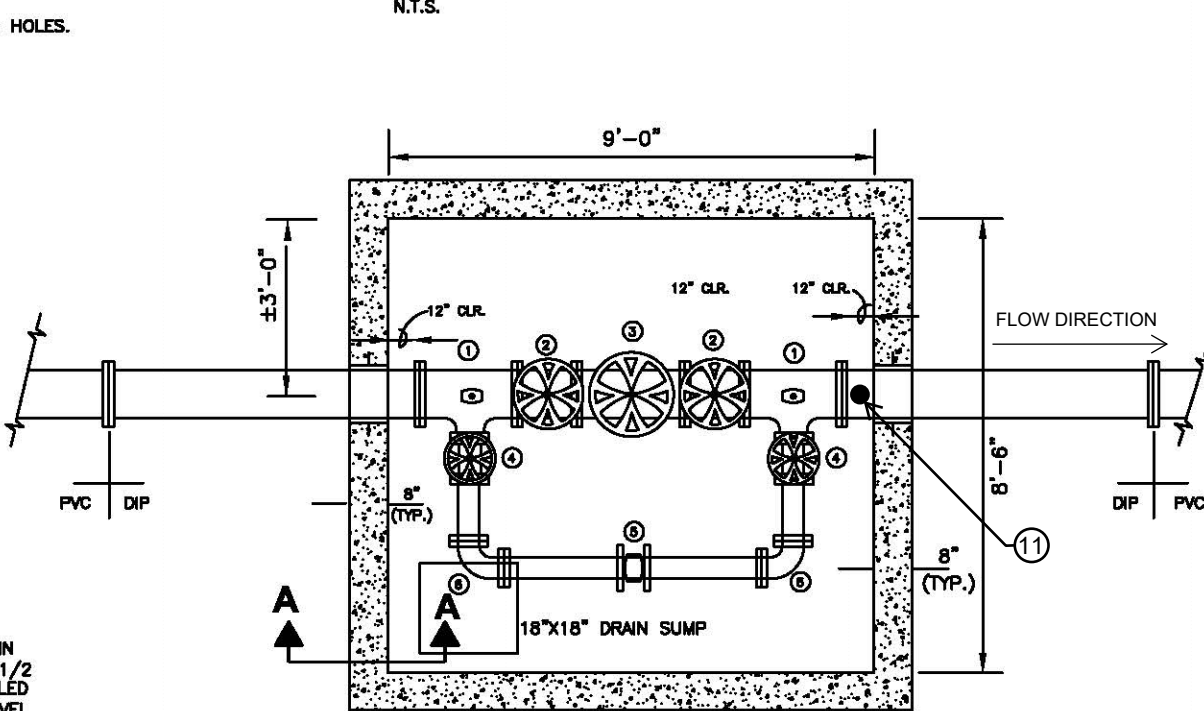
- INSTALL A FIRE HYDRANT:
INSTALL 8"x8"x6" M/J/FLG TEE
6" M/J/FLG GATE VALVE & VALVE BOX
6" DUCTILE IRON PIPE AND
3-MAY FIRE HYDRANT ASSEMBLY # SHOWN
RESTRAIN PER SFCO DETAILS
- INSTALL 45 DEGREE ELBOW
RESTRAIN PER SFCO DETAILS

NOTE: LID VENTED WITH A MINIMUM OF 12 EACH 1" DIAMETER HOLES.



VALVE VAULT SECTION A-A

PRV VAULT STRUCTURAL DETAILS

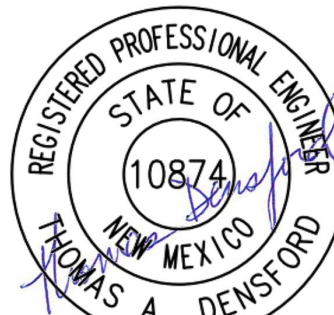
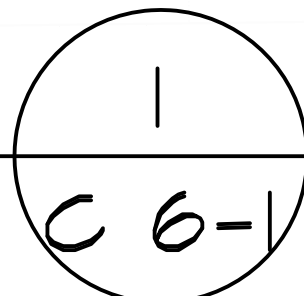


NOTE: VALVE SIZES AND VAULT DIMENSIONS CAN BE MODIFIED TO FIT PROJECT REQUIREMENTS. DIMENSIONS SHOWN ARE FOR AN 8"x4" PRV SET.

VALVE VAULT DETAILS PLAN

PRESSURE REDUCING VALVE DETAILS

NTS



3-30-2025
SAMPLING PORT ONLY



ADDED KEYNOTE #11 PER REQUEST OF SFC (E&S EMAIL DATED 03.10.2025)

REVISIONS

DATE	BY
03.29.2025	TD

DESIGN ENGINEUTY



1421 LUISA STREET, SUITE E
SANTA FE, NEW MEXICO 87505
(505) 984-3551

COLLEGE DRIVE EXTENSION

COLLEGE DRIVE WATER PLAN

SCALE: 1" = 50' DWS NO. DATE

F4DR CASE #

02/08/2025

Santa Fe County Land Use

C 4-1

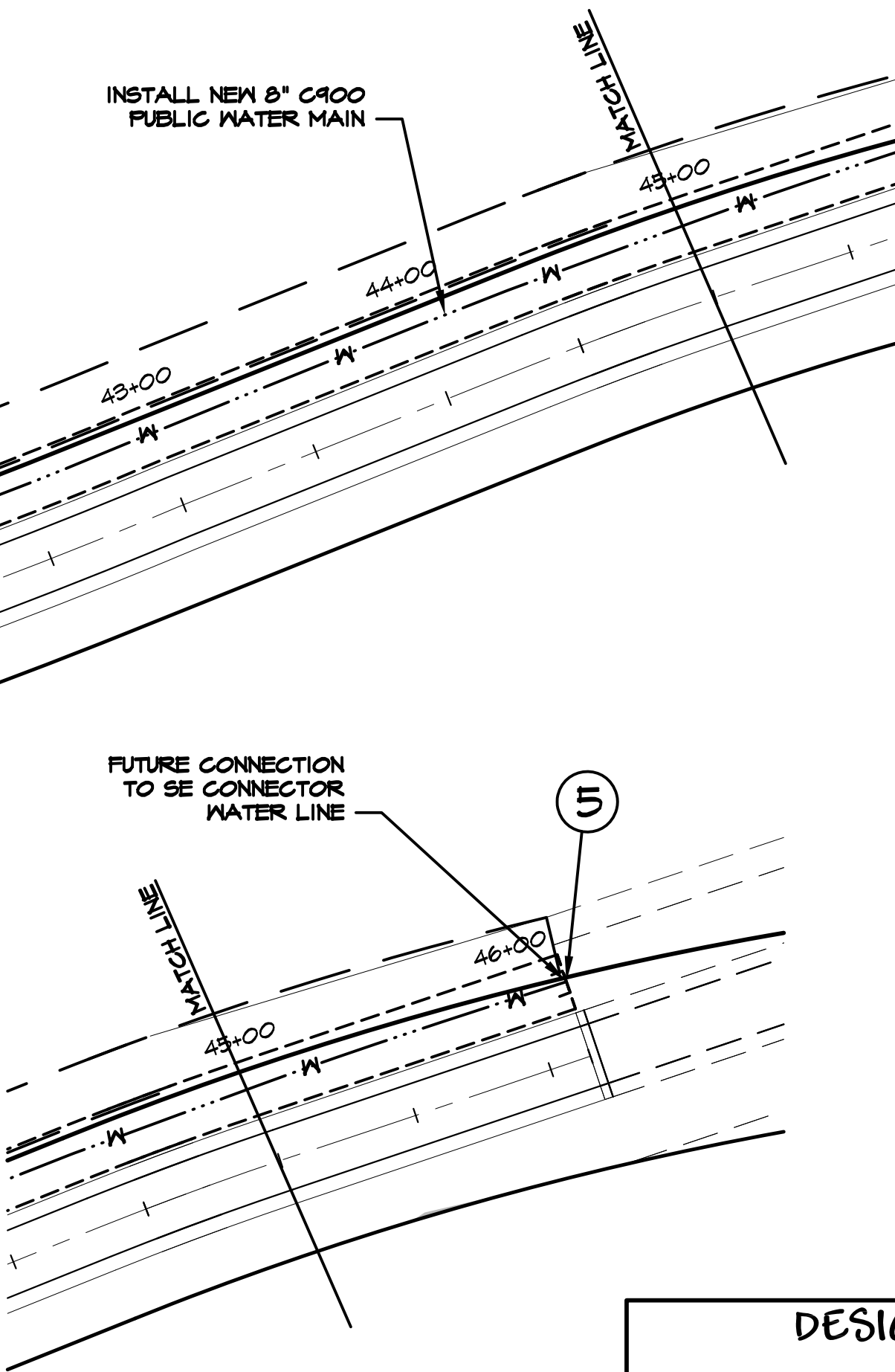
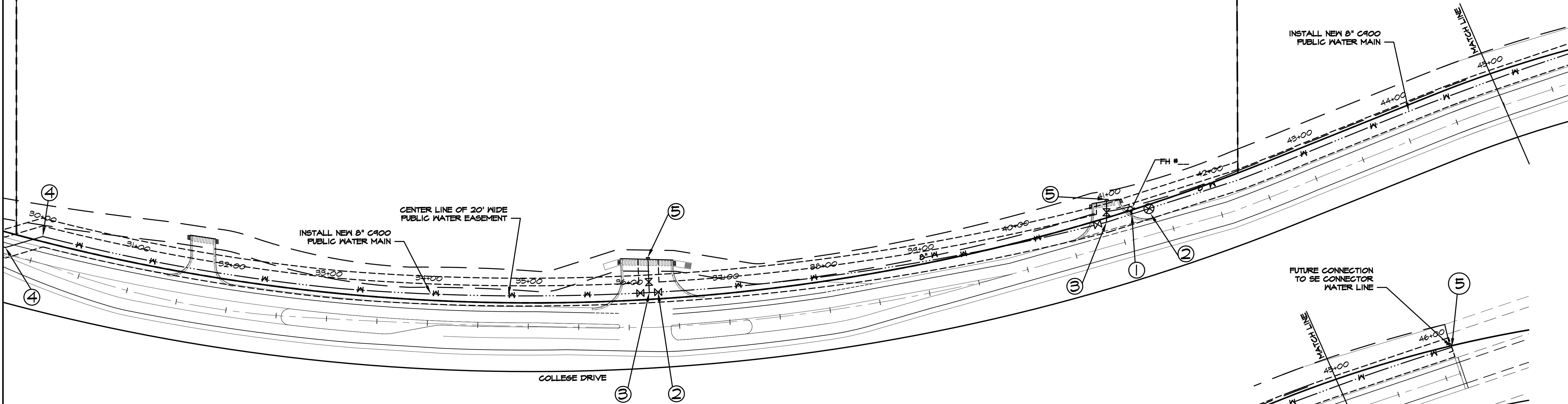
05/14/2025

SHEET NO. 11-1

Approved By: Jerome T. Roibal

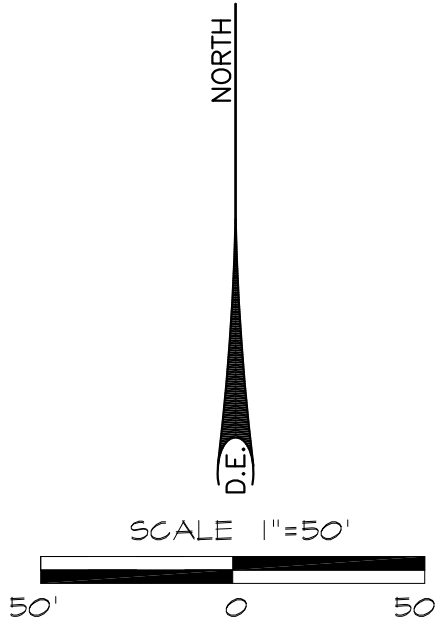
WATER SYSTEM KEY

- 1
- INSTALL A FIRE HYDRANT;
INSTALL 8"x8"x6" MJ/FLG TEE
6" MJ/FLG GATE VALVE & VALVE BOX
6" DUCTILE IRON PIPE AND
3-WAY FIRE HYDRANT ASSEMBLY # SHOWN
RESTRAIN PER SFCO DETAILS
- 2
- INSTALL A 8" GATE VALVE AND VALVE BOX
- 3
- INSTALL 8" MJ/FLG TEE
8" MJ/FLG GATE VALVE & VALVE BOX ON
NORTH AND WEST LEGS
- 4
- INSTALL 45 DEGREE ELBOW
RESTRAIN PER SFCO DETAILS
- 5
- INSTALL 8" CAP
RESTRAIN PER SFCO (SANTA FE COUNTY) DETAILS.



LEGEND

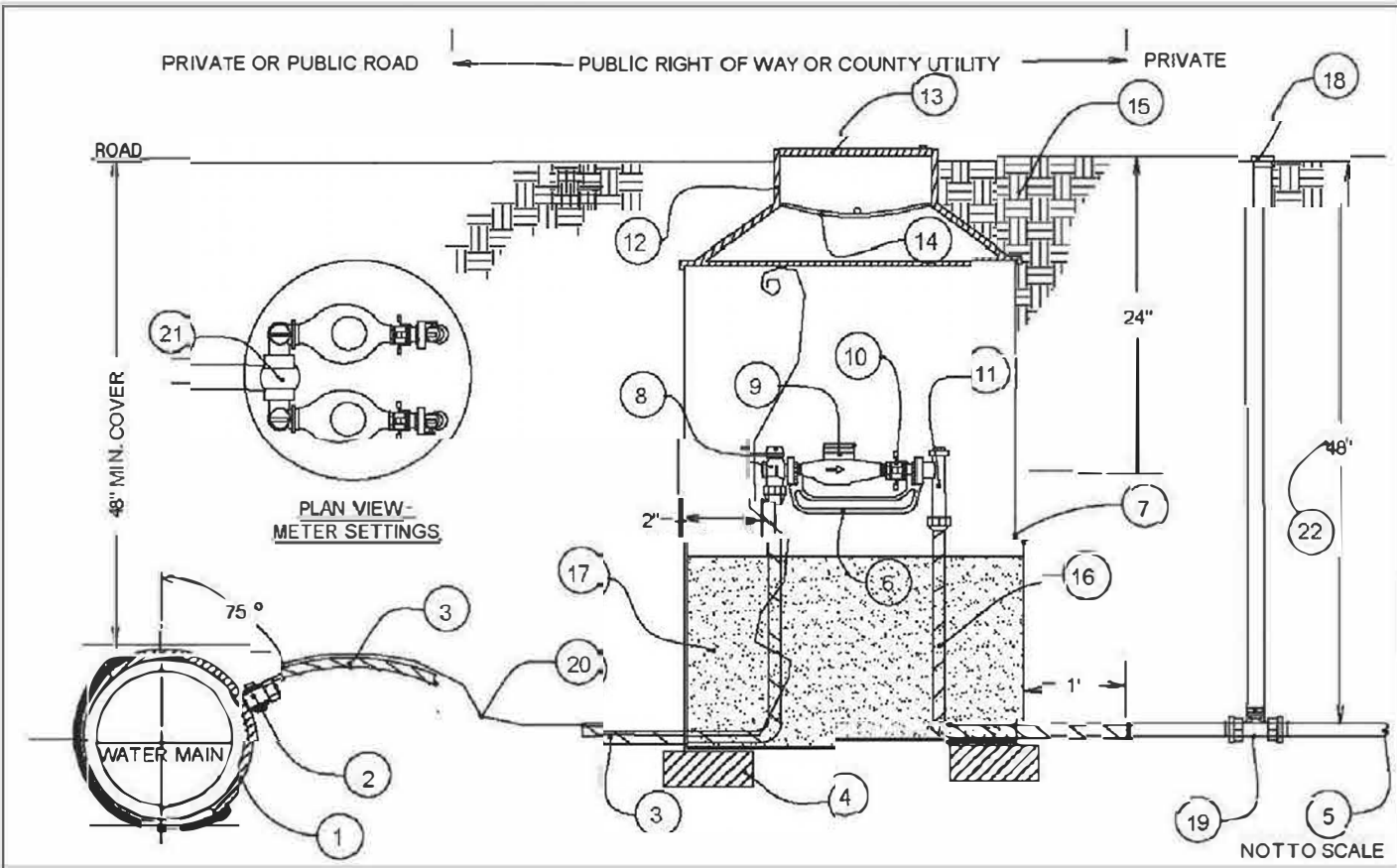
-
- FIRE HYDRANT
-
- GATE VALVE, NORMALLY OPEN
-
- GATE VALVE, NORMALLY CLOSED
-
- PUBLIC WATERLINE, 8"
-
- WATER CAP & BLOCKING



REVISIONS	
DATE	BY

DESIGN ENGINEUTY	
1421 LUISA STREET, SUITE E SANTA FE, NEW MEXICO 87505 (505) 184-9951	
COLLEGE DRIVE EXTENSION	
COLLEGE DRIVE WATER PLAN	
SCALE 1" = 50'	DWG NO.
P&DR CASE #	SHEET NO.

Santa Fe County Land Use
08/08/2025
C 4-2
SHEET NO. 11 of 2

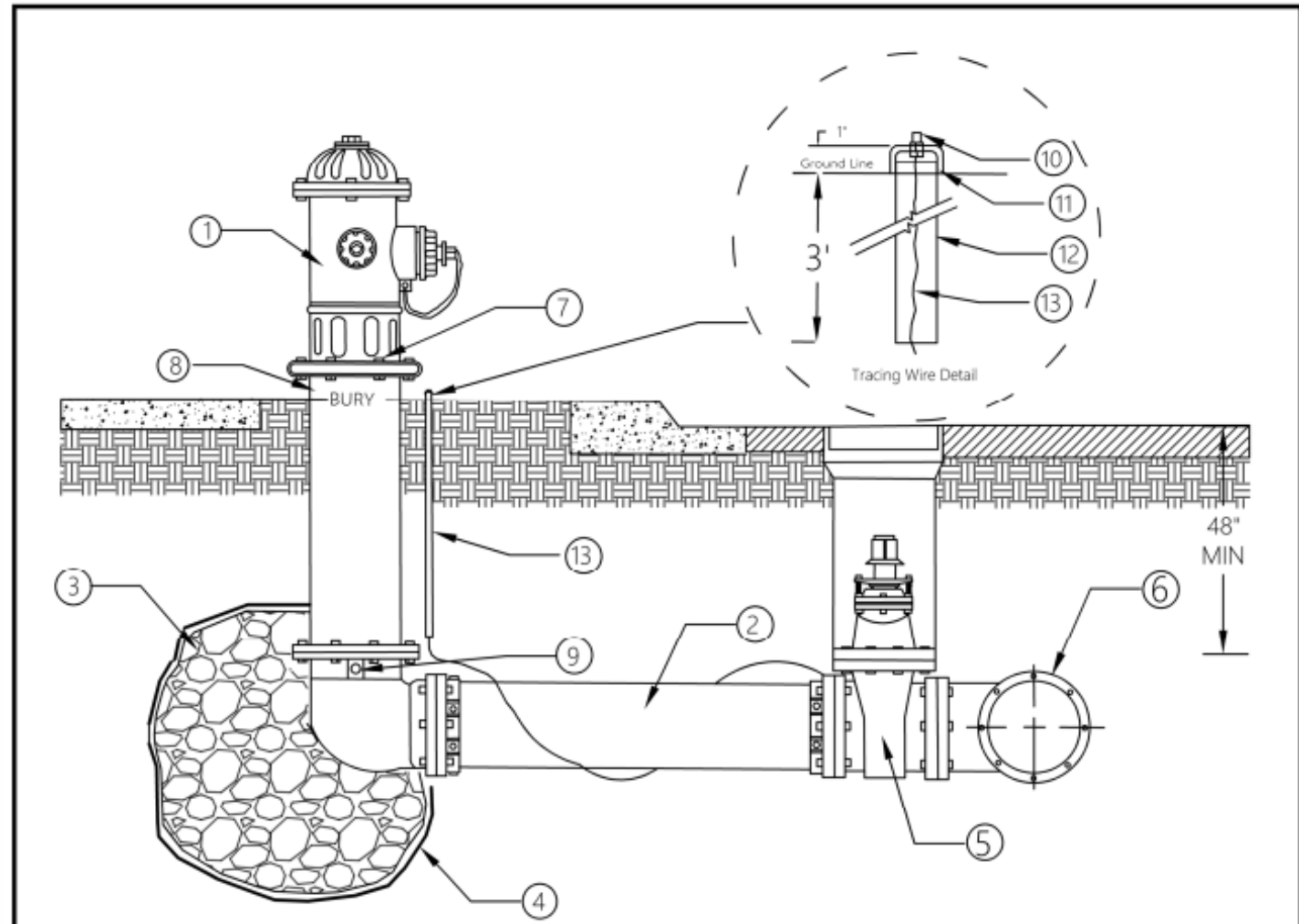


#	SIZE	DESCRIPTION
1	1"	SERVICE SADDLE - FULL WRAP AROUND STAINLESS STEEL - INSPECTION REQUIRED
2	1"	CORPORATION STOP (A.W.W.A. TAPERED THREAD)
3	1"	HDPE SERVICE TUBING, SDR 9 CTS BLUE, WITH 12 GAUGE TRACING WIRE
4	1"	BLOCKS, USED AS NECESSARY
5	3/4"	CUSTOMER CONNECTION SHALL REMAIN CAPPED UNTIL CUSTOMER LINE CONNECTED
6	5/8" x 3/4"	CAST IRON METER YOKE (PER SERVICE)
7	20"D x 36"H	METER CAN
8	1" x 5/8"	LOCKABLE ANGLE VALVE
9	5/8" x 3/4"	SEALED REGISTER WATER METER MACH10 (PER SERVICE) (FURNISHED & INSTALLED BY SFCU)
10	3/4"	EXPANSION CONNECTION (5/8"xM T.R. CONN.) (PER SERVICE)
11	3/4"	ANGEL CARTRIDGE WITH DUAL CHECK VALVE (PER SERVICE)
12	20"H x 11-1/2"D	OUTER DOUBLE LID COVER - HAT
13	12-5/16"	POLYMER LID - DOUBLE HOLE COUNTER BORE CONFIGURATION
14	12-5/16"	CONCAVE POLYMER FROST LID
15	3/4"	FINISHED GRADE AROUND METER CAN TO BE EARTHEN, NOT CONCRETE
16	3/4"	HDPE SERVICE TUBING, SDR 9 CTS (PER SERVICE)
17	1"	FINE, UNCONSOLIDATED, ROUNDED EARTHEN MATERIAL
18	1"	VALVE CAN FOR 3/4" BRASS CURB STOP (PER SERVICE)
19	3/4"	BRASS CURB STOP
20	10" GAUGE	TRACING WIRE
21	3/4"	U BRANCH
22		IF DEPTH IS GREATER THAN 48" UTILIZE THERMOCOIL DETAIL
*		NOTE: Customer shall install a customer owned Pressure Reducing Valve (PRV).

SANTA FE COUNTY UTILITIES
 STANDARD DETAIL

5/8" DOUBLE SERVICE

DATE: 08/2024

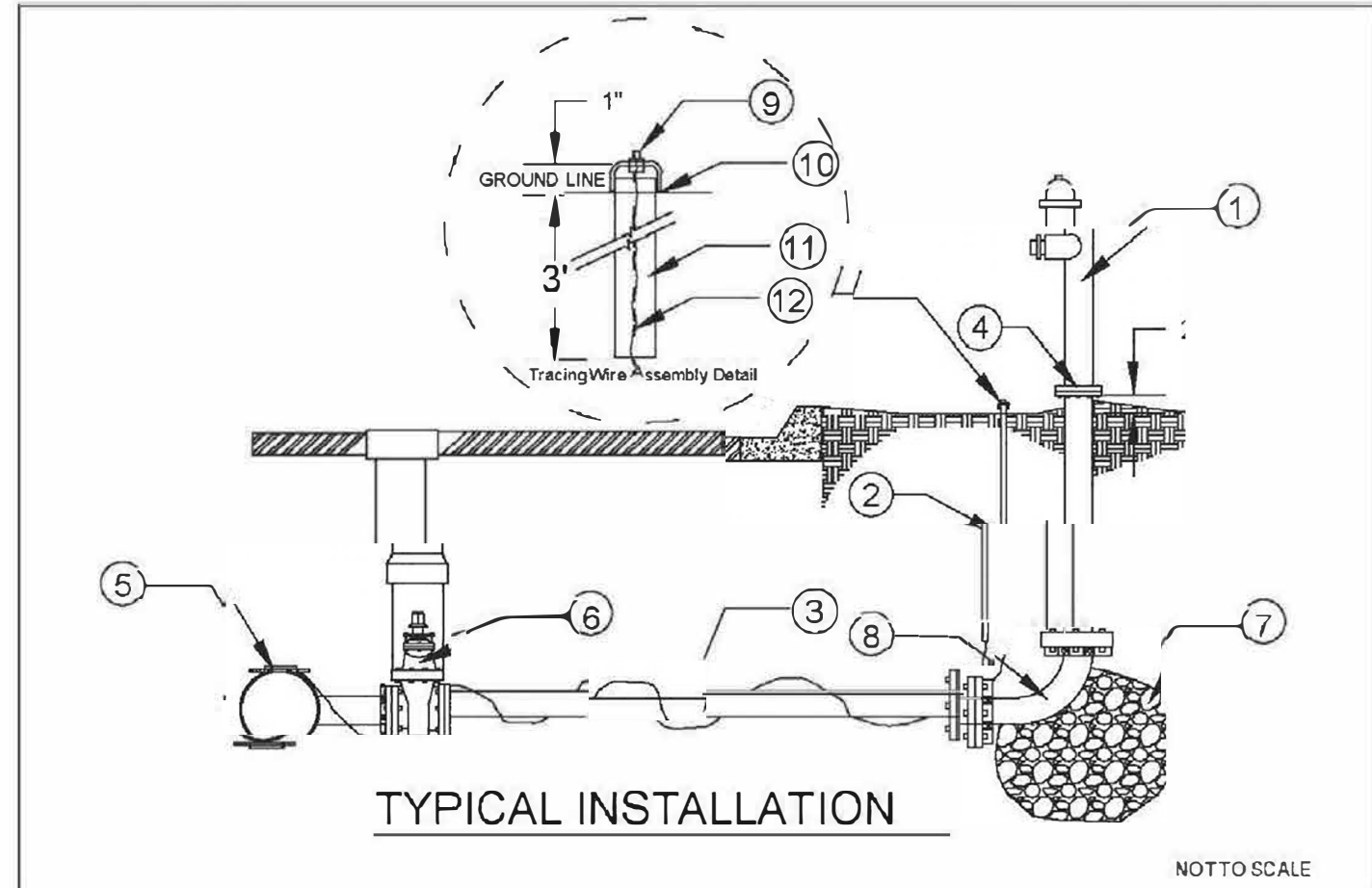


#	DESCRIPTION	#	DESCRIPTION
1	FIRE HYDRANT	8	2" MINIMUM 4" MAXIMUM GAP FROM FINISH GRADE TO BREAK AWAY JOINT
2	6" MINIMUM DUCTILE IRON PIPE*	9	DRAIN (DO NOT BLOCK)
3	1/2 CUBIC YARD GRAVEL DRAIN	10	NUT AND BOLT WITH WIRE SECURED BY SILVER SOLDER
4	PERMEABLE GEOTEXTILE	11	GLUED PVC CAP
5	6" MINIMUM GATE VALVE	12	3/4" PVC
6	6" MINIMUM MECHANICAL JOINT TEE FITTING	13	#10 TRACING WIRE
7	BREAK-AWAY CONNECTION	*	ALL BURIED DUCTILE IRON SHALL HAVE CATHODIC PROTECTION

SANTA FE COUNTY UTILITIES
 STANDARD DETAILS

FIRE HYDRANT

DATE: 08/2024

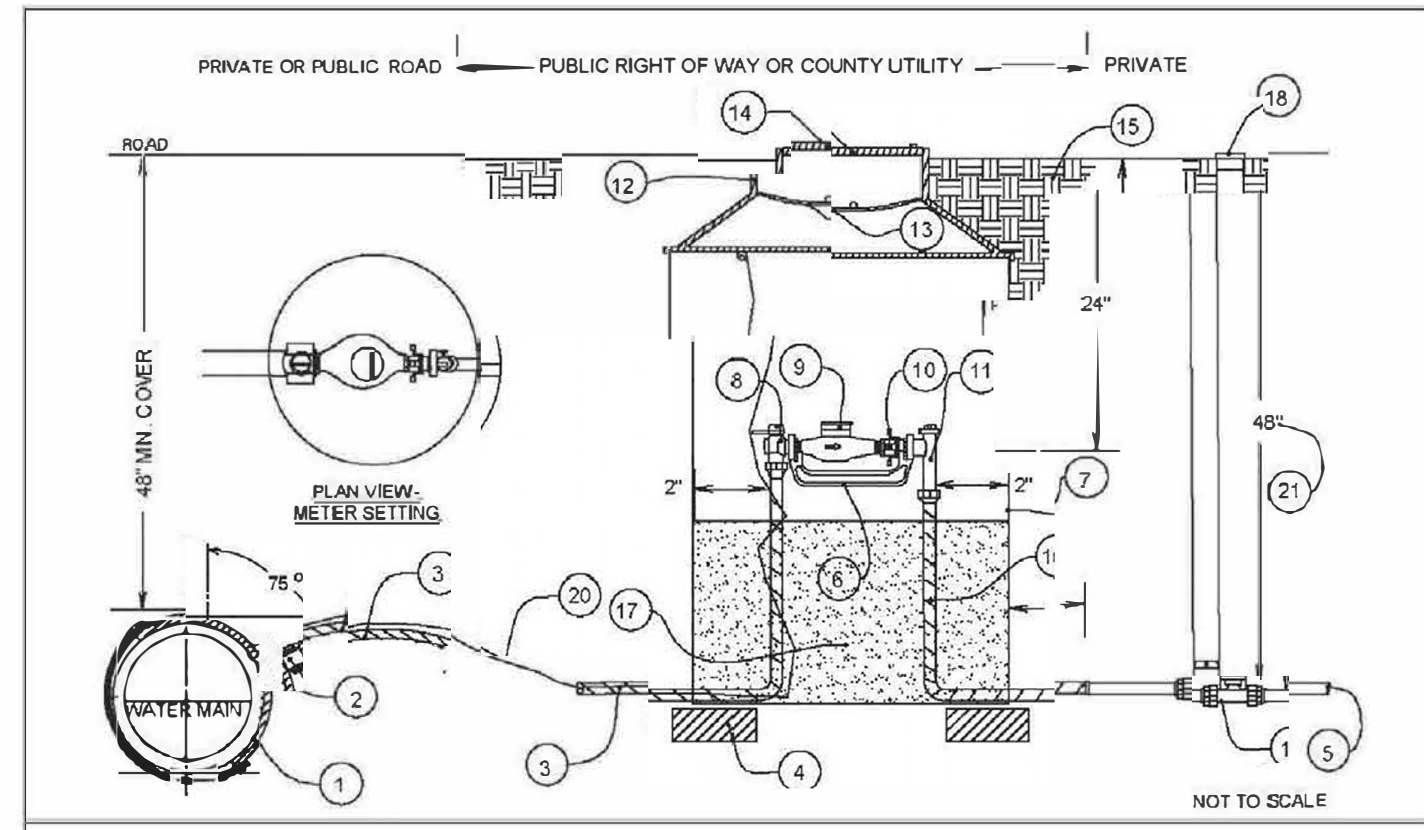


#	DESCRIPTION
1	2-1/4" POST TYPE HYDRANT WITH NATIONAL STANDARD THREADS
2	WIRE WITH ASSEMBLY
3	2" TYPE K COPPER
4	BREAK-AWAY CONNECTION
5	2" SERVICE SADDLE - FULL WRAP AROUND STAINLESS STEEL - INSPECTION REQUIRED
6	2" GATE VALVE WITH BOX
7	1/4 YARD GRAVEL AT DRAIN
8	MECHANICAL JOINT ELBOW
9	NUT AND BOLT WITH WIRE SECURED BY SILVER SOLDER
10	GLUED PVC CAP
11	3/4" PVC
12	#10 TRACING WIRE

SANTA FE COUNTY UTILITIES
 STANDARD DETAILS

FLUSH (POST) HYDRANT

DATE: 3/2021

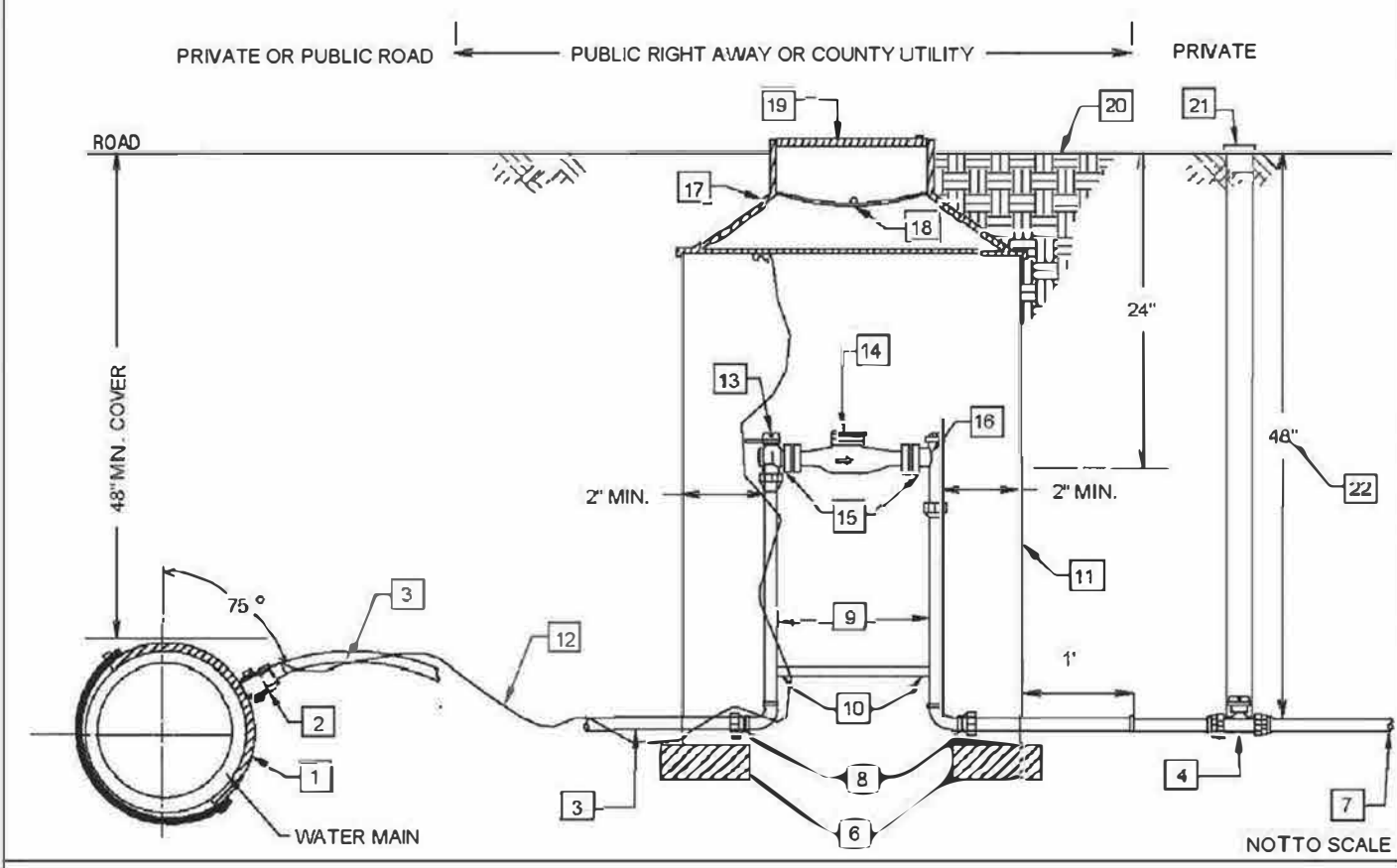


#	SIZE	DESCRIPTION
1	1"	SERVICE SADDLE - FULL WRAP AROUND STAINLESS STEEL - INSPECTION REQUIRED
2	1"	CORPORATION STOP (A.W.W.A. TAPERED THREAD)
3	1"	HDPE SERVICE TUBING, SDR 9 CTS BLUE, WITH 10 GAUGE TRACING WIRE
4	1"	BLOCKS, USED AS NECESSARY
5	1"	CUSTOMER CONNECTION SHALL REMAIN CAPPED UNTIL CUSTOMER LINE CONNECTED
6	1"	CAST IRON METER YOKE
7	20"D x 36"H	METER CAN
8	1"	LOCKABLE ANGLE VALVE
9	1"	SEALED REGISTER WATER METER MACH10 (FURNISHED & INSTALLED BY SFCU)
10	1"	EXPANSION CONNECTION (5/8"xM T.R. CONN.)
11	1"	ANGEL CARTRIDGE WITH DUAL CHECK VALVE
12	20"D x 11-1/2"D	OUTER DOUBLE LID COVER - HAT
13	12-5/16"	CONCAVE POLYMER FROST LID
14	12-5/16"	POLYMER LID - SINGLE HOLE COUNTER BORE CONFIGURATION (BYPASS/AFD-W/ SPGLUP)
15	3/4"	FINISHED GRADE AROUND METER CAN TO BE EARTHEN, NOT CONCRETE
16	3/4"	HDPE SERVICE TUBING, SDR 9 CTS
17	1"	FINE, UNCONSOLIDATED, ROUNDED EARTHEN MATERIAL
18	2"	VALVE CAN FOR 1" BRASS CURB STOP
19	1"	BRASS CURB STOP
20	10" GAUGE	TRACING WIRE
21		IF DEPTH IS GREATER THAN 48" UTILIZE THERMOCOIL DETAIL
*		NOTE: Customer shall install a customer owned Pressure Reducing Valve (PRV).

SANTA FE COUNTY UTILITIES
 STANDARD DETAIL

1" SINGLE SERVICE

DATE: 02/2020

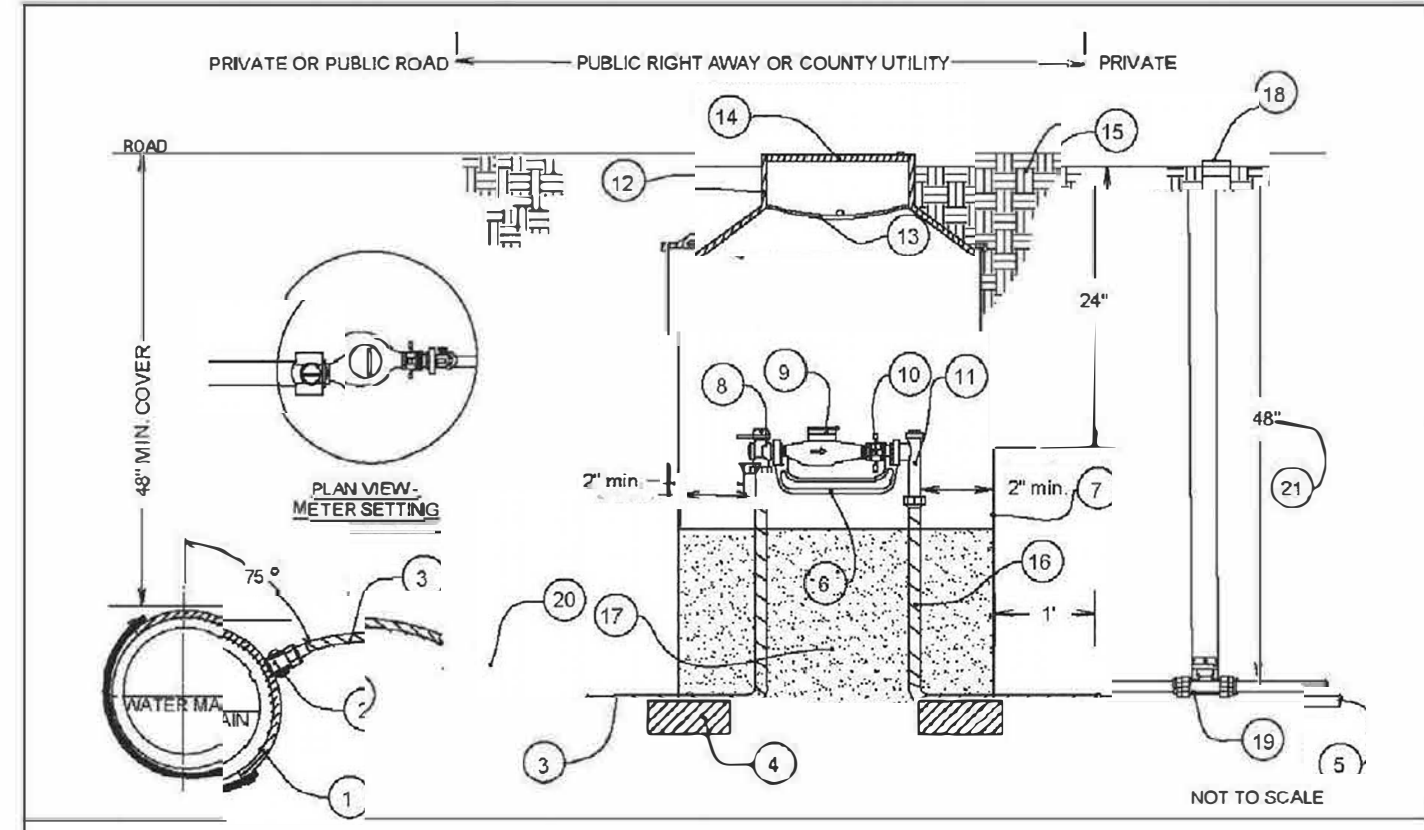


ITEM	SIZE	DESCRIPTION	NOTES
1	2"	SERVICE SADDLE - FULL WRAP AROUND STAINLESS STEEL - INSPECTION REQUIRED	SFCU STANDARDS MATERIALS LIST 3
2	2"	CORPORATION STOP (A.W.W.A. TAPERED THREAD)	
3	2"	HDPE SERVICE TUBING, SDR 9 CTS BLUE, WITH 10 GAUGE TRACING WIRE	
4	2"	BLOCKS, USED AS NECESSARY	
5	2"	CUSTOMER CONNECTION SHALL REMAIN CAPPED UNTIL CUSTOMER LINE CONNECTED	
6	3/4"	CAST IRON METER YOKE	
7	20"D x 36"H	METER CAN	
8	1" x 5/8"	LOCKABLE ANGLE VALVE	
9	5/8" x 3/4"	SEALED REGISTER WATER METER MACH10 (FURNISHED & INSTALLED BY SFCU)	
10	3/4"	EXPANSION CONNECTION (5/8"xM T.R. CONN.)	
11	3/4"	ANGEL CARTRIDGE WITH DUAL CHECK VALVE	
12	20"D x 11-1/2"D	OUTER DOUBLE LID COVER - HAT	
13	12-5/16"	CONCAVE POLYMER FROST LID	
14	12-5/16"	POLYMER LID - SINGLE HOLE COUNTER BORE CONFIGURATION (BYPASS/AFD-W/ SPGLUP)	
15	3/4"	FINISHED GRADE AROUND METER CAN TO BE EARTHEN, NOT CONCRETE	
16	3/4"	HDPE SERVICE TUBING, SDR 9 CTS	
17	1"	FINE, UNCONSOLIDATED, ROUNDED EARTHEN MATERIAL	
18	2"	VALVE CAN FOR 2" BRASS CURB STOP	
19	2"	BRASS CURB STOP	
20	10" GAUGE	TRACING WIRE	
21		IF DEPTH IS GREATER THAN 48" UTILIZE THERMOCOIL DETAIL	
*		NOTE: Customer shall install a customer owned Pressure Reducing Valve (PRV).	

SANTA FE COUNTY UTILITIES
 STANDARD DETAIL

2" SINGLE SERVICE

DATE: 08/2024

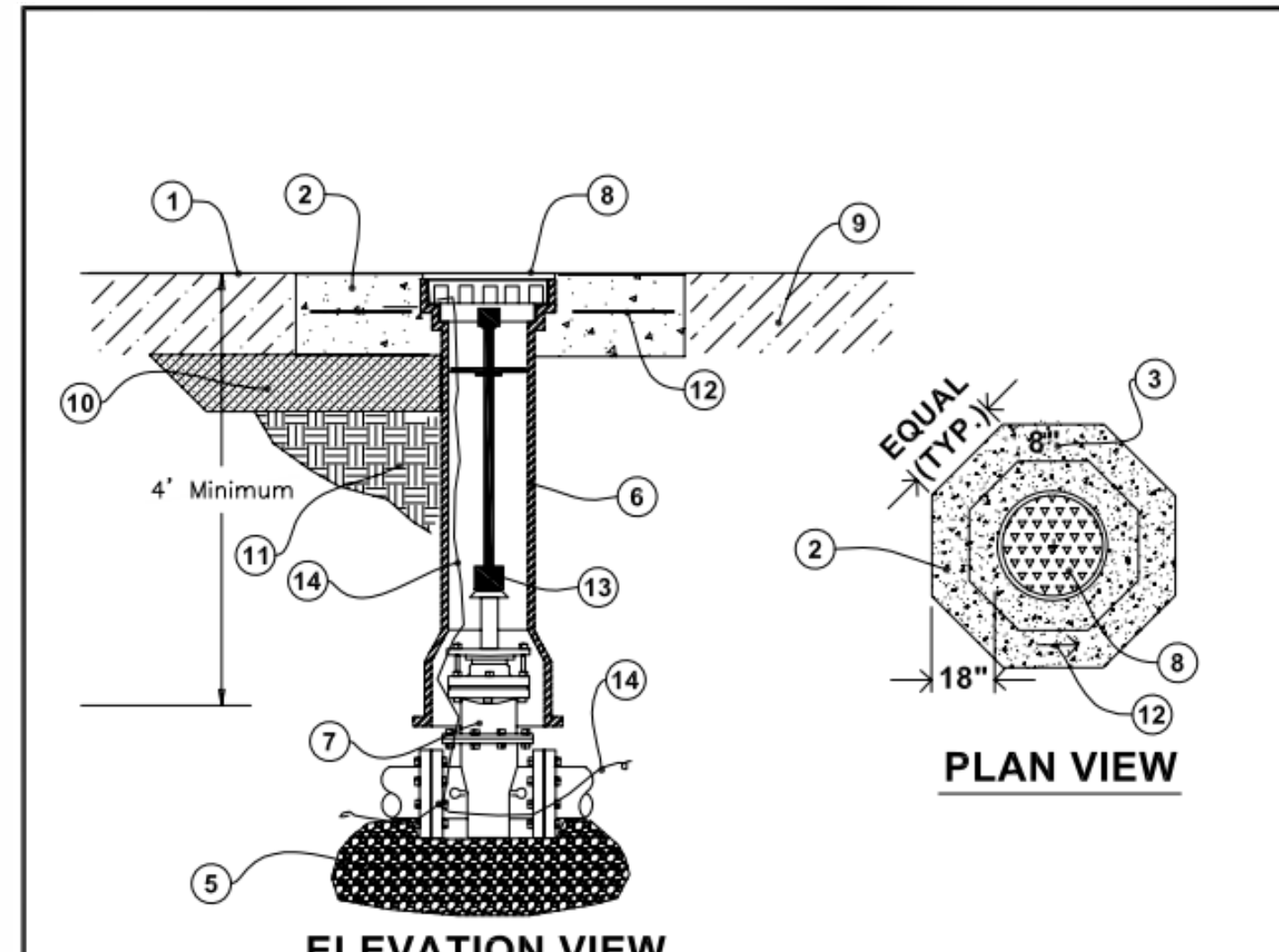


#	SIZE	DESCRIPTION
1	1"	SERVICE SADDLE - FULL WRAP AROUND STAINLESS STEEL - INSPECTION REQUIRED
2	1"	CORPORATION STOP (A.W.W.A. TAPERED THREAD)
3	1"	HDPE SERVICE TUBING, SDR 9 CTS BLUE, WITH 10 GAUGE TRACING WIRE
4	1"	BLOCKS, USED AS NECESSARY
5	3/4"	CUSTOMER CONNECTION SHALL REMAIN CAPPED UNTIL CUSTOMER LINE CONNECTED
6	5/8" x 3/4"	CAST IRON METER YOKE
7	20"D x 36"H	METER CAN
8	1" x 5/8"	LOCKABLE ANGLE VALVE
9	5/8" x 3/4"	SEALED REGISTER WATER METER MACH10 (FURNISHED & INSTALLED BY SFCU)
10	3/4"	EXPANSION CONNECTION (5/8"xM T.R. CONN.)
11	3/4"	ANGEL CARTRIDGE WITH DUAL CHECK VALVE
12	20"D x 11-1/2"D	OUTER DOUBLE LID COVER - HAT
13	12-5/16"	CONCAVE POLYMER FROST LID
14	12-5/16"	POLYMER LID - SINGLE HOLE COUNTER BORE CONFIGURATION (BYPASS/AFD-W/ SPGLUP)
15	3/4"	FINISHED GRADE AROUND METER CAN TO BE EARTHEN, NOT CONCRETE
16	3/4"	HDPE SERVICE TUBING, SDR 9 CTS
17	1"	FINE, UNCONSOLIDATED, ROUNDED EARTHEN MATERIAL
18	2"	VALVE CAN FOR 3/4" BRASS CURB STOP
19	3/4"	BRASS CURB STOP
20	10" GAUGE	TRACING WIRE
21		IF DEPTH IS GREATER THAN 48" UTILIZE THERMOCOIL DETAIL
*		NOTE: Customer shall install a customer owned Pressure Reducing Valve (PRV).

SANTA FE COUNTY UTILITIES
 STANDARD DETAIL

5/8" SINGLE SERVICE

DATE: 02/2020



#	DESCRIPTION	#	DESCRIPTION
1	FINISH STREET GRADE	8	VALVE BOX
2	8" MINIMUM depth - 3000 PSI CONCRETE PAD	9	PAVEMENT
3	STAMPED LINE SIZE (2 SIZES IF REDUCED)	10	SUBGRADE
4	STAMPED ARROW INDICATING ISOLATION DIRECTION(?)	11	COMPACTED BACKFILL
5	98% COMPACTED BACKFILL 12" MINIMUM DEPTH	12	#4 REBAR
6	5-1/4" SCREWTYPE ADJUSTABLE VALVE BOX	13	EXTENSION BAR IF POSSIBLE
7	GATE VALVE	14	#12 TRACING WIRE

SANTA FE COUNTY UTILITIES
 STANDARD DETAILS

VALVE & VALVE BOX INSTALLATION

DATE: 08/2024

DESIGN ENGINEER

 1841 LUISA STREET, SUITE C
 SANTA FE, NEW MEXICO 87505
 (505) 181-1991

SANTA FE COUNTY DETAILS

SCALE: AS SHOWN
 DRAWING NO.:
 SHEET NO.: 05/14/2025
 APPROVED: Jerome T. Roibal
 SHEET NO. 11-3

PRODUCT SPECIFICATIONS

MUELLER® A-2361 RESILIENT WEDGE GATE VALVES - 350psi



1. GENERAL CLASSIFICATION

- 1.1 Mueller Resilient Wedge Gate Valves comply with ANSI/AWWA C515.
- 1.2 Mueller Resilient Wedge Gate Valves are approved by Factory Mutual Research Corporation (FM).
- 1.3 Mueller Resilient Wedge Gate Valves are listed by Underwriters Laboratories, Inc. (UL). Valves with actuators are not listed.
- 1.4 Mueller Resilient Wedge Gate Valves are tested and certified to ANSI/NSF Standard 61 & 372.
- 1.5 Mueller Resilient Wedge Gate Valves are suitable for potable water applications.
- 1.6 Mueller Resilient Wedge Gate Valves are iron body, fully encapsulated resilient wedge type.
- 1.7 Mueller Resilient Wedge Gate Valves are manufactured in the U.S.A. at an ISO9001 Certified factory.

2. SIZE RANGE, WORKING TEMPERATURE, AND WORKING PRESSURE

- 2.1 Sizes: 4" to 12".
- 2.2 Working Temperature: 33°F minimum to 125°F maximum working temperature.
- 2.3 Working Pressure: 350psi for AWWA, UL and FM.

3. TYPE OF VALVE

- 3.1 Resilient Wedge Gate Valves are non-rising stem type.
- 3.2 NRS Resilient Wedge Gate Valves feature O-ring stem seals.
- 3.3 Resilient Wedge Gate Valves are available to either open left or open right.
- 3.4 Resilient Wedge Gate Valves have a 2" square wrench nut complying with AWWA C515. Optional hand wheels are available.
- 3.5 Resilient Wedge Gate Valves are offered with the following end connections:
 - 3.5.1 Flanged Ends with flange drilling complying to ASME B16.1 Class 125 (ISO PN10/PN16 drilling optional). Per ANSI/AWWA C111, working pressure above 250psi requires the use of a special gasket rated for the higher pressure.
 - 3.5.2 Mechanical Joint Ends complying with ANSI/AWWA C111/A21.11.
- 3.6 Resilient Wedge Tapping valves are offered with the following end connections:
 - 3.6.1 Inlet flange machined specifically for mating with Tapping Sleeves and Crosses. Raised ring on flange face complies with MSS SP-60. Drilling complies with ASME B16.1 Class 125 flange.
 - 3.6.2 Standard Mechanical Joint outlet connection complies with ANSI/AWWA C111/A21.11 and is precision machined for proper alignment of Mueller® Drilling Machines.

Form 12933 17-16

page 1 of 3

PRODUCT SPECIFICATIONS

MUELLER® A-2361 RESILIENT WEDGE GATE VALVES - 350psi



4. MATERIAL SPECIFICATIONS

- 4.1 Cap screw – Stainless Steel Type 304.
- 4.2 Wrench nut – Ductile Iron, ASTM A-536.
- 4.3 Handwheel – Cast Iron, ASTM A-126, Class B.
- 4.4 Stuffing box – Ductile Iron, ASTM A-536.
- 4.5 Stem O-rings – Nitrile, ASTM D2000.
- 4.6 Anti-friction washers – Acetal.
- 4.7 Stem – Manganese Bronze, CDA Alloy C67600.
- 4.8 Bonnet – Ductile Iron, ASTM A-536.
- 4.9 Bonnet seal – O-ring, Nitrile, ASTM D2000.
- 4.10 Stuffing box bolts & nuts – Stainless Steel Type 304.
- 4.11 Bonnet bolts & nuts – Stainless Steel Type 304.
- 4.12 Disc nut – Bronze, ASTM B-584 Alloy C89833.
- 4.13 Guide cap bearings – Acetal.
- 4.14 Disc – Ductile Iron, ASTM A-536.
- 4.15 Disc encapsulated – SBR ASTM D2000.
- 4.16 Body – Ductile Iron, ASTM A-536.
- 4.17 Coating – Inside and outside of valve fully coated Mueller PRO-GARD® Fusion Bonded Epoxy - coating complies with ANSI/AWWA C550 and valve is certified to ANSI/NSF Standard 61 & 372.

5. DESIGN FEATURES

- 5.1 Flow way – fully unobstructed, oversized flow-way. The sealing mechanism is withdrawn from the flow-way in a full open position. No pockets in bottom of flow-way to trap sediment or debris. The flow-way will permit passage of full-sized shell cutters.
- 5.2 Bronze Disc Nut – on all valves.
- 5.3 Anti-Friction Washers on non-rising stem valves – located above and below the thrust collar portion of the stem to reduce friction and provide more effective conversion of operating torques into seating loads.
- 5.4 Stem for non-rising stem valves, with O-ring Seals – One O-ring is located below the thrust collar of the stem and two are located above the thrust collar, the upper most serving as a dirt seal. The O-rings and thrust collar are factory lubricated. The two primary O-rings seal the thrust collar area from outside contaminants and water, and retain an ample amount of lubricant on the thrust collar and anti-friction washers to reduce operating torque and wear.
- 5.5 Stem – The threads on the bronze stem are Acme form threads for strength and efficiency. The stem thrust collar is made integral with the stem -- and is formed by a heat upset operation.
- 5.6 Upper Stem O-ring Replacement – The two O-rings above the thrust collar of all Mueller Resilient Wedge Gate Valves can be replaced with the valve in the fully open position, under pressure, with no leakage.

Form 12933 17-16

page 2 of 3

PRODUCT SPECIFICATIONS

MUELLER® A-2361 RESILIENT WEDGE GATE VALVES - 350psi



- 5.7 Corrosion Resistance – all inside and outside cast iron surfaces are coated with Mueller PRO-GARD® Epoxy Coating, 10 mils nominal. Mueller PRO-GARD® Epoxy Coating is non-toxic and imparts no taste to water. Valves comply with ANSI/AWWA C550 and are certified to ANSI/NSF Standard 61 & 372.

6. OPTIONAL FEATURES

- 6.1 Mueller A-2361 350psi Resilient Wedge Gate Valves can be furnished with the following optional designs or features:
 - 6.1.1 Gearing – Bevel and Spur gearing available. Bevel geared valves are for horizontal installations; spur geared for vertical. Geared valves provide an additional bearing to support the extreme end of the stem.
 - 6.1.2 Position indicator – Available for NRS valves 4" and larger.
 - 6.1.3 Bolts and nuts – Stainless Steel, Type 316.
 - 6.1.4 Stem – Silicon bronze - ASTM B99 C66100; 304 Stainless Steel or 316 Stainless Steel.
 - 6.1.5 Disc encapsulation and O-rings – EPDM ASTM D2000.

7. TEST PRESSURE

- 7.1 The pressure test on each Mueller Resilient Wedge Gate Valve meets the requirements of AWWA Standard C515 for Resilient Seated Valves.
 - 7.1.1 Each Mueller Resilient Wedge Gate Valve is subjected to two pressure tests. The seat test is at the working pressure of AWWA valves and 1-1/2 times working pressure of UL Listed valves. Shell tests are at two times the working pressure.
 - 7.1.2 Pressure tests at the working pressure shall show NO leakage past the seat from either side of the wedge or at the flange joints. Pressure tests at twice the working pressure shall show NO leakage through the metal or flange joints.
 - 7.1.3 Test pressures are as follows: 525psi seat test, 700psi shell test.



Water (U.S.) 1.800.423.1323
www.muellercompany.com
more-info@muellercompany.com

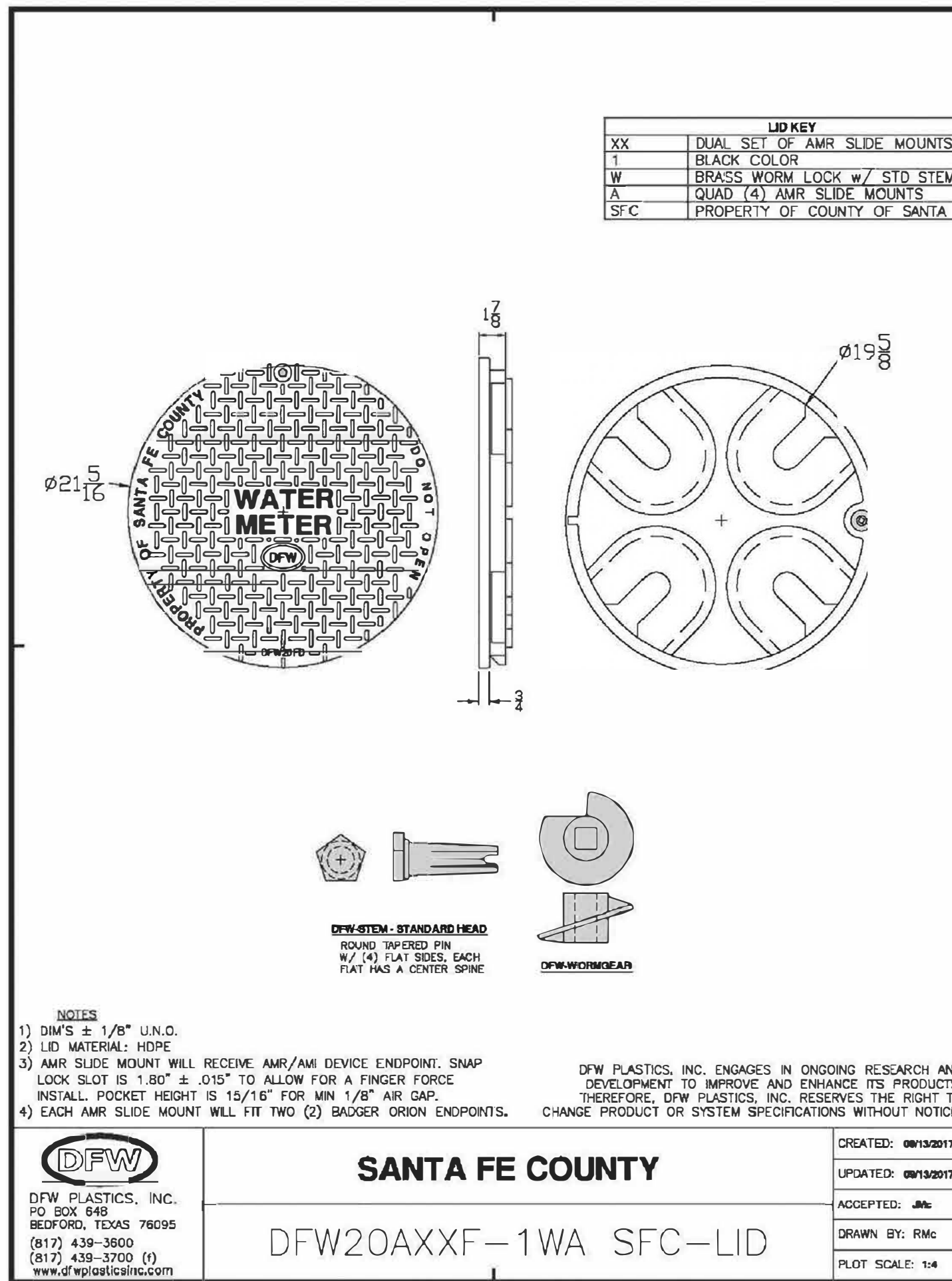
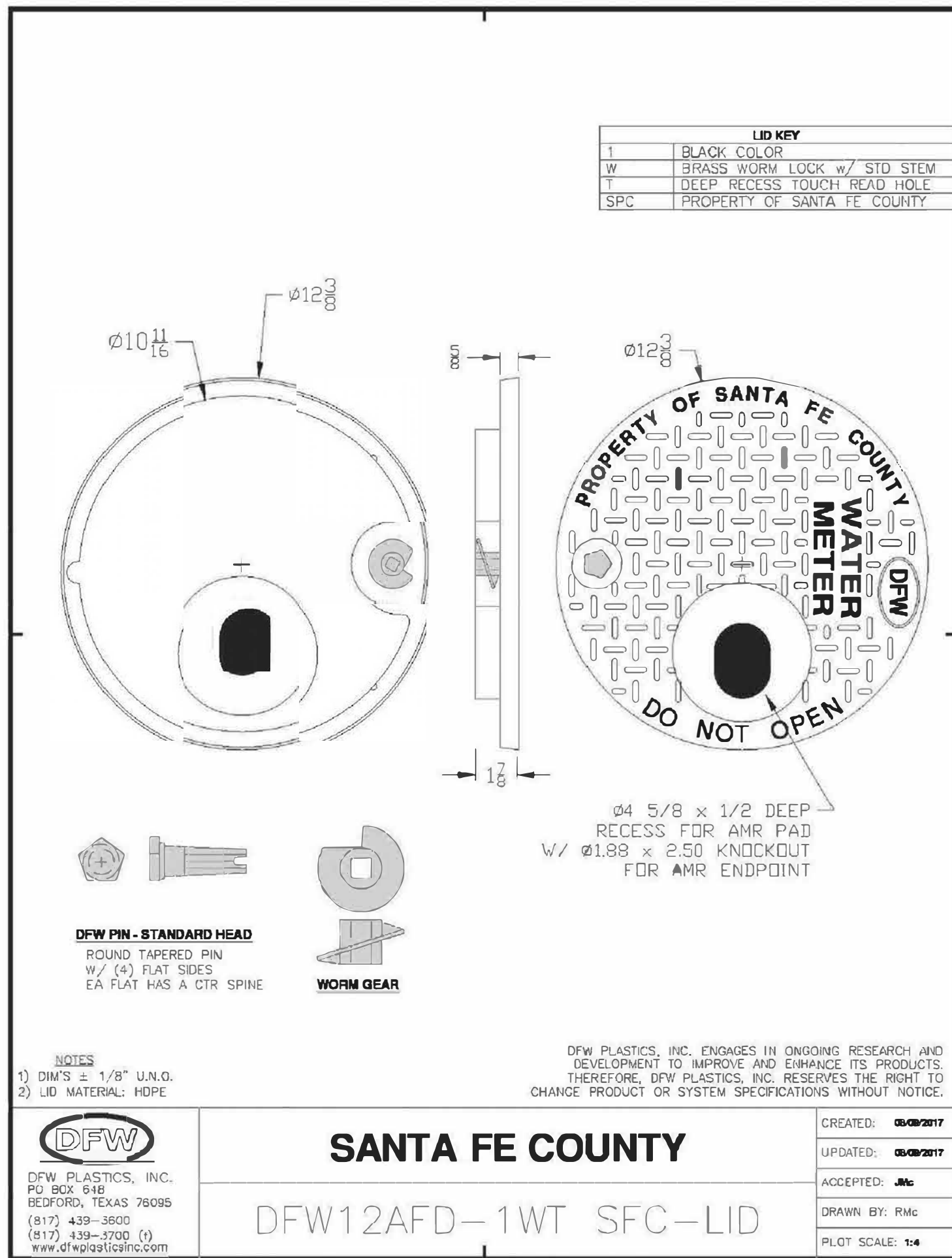
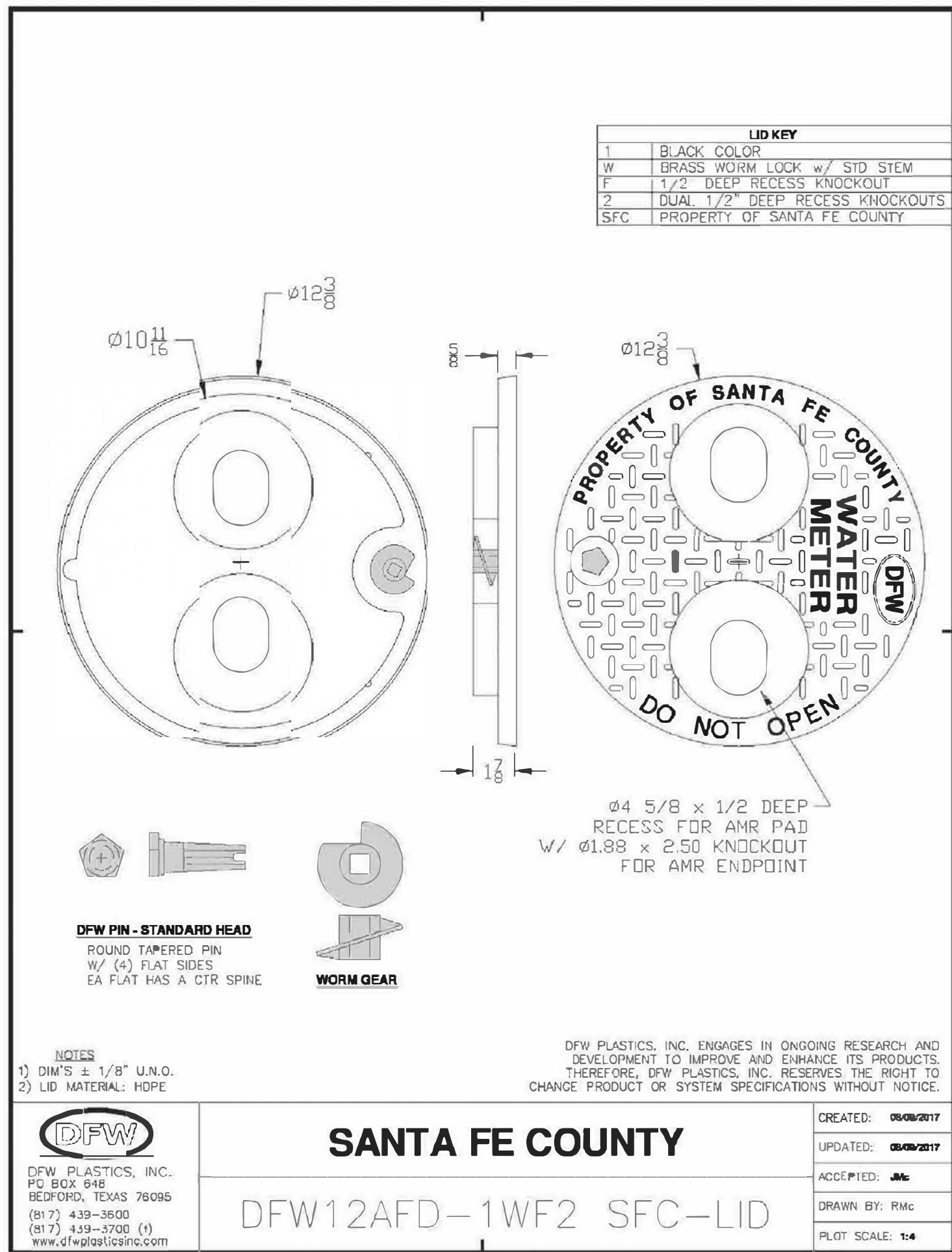
Water (Canada) 1.905.878.0541
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more-info@muellercanada.com

International 1.423.490.9555
www.mueller-international.com
international@muellercompany.com

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page 3 of 3



DESIGN ENGINEER	
1841 LUISA STREET, SUITE C SANTA FE, NEW MEXICO 87505 (505) 981-1991	
SANTA FE COUNTY DETAILS	
SCALE	DATE
AS SHOWN	02/01/2022
PACR CASE #	SHEET NO.
	05/14/2025

SHEET NO. 11-4
Approved By: *Jerome T. Raybal*

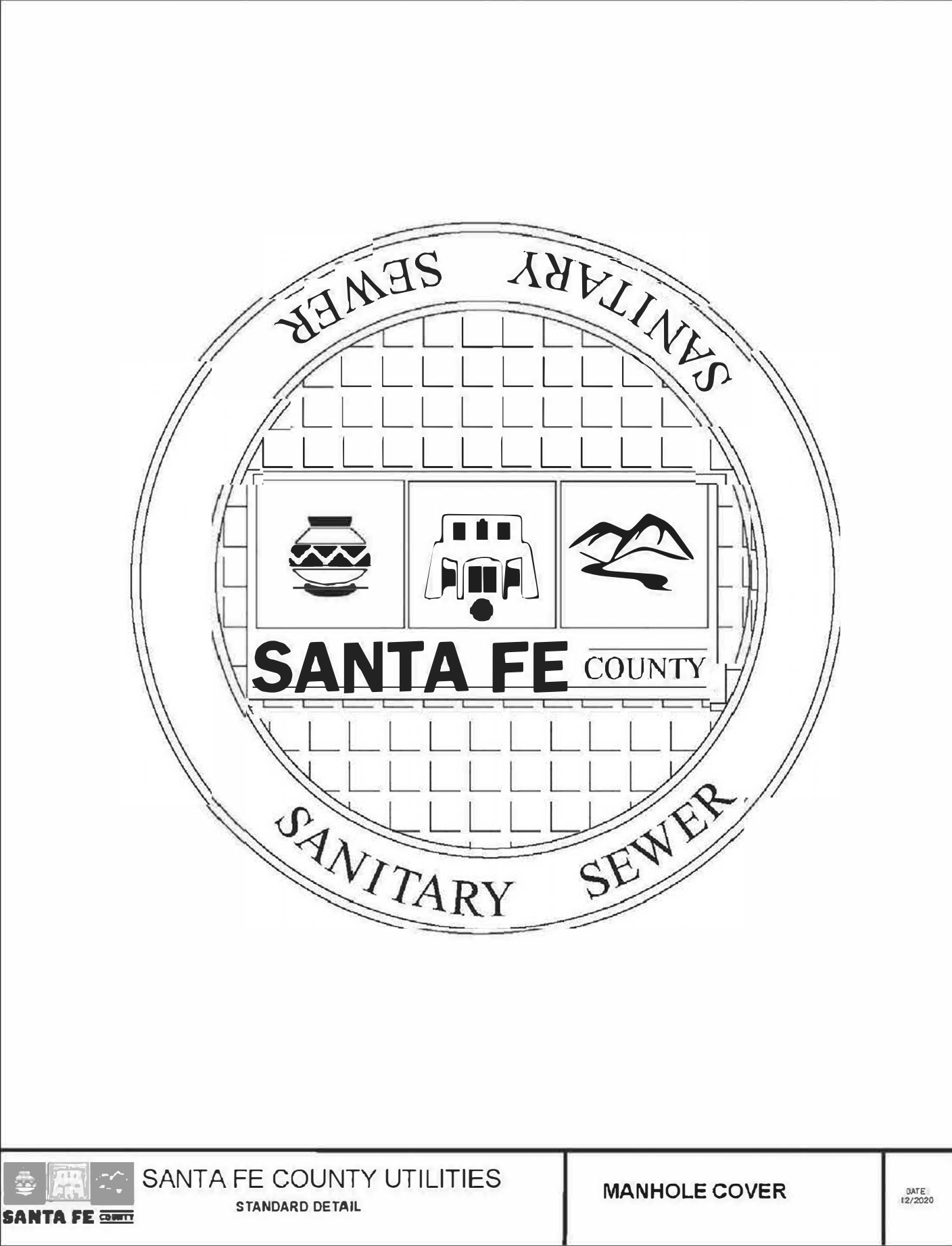
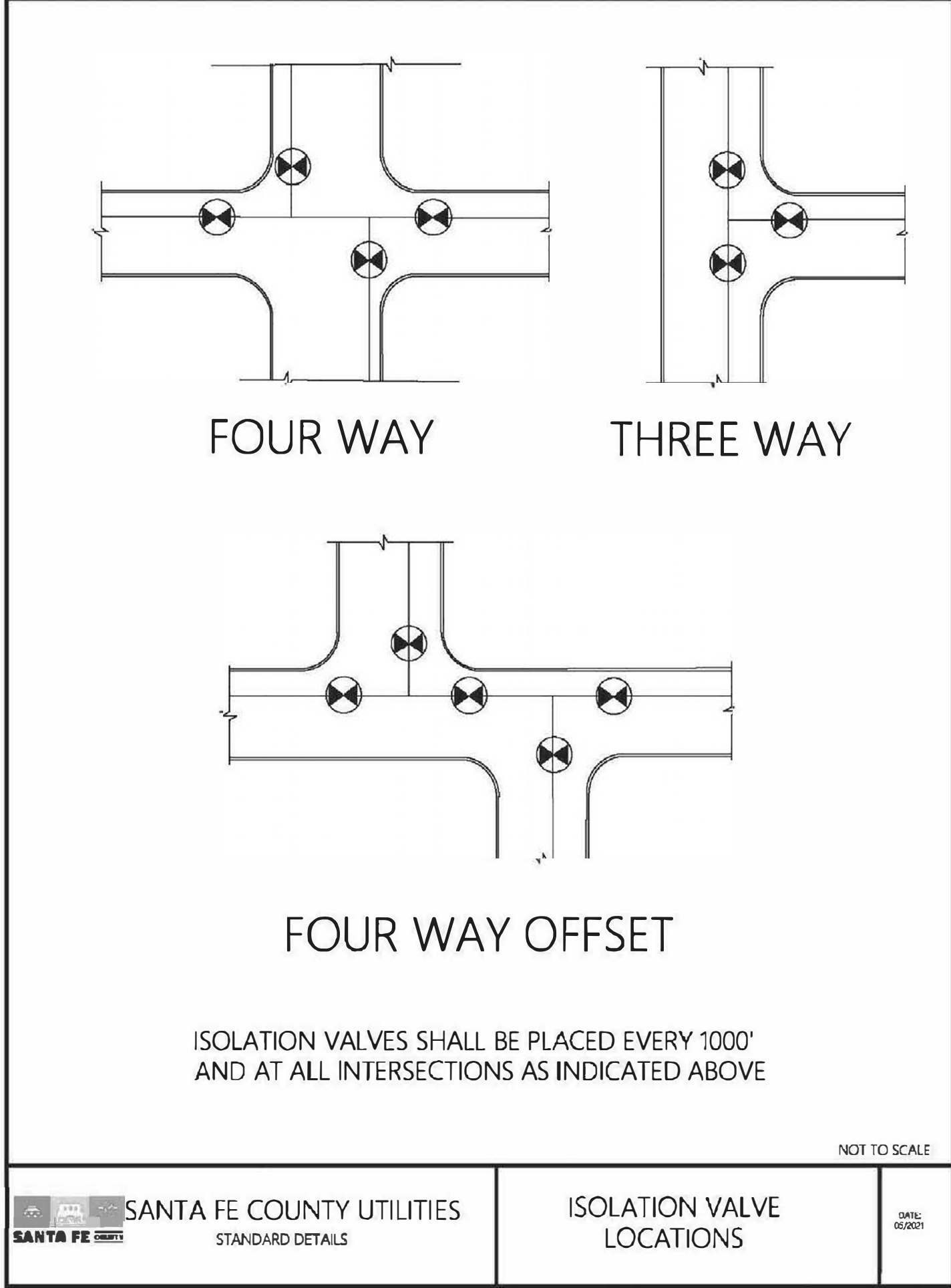


TABLE 1: MINIMUM SPECIFIED TIME REQUIRED FOR A 1.0 PSIG PRESSURE DROP FOR SIZE AND LENGTH OF PIPE INDICATED FOR Q = 0.0015

Pipe Diameter (in.)	Minimum Time (min:sec)	Length for Minimum Time (ft.)	Time for Longer Length (sec)	Specification Time (min:sec) for Length L Shown Below in feet								
				100	150	200	250	300	350	400	450	
4	3:46	597	0.380 L	3:46	3:46	3:46	3:46	3:46	3:46	3:46	3:46	
6	5:40	398	0.854 L	5:40	5:40	5:40	5:40	5:40	5:40	5:42	6:24	
8	7:34	298	1.520 L	7:34	7:34	7:34	7:34	7:34	7:36	8:52	10:08	11:24
10	9:26	239	2.374 L	9:26	9:26	9:26	9:53	11:52	13:51	15:49	17:48	
12	11:20	199	3.418 L	11:20	11:20	11:24	14:15	17:05	19:56	22:47	25:38	
15	14:10	159	5.342 L	14:10	14:10	17:48	22:15	26:42	31:09	35:36	40:04	
18	17:00	133	7.692 L	17:00	19:13	25:38	32:03	38:27	44:52	51:16	57:41	
21	19:50	114	10.470 L	19:50	26:10	34:54	43:37	52:21	61:00	69:48	78:31	
24	22:40	99	13.674 L	22:47	34:11	45:34	56:58	68:22	79:46	91:10	102:33	
27	25:30	88	17.306 L	28:51	43:16	57:41	72:07	86:32	100:57	115:22	129:48	
30	28:20	80	21.366 L	35:37	53:25	71:13	89:02	106:50	124:38	142:26	160:15	
33	31:10	72	25.852 L	43:05	64:38	86:10	107:43	129:16	150:43	172:21	193:53	
36	34:00	66	30.768 L	51:17	76:55	102:34	128:12	153:50	179:29	205:07	230:46	

(Table taken from UNI-B-6-90)

SANTARY GRAVITY SEWER LINE TESTING
New: 05/09

02731-5

TABLE 2: MINIMUM SPECIFIED TIME REQUIRED FOR A 0.5 PSIG PRESSURE DROP FOR SIZE AND LENGTH OF PIPE INDICATED FOR Q = 0.0015

Pipe Diameter (in.)	Minimum Time (min:sec)	Length for Minimum Time (ft.)	Time for Longer Length (sec)	Specification Time (min:sec) for Length L Shown Below in feet								
				100	150	200	250	300	350	400	450	
4	1:53	597	0.190 L	1:53	1:53	1:53	1:53	1:53	1:53	1:53	1:53	
6	2:50	398	0.427 L	2:50	2:50	2:50	2:50	2:50	2:50	2:51	3:12	
8	3:47	298	0.760 L	3:47	3:47	3:47	3:47	3:48	4:26	5:04	5:42	
10	4:43	239	1.187 L	4:43	4:43	4:43	4:57	5:56	6:55	7:54	8:54	
12	5:40	199	1.709 L	5:40	5:40	5:42	7:08	8:33	9:58	11:24	12:50	
15	7:05	159	2.671 L	7:05	7:05	8:54	11:08	13:21	15:35	17:48	20:02	
18	8:30	133	3.846 L	8:30	9:37	12:49	16:01	19:14	22:26	25:38	28:51	
21	9:55	114	5.235 L	9:55	13:05	17:27	21:49	26:11	30:32	34:54	39:16	
24	11:20	99	6.837 L	11:23	17:57	22:48	28:30	34:11	39:53	45:35	51:17	
27	12:45	88	8.853 L	14:25	21:38	28:51	36:04	43:16	50:30	57:42	64:54	
30	14:10	80	10.683 L	17:48	26:43	35:37	44:31	53:25	62:19	71:13	80:07	
33	15:35	72	12.926 L	21:33	32:19	43:46	53:52	64:38	75:24	86:10	96:57	
36	17:00	66	15.384 L	25:39	38:28	51:17	64:06	76:55	89:44	102:34	115:23	

(Table taken from UNI-B-6-90)

SANTARY GRAVITY SEWER LINE TESTING
New: 05/09

02731-6

END OF SECTION

DESIGN ENGINEER

181 LUISA STREET, SUITE C
SANTA FE, NEW MEXICO 87505
(505) 181-1991

SANTA FE COUNTY DETAILS

SCALE
AS SHOWN

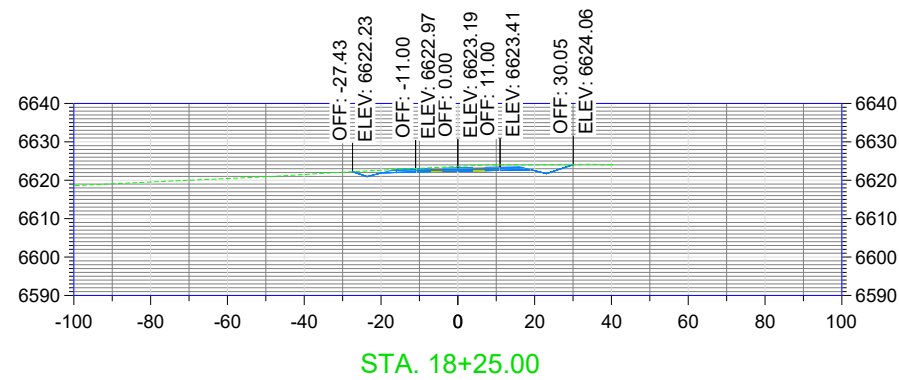
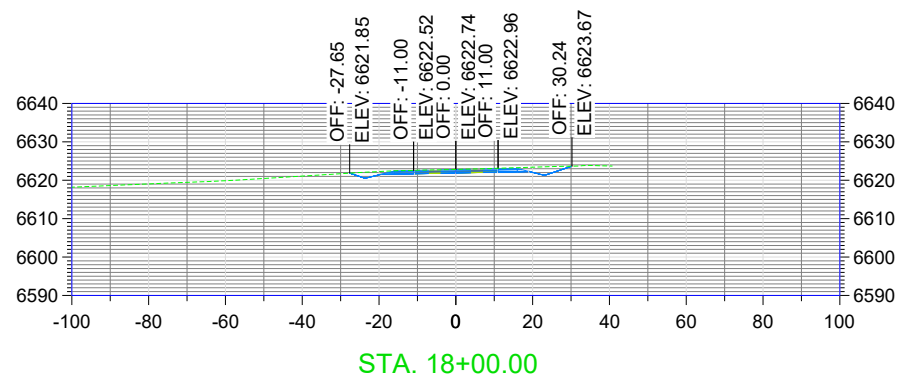
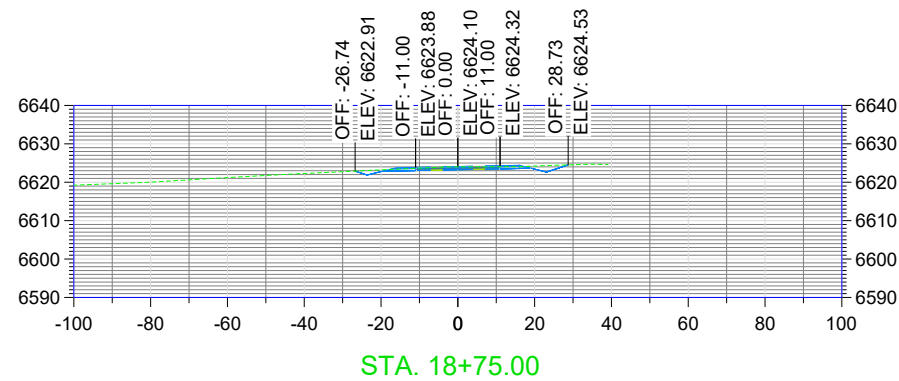
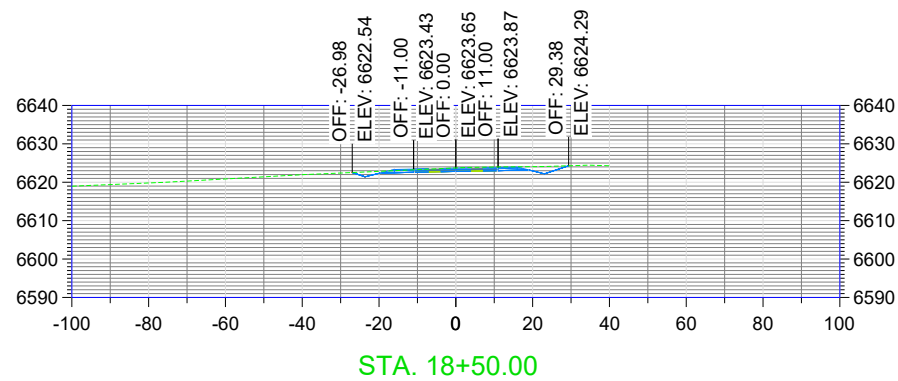
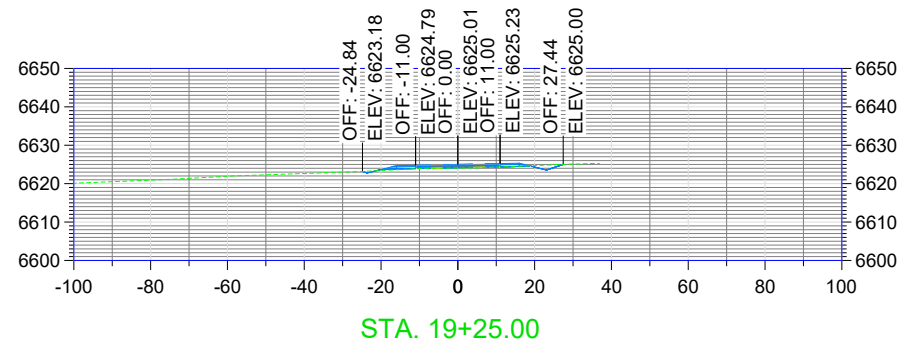
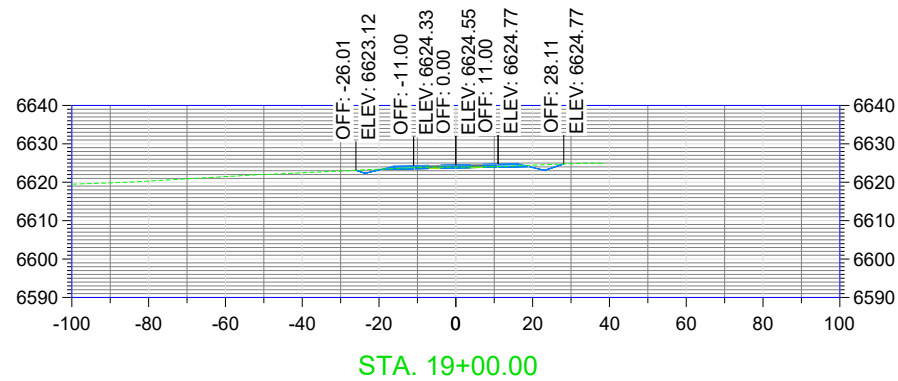
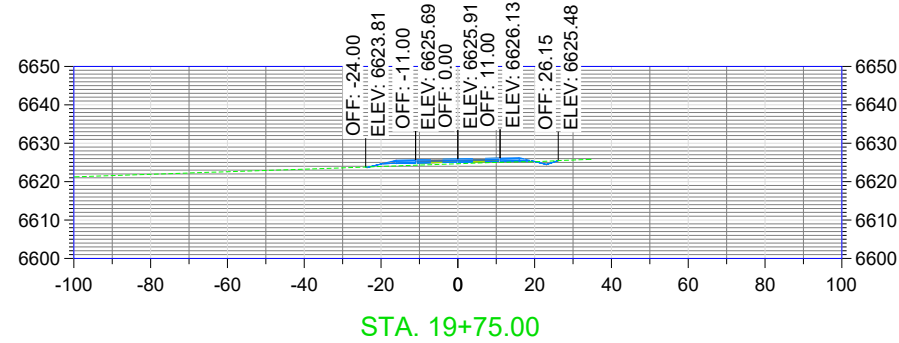
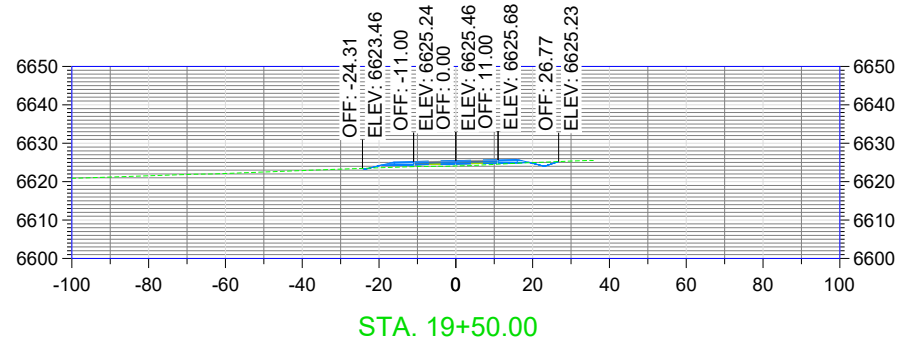
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DATE
02/01/2025

SHEET NO.
05/14/2025

APPROVED
By: *Jerome T. Raybal*

SHEET NO. 11-5



General Notes

No.	Revision/Issue	Date

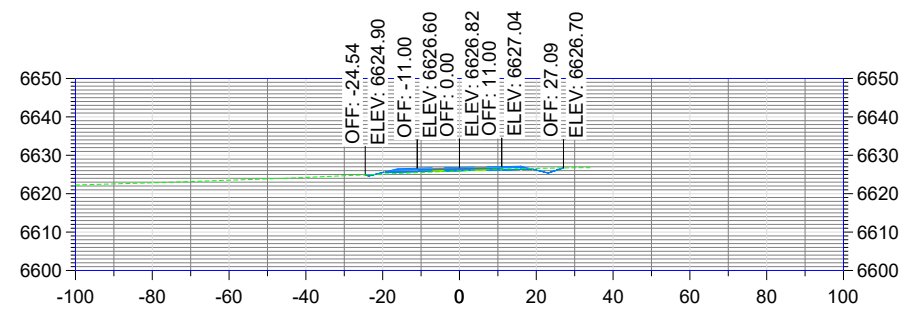
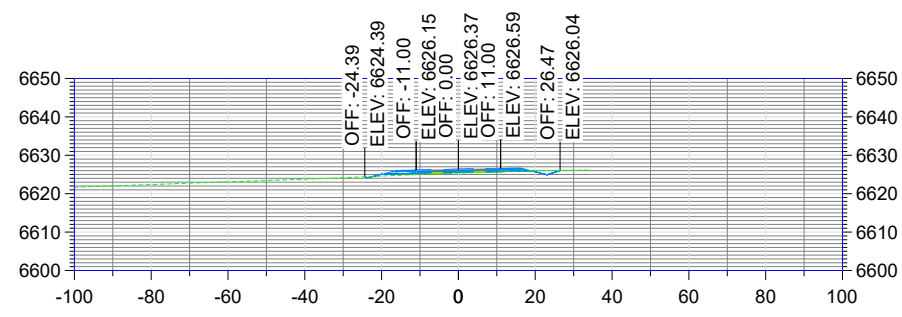
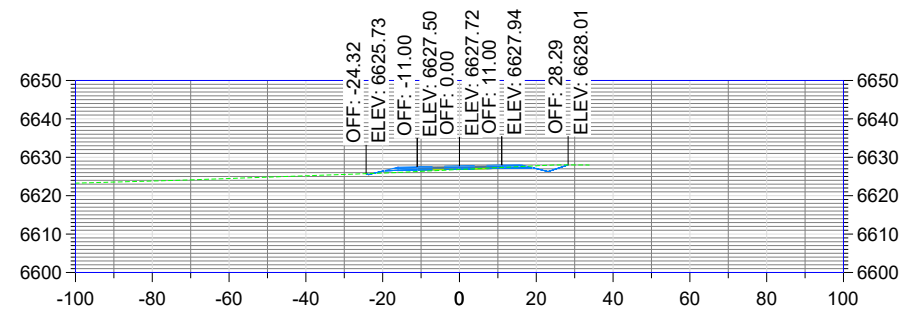
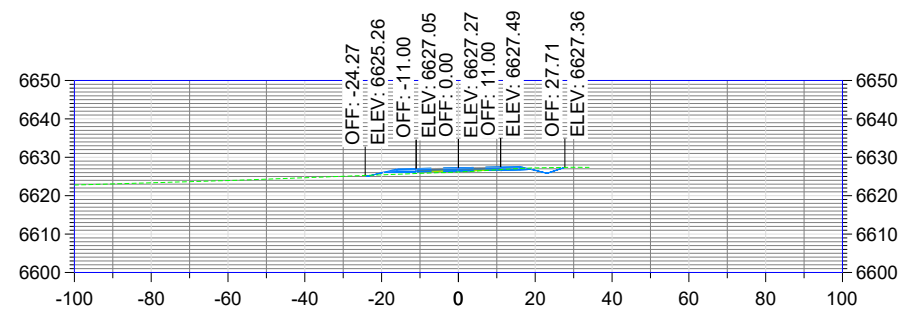
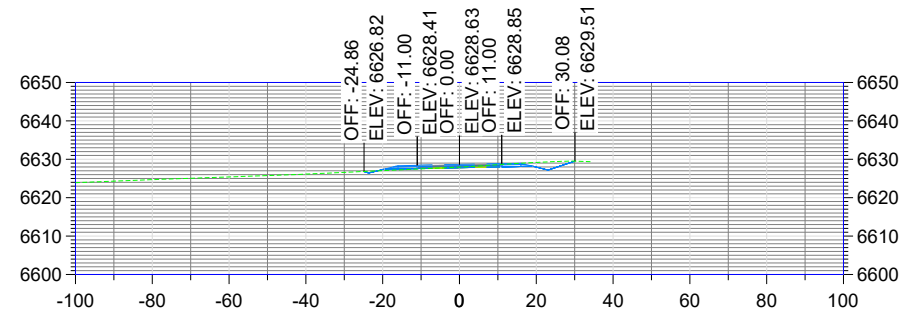
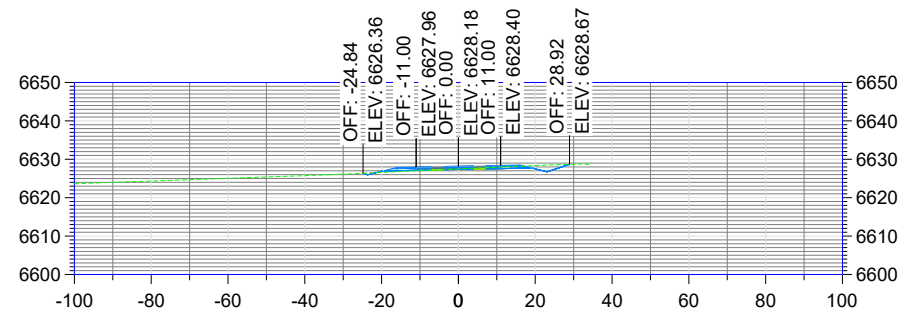
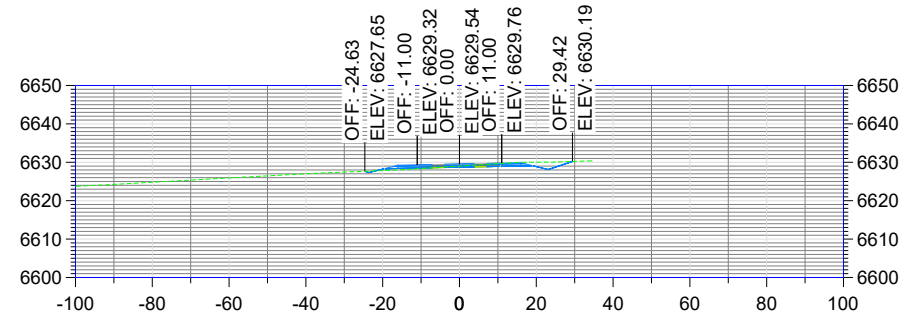
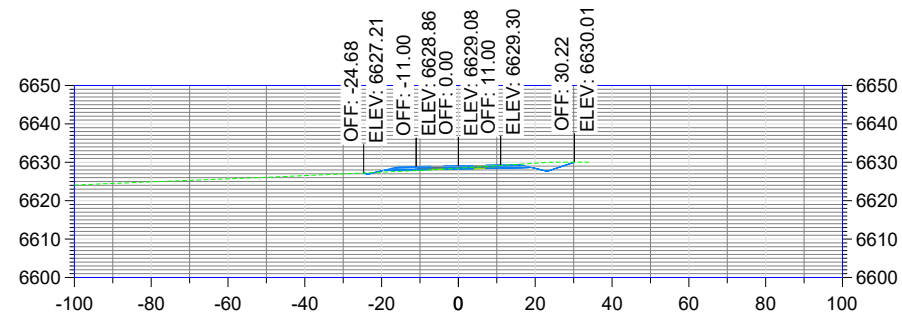


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By: *Jerome T. Roybal*



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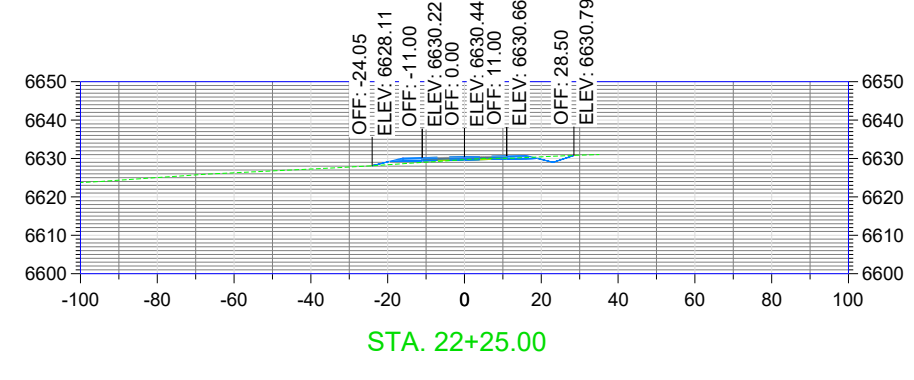
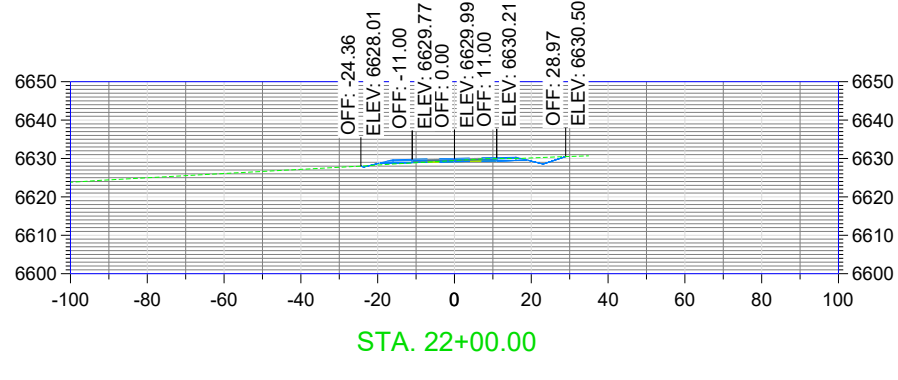
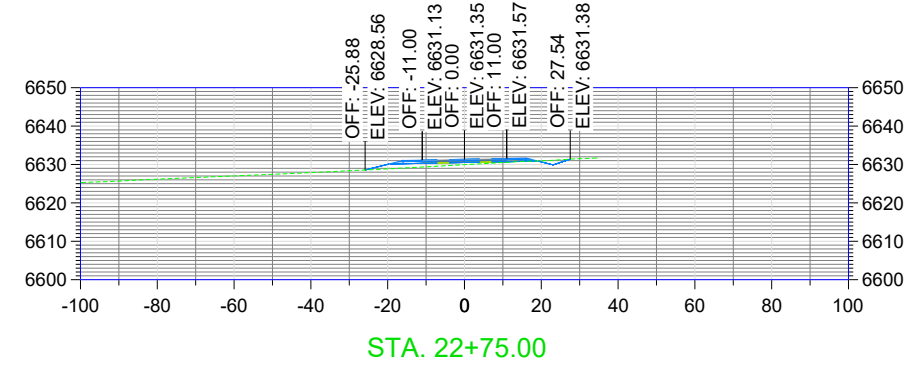
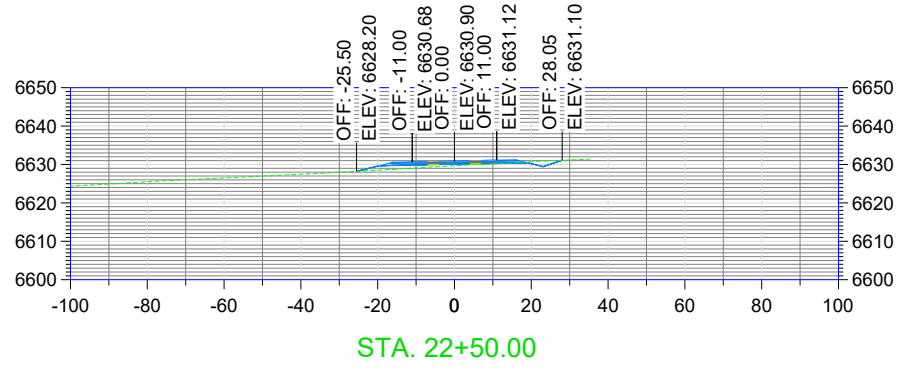
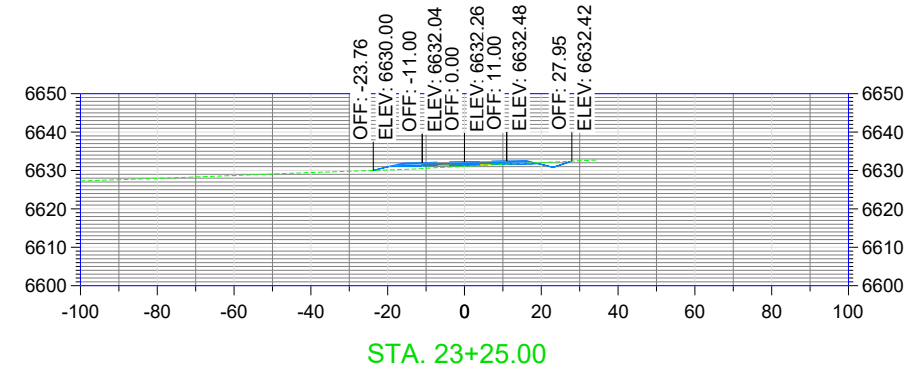
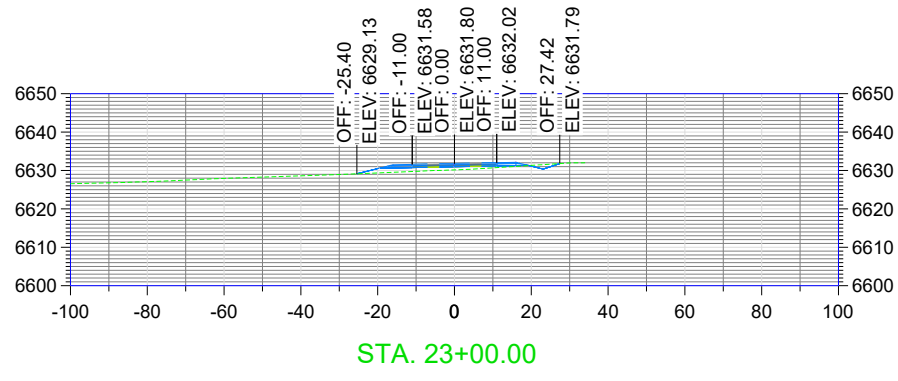
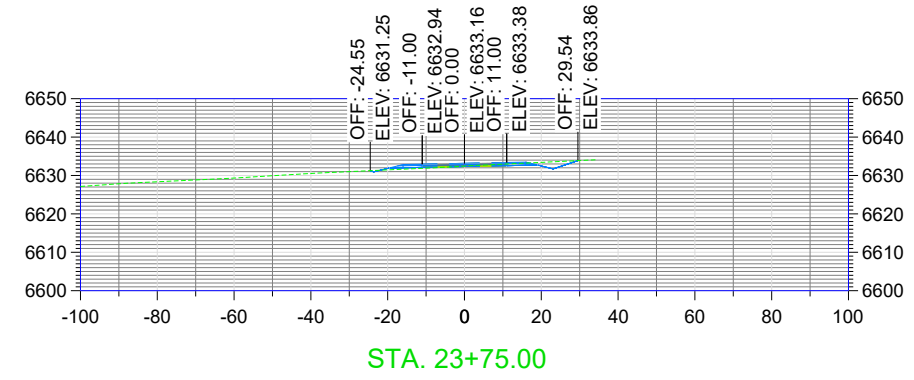
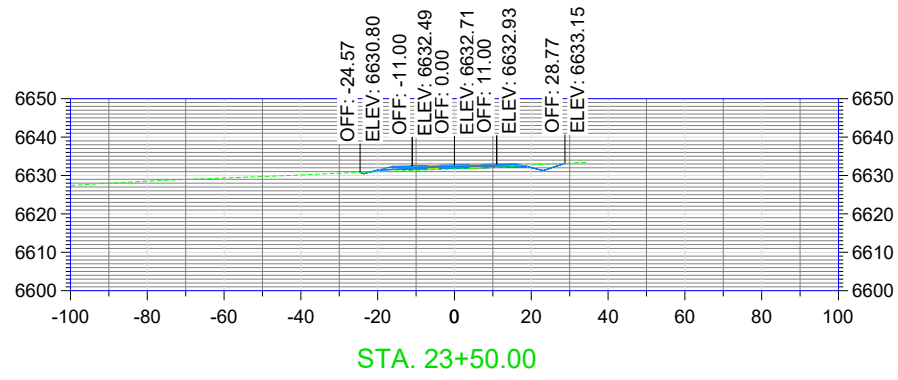


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By: *Jerome T. Roybal*



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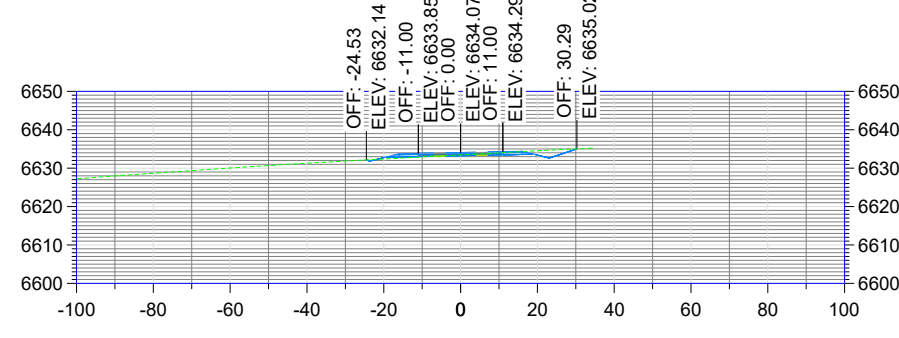
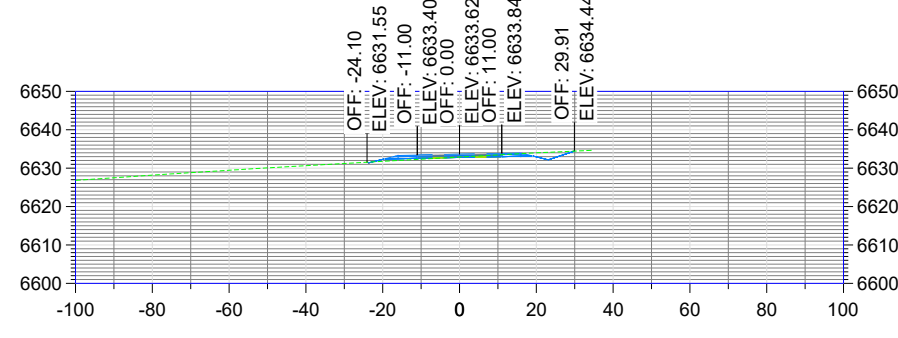
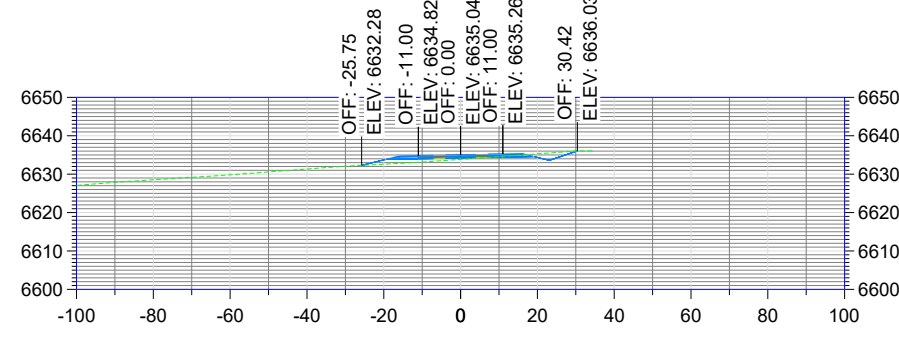
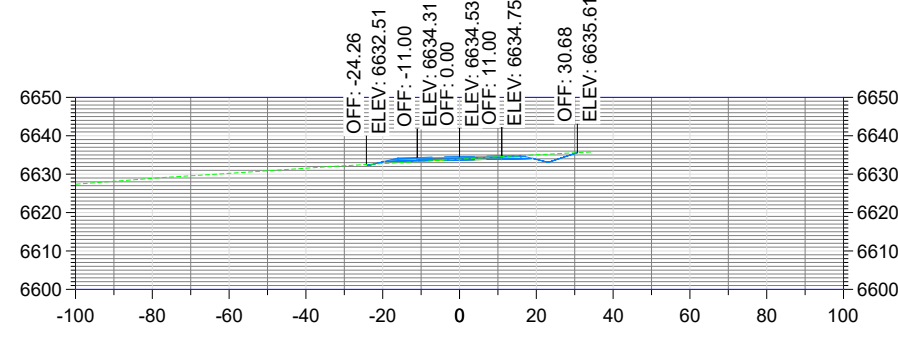
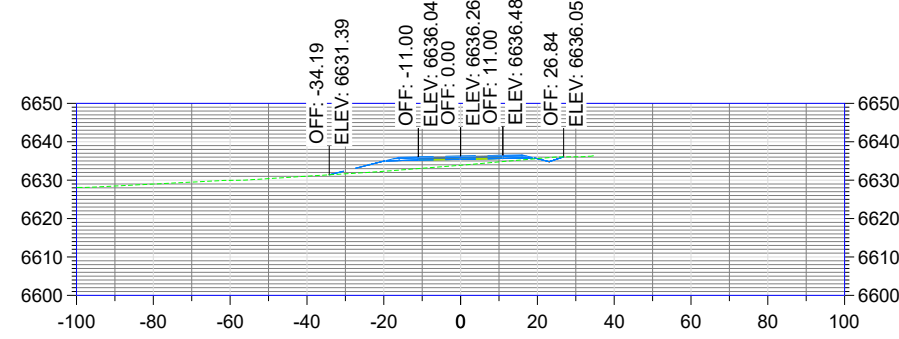
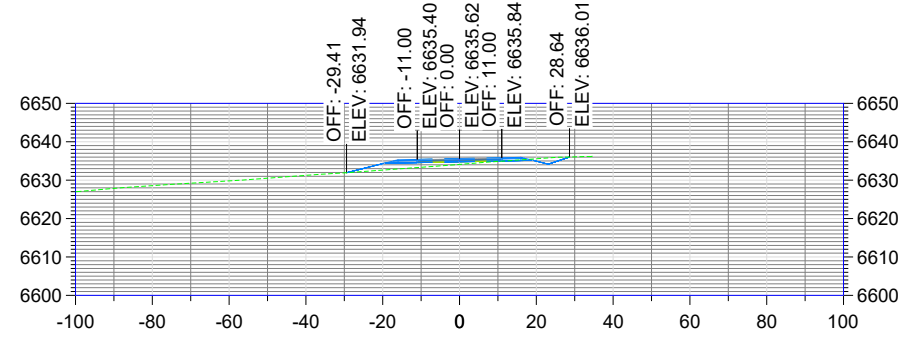
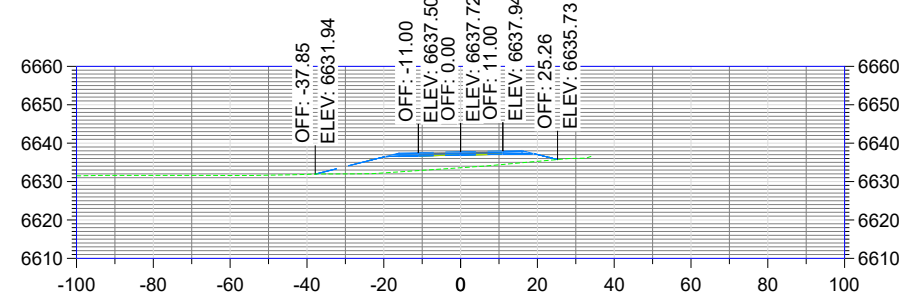
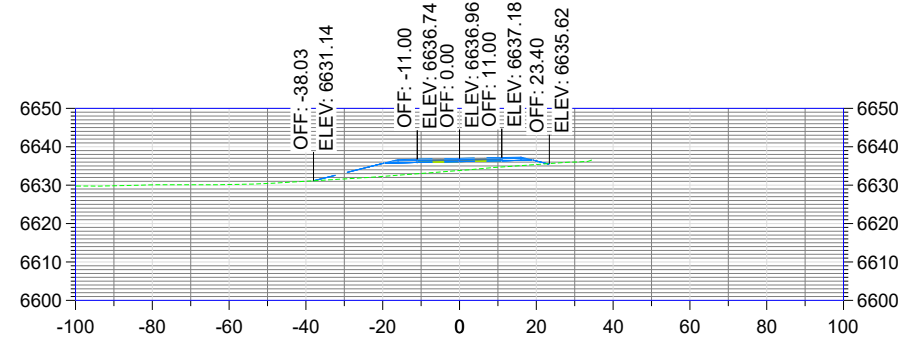


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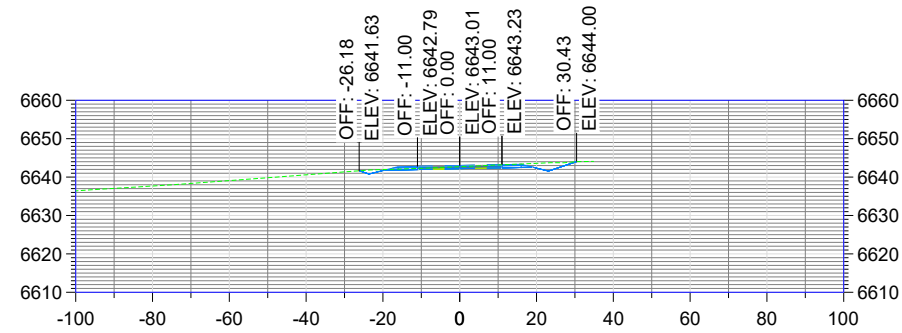


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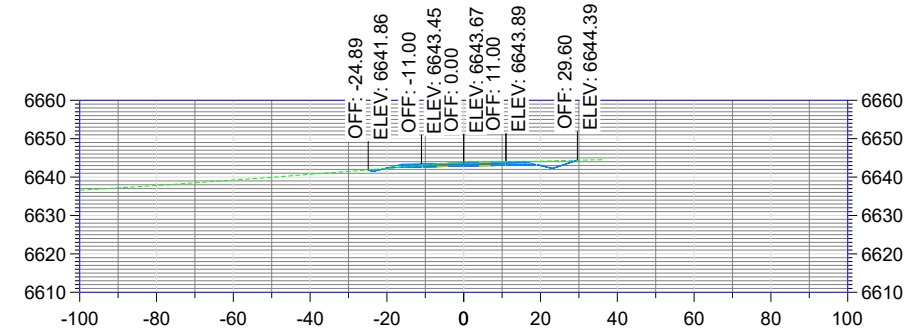
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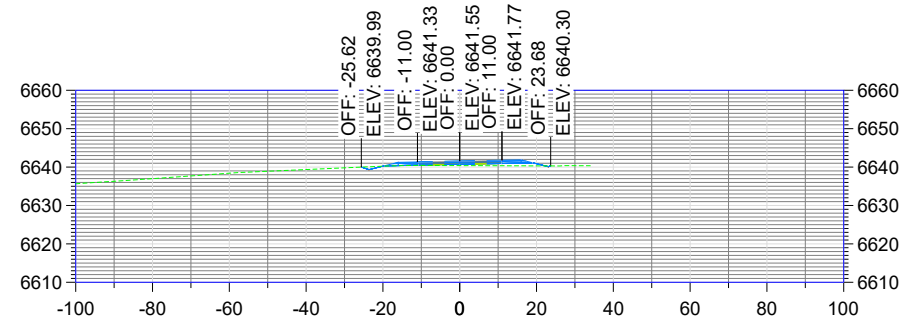
Approved
By: Jerome T. Roybal



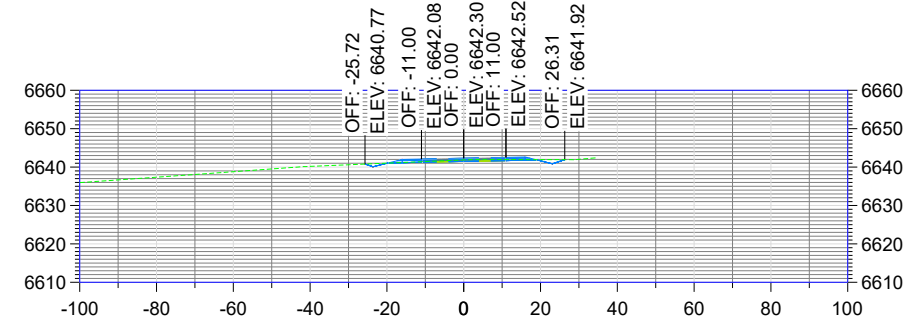
STA. 27+50.00



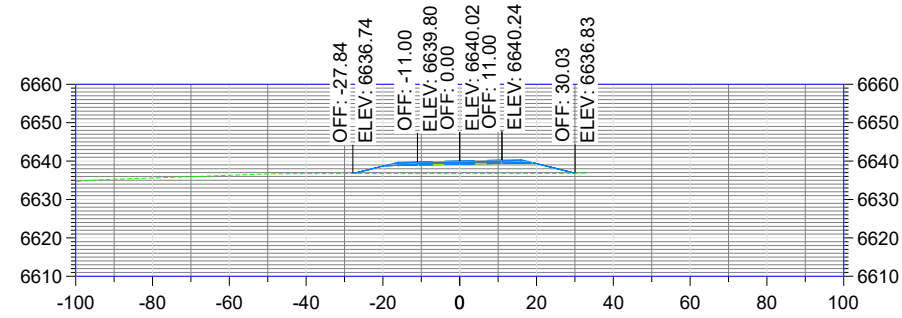
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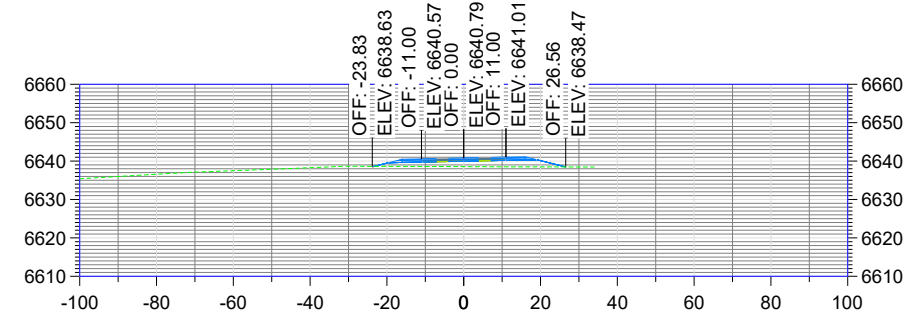
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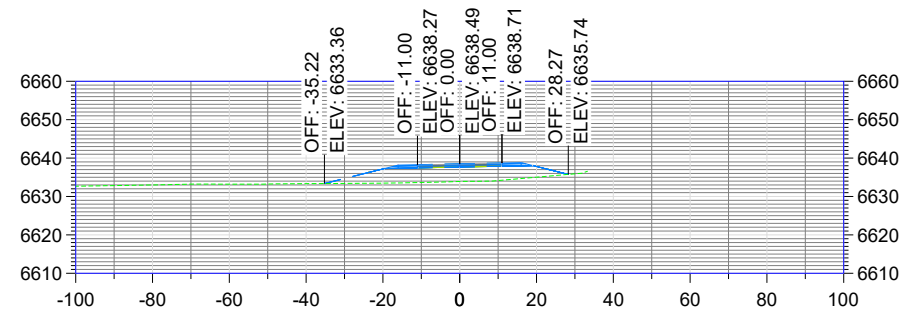
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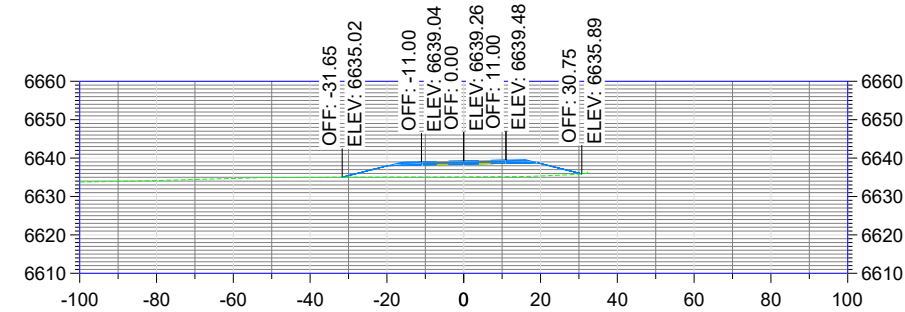
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STA. 26+75.00



STA. 26+00.00



STA. 26+25.00

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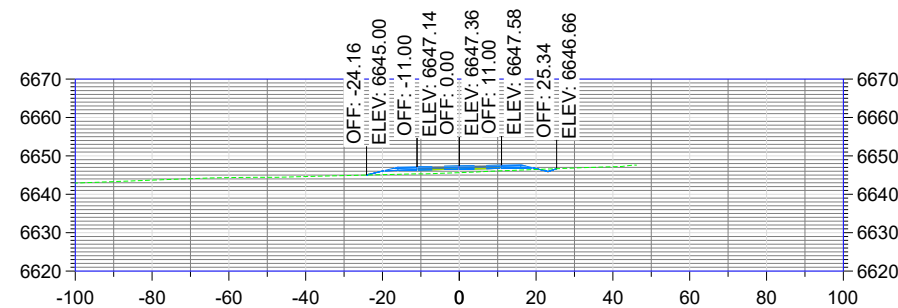


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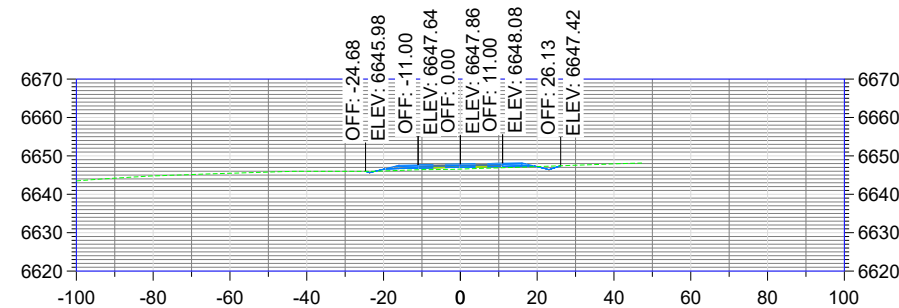
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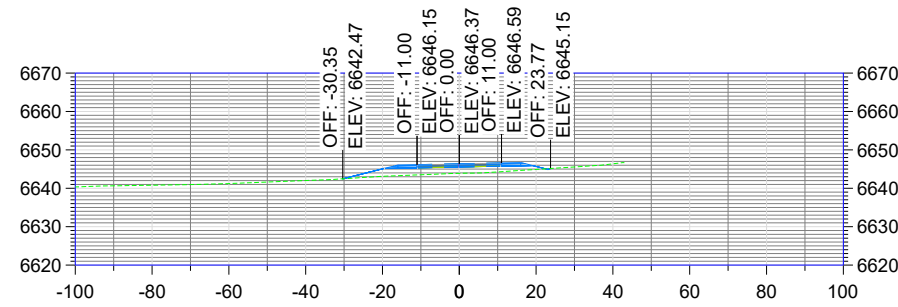
Approved
By: *Jerome T. Roybal*



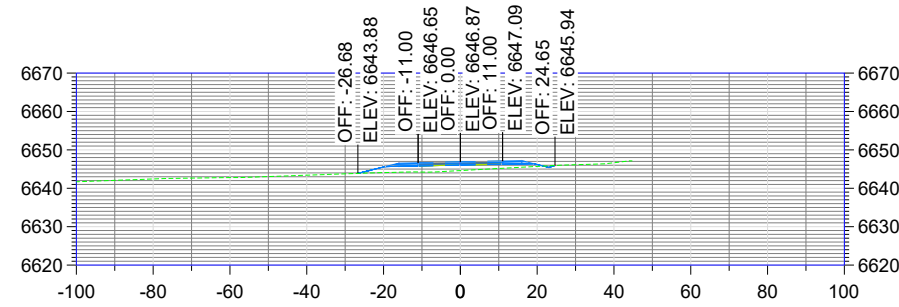
STA. 29+50.00



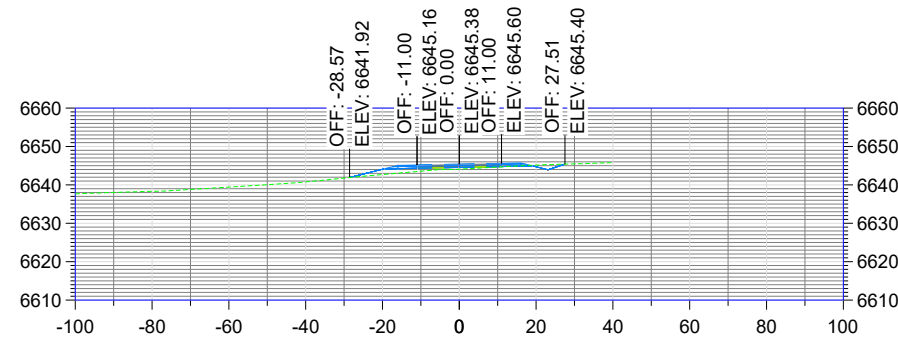
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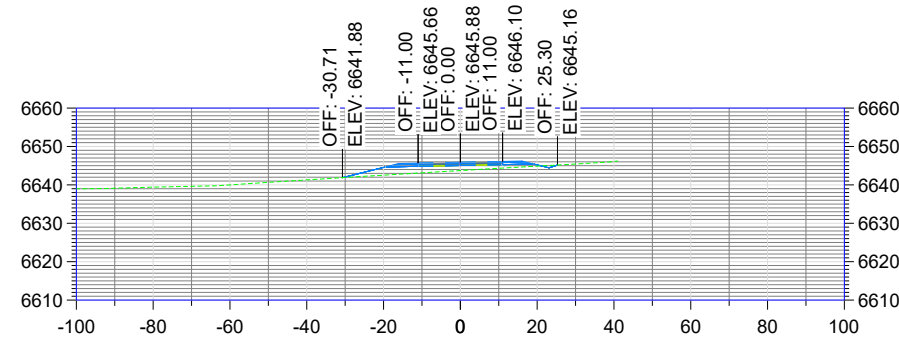
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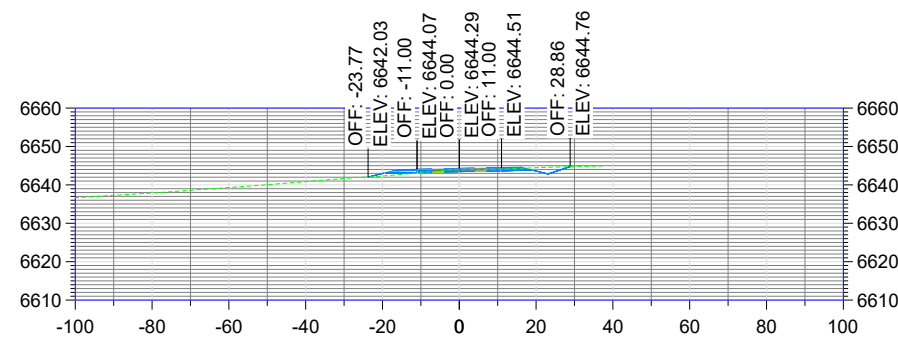
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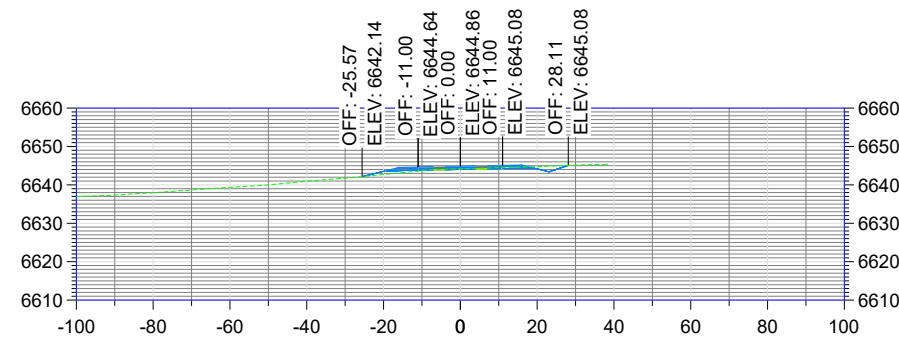
STA. 28+50.00



STA. 28+75.00



STA. 28+00.00



STA. 28+25.00

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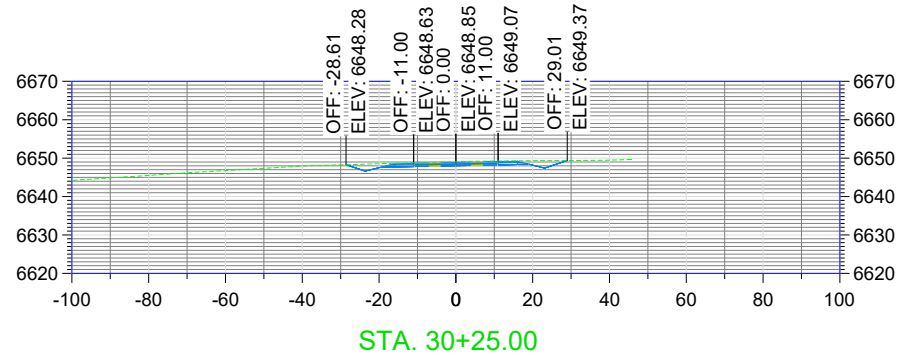
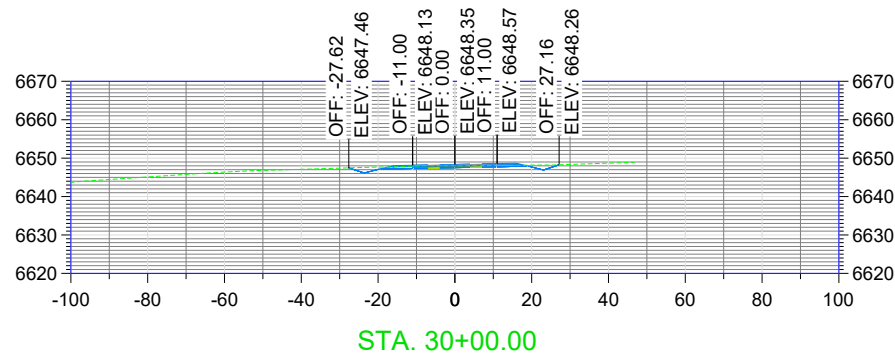
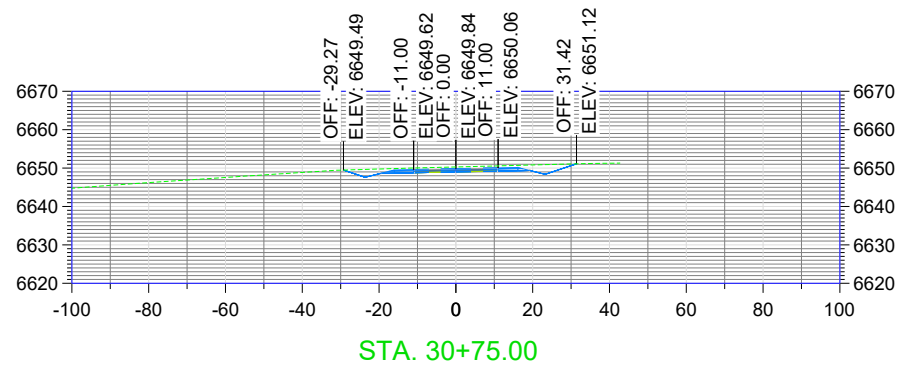
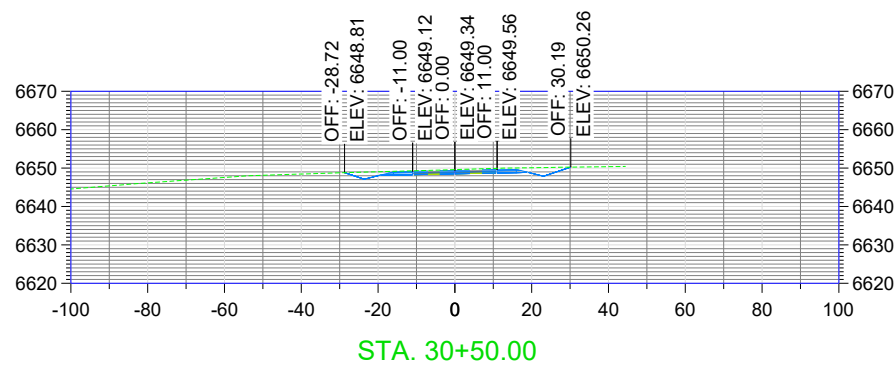
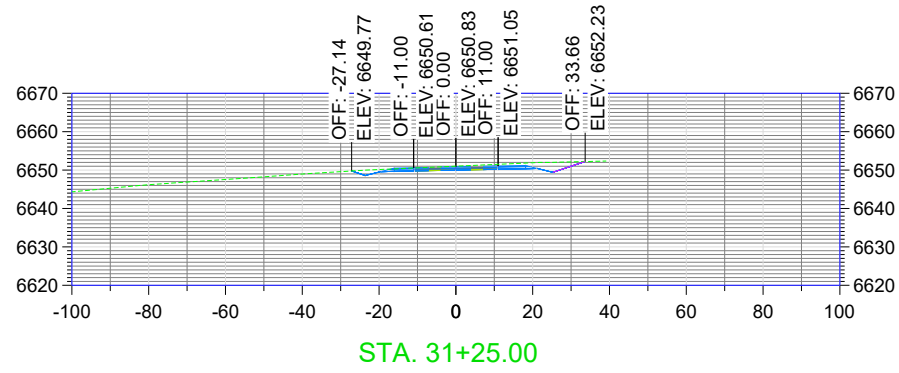
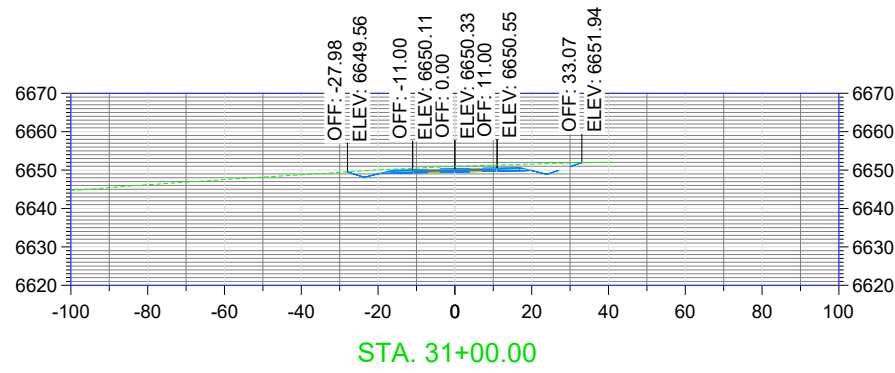
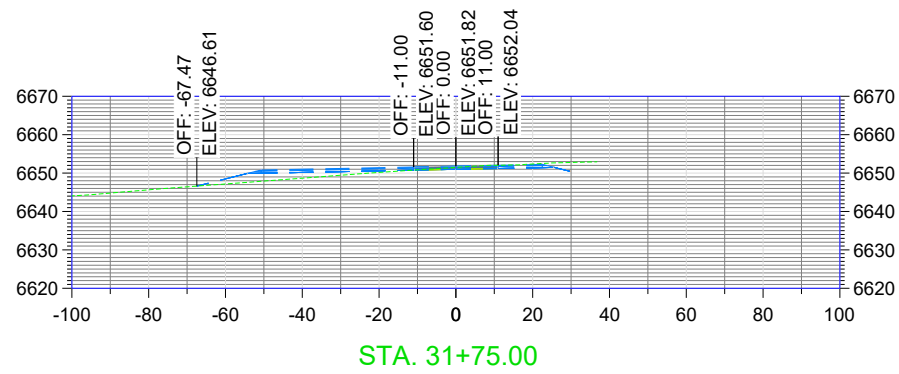
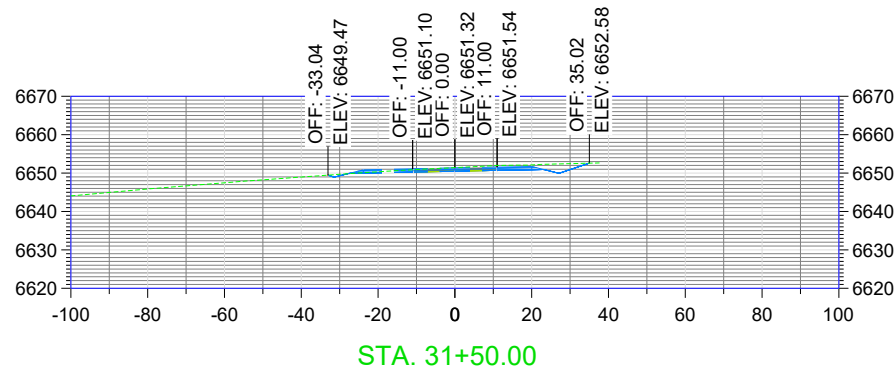
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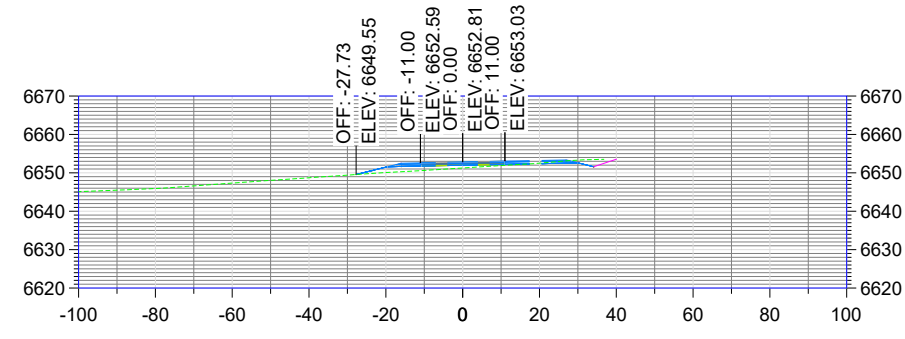
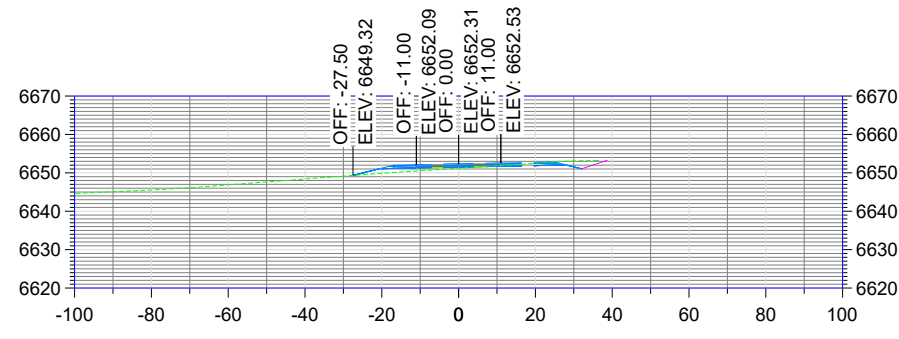
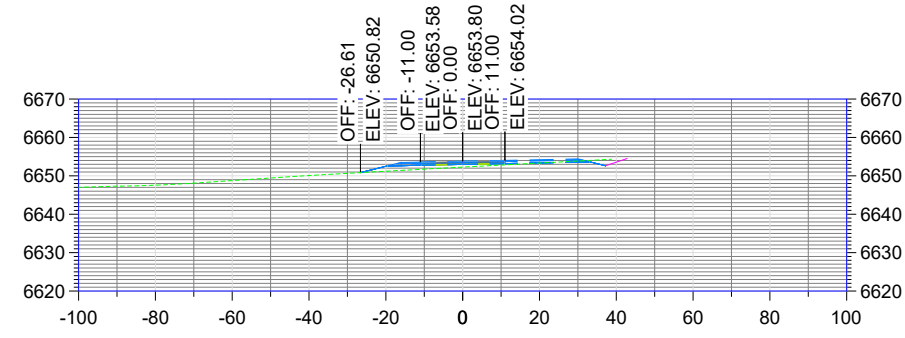
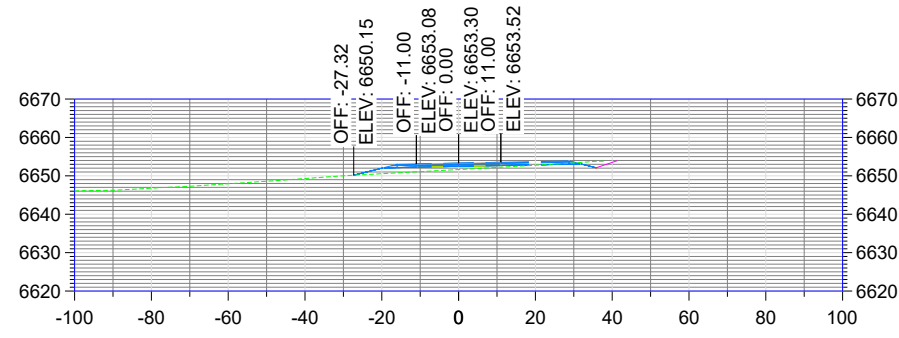
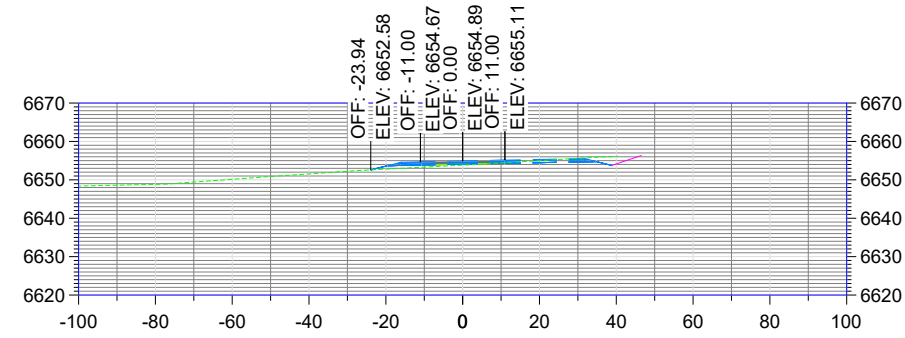
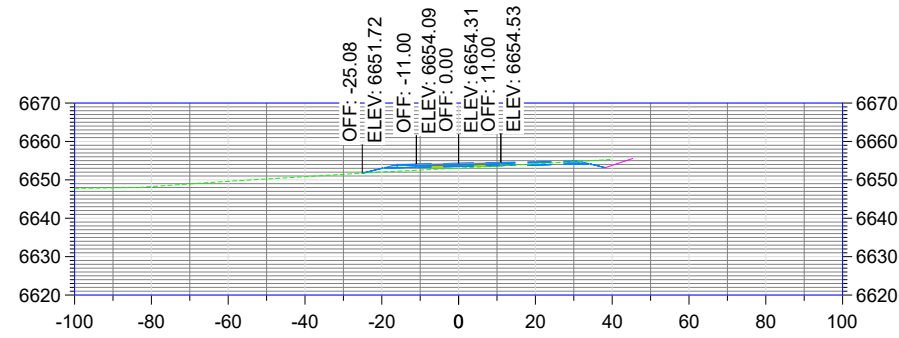
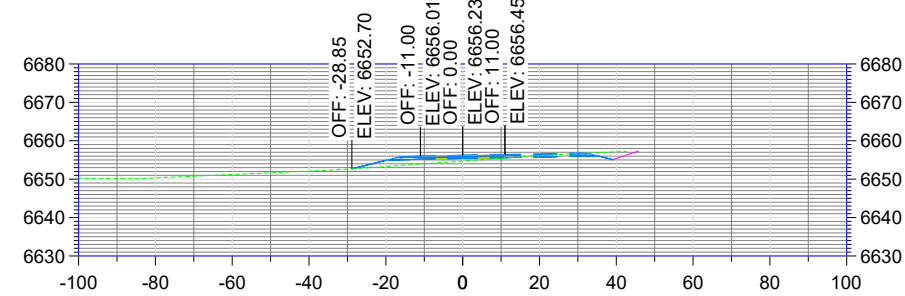
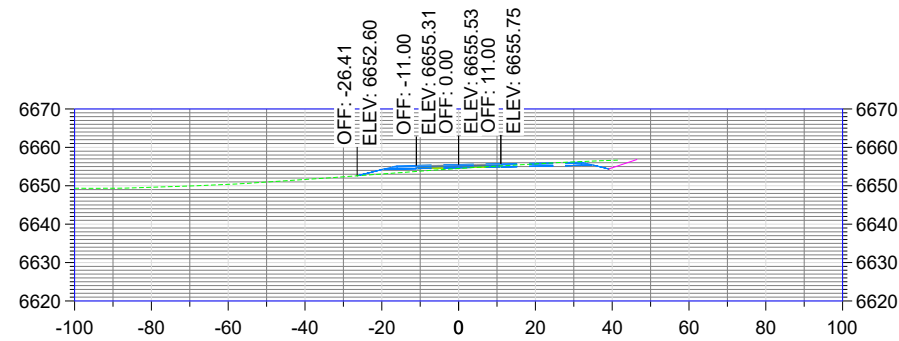


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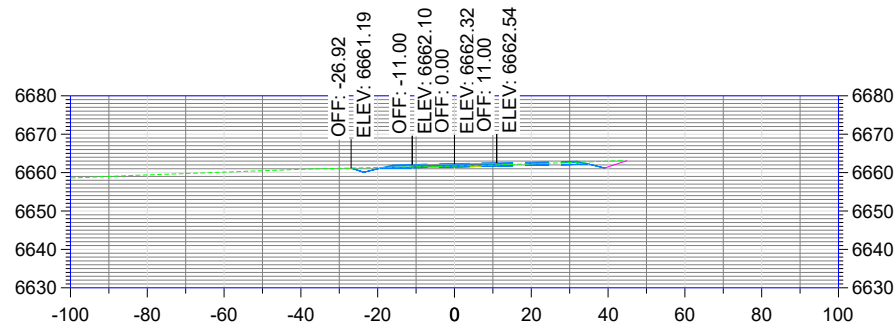


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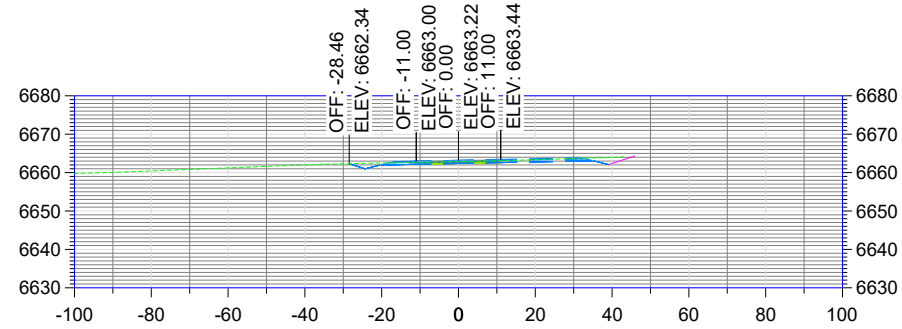
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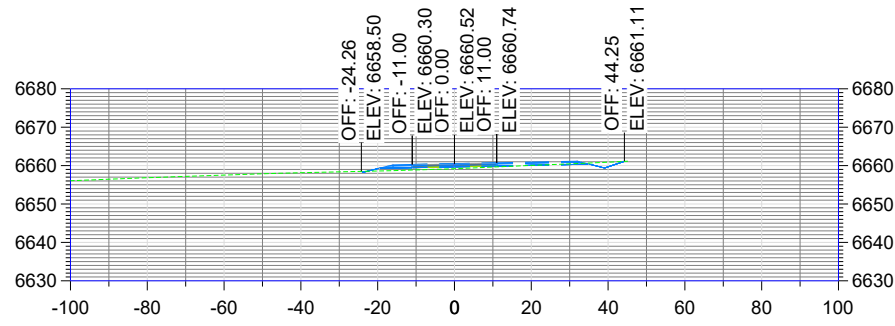
Approved
By: Jerome T. Roybal



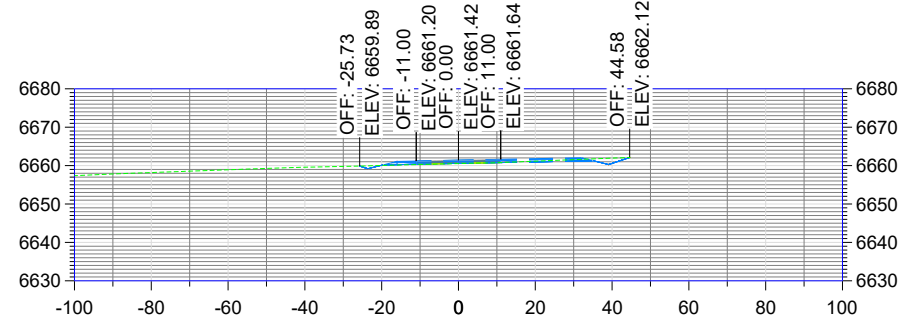
STA. 35+50.00



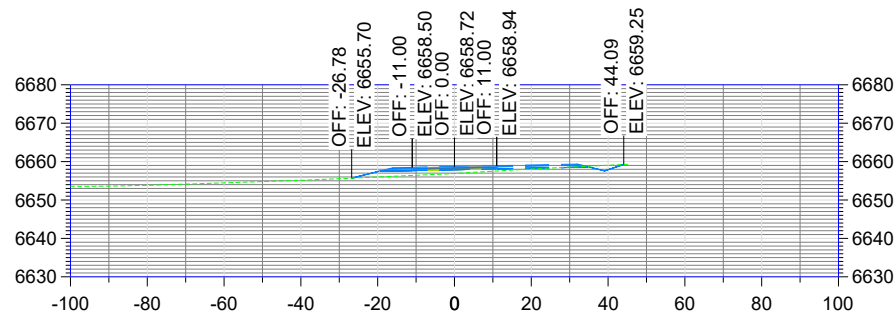
STA. 35+75.00



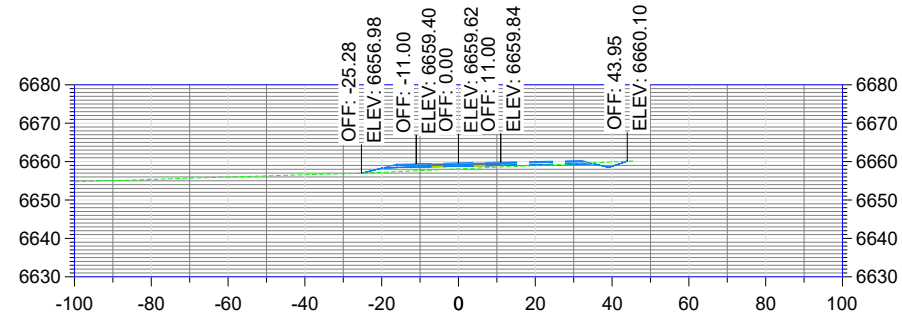
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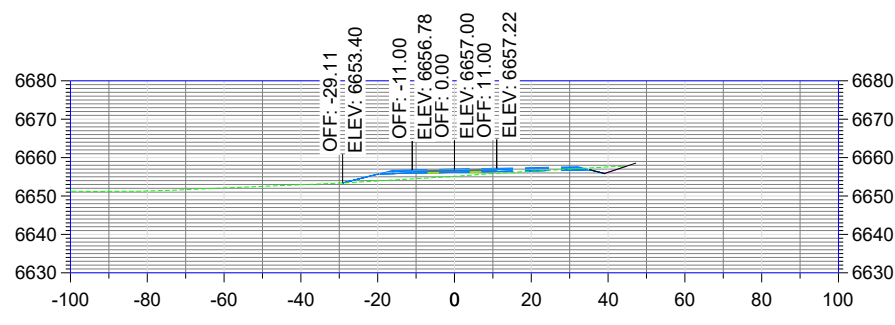
STA. 35+25.00



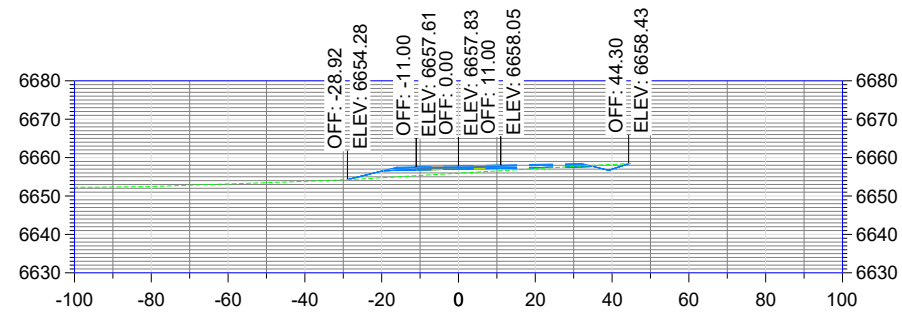
STA. 34+50.00



STA. 34+75.00



STA. 34+00.00



STA. 34+25.00

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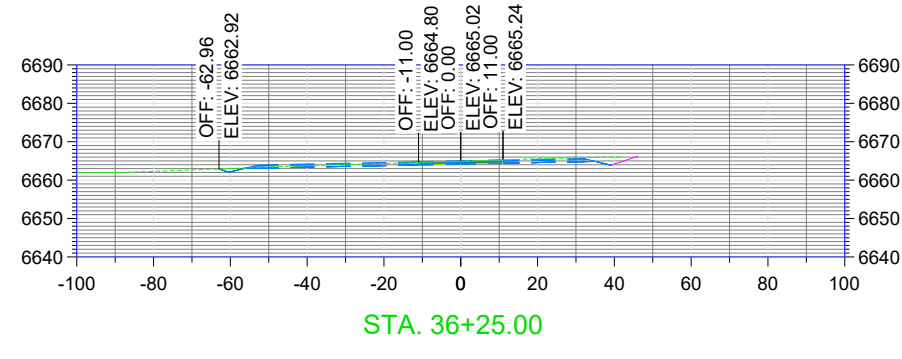
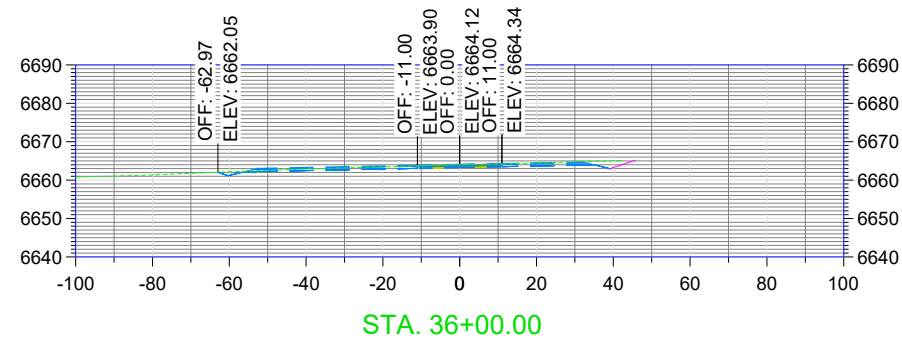
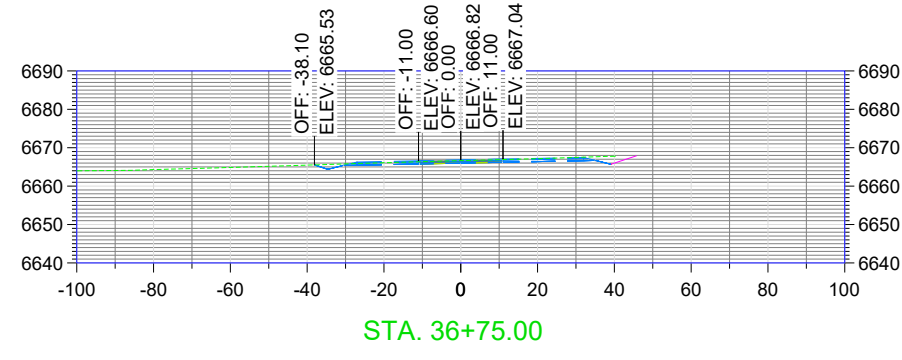
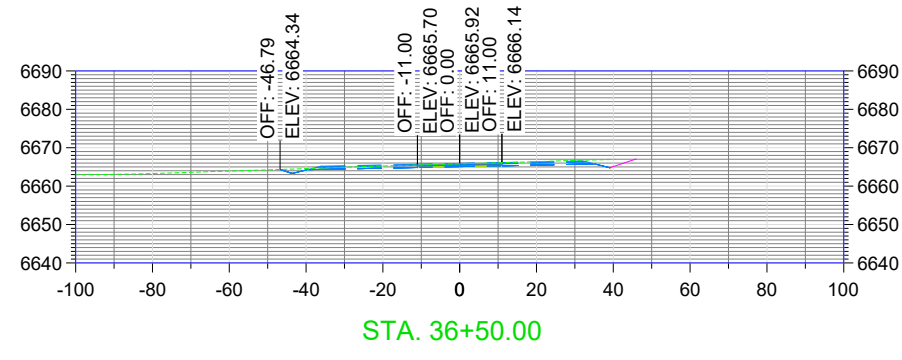
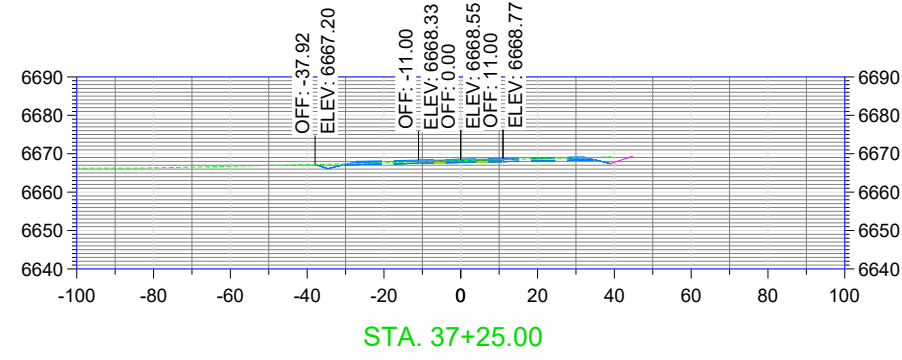
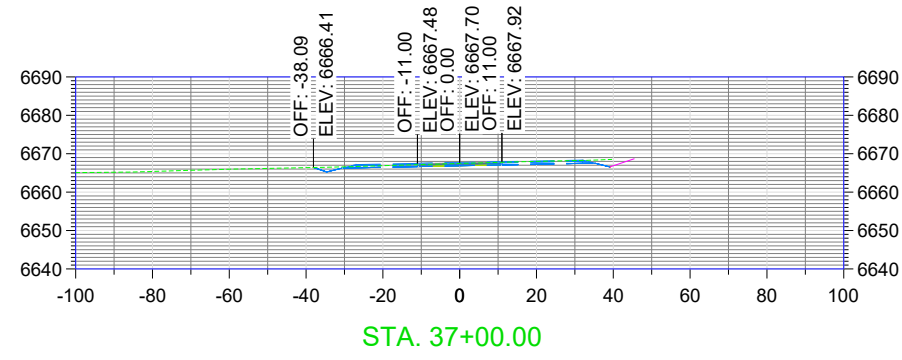
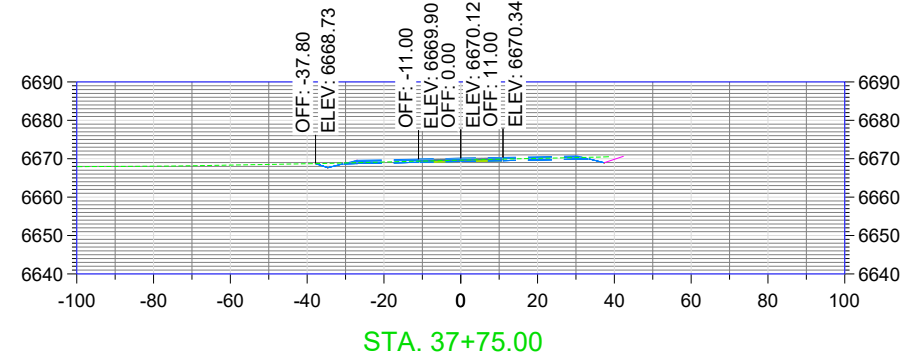
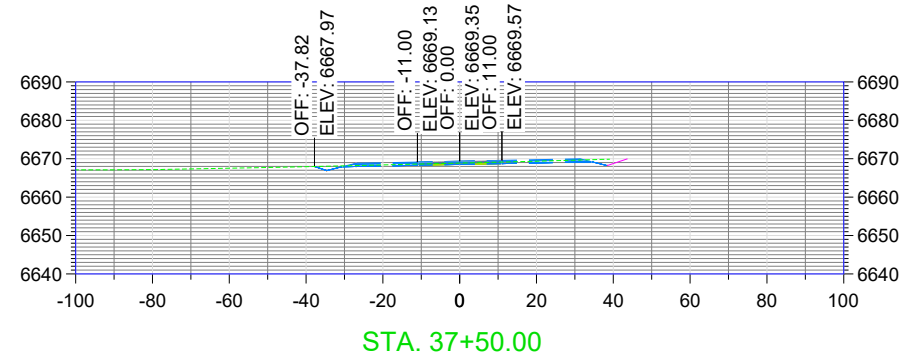


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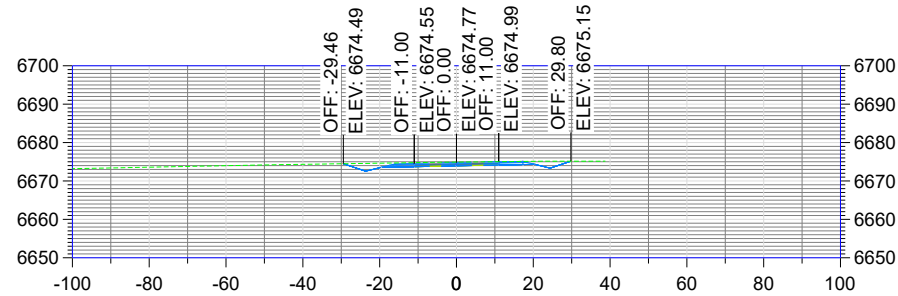


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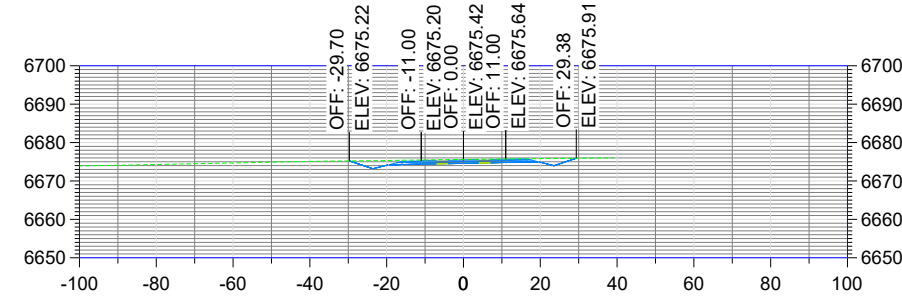
Santa Fe County Land Use

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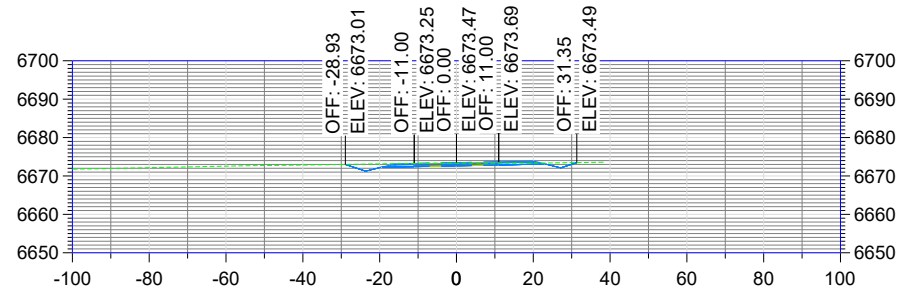
Approved
By: *Jerome T. Roybal*



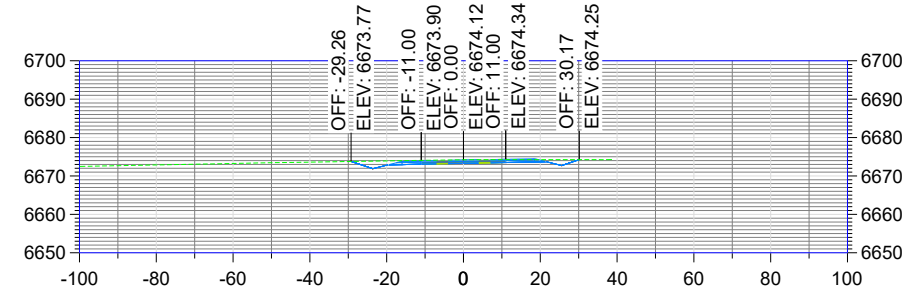
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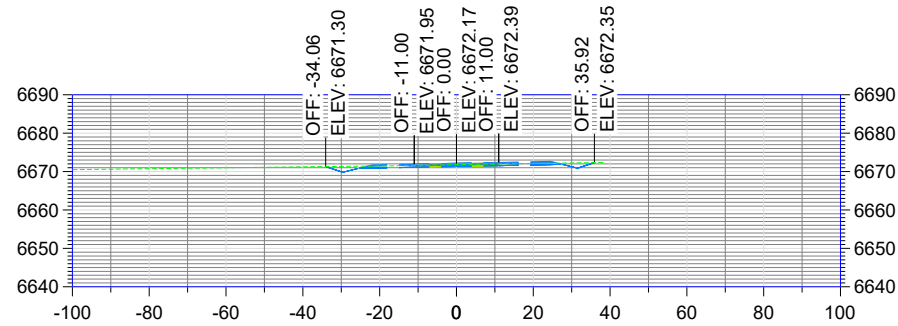
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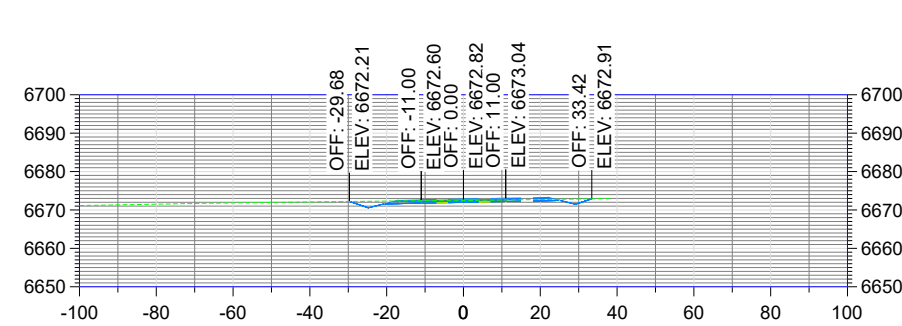
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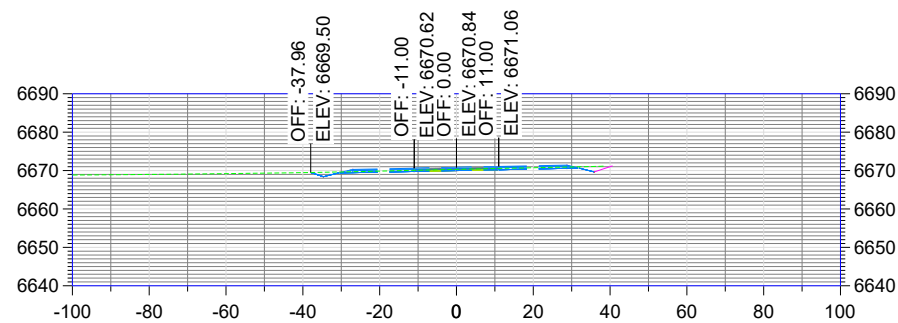
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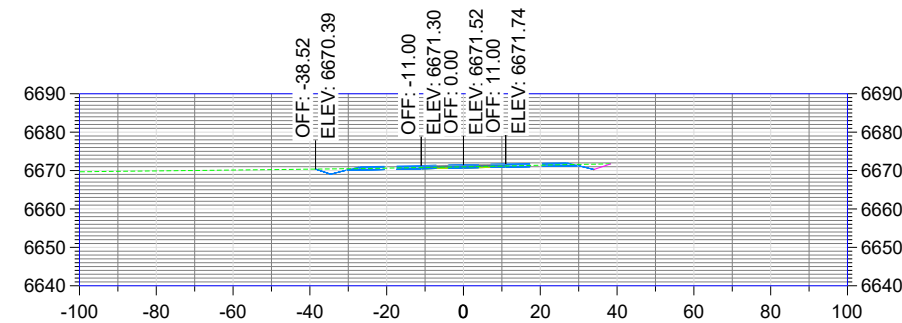
STA. 38+50.00



STA. 38+75.00



STA. 38+00.00



STA. 38+25.00

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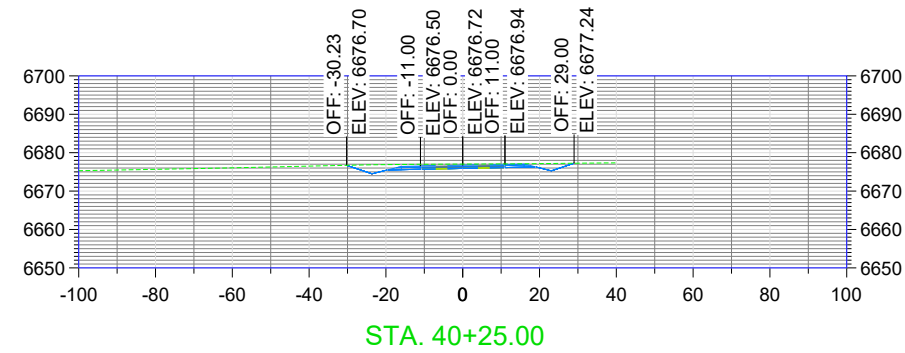
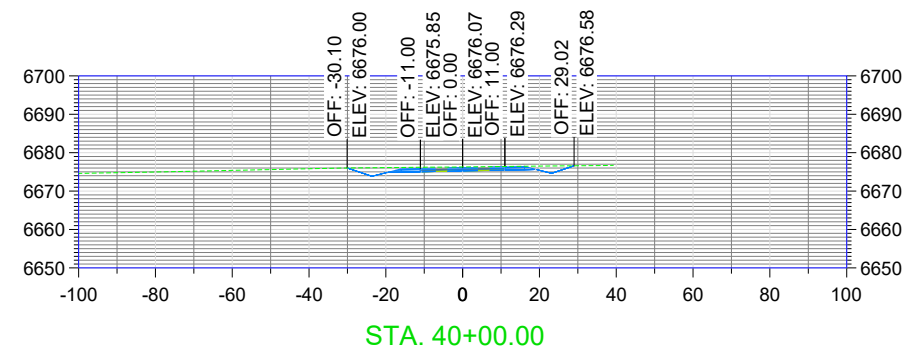
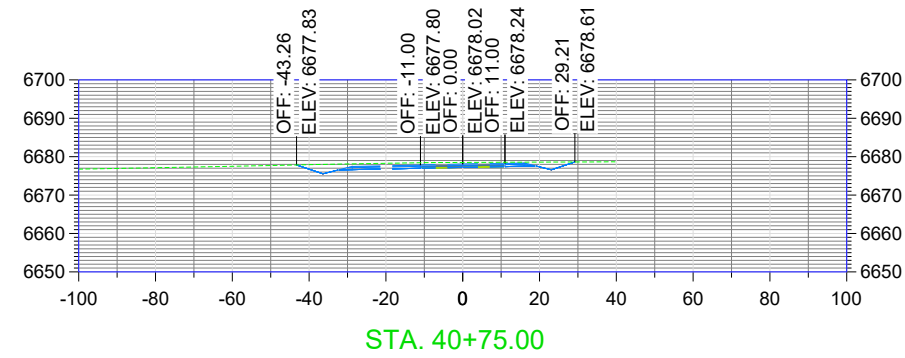
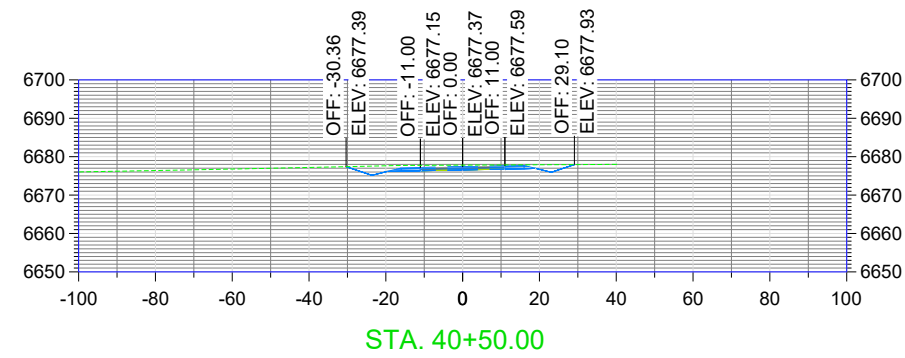
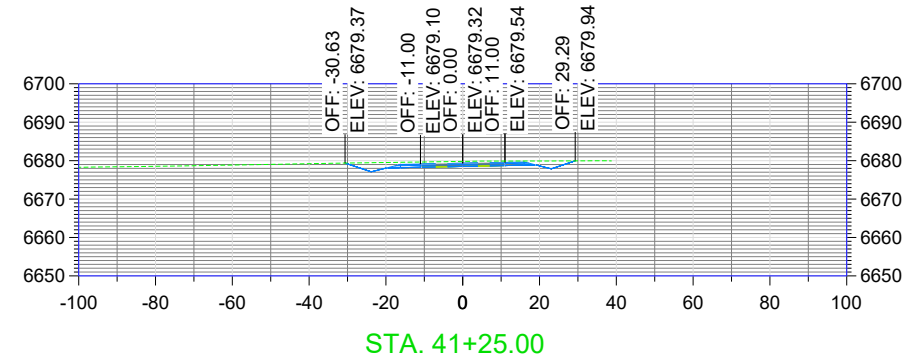
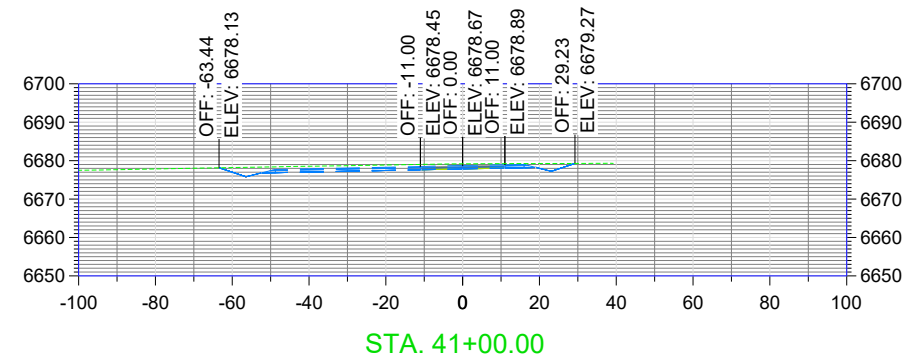
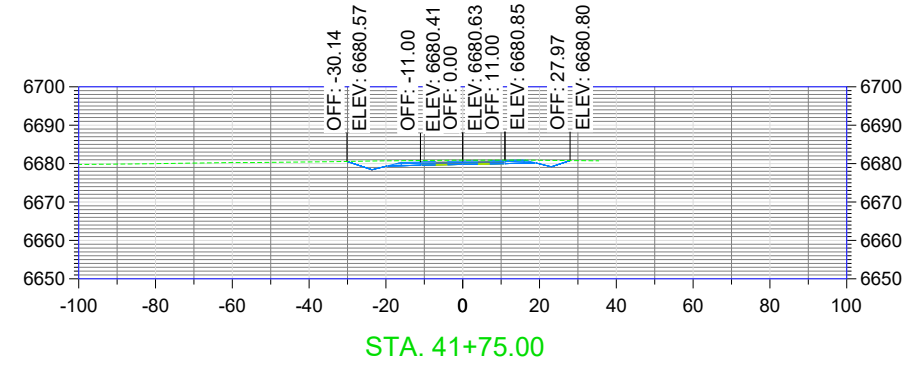
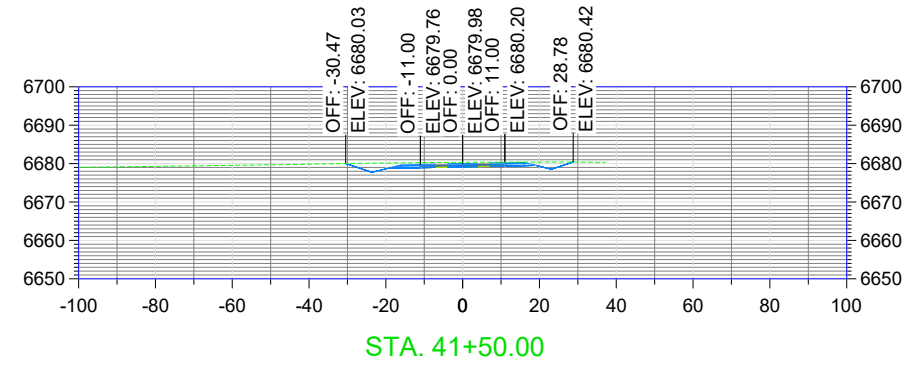


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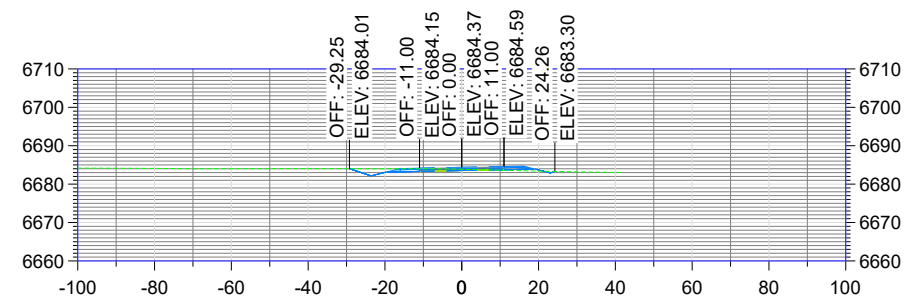


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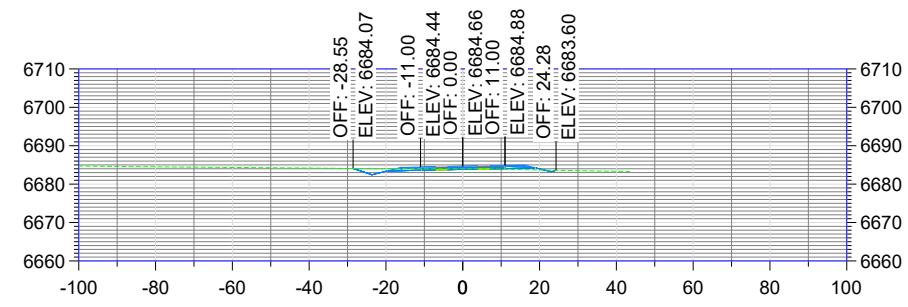
Santa Fe County Land Use

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Date March 2025	05/14/2025
Scale	

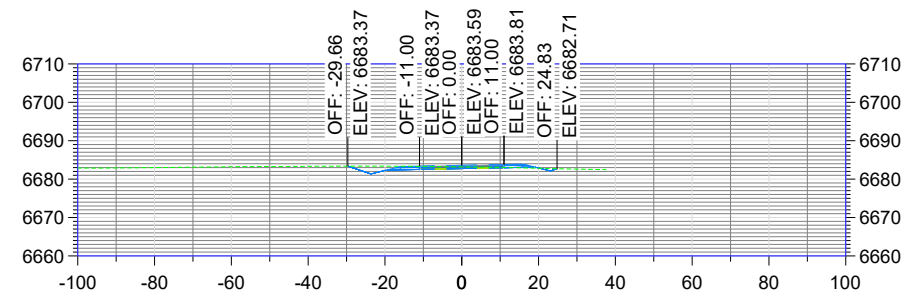
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By: Jerome T. Roybal



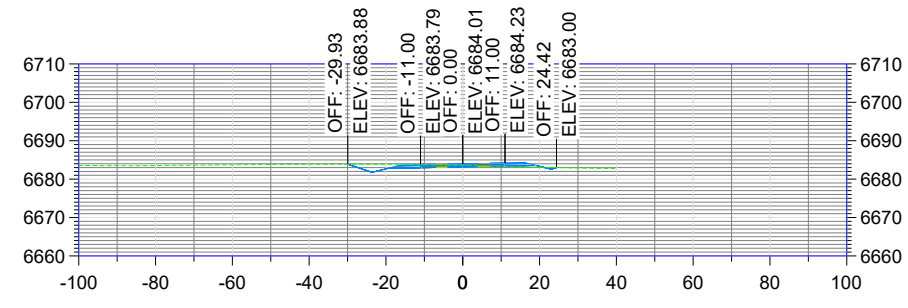
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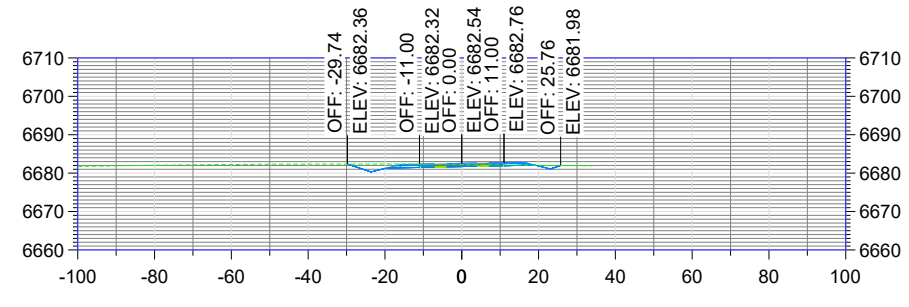
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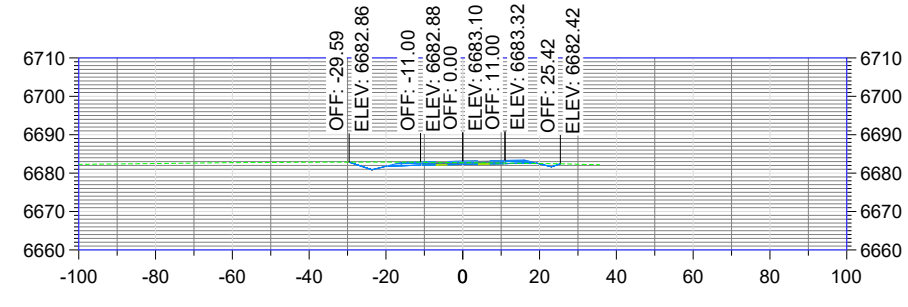
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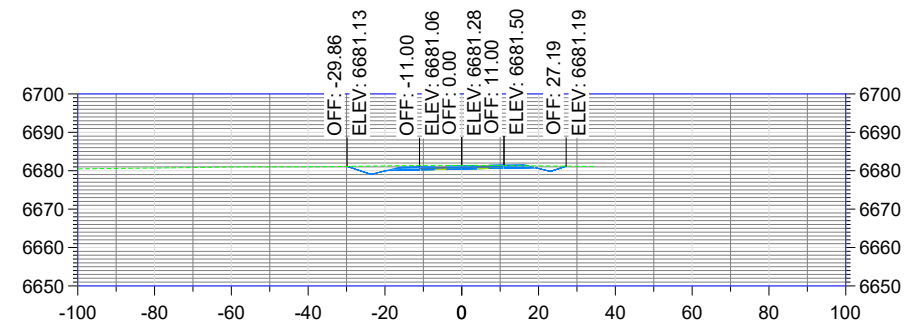
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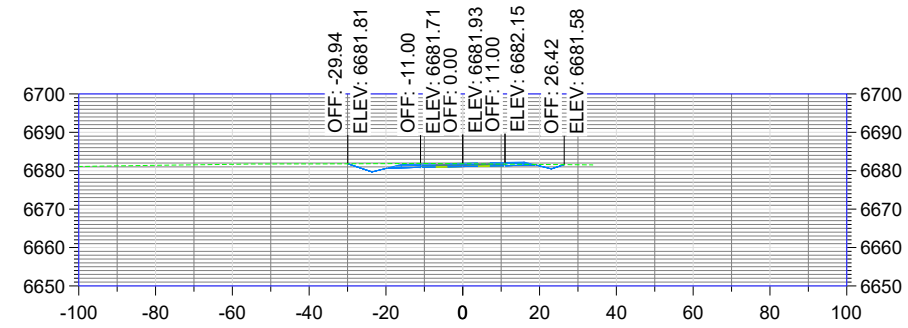
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STA. 42+00.00



STA. 42+25.00

General Notes

No.	Revision/Issue	Date



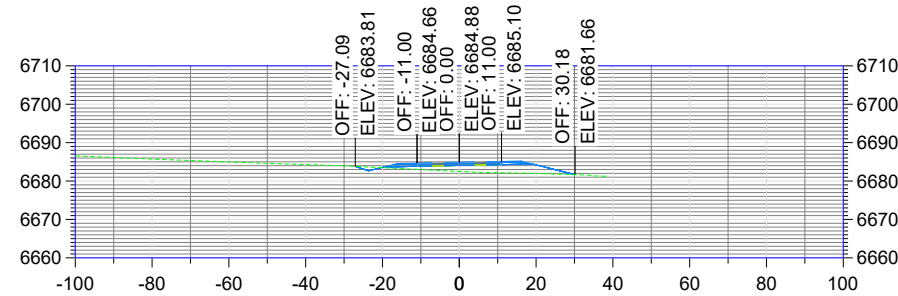
COLLEGE DRIVE
Santa Fe, NM

Santa Fe County Land Use

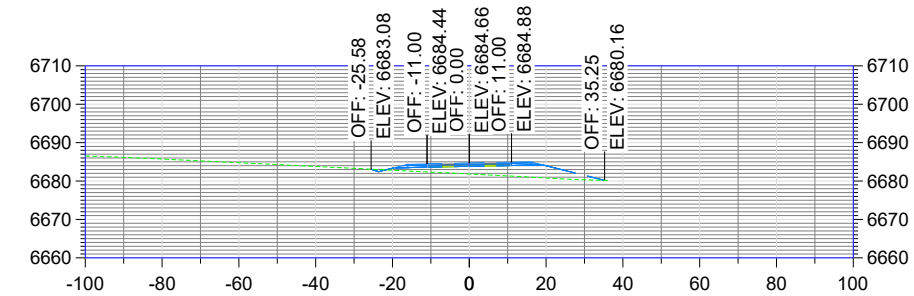
Project ES_2024-116	Sheet 05/14/2025 14-13
Date March 2025	
Scale 	

Approved

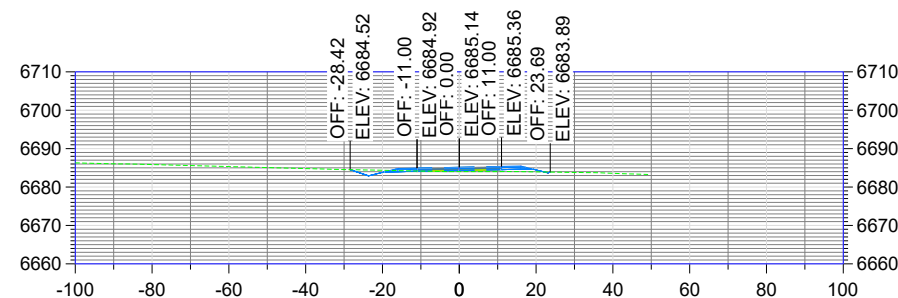
By: *Jerome T. Roybal*



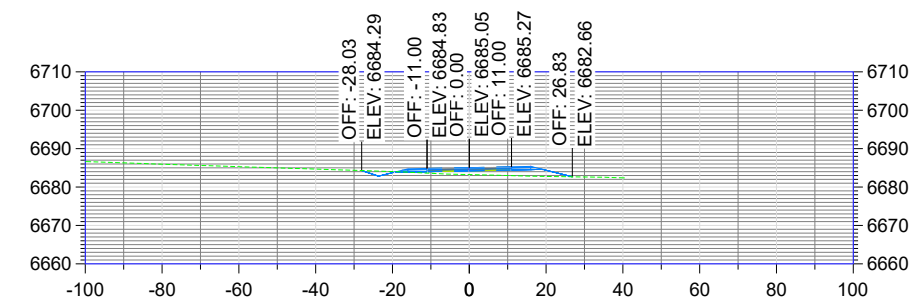
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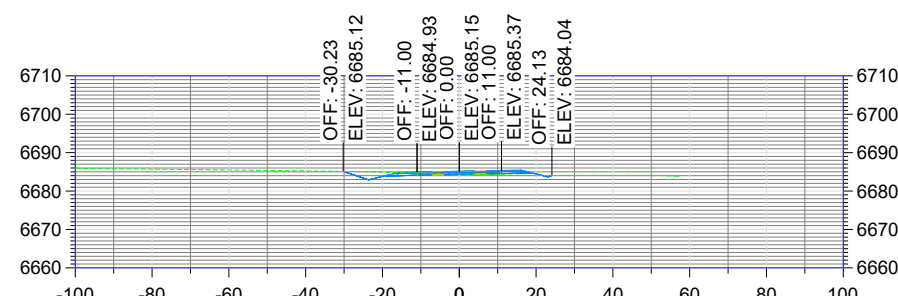
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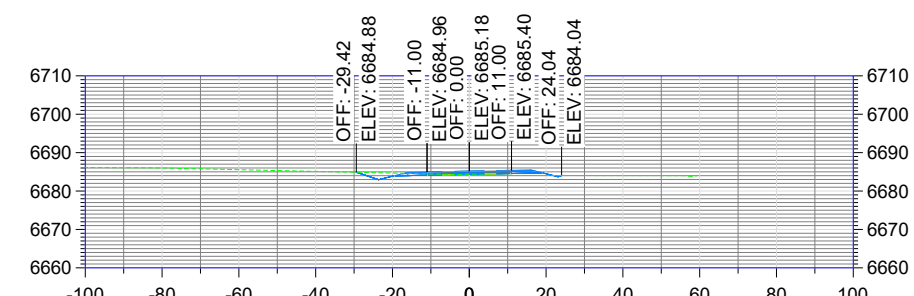
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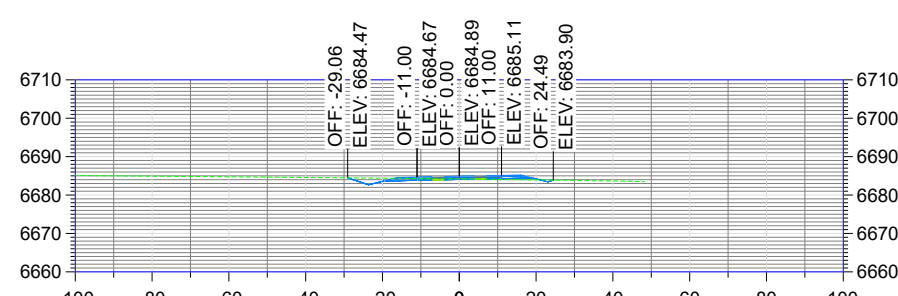
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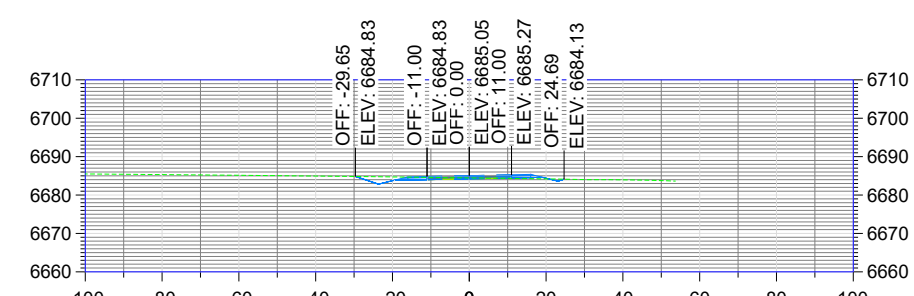
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STA. 44+25.00

General Notes

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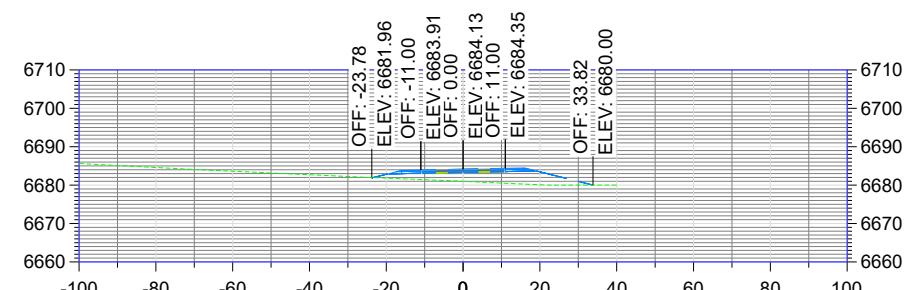
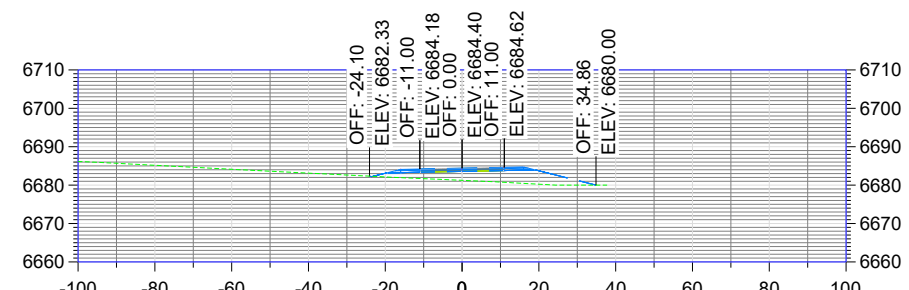
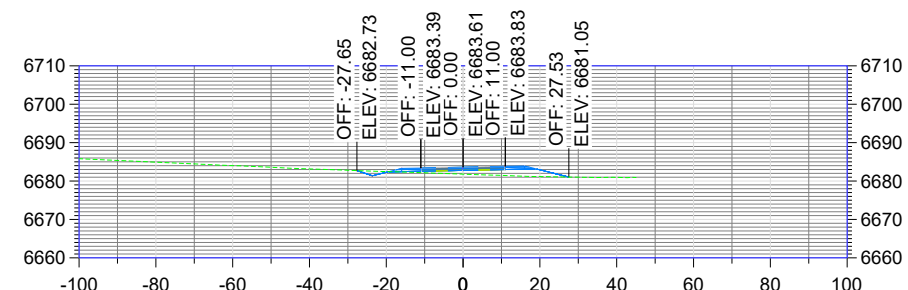
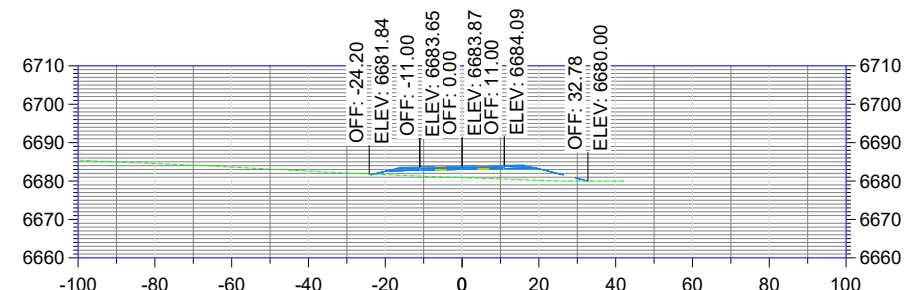
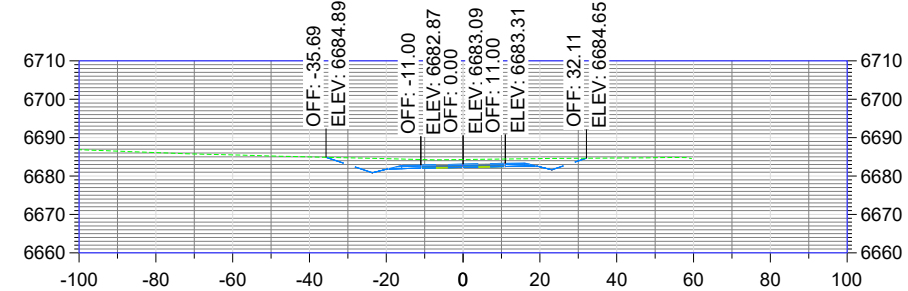
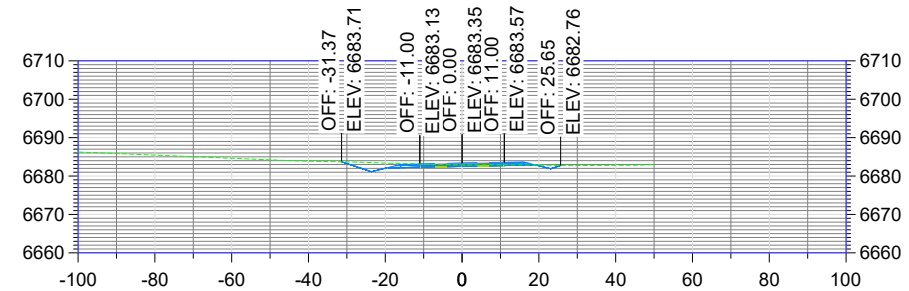
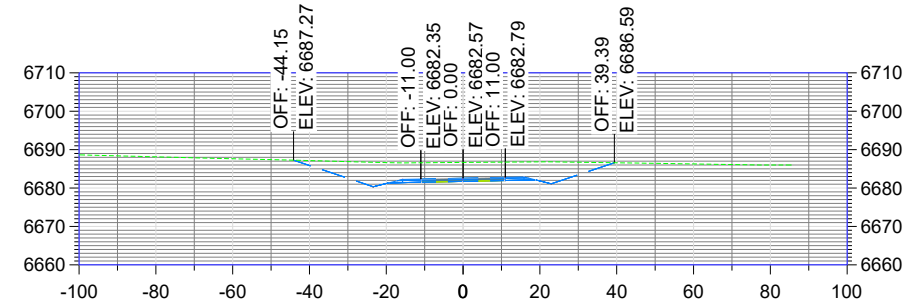
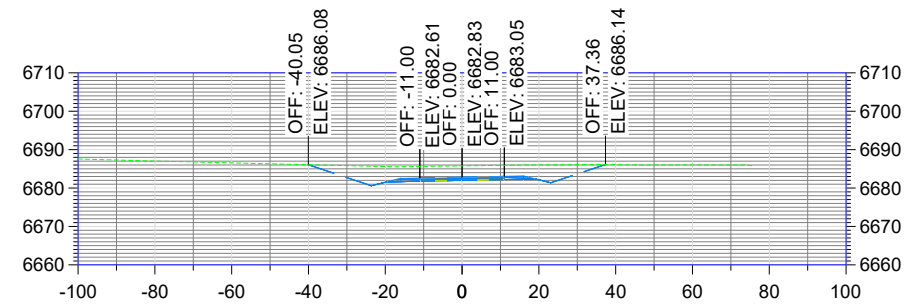


COLLEGE DRIVE
Santa Fe, NM

Santa Fe County Land Use

Project	ES_2024-116	Sheet
Date	March 2025	05/14/2025
Scale	14-14	

Approved
By: Jerome T. Roybal



General Notes

No.	Revision/Issue	Date



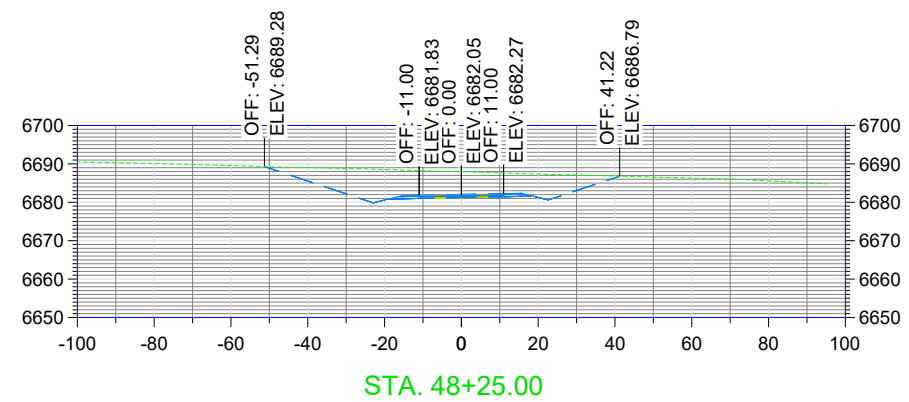
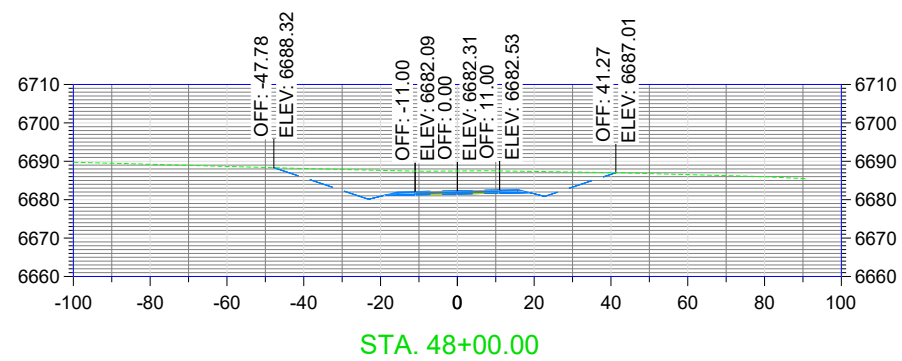
COLLEGE DRIVE
Santa Fe, NM

Santa Fe County Land Use

Project	ES_2024-116	Sheet
Date	March 2025	05/14/2025 14-15
Scale		

Approved

By: *Jerome T. Roybal*



General Notes

No.	Revision/Issue	Date

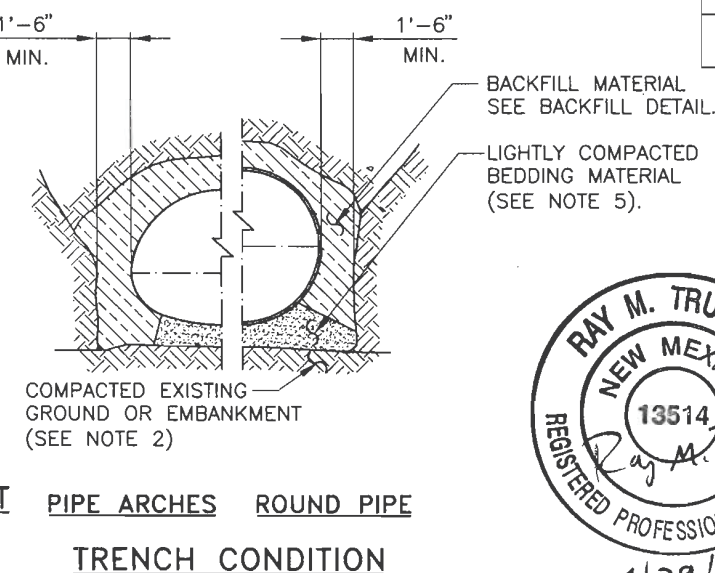
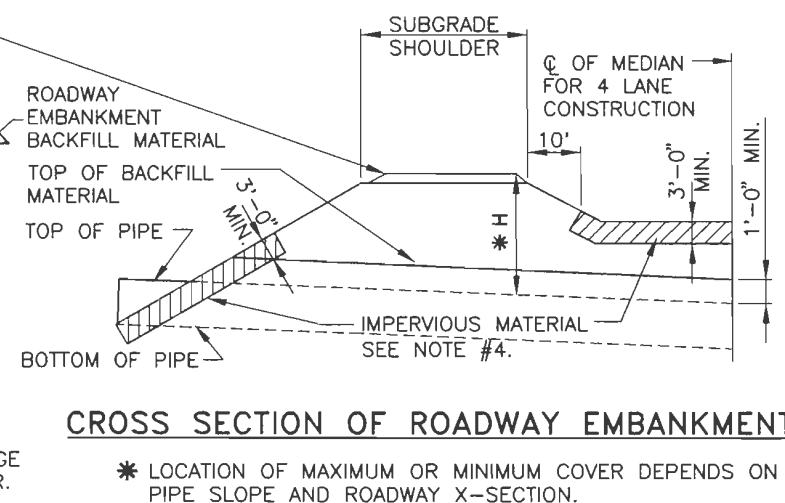
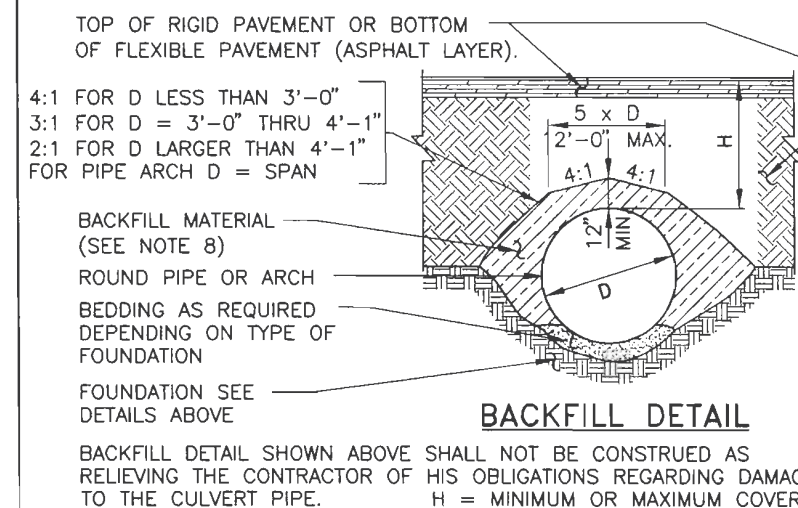
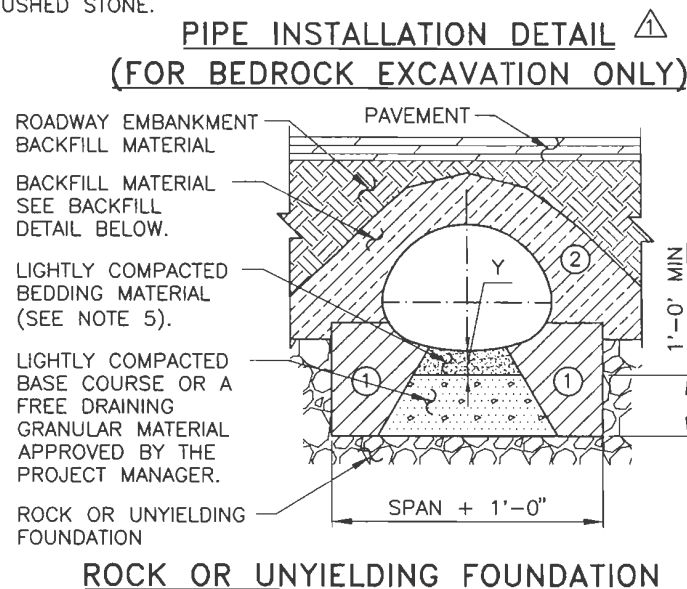
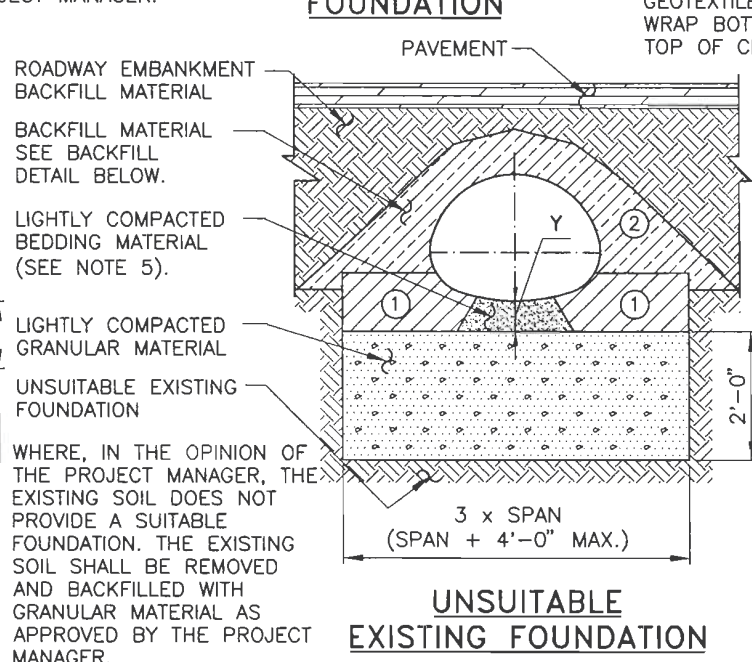
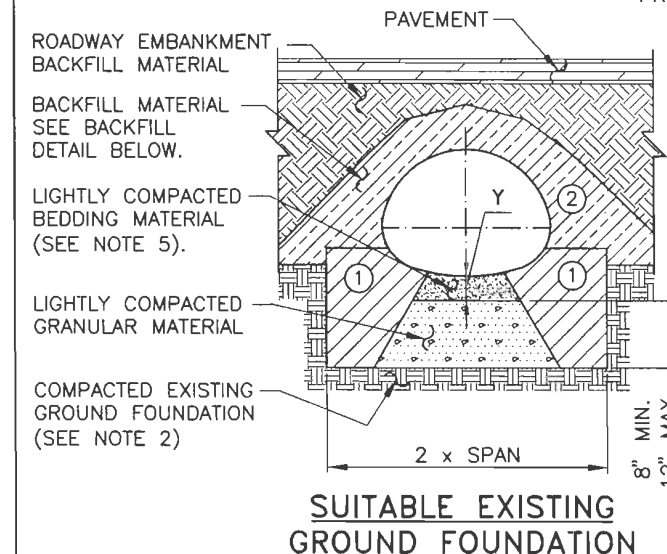
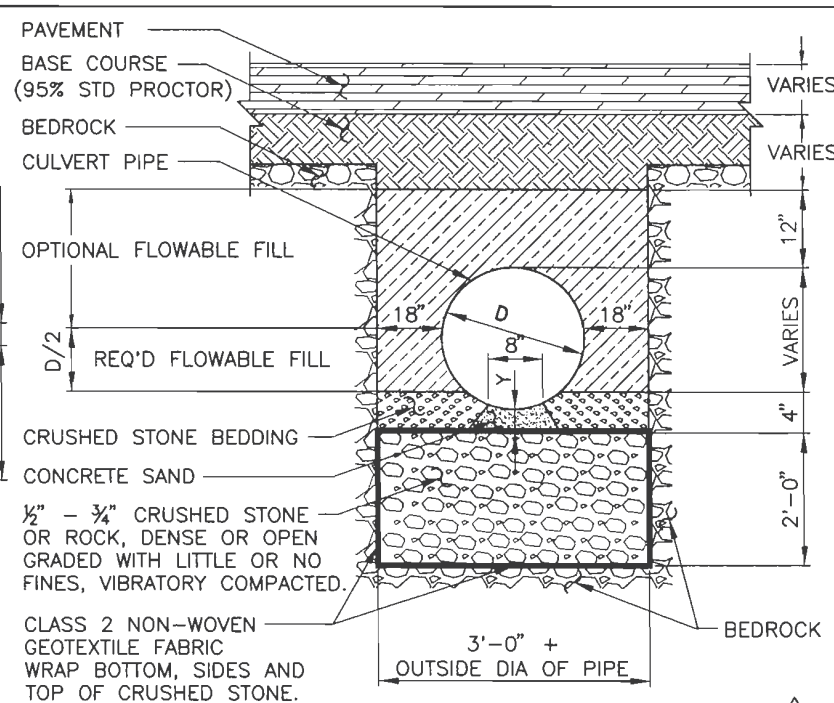
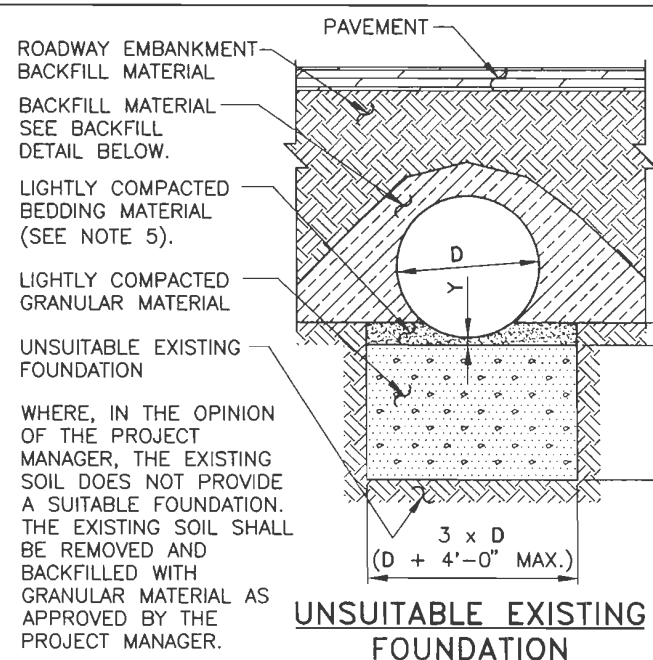
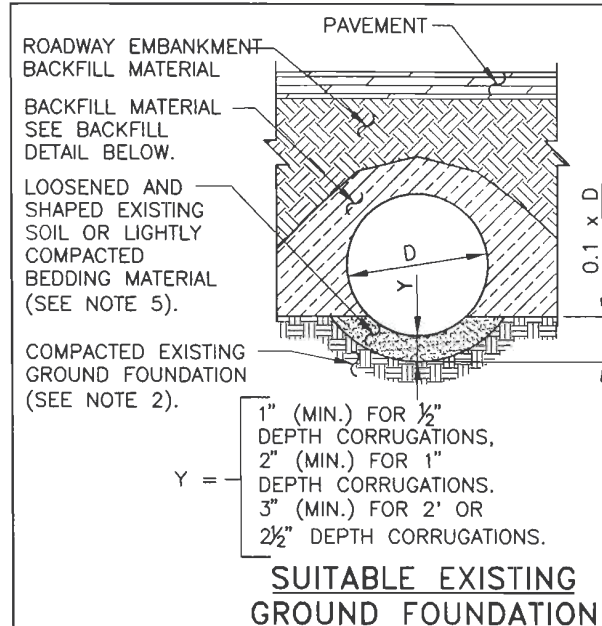


COLLEGE DRIVE
Santa Fe, NM

Santa Fe County Land Use

Project	ES_2024-116	Sheet	14-16
Date	March 2025	05/14/2025	
Scale			

Approved
By: *Jerome T. Roybal*



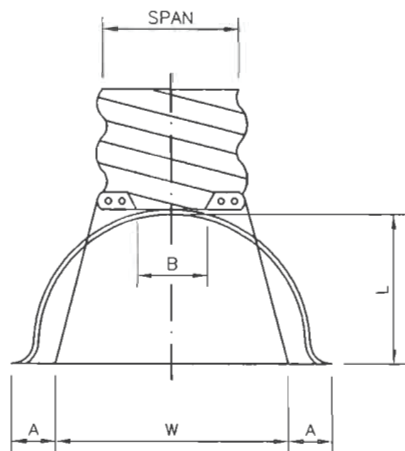
GENERAL NOTES:

1. RIVETED OR WELDED METAL PIPE AND ARCHES SHALL BE PLACED WITH THE INSIDE CIRCUMFERENTIAL LAPS POINTING DOWNSTREAM AND WITH LONGITUDINAL LAPS AT THE SIDE ON QUARTER POINTS, NOT TOP OR BOTTOM. STRUCTURAL PLATE AND PIPE ARCH CULVERTS SHALL BE ERECTED AS SHOWN ON THE ERECTION DIAGRAMS FURNISHED BY THE SUPPLIER.
2. THE EXISTING GROUND FOUNDATION MATERIAL UNDER PIPES SHALL BE BROKEN UP AND COMPACTED TO A MINIMUM DEPTH OF 6". COMPACTION SHALL BE 95% OF MAXIMUM DENSITY BY AASHTO SPECIFICATION T-99.
3. WHERE AN UNSUITABLE MATERIAL (PEAT, MUCK, ETC.) IS ENCOUNTERED AT OR BELOW THE INVERT ELEVATION. THE NECESSARY SUBSURFACE EXPLORATION AND ANALYSIS SHALL BE MADE AND CORRECTIVE TREATMENT SHALL BE AS DIRECTED BY THE PROJECT MANAGER.
4. IMPERVIOUS MATERIAL SHALL BE PLACED LONGITUDINALLY ALONG THE PIPE TO THE ELEVATIONS AND LIMITS SHOWN ON THE "CROSS SECTION OF ROADWAY EMBANKMENT," AND TRANSVERSELY AROUND THE PIPE TO THE DENSITY AND SLOPES SHOWN FOR BACKFILL MATERIAL ON THE "BACKFILL DETAIL" UNLESS OTHERWISE DESIGNATED ON THE PLANS OR DIRECTED BY THE PROJECT MANAGER IMPERVIOUS MATERIAL SHALL CONFORM TO AASHTO SPECIFICATION A-6 OR A-7 SOILS.
5. BEDDING MATERIAL SHALL BE ROUGHLY SHAPED TO FIT BOTTOM OF PIPES AND THEN LIGHTLY COMPACTED. MATERIAL SHALL CONFORM TO SECTION 206 OF THE NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS. FOR PIPE ARCH, THE WIDTH OF THE BEDDING SHALL NOT EXCEED THE WIDTH OF THE BOTTOM ARC.
6. WHERE MULTIPLE LINES OF PIPE OR PIPE ARCHES GREATER THAN 4'-0" IN DIAMETER OR SPAN ARE USED, THEY SHALL BE SPACED SO THAT ADJACENT SIDES OF THE PIPE SHALL BE AT LEAST ONE-HALF DIAMETER OR 3'-0" APART, WHICHEVER IS LESS, TO PERMIT ADEQUATE COMPACTION OF BACKFILL MATERIAL. FOR DIAMETERS 4'-0" AND LESS, THE MINIMUM SPACING SHALL BE NOT LESS THAN 2'-0". SEE 570-02-1/2 OR 570-02-2/2 FOR FLARED END SECTIONS.
7. A CONTINUOUS CONCRETE CRADLE SHALL BE USED ONLY WHEN CALLED FOR ON THE PLANS.
8. BACKFILL MATERIAL SHALL CONFORM TO SECTION 206 OF THE NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS. SPECIAL CARE SHALL BE TAKEN WHEN COMPACTING BACKFILL AT THE HUNCHES AND SIDES OF PIPES.
9. REFER TO 206-03-1/1 THRU 206-06-1/1 FOR TABLE OF MINIMUM AND MAXIMUM COVER AND CORRESPONDING GAUGE.

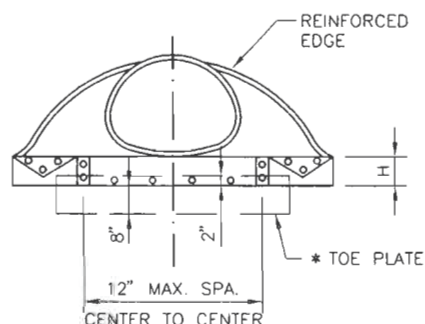
KEY	SYMBOL	DESCRIPTION
①		100% COMPACTION
②		90% COMPACTION



Approved By: *Jerome T. Roybal*

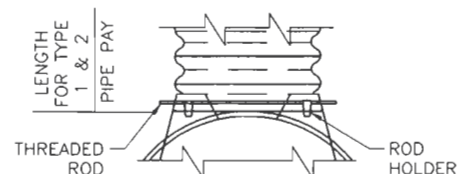


PLAN



ELEVATION

NOTE: SIZES EQUIVALENT TO THE ABOVE, USING 3" x 1" CORRUGATIONS, MAY BE USED PROVIDING THAT THEY MEET THE SIZES SHOWN UNDER TABLE 6 OF SERIAL 206-04-1/3 THRU 206-04-3/3.



TYPE 2

FOR 17" x 13" THRU 57" x 38"

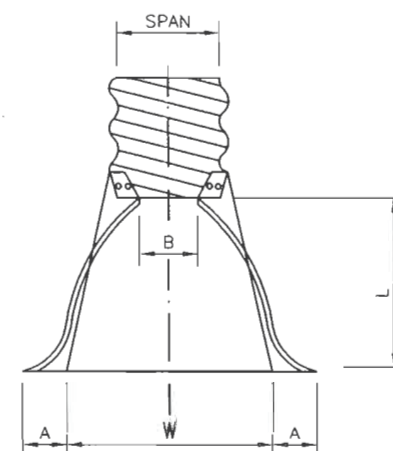
PIPE ARCH DIMENSIONS		GALVANIZED THICKNESS GA.	DIMENSIONS					APPROX. SLOPE	BODY
			A (IN.) (± 1")	B (IN.) (MAX.)	H (IN.) (± 1")	L (IN.) (± 1½")	W (IN.) (± 2")		
17	13	16	7	9	6	19	30	2 1/2:1	1 PC.
21	15	16	7	10	6	23	36	2 1/2:1	1 PC.
24	18	16	8	12	6	28	42	2 1/2:1	1 PC.
28	20	16	9	14	6	32	48	2 1/2:1	1 PC.
35	24	14	10	16	6	39	60	2 1/2:1	1 PC.
42	29	14	12	18	6	46	75	2 1/2:1	1 PC.
49	33	12	13	21	9	53	85	2 1/2:1	2 PC.
57	38	12	18	26	12	63	90	2 1/2:1	2 PC.
64	43	12	18	30	12	70	102	2 1/4:1	2 PC.
71	47	12	18	33	12	77	114	2 1/4:1	3 PC.
77	52	12	18	36	12	77	126	2:1	3 PC.
83	57	12	18	39	12	77	138	2:1	3 PC.

* THE CONTRACTOR SHALL VERIFY WITH PROVIDERS FOR CURRENT INDUSTRY SIZES.

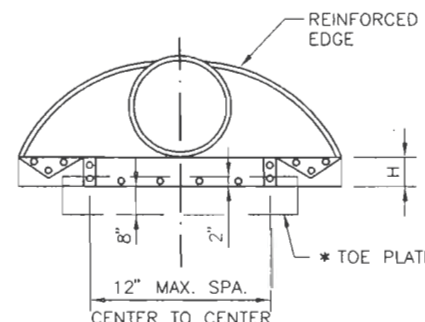
NOTE:

- ALL 3 PIECE BODIES TO HAVE 12 GAUGE THICK SIDES AND 10 GAUGE THICK CENTER PANELS. WIDTH OF CENTER PANELS TO BE GREATER THAN 20% OF THE PIPE PERIPHERY. MULTIPLE PANEL BODIES TO HAVE LAP SEAMS WHICH ARE TO BE TIGHTLY JOINED BY 3/8" GALVANIZED RIVETS OR BOLTS.
- FOR 77" X 52" AND 83" X 57" SIZES, REINFORCED EDGED TO BE SUPPLEMENTED BY L 2" X 2" X 1/4" GALVANIZED ANGLES. THE ANGLES TO BE ATTACHED BY 3/8" GALVANIZED NUTS AND BOLTS.
- ANGLE REINFORCEMENT WILL BE PLACED UNDER THE CENTER PANEL SEAMS ON THE 77" X 52" AND 83" X 57" SIZES.

* 4. TOE PLATE TO BE CONSTRUCTED WHERE SHOWN ON PLANS.



PLAN

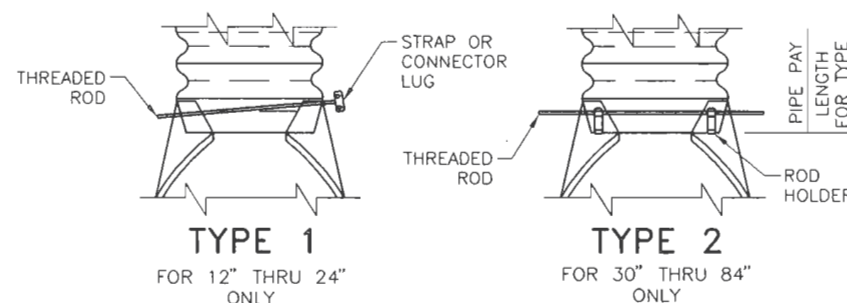


ELEVATION

NOTE:

- ALL 3 PIECE BODIES TO HAVE 12 GAUGE THICK SIDES AND 10 GAUGE THICK CENTER PANELS. WIDTH OF CENTER PANELS TO BE GREATER THAN 20% OF THE PIPE PERIPHERY. MULTIPLE PANEL BODIES TO HAVE LAP SEAMS WHICH ARE TO BE TIGHTLY JOINED BY 3/8" Ø GALVANIZED RIVETS OR BOLTS.
- FOR 60" THRU 84" SIZES, REINFORCED EDGES TO BE SUPPLEMENTED WITH GALVANIZED STIFFENER ANGLES. THE ANGLES WILL BE L 2" X 2" X 1/4" FOR 60" THRU 78" DIAMETER AND L 2 1/2" X 2 1/2" X 1/4" FOR 78" AND 84" DIAMETER. THE ANGLES TO BE ATTACHED BY 3/8" GALVANIZED NUTS AND BOLTS.

* 3. TOE PLATE TO BE CONSTRUCTED WHERE SHOWN ON PLANS.



TYPE 1

FOR 12" THRU 24" ONLY

TYPE 2

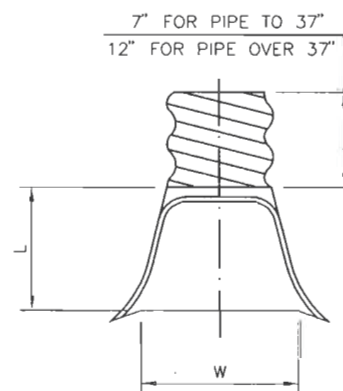
FOR 30" THRU 84" ONLY

STANDARD CONNECTION

STANDARD END SECTIONS FOR PIPE-ARCH STEEL PIPE

GENERAL NOTES

- FOR MULTIPLE INSTALLATION OF ALL TYPES, A MIN. OF A 2'-0" SPACING MEASURED ALONG THE HORIZONTAL BETWEEN FLARED END SECTIONS AT THEIR WIDEST CROSS SECTION SHALL BE USED.
- WELDING WILL NOT BE PERMITTED IN CONNECTING END SECTIONS TO CONNECTOR SECTIONS OR CONNECTOR SECTIONS TO PIPE.
- TYPE 1 AND TYPE 2 MAY BE USED WITH WELDED SEAM OR LOCKSEAM CONNECTIONS HELICALLY CORRUGATED PIPE WITH REROLLED ENDS. REROLLED ENDS SHALL INCLUDE A MINIMUM OF TWO ANNULAR CORRUGATIONS OF THE SAME SIZE AS THE PIPE CORRUGATIONS.



PLAN

CORRUGATED ALUMINUM PIPE END SECTION

PIPE DIAM. (IN.)	APRONS	
	L (IN.)	W (IN.)
18	19	30
21	23	36
24	28	42
30	31.5	48
36	38.5	60
42	47	75
48	54	85
60	63	96
66	70	112
72	77	128

STANDARD CONNECTIONS

STANDARD END SECTIONS FOR ROUND STEEL PIPE



NO.	DATE	REV. BY	DESCRIPTION
1	2/10/09	YML	CORRECTED 0.6 GA. TO 3/8" #
2	2/10/09	YML	MADE GENERAL REVISIONS
3	2/10/09	YML	CORRECTED 83" x 35" TO 83" x 57"

REVISIONS (OR CHANGE NOTICES)

NEW MEXICO
DEPARTMENT OF TRANSPORTATION
STANDARD DRAWING

CULVERT PIPE
END SECTION
(METAL)

Santa Fe County Land Use

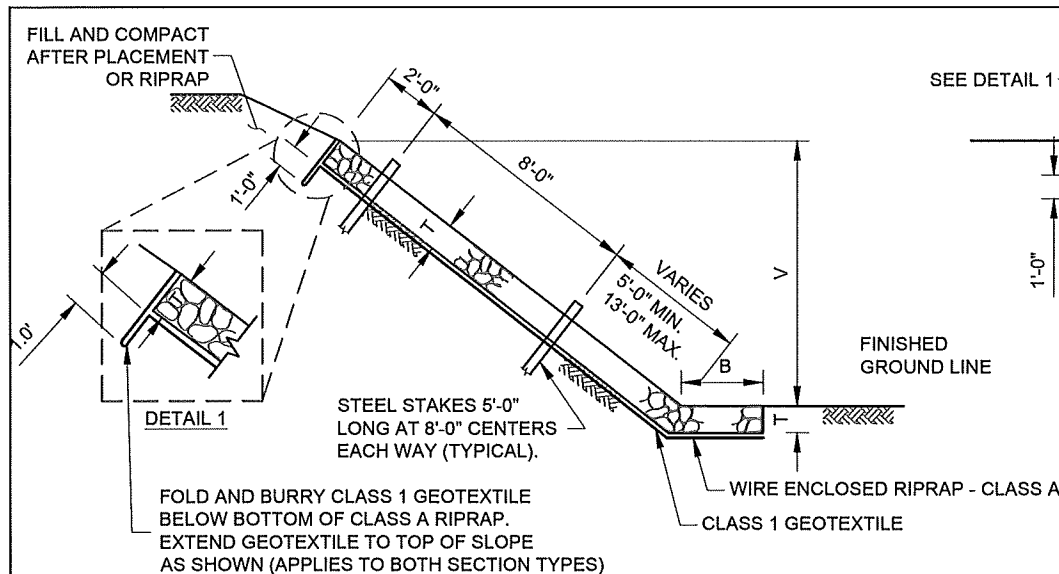
05/14/2025

DESIGNED BY _____ DRAWN BY SKL CHECKED BY TM/YML

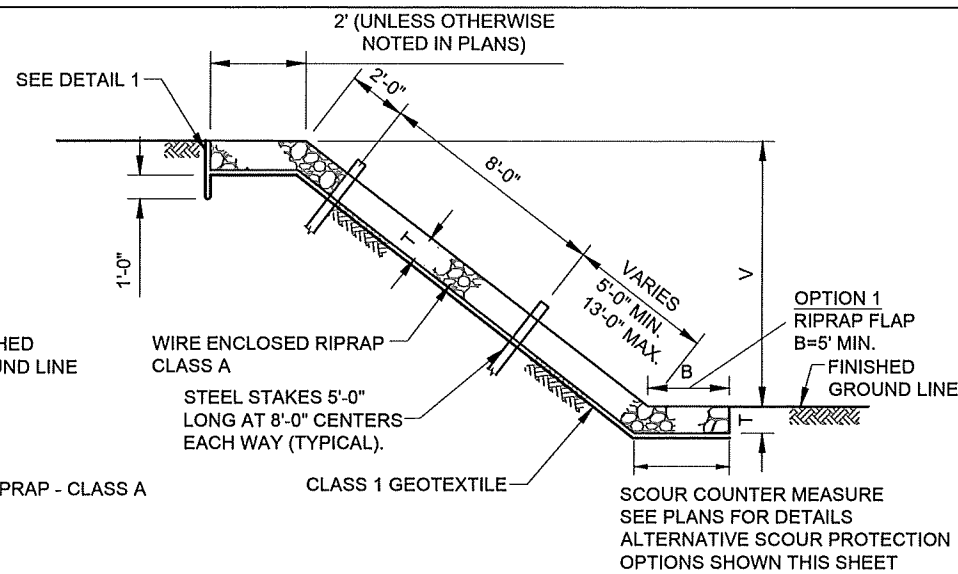
570-02-1/2

1 of 2

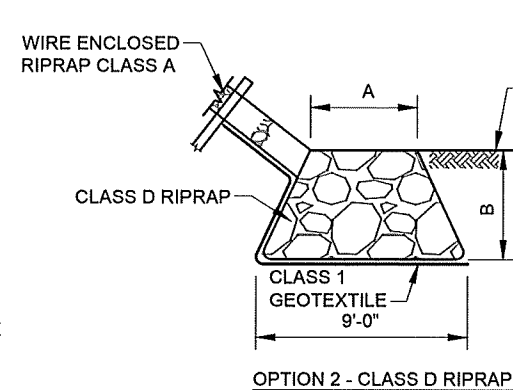
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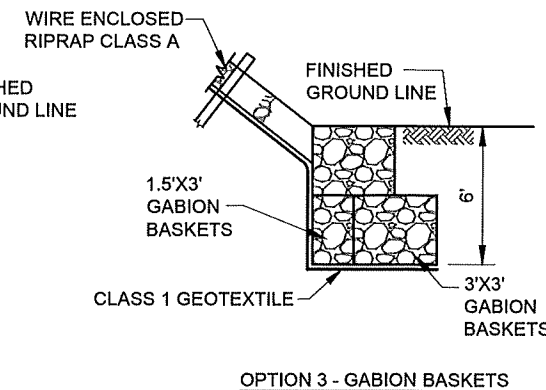
SECTION TYPE I



SECTION TYPE II



OPTION 2 - CLASS D RIPRAP

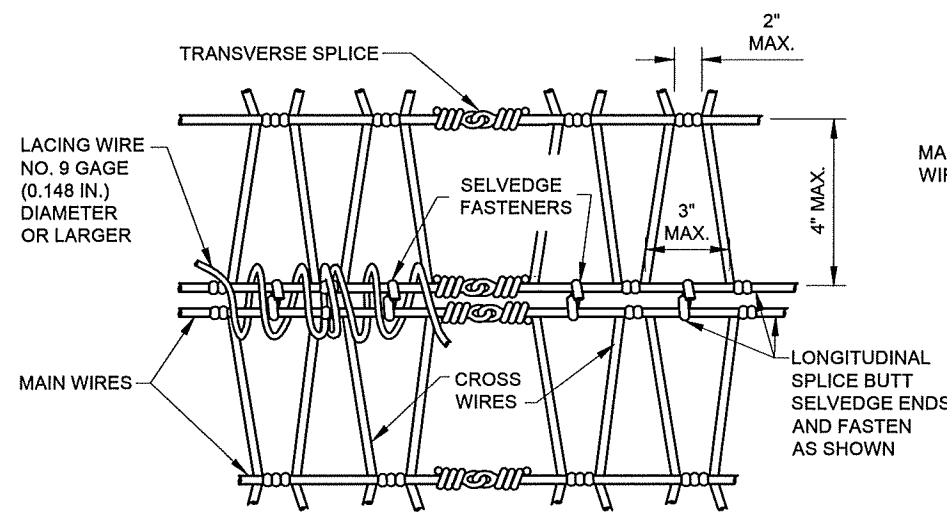


OPTION 3 - GABION BASKETS

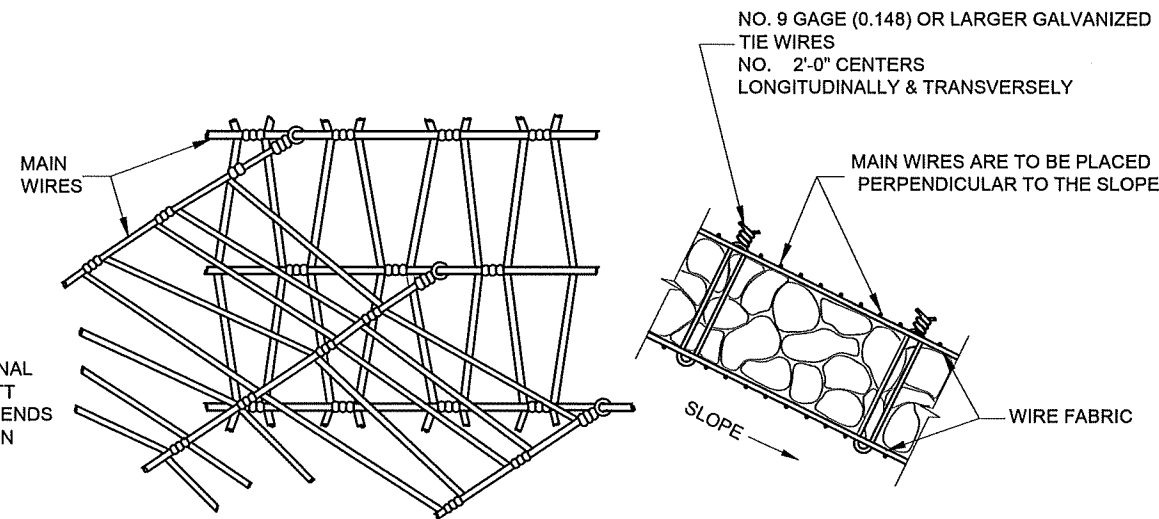
SCOUR COUNTER MEASURE OPTIONS

GENERAL NOTES

1. WIRE FABRIC FOR RIP RAP SHALL BE "W" OR HEXAGONAL MESH AND MEET THE REQUIREMENTS LISTED IN SECTION 602 OF THE NMDOT STANDARD SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION, CURRENT EDITION.
2. STEEL STAKES MAY BE RAILROAD RAILS WEIGHING NOT LESS THAN 30 LBS. PER YARD, 4" NOMINAL DIAMETER STANDARD STRENGTH GALVANIZED STEEL PIPE, OR L 4" x 4" x 3/8" STEEL ANGLES. STEEL STAKES SHALL PROJECT 6" ABOVE TOP OF RIPRAP. STEEL STAKES ARE CONSIDERED INCIDENTAL TO THE COMPLETION OF THE WORK AND NO DIRECT MEASUREMENT OR PAYMENT WILL BE MADE THEREFORE.
3. IF LENGTH OF SLOPE IS 15 FEET OR LESS, ONLY ONE ROW OF STEEL STAKES 2 FEET FROM THE TOP EDGE OF RIPRAP WILL BE REQUIRED UNLESS OTHERWISE NOTED ON PLANS.
4. FOR DIMENSIONS A, B, V, & T. SEE BRIDGE OR ROADWAY PLANS.
5. T=12" UNLESS OTHERWISE SHOWN ON PLANS; T=18" AT BRIDGES.
6. FASTENERS FOR SPLICES AND/OR SELVEDGE END CONNECTORS MAY BE WIRE TIES, INTERLOCKING WIRE CLIPS, HOG RINGS, OR LACING WIRE. ONLY FASTENERS WHICH APPEAR ON THE DEPARTMENT'S "APPROVED PRODUCTS LIST" MAY BE USED.
7. LACING SHALL BE CONTINUOUS AS FAR AS IS PRACTICAL AND SHALL PASS THROUGH EACH MESH OPENING.
8. WHERE SPLICING IS NECESSARY, AN OVERLAP OF LACING OF AT LEAST 1 FOOT SHALL BE PROVIDED.
9. FILL AND COMPACT AFTER PLACEMENT OF RIPRAP AND GEOTEXTILE. FOR SLOPES 3:1 AND STEEPER, BACKFILL EXCAVATED MATERIAL WITH PEA-GRAVEL TO ENSURE ADEQUATE EMBANKMENT PROTECTION. PEA-GRAVEL INCIDENTAL TO CLASS A RIPRAP.

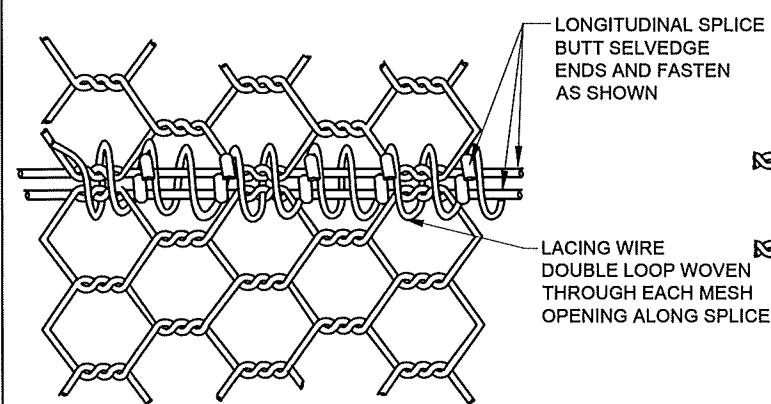


NORMAL INTERSECTION SPLICES

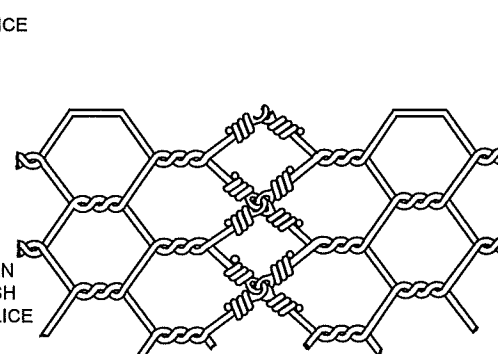


SKEWED INTERSECTION SPLICE

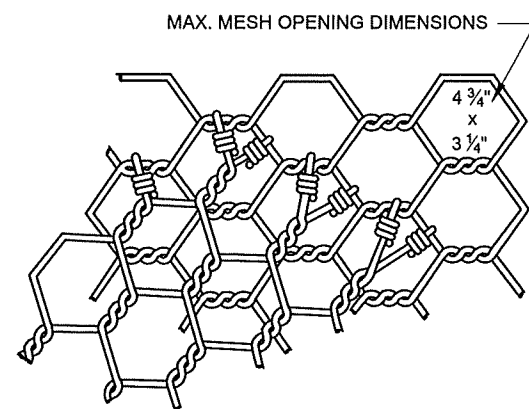
TYPICAL SECTION



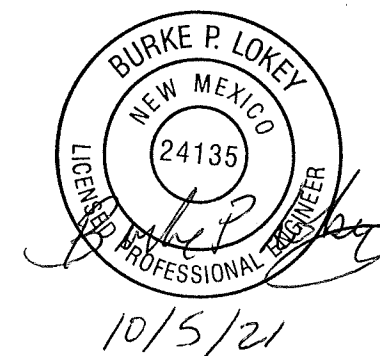
NORMAL INTERSECTION SPLICE



**TRANSVERSE SPLICE
HEXAGONAL MESH**



SKEWED INTERSECTION SPLICE



THIS STANDARD DRAWING IS FOR USE ONLY ON NMDOT PROJECTS. OTHERS WHO USE THE NMDOT STANDARD DRAWINGS DO SO AT THEIR OWN RISK AND ACCEPT THE RESPONSIBILITY OF DETERMINING THEIR APPLICABILITY AND ANY RESULTING LIABILITY.

NO.	DATE	BY	DESCRIPTION

REVISIONS (OR CHANGE NOTICES)

**NEW MEXICO
DEPARTMENT OF TRANSPORTATION
STANDARD DRAWING**

**WIRE ENCLOSED RIPRAP
CLASS "A"**

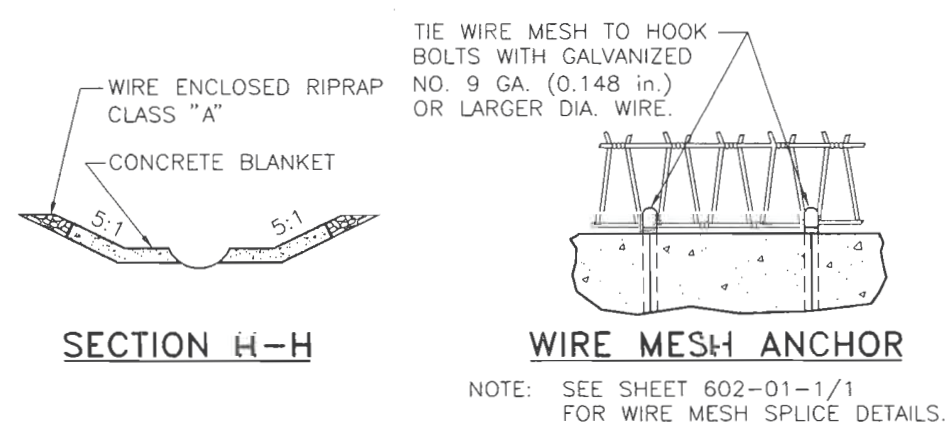
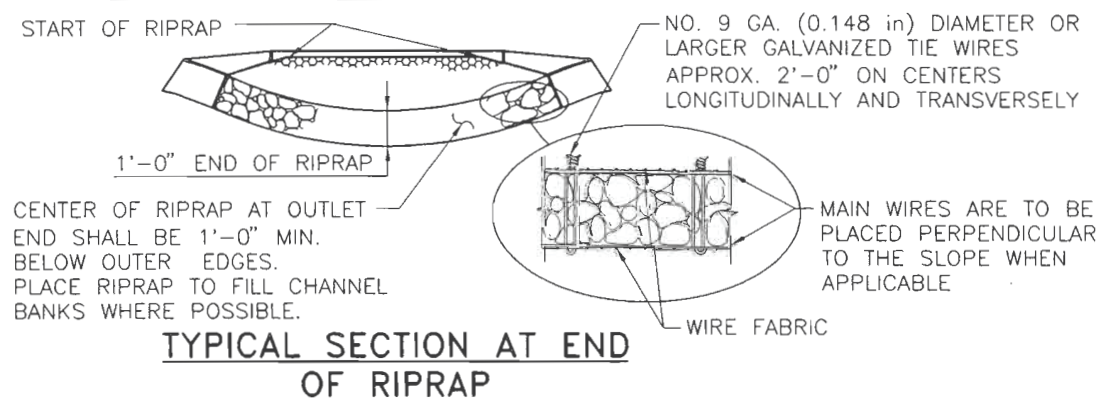
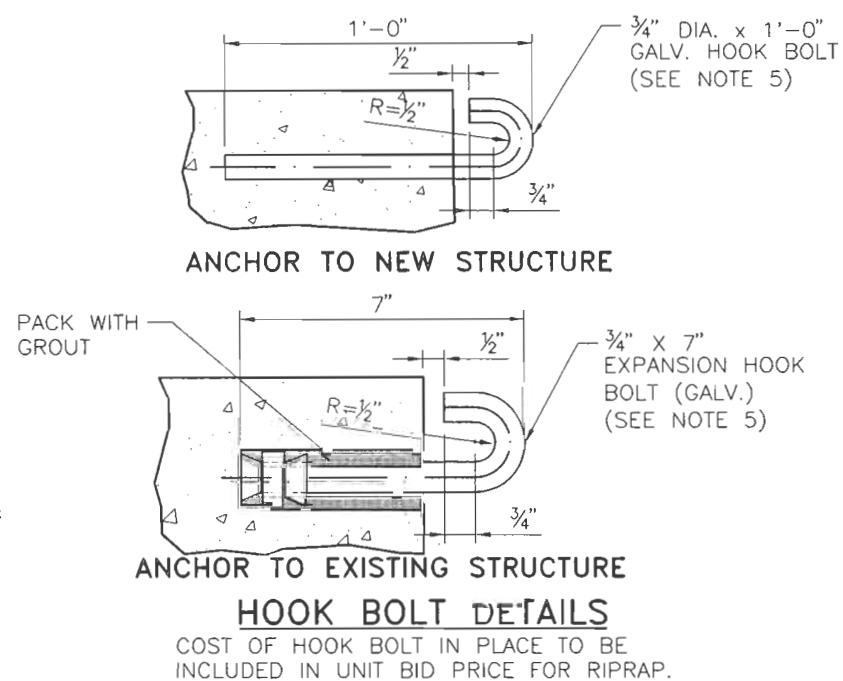
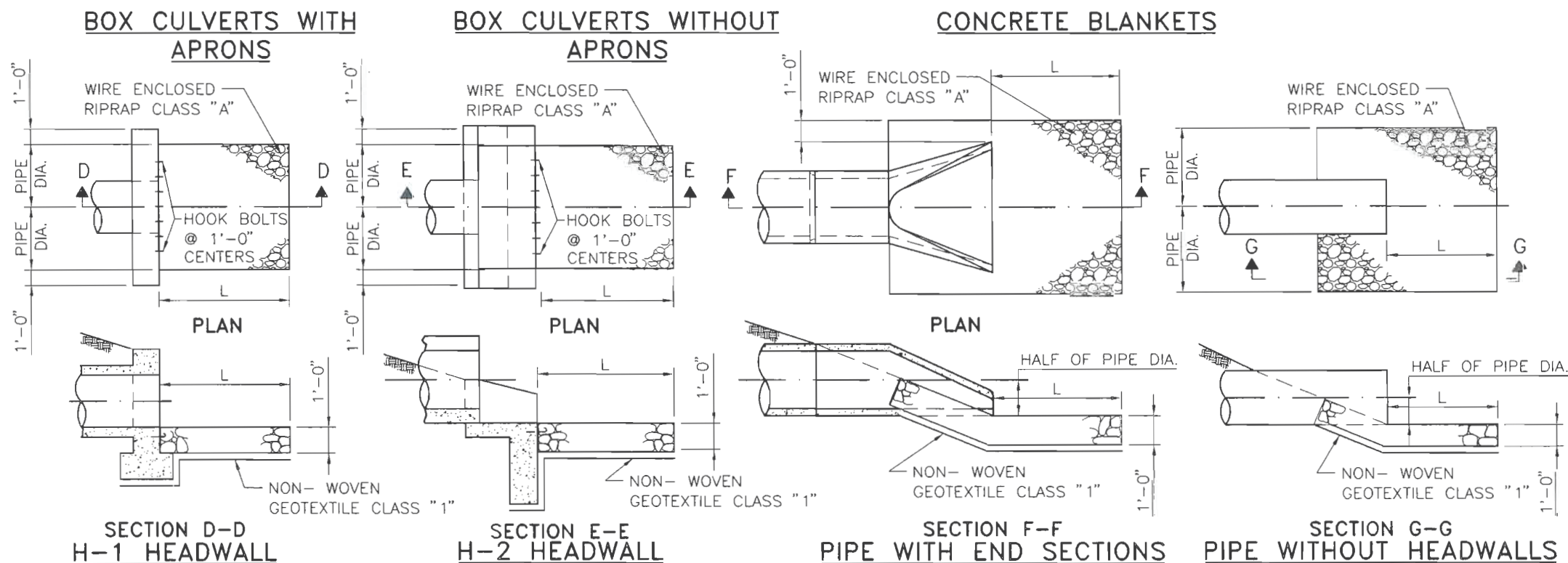
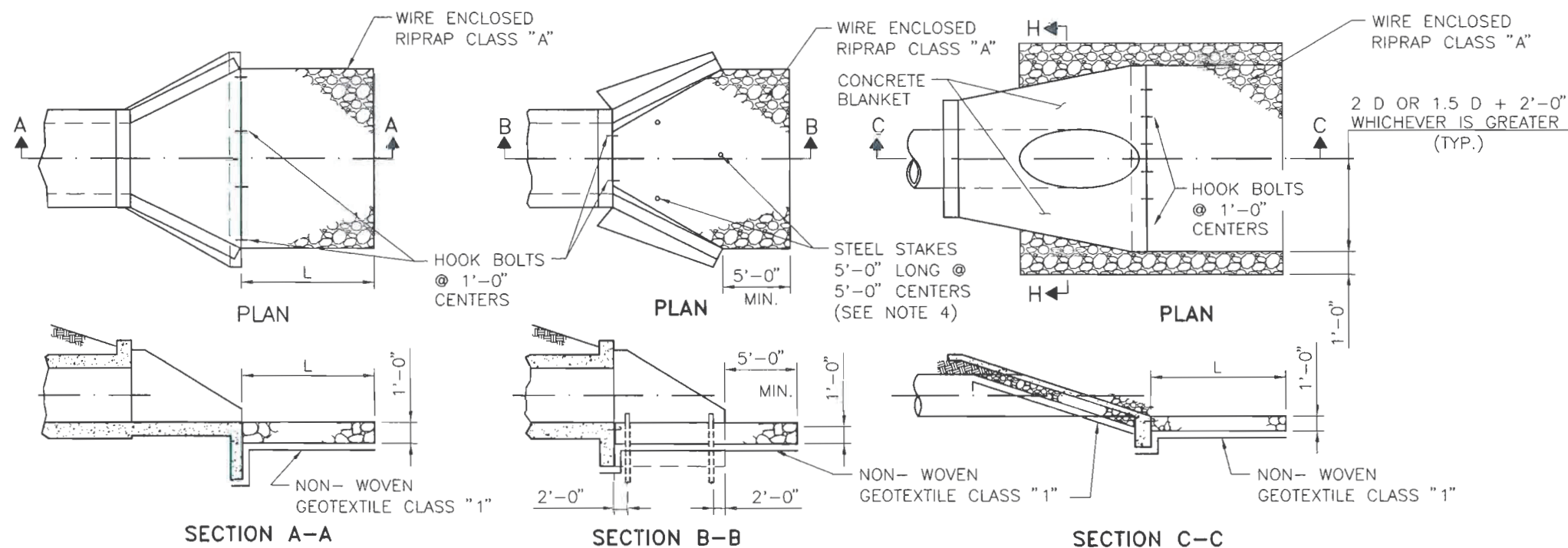
05/14/2025

602-01-1/2

1 of 2

Approved
By: *Jerome T. Roybal*

DESIGNED BY: _____ DRAWN BY: _____ CHECKED BY: _____



⚠	8/09/09	YML	GENERAL REVISIONS
NO.	DATE	REV. BY	DESCRIPTION
REVISIONS (OR CHANGE NOTICES)			
<p align="center">NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD DRAWING</p>			
<p align="center">EROSION CONTROL AT CULVERTS</p>			
<p align="center">Santa Fe County Land Use</p>			
<p align="right">05/14/2025</p>			
DESIGNED BY <u>TM</u>		DRAWN BY <u>SKL</u> CHECKED BY <u>YML</u>	
602-02-1/1		1 of 1	

EROSION CONTROL
AT CULVERTS

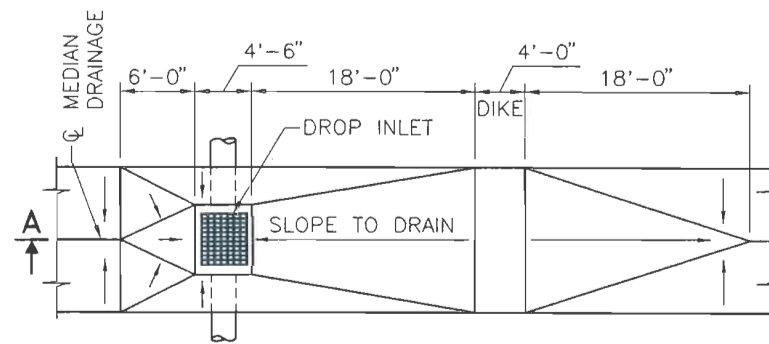
05/14/2025

DESIGNED BY TM DRAWN BY SKL CHECKED BY YML

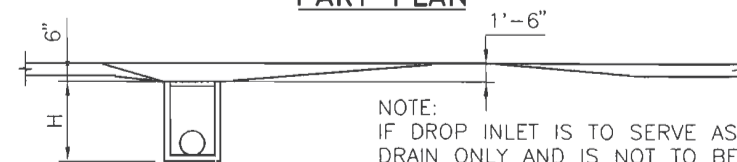
602-02-1/

1 of

Approved
By: Jerome T. Roybal



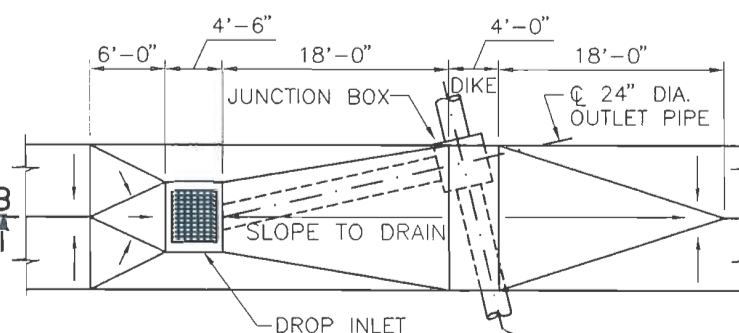
PART PLAN



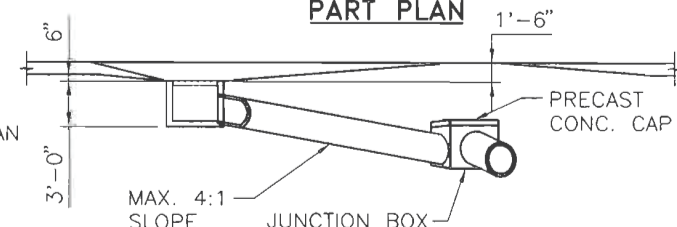
MIN. H = PIPE DIA. + 1'-0"
MAX. H = 15'-0"

SECTION A-A

TYPE I INSTALLATION

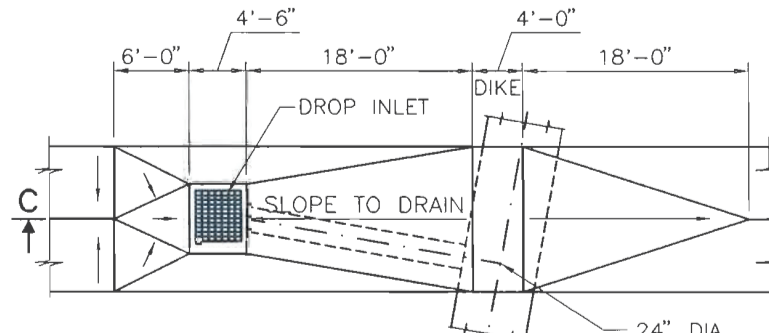


PART PLAN

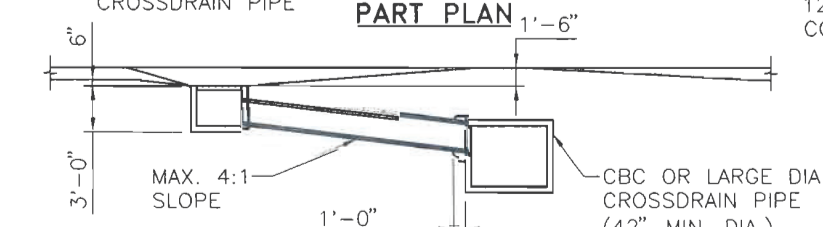


SECTION B-B

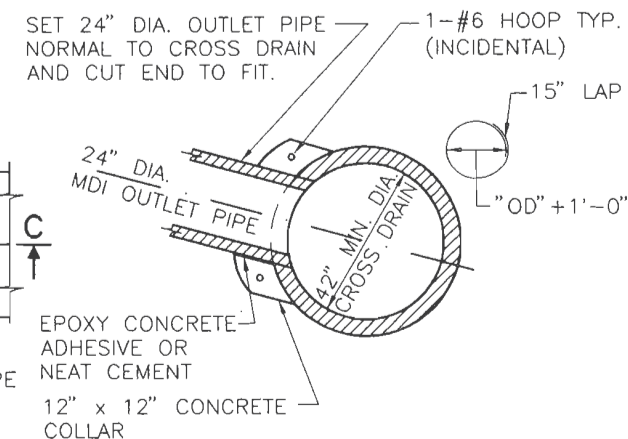
TYPE II INSTALLATION



PART PLAN

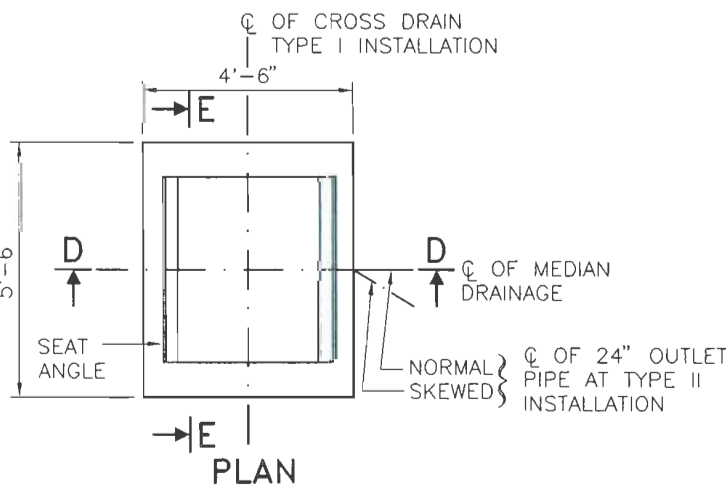


SECTION C-C

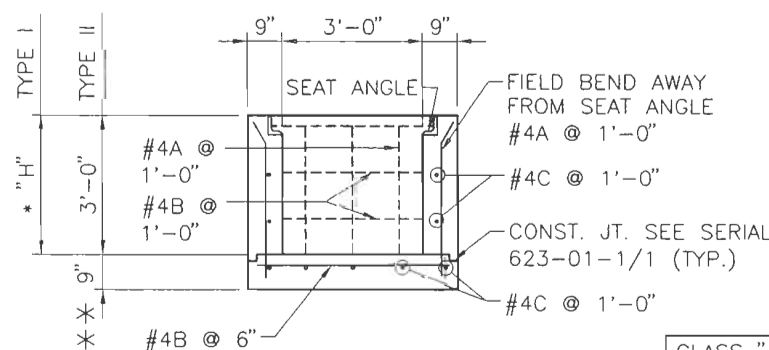


NOTE:
WHEN THE DROP INLET IS CONSTRUCTED IN CONJUNCTION WITH A NEW BOX CULVERT, THE 24" DRAIN OUTLET PIPE SHALL BE SET IN PLACE AND THE CULVERT WALL FORMED AROUND IT. IF THE DROP INLET IS TO BE USED WITH AN EXISTING BOX CULVERT OR PIPE CULVERT, A HOLE SHALL BE BROKEN THRU THE WALL AND ALL EXPOSED REINFORCING STEEL CUT OFF. CEMENT PIPE INTO CULVERT WALL SIMILAR TO THE CONNECTION SHOWN ABOVE.

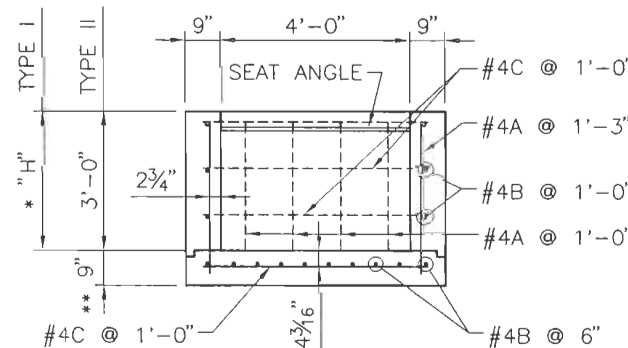
PART SECTION CONNECTION TO LARGE CROSS DRAIN PIPE



PLAN



SECTION D-D DETAILS OF DROP INLET



SECTION E-E

** AVERAGE BOTTOM THICKNESS IS 9"
USE 8 1/2" AT OUTLET AND 9 1/2" AT HIGH SIDE.

* "H" = DIA. OF PIPE + 1'-0"
MINIMUM, AND 15'-0" MAXIMUM.

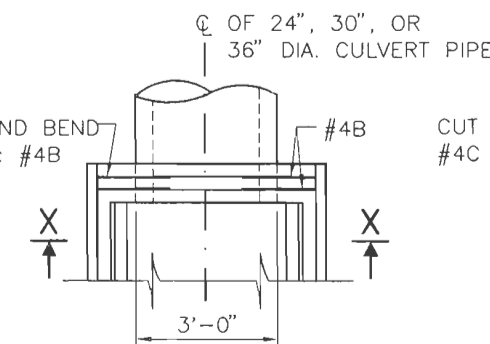
ESTIMATED QUANTITIES

(FOR CONTRACTOR'S INFORMATION ONLY, NOT A BID ITEM)

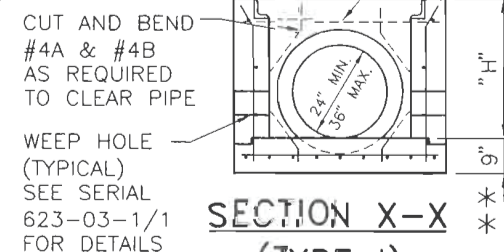
	TYPE I	TYPE II
CLASS "A" CONCRETE	.652+.4722 "H" CU. YDS.	2.07 CU. YDS.
REINFORCING STEEL	53.44+22.04 "H" LBS.	120 LBS.
STRUCTURAL STEEL (URBAN)	384 LBS	384 LBS.
STRUCTURAL STEEL (RURAL)	359 LBS	359 LBS.

NOTE: TO OBTAIN CLASS "A" CONCRETE QUANTITY, USE VALUE TABULATED ABOVE AND DEDUCT THE AMOUNT SHOWN ON SERIAL 623-03-1/1 FOR EACH PIPE OPENING.

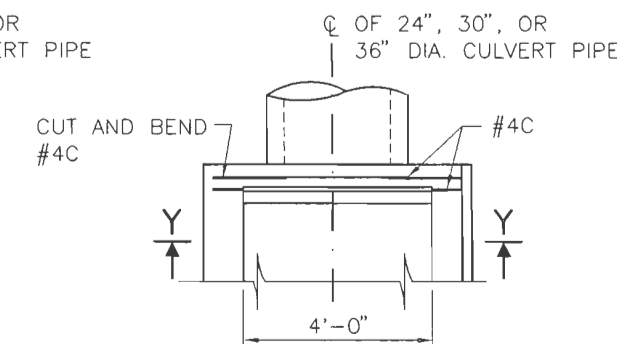
NOTE: SERIAL 623-01-1/1 MUST ACCOMPANY THIS SHEET.



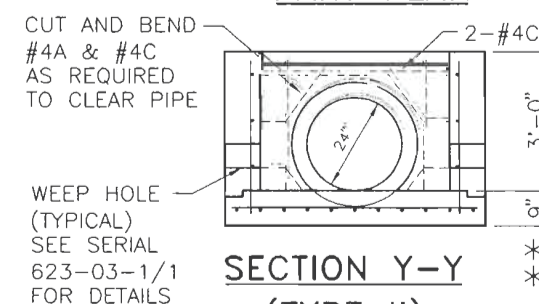
PART PLAN



SECTION X-X
(TYPE I)



PART PLAN



SECTION Y-Y
(TYPE II)

DETAILS OF REINFORCEMENT AROUND PIPE

NOTE: MEDIAN DROP INLETS, COMPLETE IN PLACE, WILL BE PAID FOR AT THE UNIT PRICE BID PER EACH.

#4A	"H" PLUS 6"	REQ'D 14
#4B	4'-3"	REQ'D 11+2H*
#4C	5'-3"	REQ'D 5+2H*

TYPE I INSTALLATION

#4A	"H" PLUS 6"	REQ'D 14
#4B	4'-3"	REQ'D 17
#4C	5'-3"	REQ'D 11

TYPE II INSTALLATION

REINFORCING STEEL DETAILS

NOTE:
ROUND OFF "H" TO THE NEAREST FOOT.
USE SHORTER LENGTH WHEN DIMENSION FALLS ON 6".

NO.	DATE	REV. BY	DESCRIPTION
4/13/09	YML	ADDED AND REVISED NOTE AS SHOWN.	

NEW MEXICO DEPARTMENT OF TRANSPORTATION STANDARD DRAWING

MEDIAN DROP INLET
DETAIL AND QUANTITIES
TYPE I AND TYPE II

DESIGNED BY SKL DRAWN BY SKL CHECKED BY YML/TM

623-01-1/1

1 of 1

Approved By: Jerome T. Roybal

Sheet 623-02

05/14/2025

