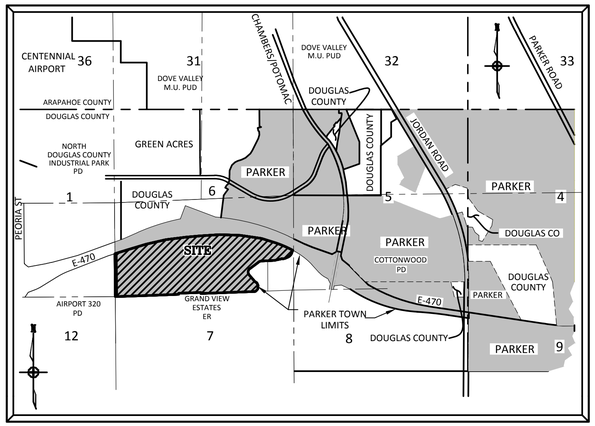
FINAL ROAD & STORM DRAINAGE CONSTRUCTION PLANS
FOR
BELFORD AVENUE
COMPARK VILLAGE SOUTH, FILING NO. 1

PARKER, COLORADO

THE WEST LINE OF THE SOUTHWEST QUARTER OF SECTION 6, TOWNSHIP 6 SOUTH, RANGE 66 WEST OF THE SIXTH PRINCIPAL MERIDIAN BEING MONUMENTED AS SHOWN HEREON HAVING A BEARING OF NORTH 00°29'49" WEST, AS DETERMINED BY GPS OBSERVATION FROM NGS CONTROL POINTS IN THE COLORADO CENTRAL ZONE, STATE PLANE COORDINATE SYSTEM TOWN OF PARKER, COUNTY OF DOUGLAS, STATE OF COLORADO



VICINITY MAP

N.T.S.

AGENCY CONTACT LIST

COMPARK LAND COMPANY
MICHAEL VICKERS
290 FILLMORE ST #1A
DENVER, CO 80206 — 303-881-6292

MANHARD CONSULTING
RICKY J. MOORE, P.E.
8008 E ARAPAHOE COURT, SUITE 110
CENTENNIAL, CO 80112 — 303-708-0500

PARKER PUBLIC WORKS
20120 E. MAINSTREET
PARKER, CO. 80138 — 303-840-9546
STREETS - ALEX MESTDAGH
STORM WATER - JACOB JAMES
EROSION CONTROL - ADAM NELSON
LIFE SAFETY - RANDY CAPRA

TOWN OF PARKER POLICE DEPARTMENT
19,600 E. PARKER SQUARE DR.
PARKER, CO. 80134 — 303-841-9800

STONEGATE VILLAGE METRO DISTRICT
DISTRICT ENGINEER:
SCOTT BARNETT
MULHERN MRE, INC.
2 INVERNESS DRIVE EAST. SUITE 200
ENGLEWOOD, CO 80112 — 303-858-9909

DISTRICT MANAGER:
KURT SCHLIEGER
COMMUNITY RESOURCE SERVICES OF COLORADO
7995 E. PRENTICE AVENUE, SUITE 103-E
GREENWOOD VILLAGE, CO 80111 — 303-381-4968

COMPARK VILLAGE CAMPUS METRO DISTRICT
C/O CLIFFTON LARSON ALLEN
8390 E. CRESCENT PARKWAY, SUITE 500
GREENWOOD VILLAGE, CO 80111 — (303) 779-4525

SOUTH METRO FIRE RESCUE AUTHORITY
MICHELLE HERIAN
9195 E. MINERAL AVE.
CENTENNIAL, CO 80112 — 720-488-7200

UTILITY NOTIFICATION COMPANY OF COLORADO
2801 SOUTH YOUNGFIELD ST, SUITE 301
GOLDEN, CO 80401 — 1-800-922-1987
LOCAL CALLS — (811)

XCEL ENERGY
MICHELLE O'NAN
5909 E. 38TH AVE.
DENVER, CO 80207 — 303-329-1618

COMCAST
KEVIN YOUNG
6850 S. TUCSON WAY
ENGLEWOOD, CO 80112 — 720-490-3867

CENTURY LINK
WILLIAM BENSON
9750 E. COSTILLA AVE.
ENGLEWOOD, CO 80112 — 303-792-6069

COLORADO DEPARTMENT OF HEALTH
4210 E. 11TH AVE.
DENVER, CO 80220 — 303-320-8333

INTERMOUNTAIN RURAL ELECTRIC ASSOCIATION
BROOKS KAUFMAN
5496 NORTH US HWY 85
P.O. BOX DRAWER A
SEDALIA, CO 80135 — 303-688-3100

BENCHMARKS: (COMPARK SOUTH)

SOURCE BENCHMARKS:
DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD.
ELEVATION = 5752.84 (NAVD 88)

SITE BENCHMARKS:
1. A NO. 5 REBAR WITH 2" ALUMINUM CAP STAMPED "LS 28286, 2001" FOUND AT THE SOUTHWEST CORNER OF SECTION 6, T6S, R66W LOCATED ON THE WEST LINE OF FIRST STREET APPROXIMATELY 1000 FEET NORTH OF ELM AVENUE.
ELEVATION = 5845.51
2. A 2.5" IRON PIPE WITH 3.25" ALUMINUM CAP STAMPED "PLS 12405, 1997" FOUND AT THE SOUTHEAST CORNER OF SECTION 6, T6S, R66W LOCATED APPROXIMATELY 960 FEET NORTH OF THE CENTERLINE OF AVENTERRA PARKWAY AND APPROXIMATELY 1050 FEET WEST OF THE CENTERLINE OF CHAMBERS ROAD.
ELEVATION = 5808.06

Know what's **below.** **Call** before you dig.

SIGHT DISTANCE CERTIFICATION:

"I, THE UNDERSIGNED, HEREBY CERTIFY THAT THE PROPOSED SUBDIVISION, COMPARK VILLAGE SOUTH, FILING NO. 1, IS DESIGNED WITH ADEQUATE CORNER SIGHT DISTANCE FOR ALL INTERSECTIONS AND PEDESTRIAN CROSSING LOCATIONS. CONSIDERATION OF LANDSCAPING IMPACTS TO THE CORNER SIGHT DISTANCE AT BOTH INITIAL AND MATURE GROWTH HAS BEEN REVIEWED. THE MINIMUM CORNER SIGHT DISTANCE IS IN COMPLIANCE WITH AASHTO 'POLICY ON GEOMETRIC DESIGN OF HIGHWAY AND STREETS'."

I HEREBY AFFIRM THAT THESE CONSTRUCTION PLANS WERE PREPARED BY ME OR UNDER MY DIRECT SUPERVISION.

FOR AND ON BEHALF OF MANHARD CONSULTING

Manhard CONSULTING LTD™
8008 E. Arapahoe Court, Suite 110, Centennial, CO 80112 ph:303.708.0500 fx:303.708.0400 manhard.com
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Construction Managers • Environmental Scientists • Landscape Architects • Planners

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TOWN OF PARKER APPROVALS

THE TOWN OF PARKER REVIEW CONSTITUTES GENERAL COMPLIANCE WITH THE TOWN'S STANDARDS AND APPROVED VARIANCES, SUBJECT TO THESE PLANS BEING STAMPED, SIGNED, AND DATED BY THE PROFESSIONAL ENGINEER OF RECORD. REVIEW BY THE TOWN DOES NOT CONSTITUTE APPROVAL OF THE PLAN DESIGN OR ACCURACY AND CORRECTNESS OF ENGINEERING CALCULATIONS. ERRORS IN THE DESIGN OR CALCULATIONS REMAIN THE RESPONSIBILITY OF THE REGISTERED PROFESSIONAL ENGINEER WHOSE STAMP AND SIGNATURE ARE AFFIXED TO THIS DOCUMENT.

THIS REVIEW DOES NOT CONSTITUTE APPROVAL OF ANY PRIVATE ON-SITE IMPROVEMENTS WHICH MAY BE SHOWN. CONSTRUCTION CANNOT COMMENCE UNTIL ALL REQUIRED DRAINAGE/TRAFFIC REPORT(S), FINAL DEVELOPMENT PLAN(S), SPECIAL REVIEW(S), GRADING PERMIT, AND/OR OTHER PERMITS ARE COMPLETE, APPROVED AND ON FILE WITH THE TOWN OF PARKER.

TOWN OF PARKER, DIRECTOR OF ENGINEERING — DATE

DRAWN BY	REVISIONS	DATE
ETG	3RD SUBMITTAL	6/24/16
	2ND SUBMITTAL	4/14/16
	1ST SUBMITTAL	12/2015

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Construction Managers • Environmental Scientists • Landscape Architects • Planners

COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
COVER SHEET

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 1 OF 40
CLCPKC3 ---

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PENDING APPROVAL

Plotted: 6/27/2016 7:04 PM Dwg Name: p:\Clpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-BelFord-CV01.dwg, Updated By: adrucker

GENERAL NOTES:

1. ALL CONSTRUCTION SHALL COMPLY WITH THE STONEGATE VILLAGE METRO DISTRICT WATER AND SANITATION SYSTEM SPECIFICATIONS, THE DOUGLAS COUNTY ROADWAY DESIGN AND CONSTRUCTION STANDARDS, THE TOWN OF PARKER ROADWAY DESIGN AND CONSTRUCTION CRITERIA, THE TOWN OF PARKER STORM DRAINAGE AND ENVIRONMENTAL CRITERIA, THE URBAN DRAINAGE AND FLOOD CONTROL DISTRICT, THE COLORADO STATE BOARD OF HEALTH, THE ENVIRONMENTAL PROTECTION AGENCY AND THE OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION.

2. THE CONTRACTOR SHALL CONTACT ALL APPROPRIATE UTILITY COMPANIES AND THE TOWN OF PARKER PRIOR TO THE BEGINNING OF ANY CONSTRUCTION. CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ANY EXISTING UTILITY (INCLUDING DEPTHS) WHICH MAY CONFLICT WITH THE PROPOSED CONSTRUCTION. ALL EXISTING UTILITIES SHALL BE PROTECTED FROM DAMAGE BY THE CONTRACTOR. DAMAGED UTILITIES SHALL BE REPAIRED BY THE CONTRACTOR AT HIS OWN EXPENSE. ALL ITEMS SHOWN ON THE PLANS AS EXISTING ARE SHOWN IN APPROXIMATE LOCATIONS ONLY. THE ACTUAL LOCATIONS MAY VARY FROM THE PLANS, ESPECIALLY IN THE CASE OF UNDERGROUND UTILITIES. WHENEVER THE CONTRACTOR DISCOVERS A DISCREPANCY IN LOCATIONS, HE SHALL CONTACT THE ENGINEER IMMEDIATELY.

3. THE DISTRICT ENGINEER AND OTHER APPROVING AGENCIES ARE TO BE NOTIFIED AT LEAST 48 HOURS PRIOR TO CONSTRUCTION.

4. THE CONTRACTOR SHALL OBTAIN, AT HIS EXPENSE, ALL PERMITS WHICH ARE NECESSARY TO PERFORM THE PROPOSED WORK, INCLUDING STREET CUTS, UTILITY INTERFERENCE AND TRAFFIC CONTROL.

5. ALL CONCRETE SHALL BE A MINIMUM OF CLASS B, 6-SACK, TYPE II, 3000 POUND COMPRESSION STRENGTH. ALL CONCRETE ASSOCIATED WITH ROADWAY CONSTRUCTION SHALL BE CLASS D.

6. THE DESIGN ENGINEER SHALL SUBMIT ONE (1) SET OF ROLLED "AS-BUILT" BLUELINE PRINTS TO THE DESIGNATED TOWN AUTHORITY FOR APPROVAL PRIOR TO PRINTING MYLAR SEPIAS AND ELECTRONIC FILES FOR THE TOWN. AFTER APPROVAL HAS BEEN GRANTED BY THE DESIGNATED TOWN AUTHORITY, FULL SIZE MYLAR SEPIA PRINTS SHALL BE TRANSMITTED TO THE TOWN.

7. ALL BACKFILL MATERIAL SHALL BE COMPACTED TO ALL APPLICABLE TOWN AND DISTRICT STANDARDS. COMPACTION TESTS MUST BE SUBMITTED TO THE TOWN AND DISTRICT PRIOR TO PROBATIONARY ACCEPTANCE.

8. ALL CURBS SHALL BE CAREFULLY AND FIRMLY BACKFILLED BY THE CONTRACTOR. ANY EXCESS MATERIAL FROM SUBGRADE TRIMMING SHALL NOT BE LEFT IN THE STREET CORE, BUT SHALL BE SPREAD UNIFORMLY IN A 20-FOOT WIDE ZONE BEHIND THE WALK.

9. REFER TO OVERLOT GRADING AND EROSION CONTROL PLAN FOR GRADING NOTES.

10. EXPANSION JOINTS WILL BE PLACED IN ALL SIDEWALKS AND CURB AND GUTTER AT PCs, PTs, AND AT ANY FIXED OBJECT, BUT IN NO CASE ANY FARTHER THAN 500 FEET APART.

11. THE APPLICANT IS 470 COMPARK LLC.

12. THE UTILITY CONTRACTOR THAT INSTALLS SANITARY SEWER, STORM SEWER, AND WATER SHALL, AFTER PROPERLY COMPLETING THE WORK, WALK THE SITE WITH THE OWNER'S REPRESENTATIVE(S) TO INSPECT MANHOLES, HYDRANTS, VALVE BOXES, AND INLETS PRIOR TO THE START OF WORK BY THE CURB, GUTTER, AND WALK CONTRACTOR. A SIMILAR FIELD INSPECTION SHALL OCCUR WITH THE UTILITY CONTRACTOR AND CURB CONTRACTOR TO INSPECT THESE ITEMS PLUS CURB STOP BOXES AND CONCRETE WORK PRIOR TO THE START OF WORK BY THE PAVING CONTRACTOR. THESE FIELD INSPECTIONS ARE INTENDED TO HELP ESTABLISH RESPONSIBILITY FOR ANY NECESSARY REPAIRS, CLEANING, ETC. THAT ARE NEEDED. THESE INSPECTIONS WITH A REPRESENTATIVE OF THE OWNER ARE IN ADDITION TO ANY INSPECTIONS BY REPRESENTATIVES OF THE TOWN OF PARKER OR COTTONWOOD WATER AND SANITATION DISTRICT.

13. ALL TESTING AND INSPECTION FOR COMPLIANCE WITH TOWN OF PARKER STANDARDS SHALL BE COMPLETED PRIOR TO PROBATIONARY ACCEPTANCE.

14. THE DESIGN ENGINEER SHALL SUBMIT ONE (1) SET OF ROLLED "AS-BUILT" BLUELINE PRINTS AND ELECTRONIC FILES TO THE DISTRICT ENGINEER FOR APPROVAL PRIOR TO PRINTING MYLAR SEPIAS FOR THE DISTRICT. AFTER APPROVAL HAS BEEN GRANTED BY THE DISTRICT ENGINEER, FULL SIZE MYLAR SEPIA PRINTS SHALL BE TRANSMITTED TO THE COTTONWOOD WATER AND SANITATION DISTRICT OFFICE AND AN ADDITIONAL SET OF ROLLED BLUELINE PRINTS SHALL BE TRANSMITTED TO THE DISTRICT ENGINEER'S OFFICE PRIOR TO PROBATIONARY ACCEPTANCE.

15. TRENCHES SHALL BE EXCAVATED AND THE PIPE EXPOSED FOR THE INSPECTION AT ANY LOCATION ON THE PROJECT IF SO ORDERED BY THE INSPECTOR.

16. CONTRACTOR WILL BE HELD RESPONSIBLE FOR THE PROPER FUNCTIONING OF LINES (WATER AND SEWER) FOR UP TO TWO (2) YEARS FROM THE DATE OF PROBATIONARY ACCEPTANCE OF THE LINES BY THE DISTRICT. ANY MALFUNCTION DURING THIS PERIOD OF GUARANTEE SHALL BE REMEDIED BY THE CONTRACTOR TO THE SATISFACTION OF THE DISTRICT ENGINEER AT NO EXPENSE TO THE DISTRICT.

17. SURFACE GRADES ARE TO BE WITHIN PLUS OR MINUS ONE FOOT OF FINISHED GRADE AND VERIFICATION OF COMPACTION RESULTS OBTAINED PRIOR TO THE INSTALLATION OF WATER AND SEWER LINES. RESULTS MUST BE SUBMITTED TO THE DISTRICT ENGINEER.

18. NO WORK SHALL BE BACKFILLED UNTIL THE CONSTRUCTION HAS BEEN INSPECTED AND APPROVED FOR BACKFILLING BY THE DISTRICT ENGINEER OR REPRESENTATIVE OF THE DISTRICT ENGINEER.

19. ALL SERVICES WILL BE PERMANENTLY MARKED ON CURB FACE AS FOLLOWS:

"X" FOR SANITARY SERVICE SEWERS
"V" FOR WATER SERVICES

20. NO TREES SHALL BE ALLOWED IN EASEMENTS OR WITHIN 8' OF ANY WATER OR SANITARY SEWER MAINS IN RIGHT-OF-WAY. NO TREES ALLOWED WITHIN 7' OF THE EDGE OF ANY STORM SEWER.

21. BENCHMARKS:

SOURCE BENCHMARKS:
DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD.
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ELEVATION = 5808.06

22. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE LOCATION, PROTECTION AND REPAIR OF ALL UTILITIES ENCOUNTERED DURING CONSTRUCTION, WHETHER SHOWN ON THESE PLANS OR NOT. CONTRACTOR SHALL CONTACT REPRESENTATIVES OF THE RESPECTIVE UTILITIES AND HAVE ALL UTILITIES FIELD LOCATED PRIOR TO CONSTRUCTION. IT SHALL BE THE CONTRACTOR'S RESPONSIBILITY TO VERIFY ALL LOCATIONS OF EXISTING STRUCTURES AND UTILITIES SHOWN ON THE DRAWINGS, TO ASCERTAIN WHETHER ANY STRUCTURES AND UTILITIES MAY EXIST, AND REPAIR AND/OR REPLACE ANY STRUCTURES AND/OR UTILITIES THAT ARE DAMAGED BY THE CONTRACTOR.

23. T.C. INDICATES TOP BACK OF WALK GRADE FOR COMBINATION CURB, GUTTER, AND SIDEWALK, OR TOP BACK OF CURB FOR OTHER CURB AND GUTTER TYPES.

24. ALL DIMENSIONS AND RADII ARE TO FLOWLINE UNLESS OTHERWISE NOTED.

25. THE CONTRACTOR SHALL FURNISH THE ENGINEER WITH A SET OF "AS-BUILT" PLANS MARKED WITH ALL DEVIATIONS FROM THE CONSTRUCTION PLANS PRIOR TO INITIAL ACCEPTANCE.

26. ALL STATIONING IS ON CENTERLINE OF RIGHT OF WAY UNLESS OTHERWISE NOTED.

CONSTRUCTION NOTES:

1. ALL MATERIALS AND CONSTRUCTION SHALL BE IN CONFORMANCE WITH THE LATEST EDITION OF THE COLORADO DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, THE LATEST EDITION OF THE TOWN OF PARKER ROADWAY DESIGN AND CONSTRUCTION CRITERIA MANUAL, AND THE TOWN OF PARKER STORM DRAINAGE AND ENVIRONMENTAL CRITERIA MANUAL.

2. ALL MATERIALS AND WORKMANSHIP SHALL BE SUBJECT TO INSPECTION BY THE TOWN OF PARKER PUBLIC WORKS DEPARTMENT. THE TOWN RESERVES THE RIGHT TO ACCEPT OR REJECT ANY SUCH MATERIALS AND WORKMANSHIP THAT DOES NOT CONFORM TO ITS STANDARDS AND SPECIFICATIONS.

3. A PRE-CONSTRUCTION MEETING SHALL BE SCHEDULED A MINIMUM OF 48 HOURS AND A MAXIMUM OF 96 HOURS PRIOR TO THE START OF CONSTRUCTION. A PRE-CONSTRUCTION MEETING WILL NOT BE SCHEDULED UNTIL THE GRADING PERMIT AND ALL OTHER NECESSARY PERMITS HAVE BEEN OBTAINED.

4. A DEVELOPMENT REVIEW ENGINEER SHALL BE CONTACTED A MINIMUM OF 24 HOURS PRIOR TO A NECESSARY INSPECTION. IF A DEVELOPMENT REVIEW ENGINEER IS NOT AVAILABLE AFTER PROPER NOTICE OF CONSTRUCTION ACTIVITY HAS BEEN PROVIDED, THE PERMITTEE MAY COMMENCE WORK IN THE DEVELOPMENT REVIEW ENGINEER'S ABSENCE. HOWEVER, TOWN OF PARKER RESERVES THE RIGHT TO REJECT THE IMPROVEMENT IF SUBSEQUENT TESTING REVEALS AN IMPROPER INSTALLATION.

5. LOCATION OF EXISTING UTILITIES SHALL BE VERIFIED BY THE CONTRACTOR PRIOR TO ACTUAL CONSTRUCTION. FOR INFORMATION, CONTACT DENVER INTER-UTILITY GROUP AT 303-534-6700, OR 1-800-922-1987. THE CONTRACTOR SHALL FIELD VERIFY SIZE AND HORIZONTAL AND VERTICAL LOCATIONS OF EXISTING FACILITIES PRIOR TO CONSTRUCTION, AND NOTIFY THE ENGINEER OF ANY DISCREPANCIES.

6. THE CONTRACTOR SHALL HAVE ONE (1) SIGNED COPY OF THE PLANS, APPROVED BY THE TOWN OF PARKER PUBLIC WORKS DIRECTOR, AND ONE (1) COPY OF THE ROADWAY DESIGN AND CONSTRUCTION CRITERIA AT THE JOB SITE AT ALL TIMES.

7. ALL PROPOSED STREET CUTS TO EXISTING PAVEMENTS FOR UTILITIES, STORM SEWER, OR FOR OTHER PURPOSES ARE LISTED AND REFERENCED BELOW:

WATER TIE-IN	----
SANITARY SEWER CONNECTION	----
STORM SEWER CONNECTION	NONE

8. A PLAN FOR TRAFFIC CONTROL DURING CONSTRUCTION SHALL BE SUBMITTED TO THE TOWN OF PARKER FOR ACCEPTANCE WITH THE RIGHT-OF-WAY PERMIT USE APPLICATION. A PERMIT WILL NOT BE ISSUED WITHOUT AN APPROVED TRAFFIC CONTROL PLAN FOR USE DURING CONSTRUCTION.

9. ALL TRENCHES SHALL BE ADEQUATELY SUPPORTED AND THE SAFETY OF WORKERS PROVIDED FOR AS REQUIRED BY THE MOST RECENT OCCUPATIONAL SAFETY AND HEALTH ADMINISTRATION (OSHA) "SAFETY AND HEALTH REGULATIONS FOR CONSTRUCTION."

10. COMPACTION OF ALL TRENCHES MUST BE ATTAINED AND COMPACTION TEST RESULTS SUBMITTED TO THE DEVELOPMENT REVIEW ENGINEER IN PRELIMINARY FORM PRIOR TO PAVING AND IN FINAL FORM PRIOR TO PROBATIONARY ACCEPTANCE.

11. THE CONTRACTOR IS RESPONSIBLE FOR IMPLEMENTING AND MAINTAINING EROSION AND SEDIMENT CONTROL MEASURES AT ALL TIMES DURING CONSTRUCTION. THE PLAN MAY BE MODIFIED AS FIELD CONDITIONS WARRANT WITH APPROVAL FROM THE TOWN OF PARKER PUBLIC WORKS DEPARTMENT.

12. THE CONTRACTOR SHALL PROVIDE, ERECT, AND MAINTAIN PROPER TRAFFIC CONTROL DEVICES UNTIL THE SITE IS OPEN TO TRAFFIC. THE CONTRACTOR SHALL SUBMIT A TRAFFIC CONTROL PLAN TO THE TOWN OF PARKER PUBLIC WORKS DEPARTMENT FOR APPROVAL PRIOR TO CONSTRUCTION.

13. PLANS ARE APPROVED FOR A PERIOD OF ONE (1) YEAR FROM THE DATE SHOWN ON THE TOWN OF PARKER SIGNATURE BLOCK. PLANS SHALL BE RESUBMITTED TO THE TOWN FOR APPROVAL AFTER ONE (1) YEAR. THE COST OF THE PLAN RE-REVIEW AND RE-ACCEPTANCE WILL BE CHARGED BACK TO THE DEVELOPER INCLUDING ALL TIME AND EXPENSES OF THE TOWN OF PARKER PUBLIC WORKS DEPARTMENT.

14. REPAIR OF ANY DAMAGE TO EXISTING IMPROVEMENTS OR LANDSCAPING IS THE RESPONSIBILITY OF THE CONTRACTOR.

15. ALL DAMAGED EXISTING CURB, GUTTER, AND SIDEWALK SHALL BE REPAIRED PRIOR TO ACCEPTANCE OF COMPLETED IMPROVEMENTS.

16. ALL CONSTRUCTION ACTIVITIES MUST COMPLY WITH THE STATE OF COLORADO PERMITTING PROCESS FOR "STORMWATER DISCHARGES ASSOCIATED WITH CONSTRUCTION ACTIVITY." FOR INFORMATION, PLEASE CONTACT COLORADO DEPARTMENT OF HEALTH, WATER QUALITY CONTROL DIVISION, WQCD-PE-B2, 4300 CHERRY DRIVE SOUTH, DENVER, COLORADO 80222-1530. ATTENTION: PERMITS AND ENFORCEMENT SECTION. PHONE: 303-692-3500.

17. IF DEWATERING IS REQUIRED, A STATE CONSTRUCTION DEWATERING DISCHARGE PERMIT IS REQUIRED FOR DISCHARGES TO A STORM SEWER, CHANNEL, IRRIGATION DITCH, ANY STREET THAT IS TRIBUTARY TO THE AFOREMENTIONED FACILITIES, OR ANY WATER OF THE UNITED STATES.

18. ALL REFERENCES TO BOOKS, PAGES, MAPS, AND RECEPTION NUMBER ARE PUBLIC DOCUMENTS ON FILE WITH THE COUNTY CLERK AND RECORDER'S OFFICE.

PARKER STANDARD STORM DRAINAGE INFRASTRUCTURE NOTES

1. ALL STORM DRAINAGE IMPROVEMENTS ARE SUBJECT TO COMPLIANCE WITH THE COLORADO DEPARTMENT OF TRANSPORTATION (CDOT) CURRENT EDITION OF THE STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, M & S STANDARDS, AND ALL STANDARD SPECIAL PROVISIONS CURRENTLY USED BY CDOT, WITH THE MODIFICATIONS SET FORTH IN THE TOWN OF PARKER'S STORM DRAINAGE AND ENVIRONMENT CRITERIA MANUAL (SDECM), AS AMENDED.

2. THE CONTRACTOR SHALL COMPLY WITH THE "COLORADO WATER QUALITY CONTROL ACT" (TITLE 25, ARTICLE 8 CRS), THE "PROTECTION OF FISHING STREAMS" TITLE 33, ARTICLE 5, CRS), THE "CLEAN WATER ACT" (33 USC 1344), "CHERRY CREEK RESERVOIR CONTROL REGULATION NO. 72" (5 CCR 1002-72), THE REGULATION PROMULGATED, CERTIFICATION OR PERMITS ISSUES, AND THE REQUIREMENTS PRESENTED IN THE SDECM REVISION TO SECTION 107 AND THE CONSTRUCTION BMP PLAN. IN THE EVENT OF CONFLICTS BETWEEN THESE REQUIREMENTS AND WATER QUALITY CONTROL LAWS, RULES, OR REGULATIONS OF OTHER FEDERAL, OR STATE AGENCIES, THE MORE RESTRICTIVE LAWS, RULES, OR REGULATIONS SHALL APPLY.

3. INSPECTIONS: CONSTRUCTION SHALL NOT BEGIN UNTIL A GRADING PERMIT HAS BEEN ISSUED FOR THE PROJECT. THE CONTRACTOR SHALL NOTIFY THE TOWN OF PARKER ENGINEERING DEPARTMENT (PUBLIC WORKS) TO SCHEDULE INSPECTIONS A MINIMUM OF 48 HOURS PRIOR TO THE CONSTRUCTION OF ALL DRAINAGE INFRASTRUCTURE (STORM SEWERS, INLETS, MANHOLES, ENERGY DISSIPATERS, RIPRAP, GROUTED BOULDERS, DETENTION POND OUTLET STRUCTURES, FOREBAYS, TRICKLE CHANNELS, ETC.). FAILURE TO NOTIFY THE ENGINEERING DEPARTMENT FOR INSPECTIONS MAY RESULT IN NON-ACCEPTANCE OF THE INFRASTRUCTURE BY THE TOWN. URBAN DRAINAGE AND FLOOD CONTROL DISTRICT MUST ALSO BE NOTIFIED IN A SIMILAR MANNER FOR ALL MAINTENANCE ELIGIBLE DRAINAGE INFRASTRUCTURES (CONSULT WITH STORMWATER ENGINEERING DIVISION).

4. STRUCTURAL BACKFILL (CDOT CLASS 1) SHALL BE COMPACTED TO CDOT STANDARD SPECIFICATIONS 203.03. STRUCTURAL BACKFILL (CDOT CLASS 2) SHALL CONFORM TO CDOT STANDARD SPECIFICATION 203.07. AT THE CONTRACTOR'S OPTION, STRUCTURAL BACKFILL (SQUEEGEE) MEETING THE GRADATION REQUIREMENTS CONTAINED IN REVISION OF SECTION 206 OF THE CDOT STANDARD SPECIFICATIONS AS PRESENTED IN THE SDECM, MAY BE SUBSTITUTED FOR STRUCTURE BACKFILL (CLASS 1 OR CLASS 2) FOR BACKFILLING OF CULVERT PIPES, STORM SEWER PIPES, MANHOLES AND INLET STRUCTURES; HOWEVER, THE TOP 2 FEET BELOW SUB-GRADE ELEVATION SHALL BE THE REQUIRED EMBANKMENT MATERIAL.

5. ALL EXCAVATIONS SHALL MEET OSHA REQUIREMENTS.

6. TESTING: PROBATIONARY ACCEPTANCE OF STORM DRAINAGE IMPROVEMENTS WILL BE CONTINGENT UPON SATISFACTORY TESTING RESULTS. IN ALL CASES WHERE TESTS INDICATE COMPACTION LESS THAN THAT REQUIRED BY TOWN SPECIFICATIONS, ADDITIONAL COMPACTION AND TESTS WILL BE REQUIRED UNTIL THE SPECIFICATIONS ARE MET. FREQUENCY OF TESTING WILL BE AS FOLLOWS:

A) 1 TEST FOR SUB-GRADE AND 1 TEST FOR BACKFILL AT EVERY ABOVE-GROUND APPURTENANCE (MANHOLES, INLETS, ETC.)
B) 1 TEST EVERY 200 LF OF MAINLINE TRENCHES EVERY 1-FOOT OF BACKFILL LIFT AND WITHIN 1 FOOT FROM ALL STRUCTURES.

7. ALLOWABLE STORM SEWER CONDUIT MATERIAL WITHIN THE TOWN OF PARKER SHALL BE LIMITED TO REINFORCED CONCRETE PIPE (RCP) CONFORMING TO CDOT STANDARD SPECIFICATION 706.02.

8. ALL RCP JOINTS SHALL BE MANUFACTURED IN ACCORDANCE WITH ASTM C443. RUBBER GASKETS SHALL BE USED ON ALL PIPE JOINTS CONFORMING TO ASTM C443. ALL RCP SECTIONS SHALL BE JOINTED IN SUCH A MANNER THAT THE ENDS ARE FULLY ENTERED AND THE INNER SURFACES ARE REASONABLY FLUSH. AVERAGE JOINT GAP THAT EXCEEDS ½ INCH SHALL BE FILLED WITH AN APPROVED FLEXIBLE PLASTIC SEALANT.

9. JOINT RESTRAINTS AND TOE-WALLS CONFORMING TO CDOT M&S STANDARD PLAN NO. M-601-11 SHALL BE USED ON ALL RCP FLARED END SECTION OUTFALLS.

10. EPOXY COATED REBAR SHALL BE USED AS REINFORCING STEEL ON ALL STORM INLETS. REFERENCE CDOT M&S STANDARD NO. M-604-10, 11, 12, AND 13.

11. CDOT CLASS D CONCRETE SHALL BE USED FOR ALL CONCRETE DRAINAGE STRUCTURES.

12. PRE-CAST INLETS AND MANHOLE BASES SHALL NOT BE USED WITHIN THE TOWN OF PARKER RIGHT-OF-WAY, WITH THE EXCEPTION OF CDOT TYPE C AND D INLETS.

13. TWO (2) MANHOLE ACCESS JOINTS ARE REQUIRED ON ALL TYPE "R" CURB INLETS GREATER THAN OR EQUAL TO TEN (10) FEET IN LENGTH AS PRESENTED IN CDOT M&S STANDARD PLAN NO. M-604-12.

14. ALL GROUTING (BOULDERS, RIPRAP) SHALL BE IN ACCORDANCE WITH THE REVISION OF SECTION 506 OF THE CDOT STANDARD SPECIFICATIONS AS PRESENTED IN THE SDECM.

15. ALL BOULDERS AND RIPRAP SHALL BE SELECTED AND PLACED IN ACCORDANCE WITH THE REVISION OF SECTION 506 OF THE CDOT STANDARD SPECIFICATIONS AS PRESENTED IN THE SDECM.

16. CONTRACTOR SHALL REFER TO THE TOWN OF PARKER'S CONSTRUCTION BEST MANAGEMENT PRACTICES DETAILS AND NOTES FOR ALL REQUIREMENTS RELATING TO RE-VEGETATION, SEDIMENT AND EROSION CONTROL REQUIREMENTS FOR CONSTRUCTION ACTIVITIES.

SIGNAGE & STRIPING NOTES

1. SEE SIGNAGE & STRIPING PLAN FOR NOTES.

ROADWAY NOTES:

1. PAVING SHALL NOT COMMENCE UNTIL A SOILS REPORT AND PAVEMENT DESIGN IS APPROVED BY THE ENGINEERING DIVISION AND SUB-GRADE COMPACTION TESTS ARE SUBMITTED TO AND APPROVED BY THE DEVELOPMENT REVIEW ENGINEER.

2. STANDARD TOWN OF PARKER HANDICAP RAMPS ARE TO BE CONSTRUCTED AT ALL CURB RETURNS AND AT ALL "T" INTERSECTIONS.

3. ALL STATIONING IS BASED ON CENTERLINE OF ROADWAYS UNLESS OTHERWISE NOTED.

4. ALL ELEVATIONS ARE ON USGS DATUM WITH DATE. RANGE POINT OR MONUMENT SHALL BE SHOWN ON THE CONSTRUCTION PLANS.

5. EXCEPT WHERE OTHERWISE PROVIDED FOR IN THESE PLANS AND SPECIFICATIONS, THE COLORADO DEPARTMENT OF HIGHWAYS STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION, THE COLORADO DEPARTMENT OF HIGHWAYS M-STANDARDS, AND THE TOWN OF PARKER ROADWAY DESIGN AND CONSTRUCTION CRITERIA MANUAL, LATEST EDITION, SHALL APPLY.

MASTER LEGEND

PROPOSED SANITARY SEWER W/MANHOLE
PROPOSED WATERLINE W/ GATE VALVE
PROPOSED F.H. ASSEMBLY, GATE VALVE & TEE
EXISTING SANITARY SEWER W/ MANHOLE
EXISTING WATERLINE W/ GATE VALVE
EXISTING FH ASSEMBLY, GATE VALVE & TEE
EXISTING HIGH PRESSURE GAS LINE
PROPOSED STORM SEWER W/ MANHOLE
PROPOSED EOA, FL AND BOC
PROPOSED SIDEWALK
PROPOSED ROW
PROPOSED UTILITY EASEMENT
EXISTING TOP BACK OF CURB
EXISTING FLOWLINE
EXISTING LIP OF CURB/EDGE OF ASPHALT
EXISTING STORM INLET
PROPOSED STORM INLET
PROPOSED WATER SERVICE W/ CURBSTOP
PROPOSED SANITARY SERVICE
EXISTING WATER SERVICE W/ CURBSTOP
EXISTING SANITARY SERVICE
CAUTION! UTILITY CROSSING
PROPOSED CROSS PAN
EXISTING CROSS PAN
PROPOSED CONTOURS
EXISTING CONTOURS
EXISTING TELEPHONE LINE
EXISTING ELECTRIC LINE
EXISTING STORM
EXIST. OVERHEAD UTILITY
EXISTING POWER POLES
HP HIGH POINT
LP LOW POINT
TW TOP OF WALL ELEVATION
M.E. MATCH EXISTING
INDICATES PROPERTY CORNER ELEV. PER GRADING TEMPLATES
CUT/FILL LINE
FLOW DIRECTION ARROW
PROPOSED ASPHALT LIMITS
PROPOSED SIGN
PROPOSED STREET LIGHT

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

	DATE	REVISIONS	DRAWN BY
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C	6/24/16	3RD SUBMITTAL	
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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
GENERAL NOTES

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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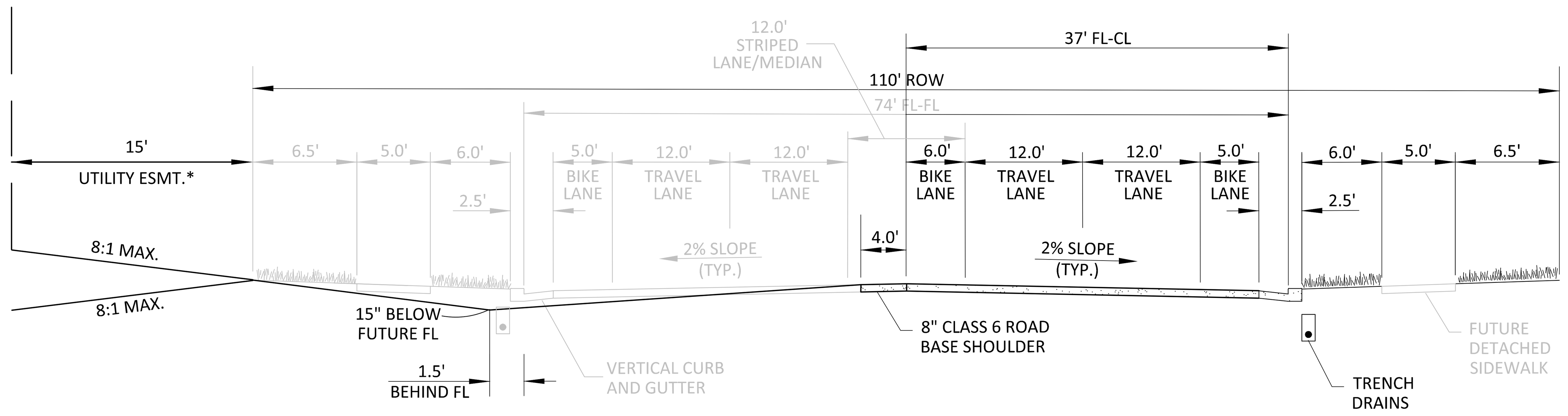


PARKER MAJOR COLLECTOR WITHIN DOUGLAS COUNTY JURISDICTION

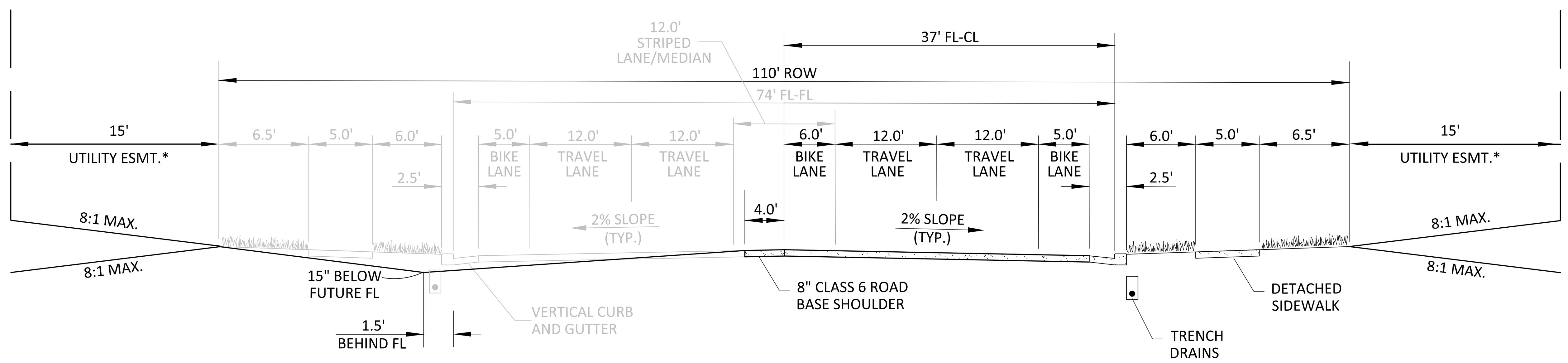
PROPOSED CONDITION

STA 13+93.54 - 44+00.69

*FUTURE IMPROVEMENTS ARE SHADED FOR REFERENCE

GENERAL NOTES:

1. TRENCH DRAINS ARE REQUIRED ON COLLECTOR STREETS, SEE STANDARD DETAIL 31.
2. ROW WIDTH SHOWN IS TYPICAL. ADDITIONAL ROW AND/OR LANES MAY BE REQUIRED BASED ON A TRAFFIC STUDY.
3. SEE STANDARD DETAIL 3 FOR TYPICAL CURB AND GUTTER INFORMATION.
4. SEE STANDARD DETAIL 4 FOR TYPICAL SIDEWALK INFORMATION.
5. *UTILITY EASEMENT WIDTH VARIES FROM TYPICAL AT CERTAIN LOCATIONS. SEE PLANS FOR LOCATION INFORMATION.



PARKER MAJOR COLLECTOR

PROPOSED CONDITION

STA 44+00.69 - 78+00

*FUTURE IMPROVEMENTS ARE SHADED FOR REFERENCE

GENERAL NOTES:

1. TRENCH DRAINS ARE REQUIRED ON COLLECTOR STREETS, SEE STANDARD DETAIL 31.
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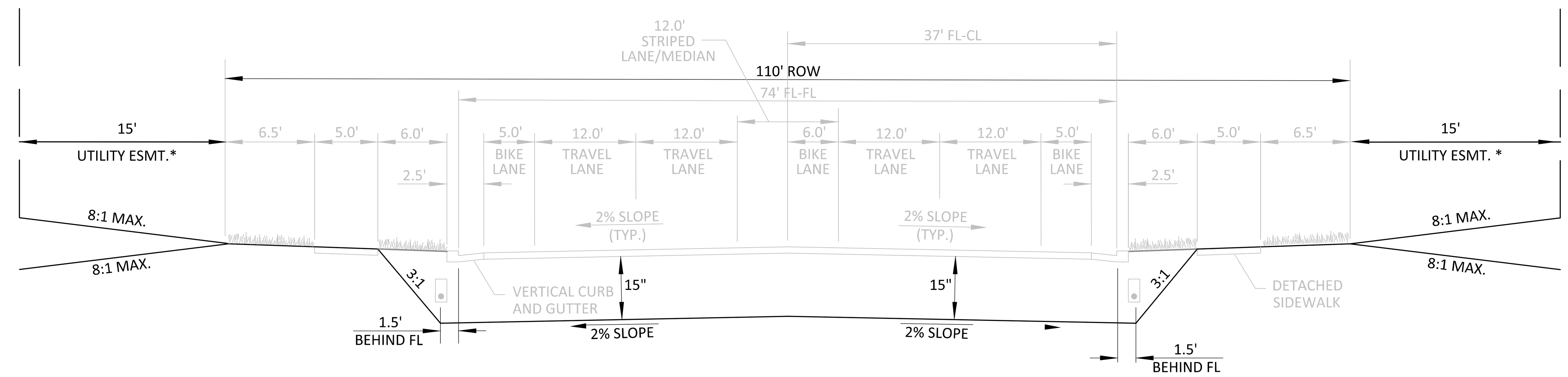
BELFORD AVENUE



UNDERCUT

PROPOSED CONDITION

STA 78+00 - 94+03.60

*FUTURE IMPROVEMENTS ARE SHADED FOR REFERENCE

GENERAL NOTES:

1. TRENCH DRAINS ARE REQUIRED ON COLLECTOR STREETS, SEE STANDARD DETAIL 31.
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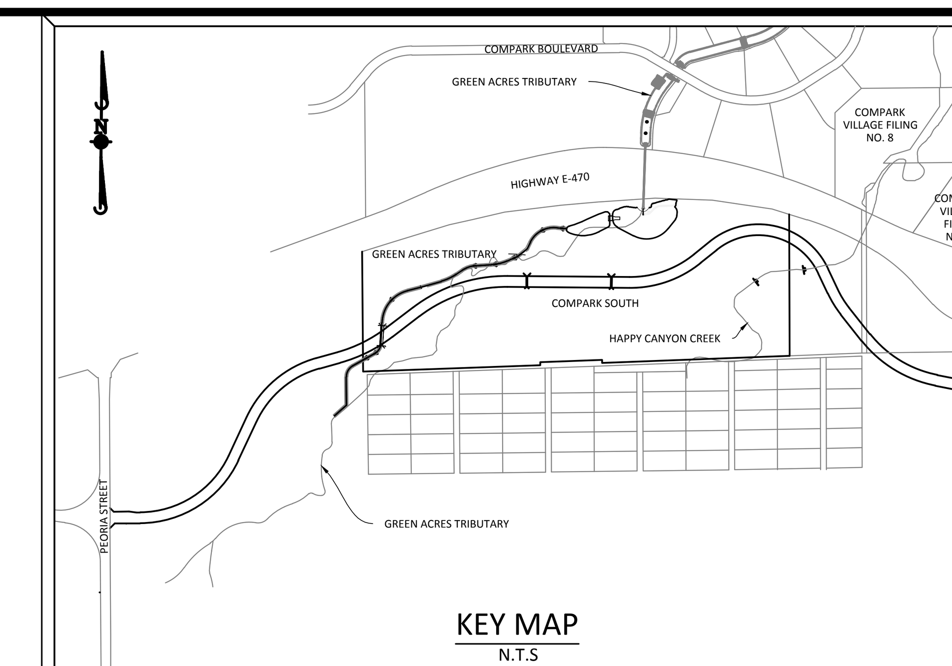

KEY MAP

N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

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TOWN OF PARKER, COLORADO

TYPICAL ROADWAY SECITON

TOWN OF PARKER APPROVALS

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DATE: 12/2015

SHEET 3 OF 40

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Index			Contract	Contract Item	Unit	Roadway														Project Tools	
Book	Page	Sheet	Item No.			Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.	Plan	As Const.
			201	CLEARING AND GRUBBING	LS	XXX																XXX	
			201	REMOVAL OF SIDEWALK	SY	XXX																XXX	
			201	REMOVAL OF CURB AND GUTTER	LF	XXX																XXX	
			201	REMOVAL OF GUTTER	LF	XXX																XXX	
			201	REMOVAL OF CONCRETE PAVEMENT	SY	XXX																XXX	
			201	REMOVAL OF ASPHALT MIX	SY	XXX																XXX	
			201	REMOVAL OF PAVEMENT MARKING	SF	XXX																XXX	
			201	REMOVAL OF LIGHT STANDARD	EACH	XXX																XXX	
			201	REMOVAL OF GROUND SIGN	EACH	XXX																XXX	
			201	REMOVAL OF SIGN PANEL	EACH	XXX																XXX	
			201	REMOVAL OF TRAFFIC SIGN HEAD	EACH	XXX																XXX	
			203	UNCLASSIFIED EXCAVATION (COMPLETE IN PLACE)	CY	XXX																XXX	
			203	POTHOLING	HOUR	XXX																XXX	
			207	TOPSOIL (STOCKPILE AND REDISTRIBUTE)	CY	XXX																XXX	
			208	EROSION CONTROL SUPERVISOR	LS	XXX																XXX	
			208	SILT FENCE	LF	XXX																XXX	
			208	SEDIMENT TRAP	EACH	XXX																XXX	
			208	CHECK DAM	LF	XXX																XXX	
			208	CONCRETE WASHOUT STRUCTURE	EACH	XXX																XXX	
			208	INLET PROTECTION	EACH	XXX																XXX	
			208	STABILIZED CONSTRUCTION ENTRANCE (VEHICLE TRACKING CONTROL)	EACH	XXX																XXX	
			208	STABILIZED STAGING AREA	SY	XXX																XXX	
			208	REINFORCED ROCK BERM	LF	XXX																XXX	
			208	REINFORCED ROCK BERM (FOR CULVERT PROTECTION)	LF	XXX																XXX	
			208	SEDIMENT CONTROL LOG (12 INCH)	LF	XXX																XXX	
			210	RESET GROUND SIGN	EACH	XXX																XXX	
			210	RESET SIGN PANEL	EACH	XXX																XXX	
			210	RESET TRAFFIC SIGNAL LIGHT POLE	EACH	XXX																XXX	
			210	RESET TRAFFIC SIGNAL HEAD	EACH	XXX																XXX	
			210	RESET PEDESTRIAN HEAD	EACH	XXX																XXX	

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TOWN OF PARKER, COLORADO
QUANTITY TABULATION

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SHEET 4 OF 40
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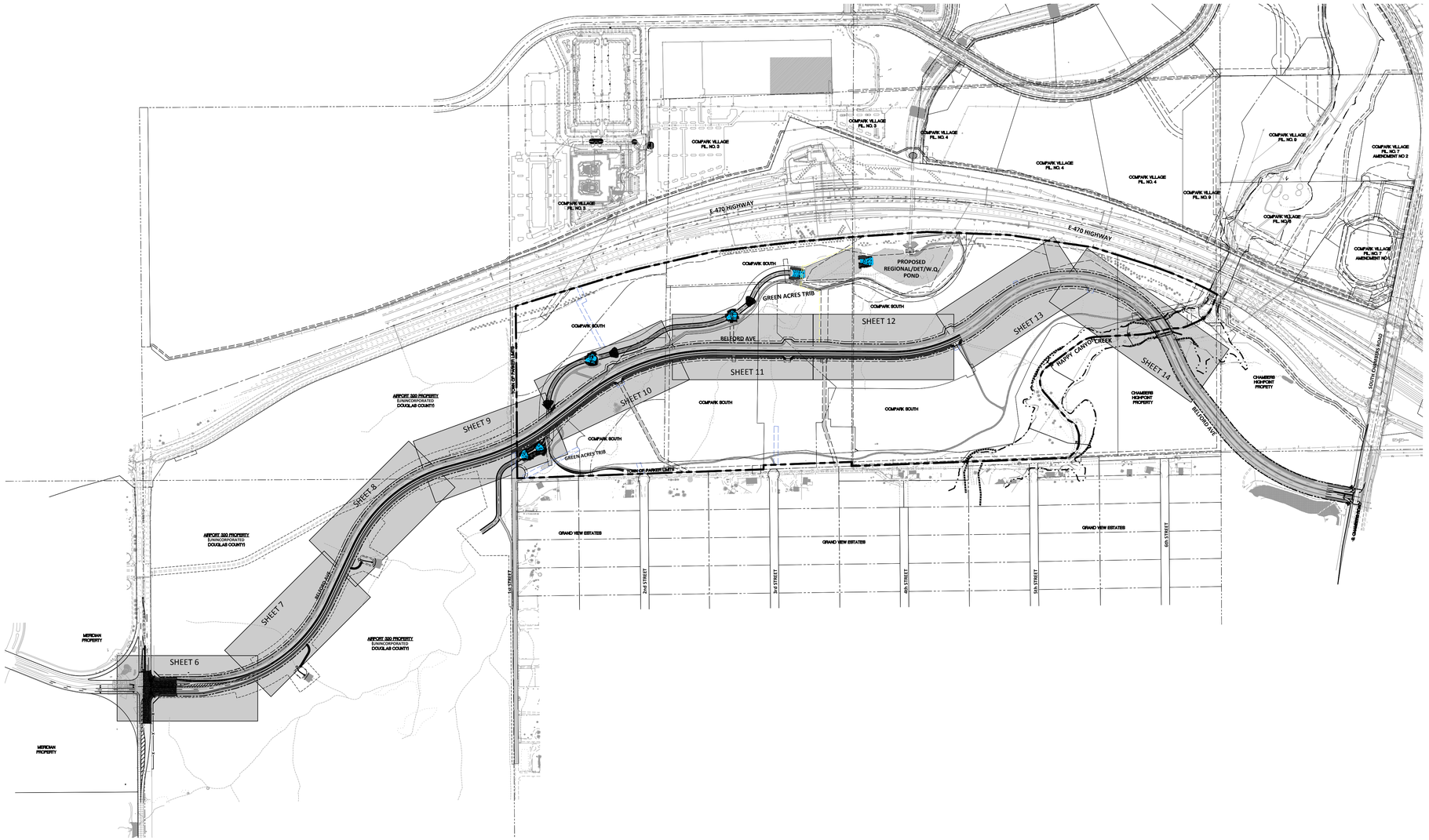

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SCALE: 1"=###'

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TOWN OF PARKER, COLORADO

STREET INDEX SHEET

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SHEET 5 OF 40

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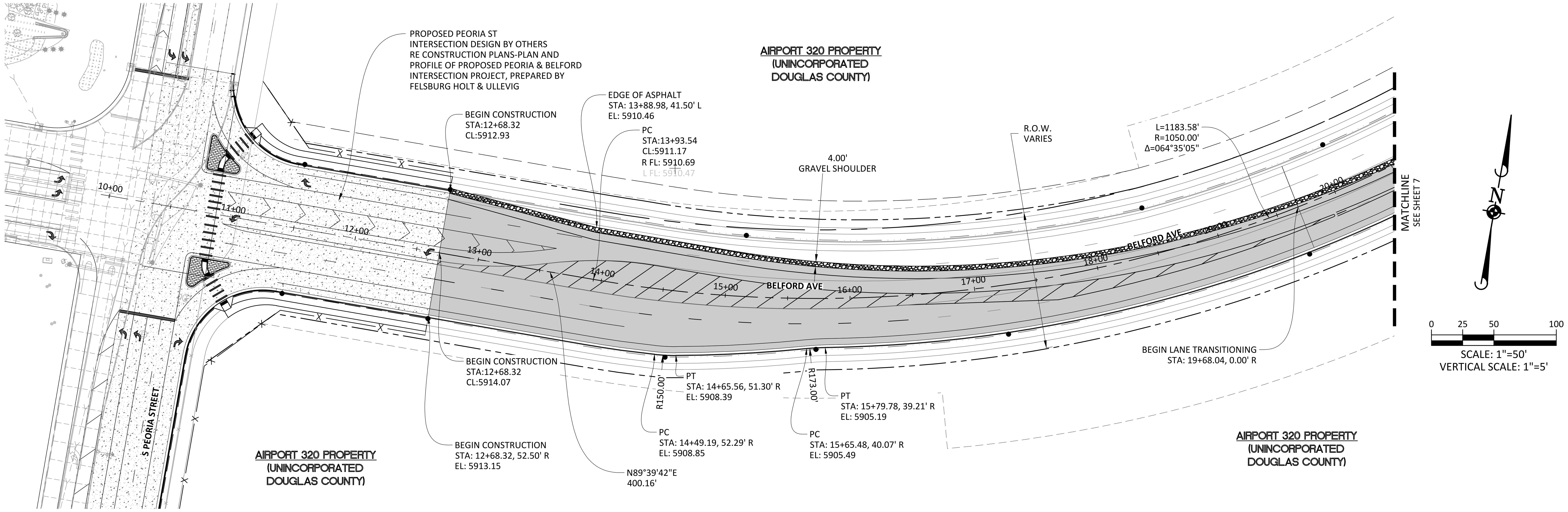

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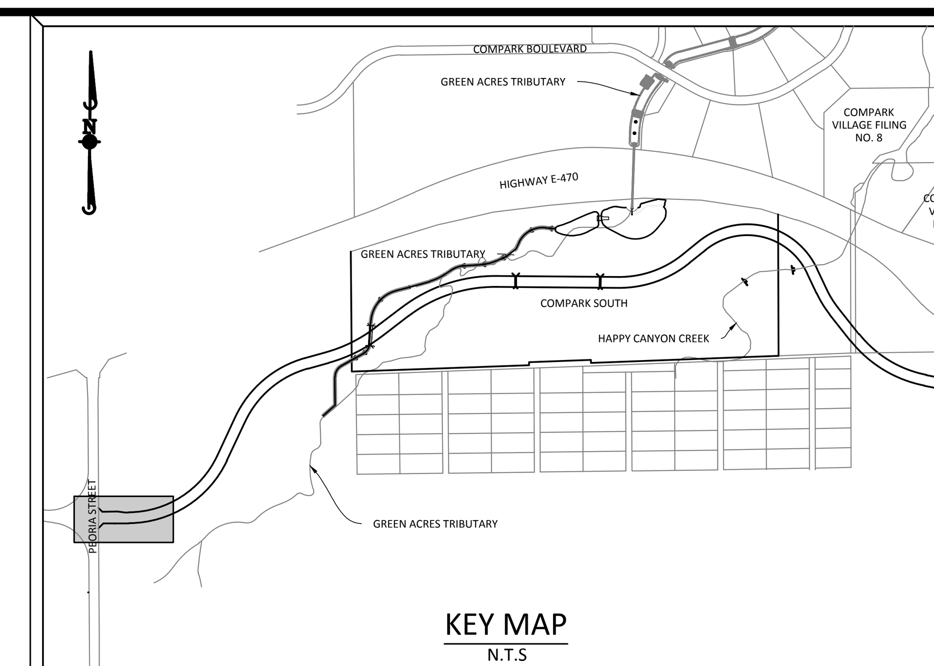
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

PLAN: BELFORD AVENUE

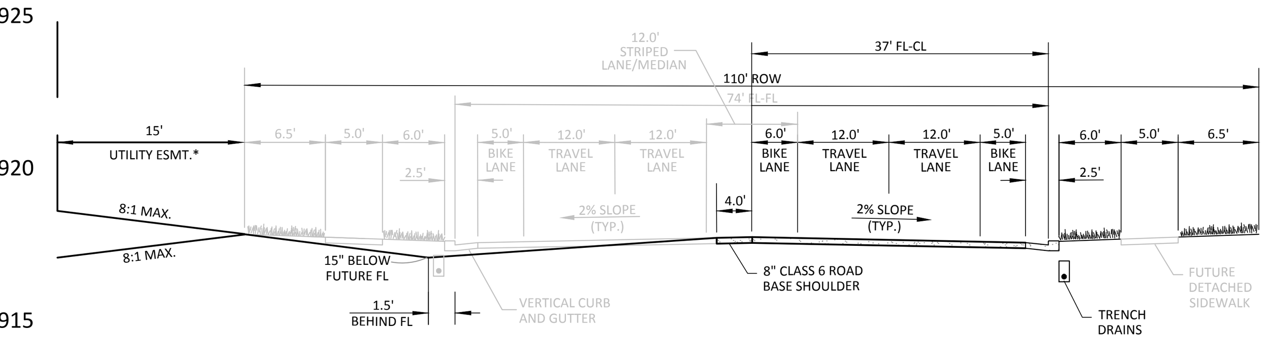


SOURCE BENCHMARKS:

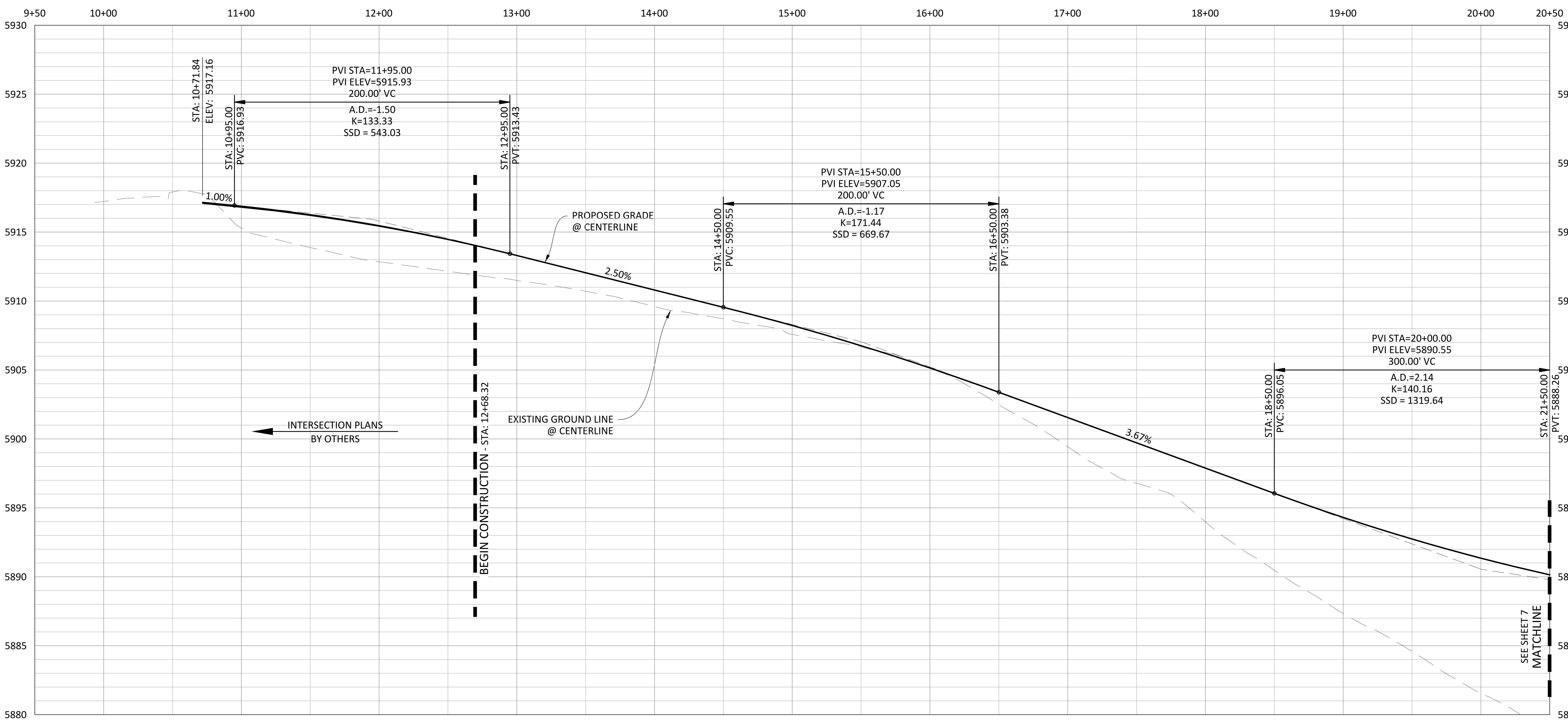
DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

NOTES:

1) REFER TO GENERAL NOTES ON SHEET 2 FOR ALL APPLICABLE CONSTRUCTION STANDARDS & MASTER LEGEND
2) ALL STATIONING IS CENTERLINE UNLESS OTHERWISE NOTED.REFER TO FINAL PLAT FOR RIGHT-OF-WAY AND CENTERLINE DIMENSIONS AND HORIZONTAL CONTROL.
3) ALL ELEVATIONS ARE FL UNLESS OTHERWISE NOTED. TC INDICATES BACK OF WALK FOR COMBINATION CURB, GUTTER, AND WALK, OR TOP OF CURB FOR CURB AND GUTTER.
4) REFER TO STONEGATE VILLAGE METRO DISTICT APPROVED WATER AND SANITARY SEWER CONSTRUCTION PLANS FOR ALL PROPOSED WATER AND SANITARY SEWER LOCATIONS.
5) TFI INDICATES TOP FRONT OF INLET ELEVATION. TFI ELEVATIONS SHOWN ON INLETS IN PLAN VIEW ARE AT FRONT CORNERS OF INLET. REFER TO SPECIFIC INLET DETAILS ON STORM SEWER PLAN AND PROFILE.
6) *EASEMENT WIDTH VARIES. SEE PLAT FOR LOCATION AND WIDTH INFORMATION.
7) REFER TO SHEET 35-36 FOR STREET AND CURB DETAILS.REFER TO SHEET 37-39 FOR STORM SEWER DETAILS.



PARKER MAJOR COLLECTOR WITHIN DOUGLAS COUNTY JURISDICTION
PROPOSED CONDITION



PROFILE: BELFORD AVENUE

0 25 50 100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

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SHEET 6 OF 40
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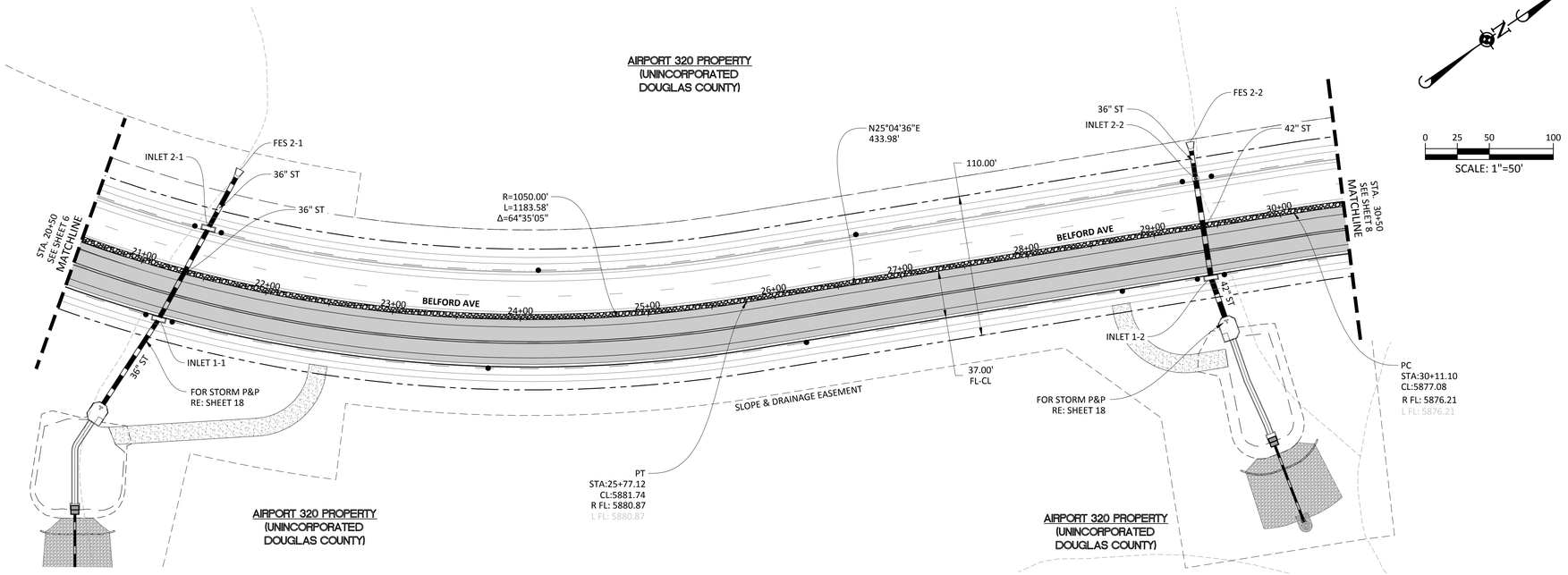
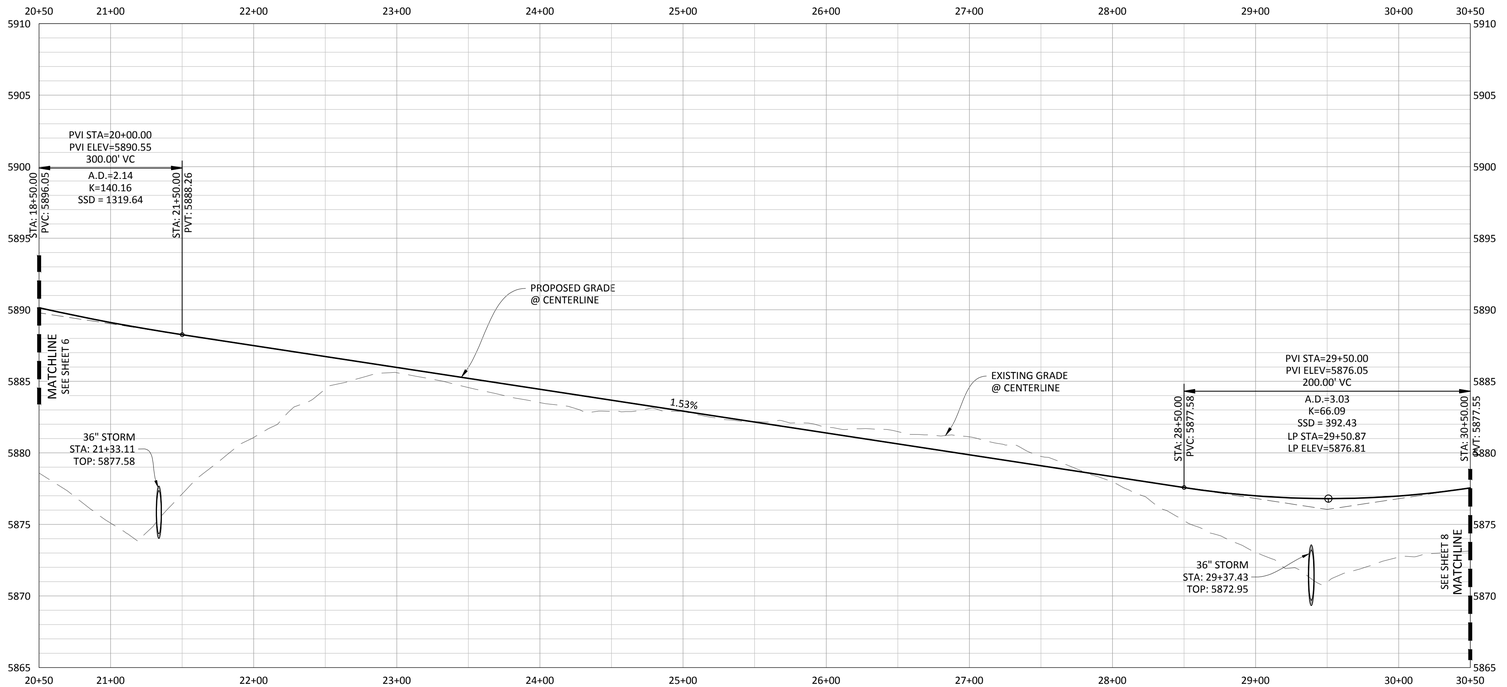
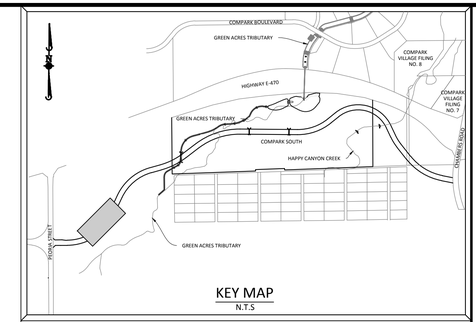


PLAN: BELFORD AVENUE



PROFILE: BELFORD AVENUE



KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

NOTES:

1) REFER TO GENERAL NOTES ON SHEET 2 FOR ALL APPLICABLE CONSTRUCTION STANDARDS & MASTER LEGEND

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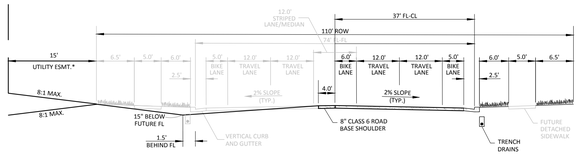
6) *EASEMENT WIDTH VARIES. SEE PLAT FOR LOCATION AND WIDTH INFORMATION.

7) REFER TO SHEET 35-36 FOR STREET AND CURB DETAILS.REFER TO SHEET 37-39 FOR STORM SEWER DETAILS.



PARKER MAJOR COLLECTOR WITHIN
DOUGLAS COUNTY JURISDICTION
PROPOSED CONDITION

0
25
50
100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
		ETG
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4/14/16	B. 2ND SUBMITTAL	
11/2015	A. 1ST SUBMITTAL	

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
7 OF 40
CLCPKC3 ---

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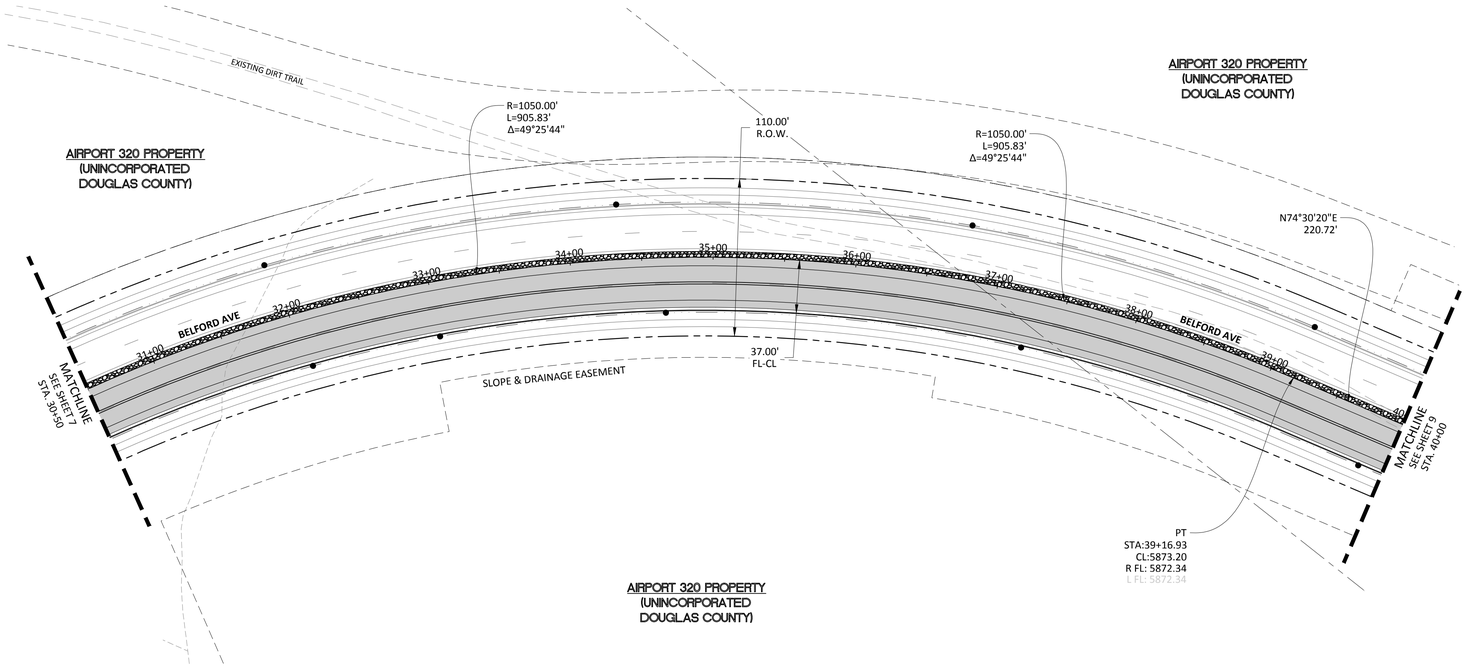
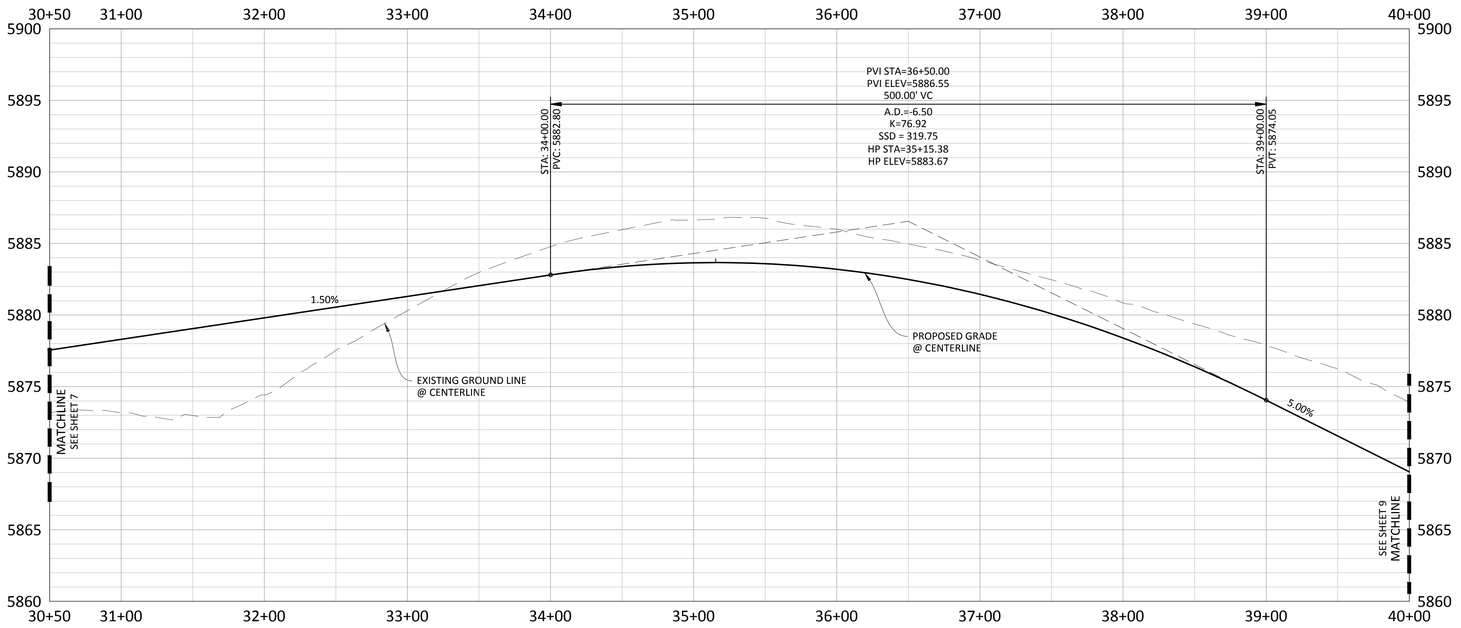
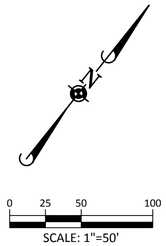
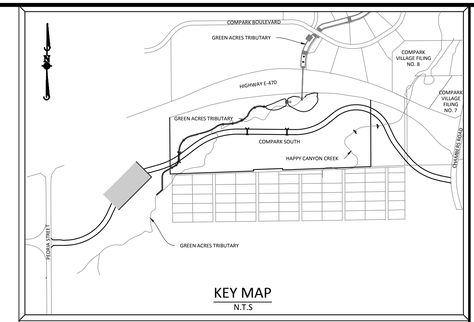


PLAN: BELFORD AVENUE



PROFILE: BELFORD AVENUE





KEY MAP
N.T.S

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DOUGLAS COUNTY BM 1.115010
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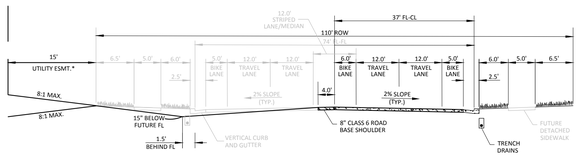
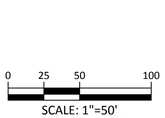


PARKER MAJOR COLLECTOR WITHIN
DOUGLAS COUNTY JURISDICTION
PROPOSED CONDITION



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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
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B 4/14/16	2ND SUBMITTAL	ETG
A 1/12/015	1ST SUBMITTAL	ETG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
8 OF 40
CLCPKC3 ---

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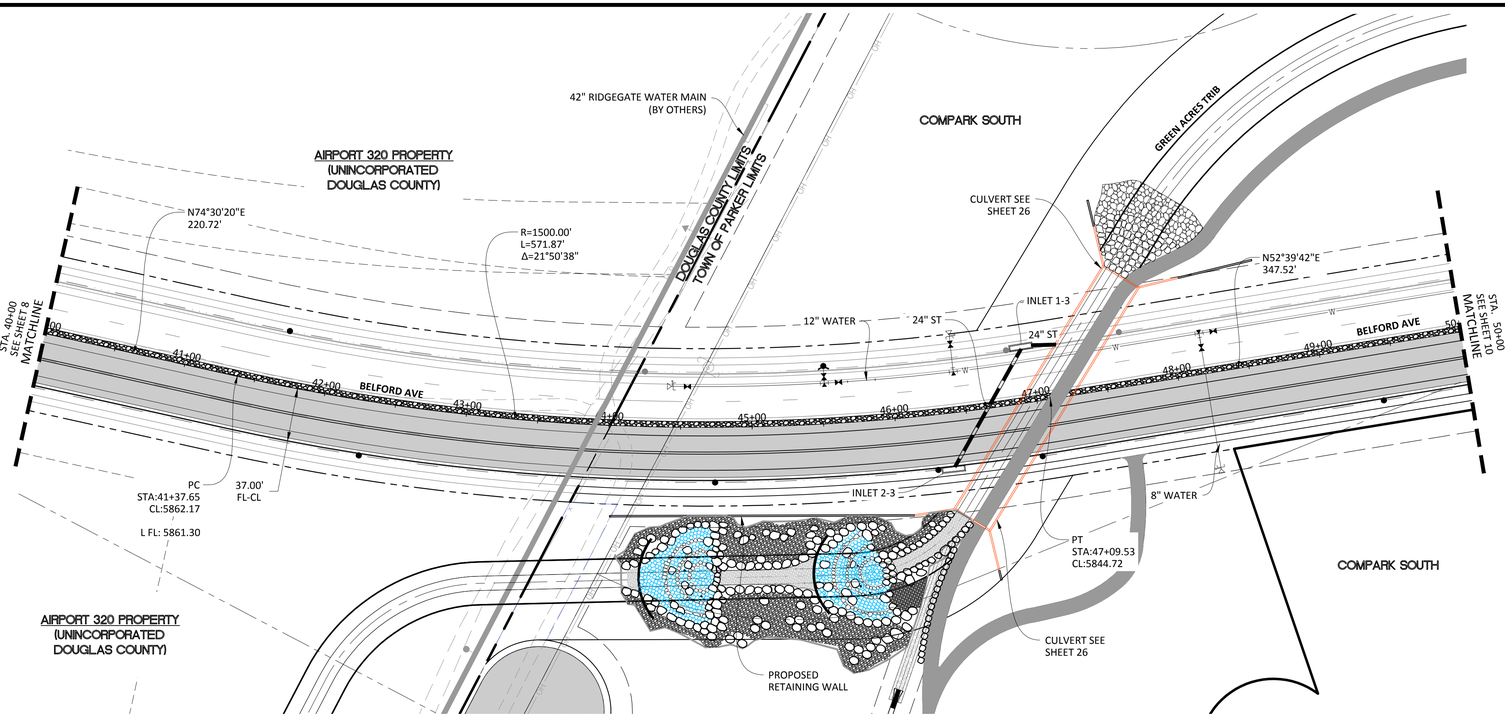
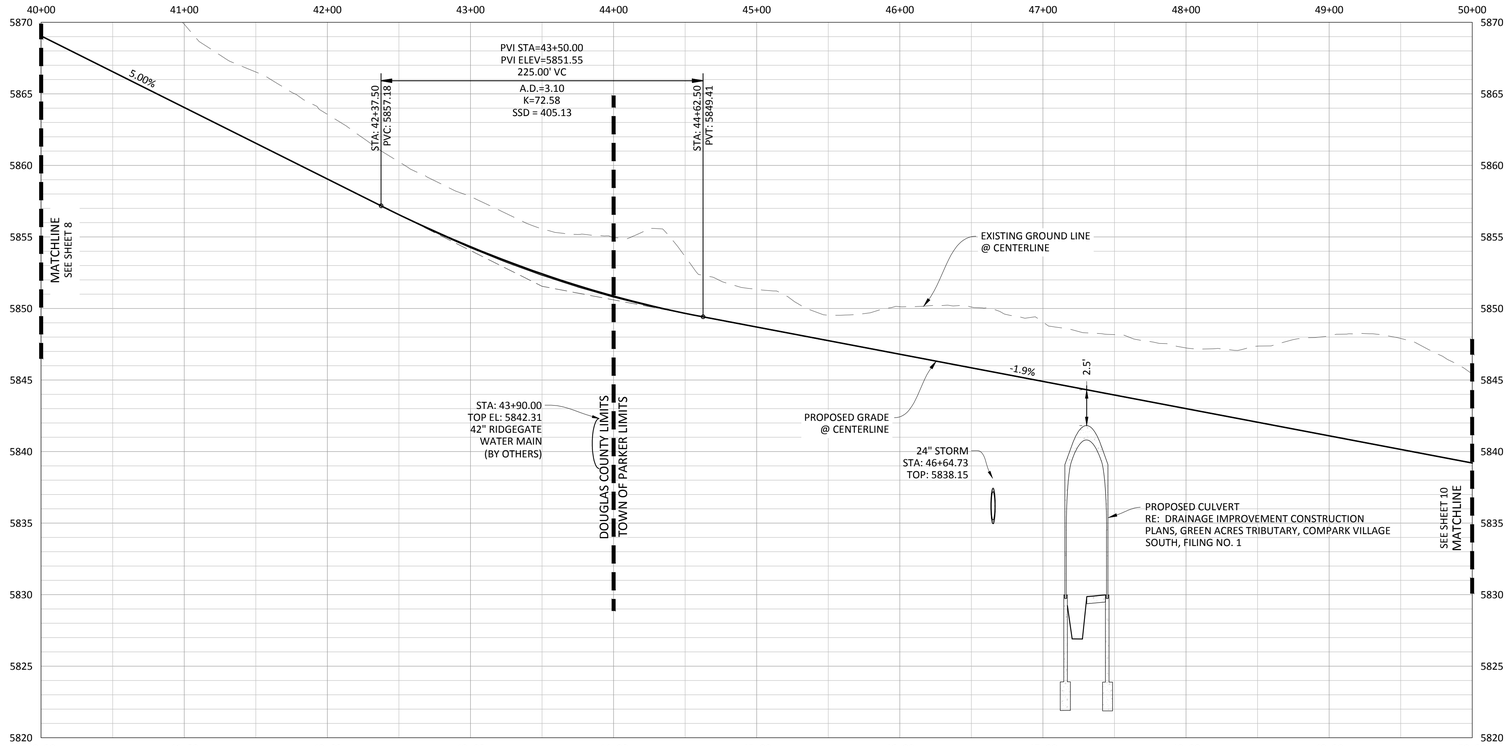
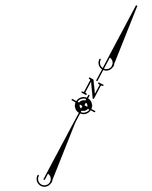


PLAN: BELFORD AVENUE



PROFILE: BELFORD AVENUE



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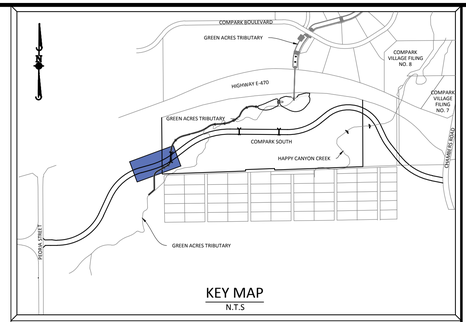

KEY MAP
N.T.S

SOURCE BENCHMARKS:

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A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

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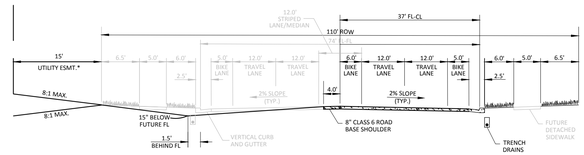
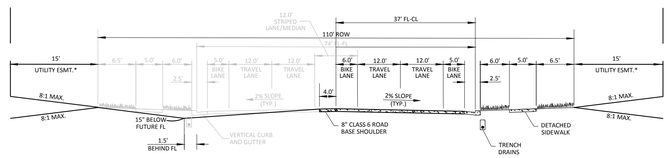


PARKER MAJOR COLLECTOR WITHIN
DOUGLAS COUNTY JURISDICTION
PROPOSED CONDITION



PARKER MAJOR COLLECTOR
PROPOSED CONDITION

*FUTURE IMPROVEMENTS ARE SHADED FOR REFERENCE

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0 25 50 100

SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING — DATE

DATE	REVISIONS	DRAWN BY
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A 11/2015	1ST SUBMITTAL	

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
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SHEET 9 OF 40
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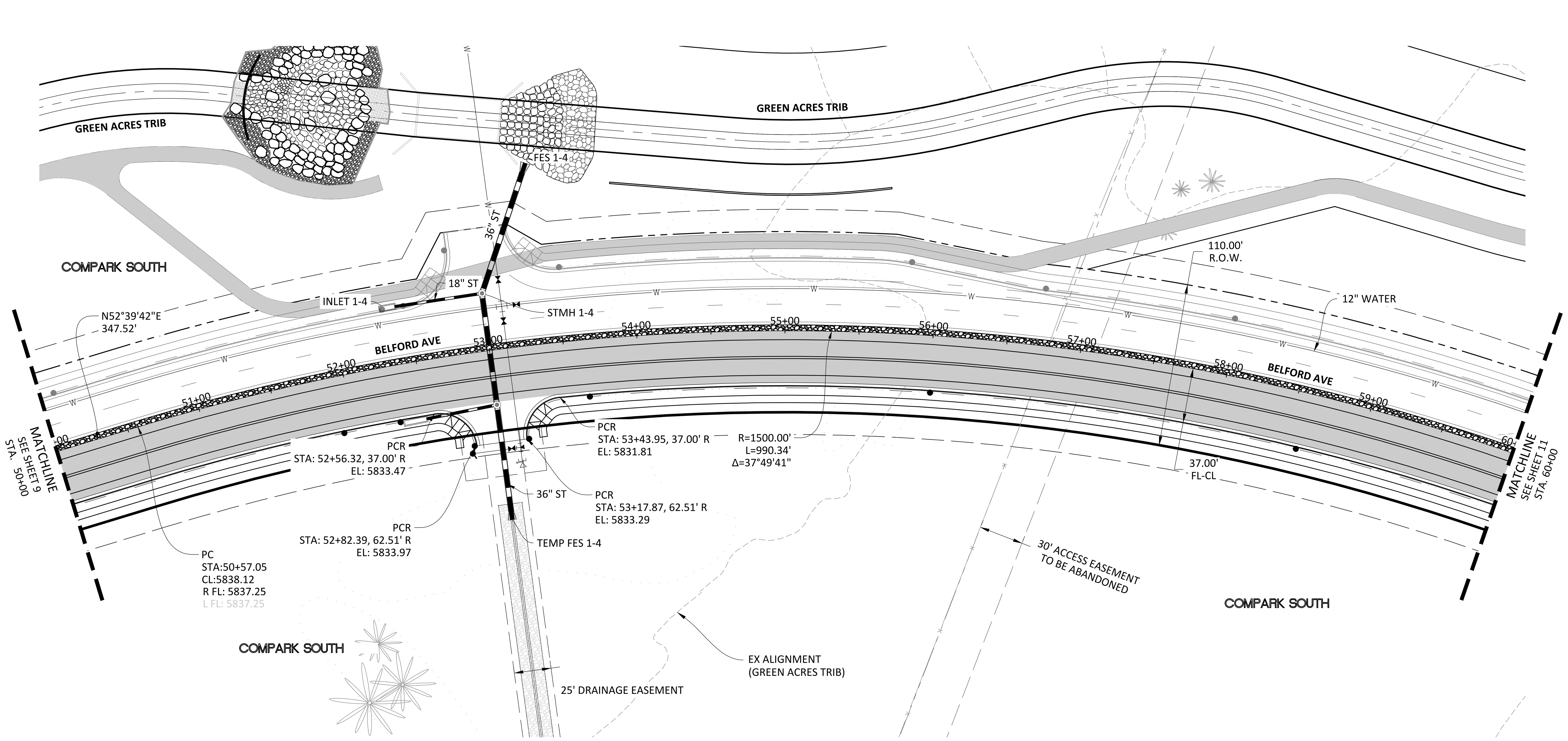

PLAN: BELFORD AVENUE

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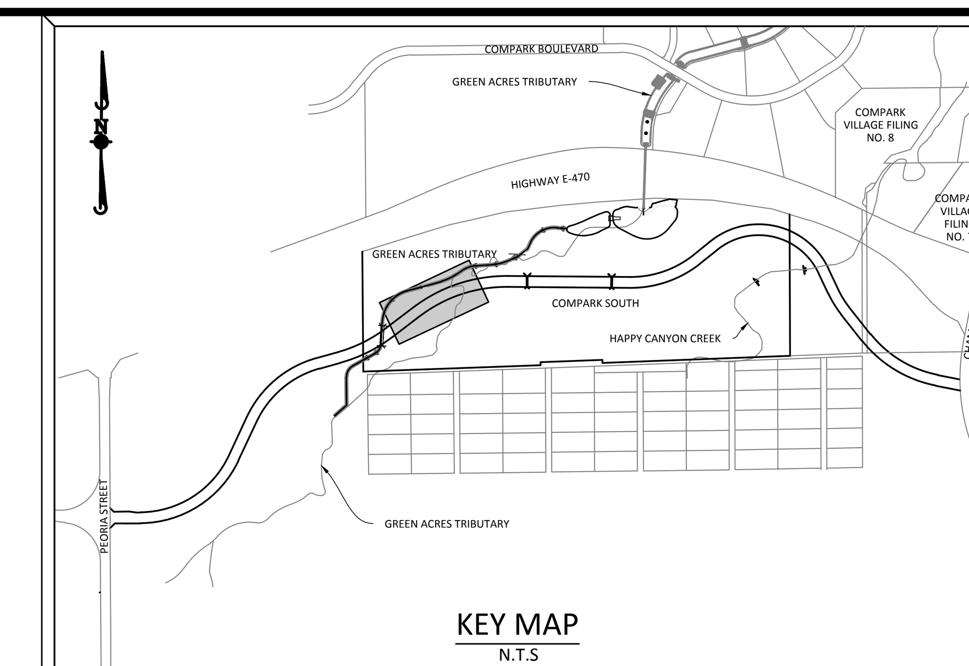
SCALE: 1"=50'



KEY MAP
N.T.S

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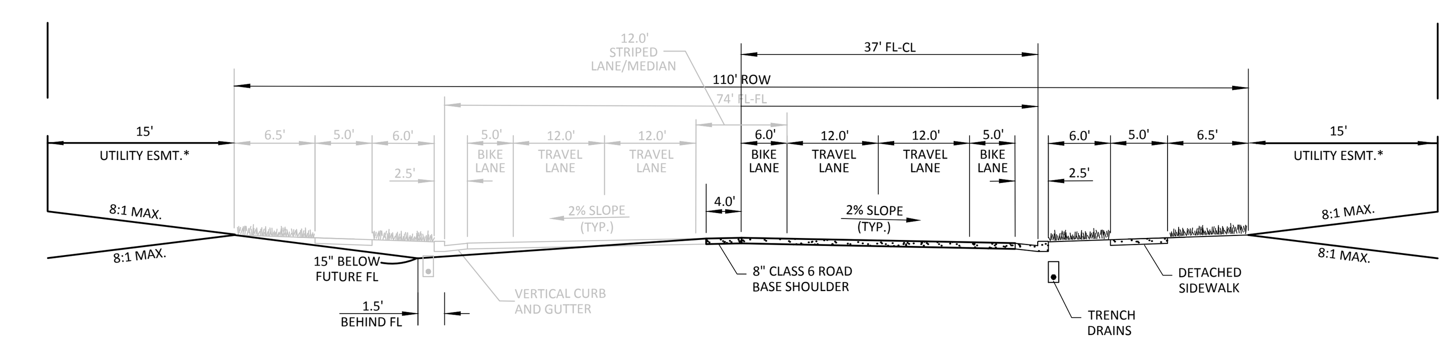
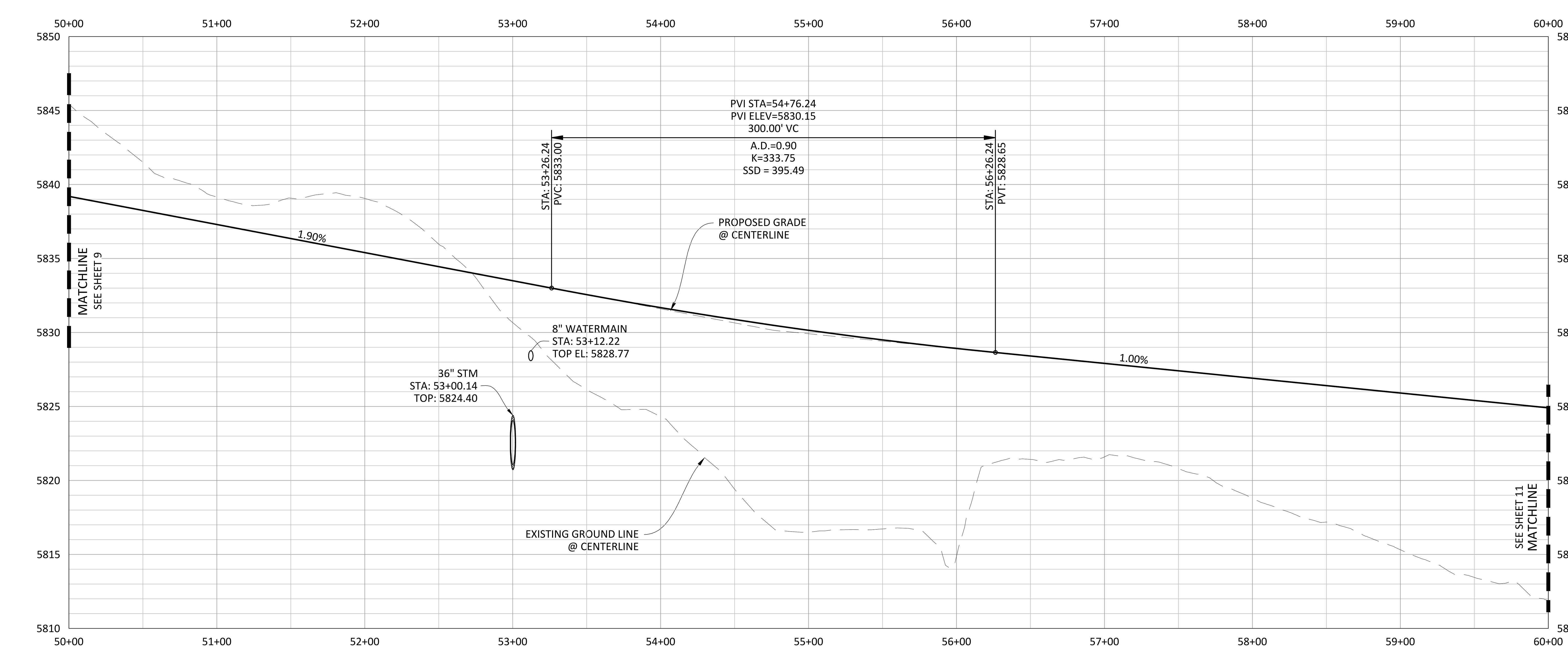


PARKER MAJOR COLLECTOR
PROPOSED CONDITION



PROFILE: BELFORD AVENUE

0 25 50 100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 10 OF 40
CLCPKC3 ---

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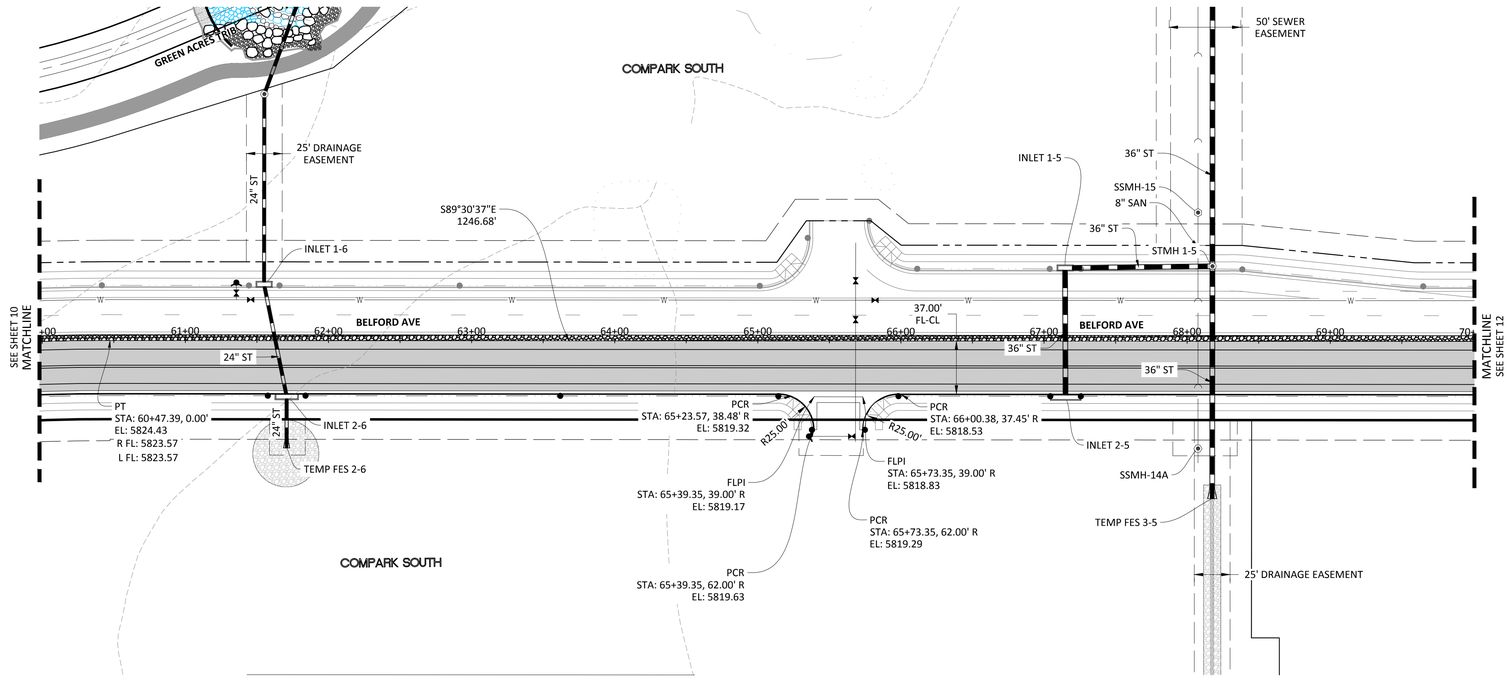
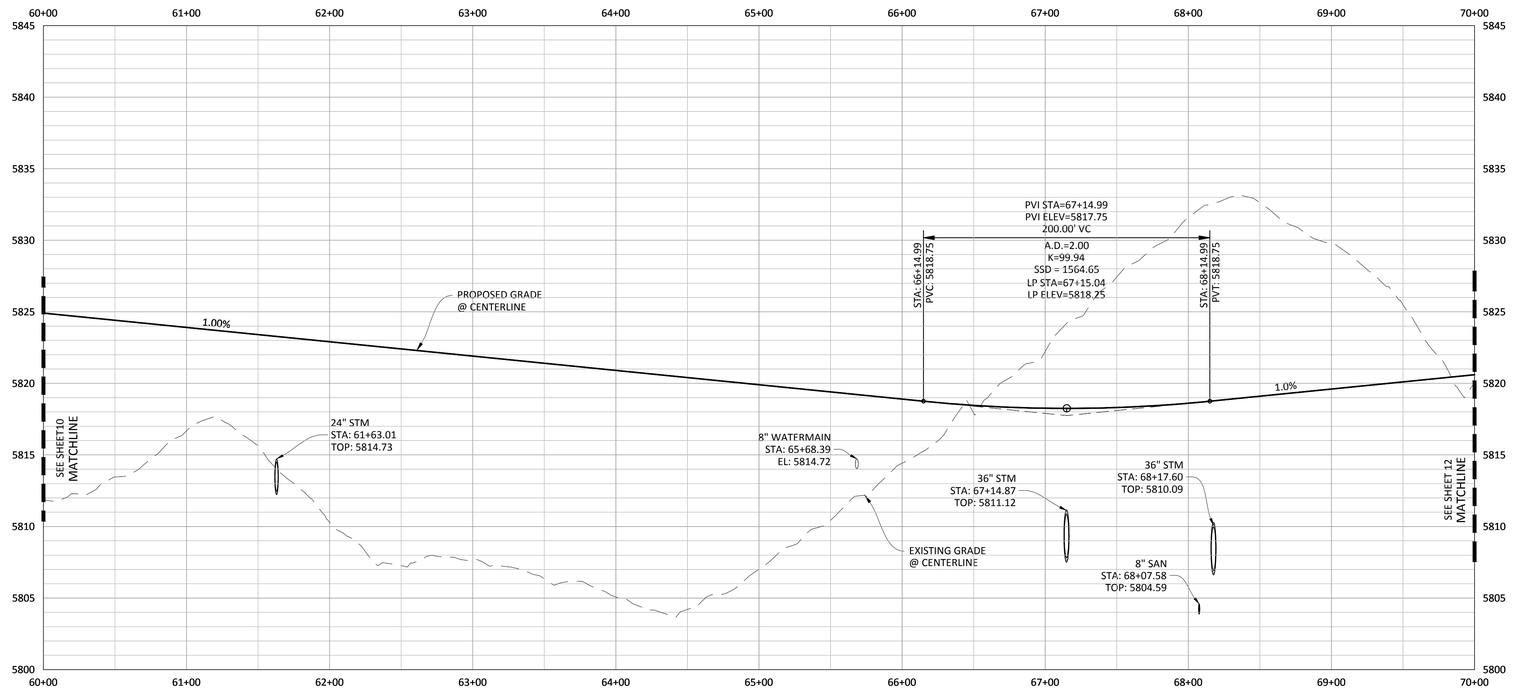
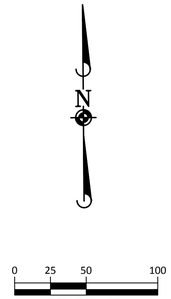


PLAN: BELFORD AVENUE



PROFILE: BELFORD AVENUE



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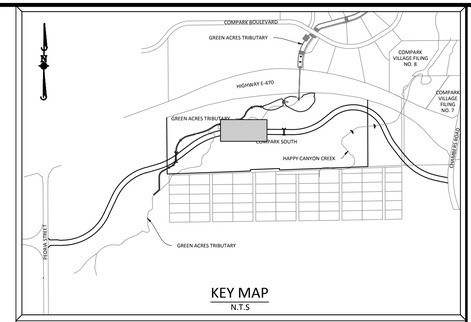

KEY MAP

N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

NOTES:

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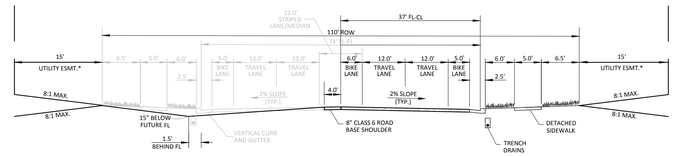
7) REFER TO SHEET 35-36 FOR STREET AND CURB DETAILS.REFER TO SHEET 37-39 FOR STORM SEWER DETAILS.



PARKER MAJOR COLLECTOR

PROPOSED CONDITION

0 25 50 100

SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

811 Know what's below. Call before you dig.

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
		ETG
C 6/24/16	3RD SUBMITTAL	
B 4/15/16	2ND SUBMITTAL	
A 11/2015	1ST SUBMITTAL	

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 11 OF 40

CLCPKC3 ---

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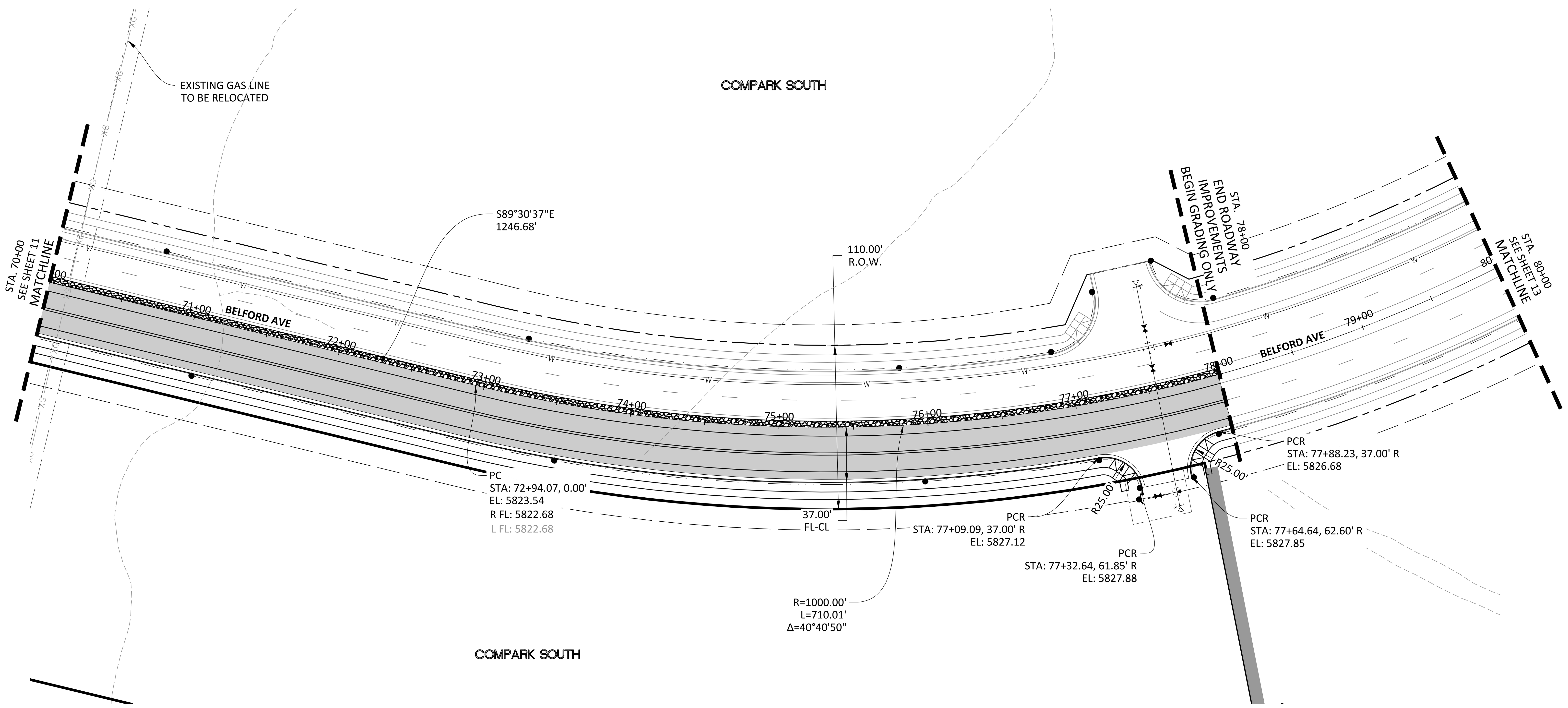

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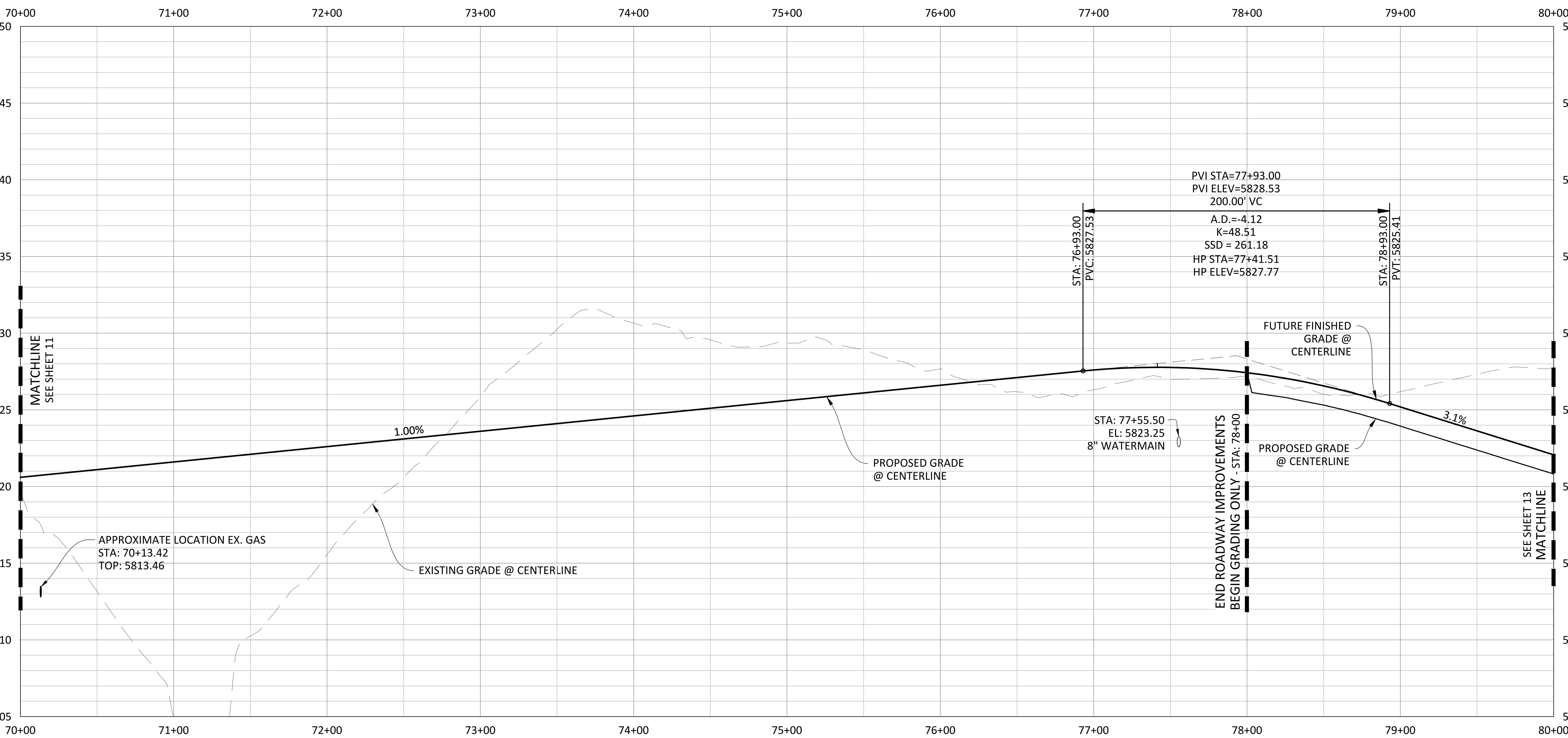
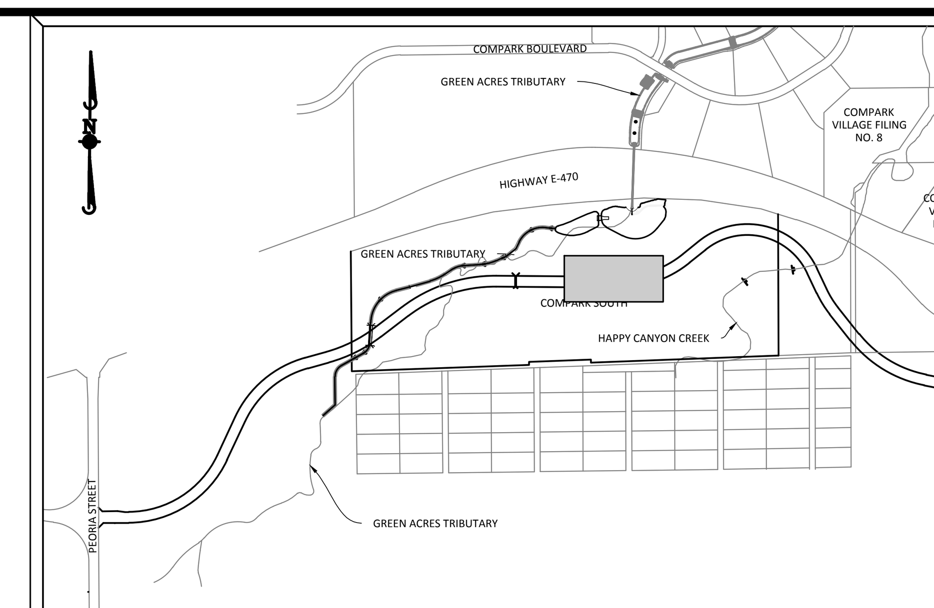
SCALE: 1"=50'

PLAN: BELFORD AVENUE



PROFILE: BELFORD AVENUE



KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
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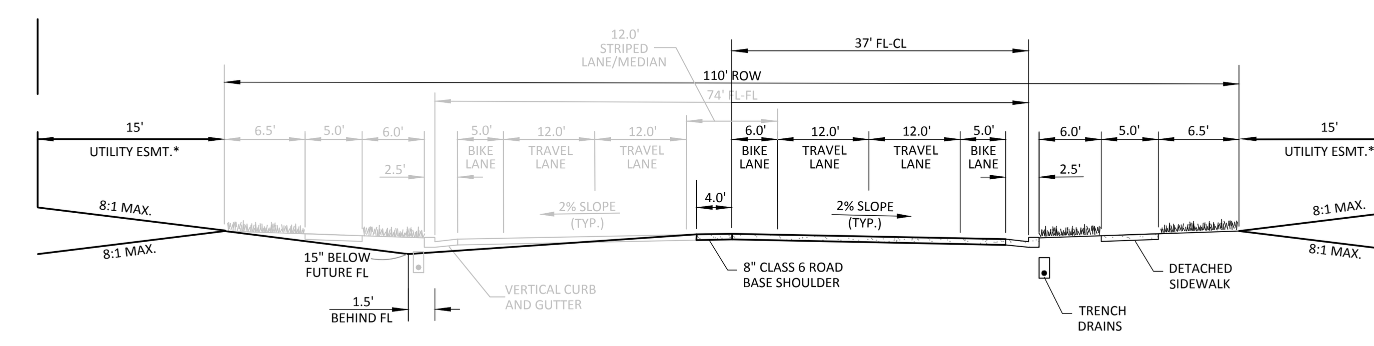
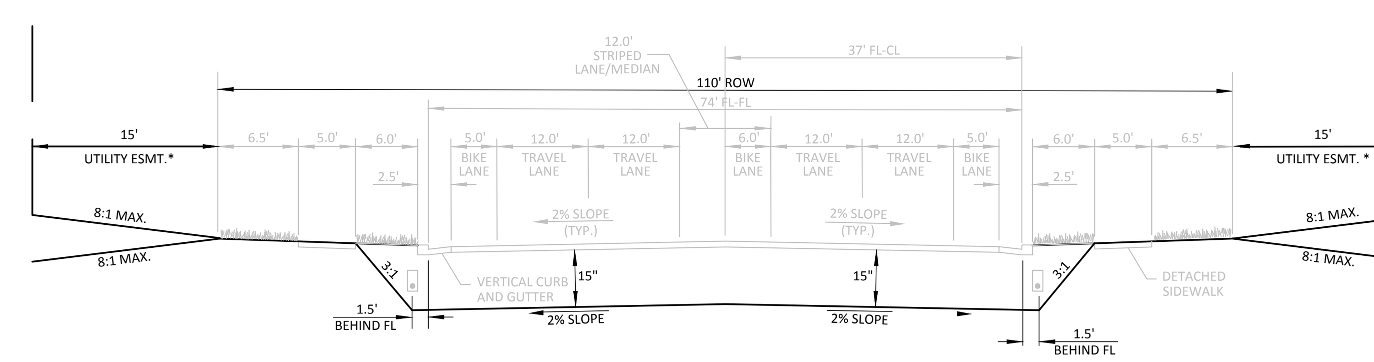


PARKER MAJOR COLLECTOR
PROPOSED CONDITION



UNDERCUT
PROPOSED CONDITION

0 25 50 100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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B	4/11/16	2ND SUBMITTAL	
A	11/2015	1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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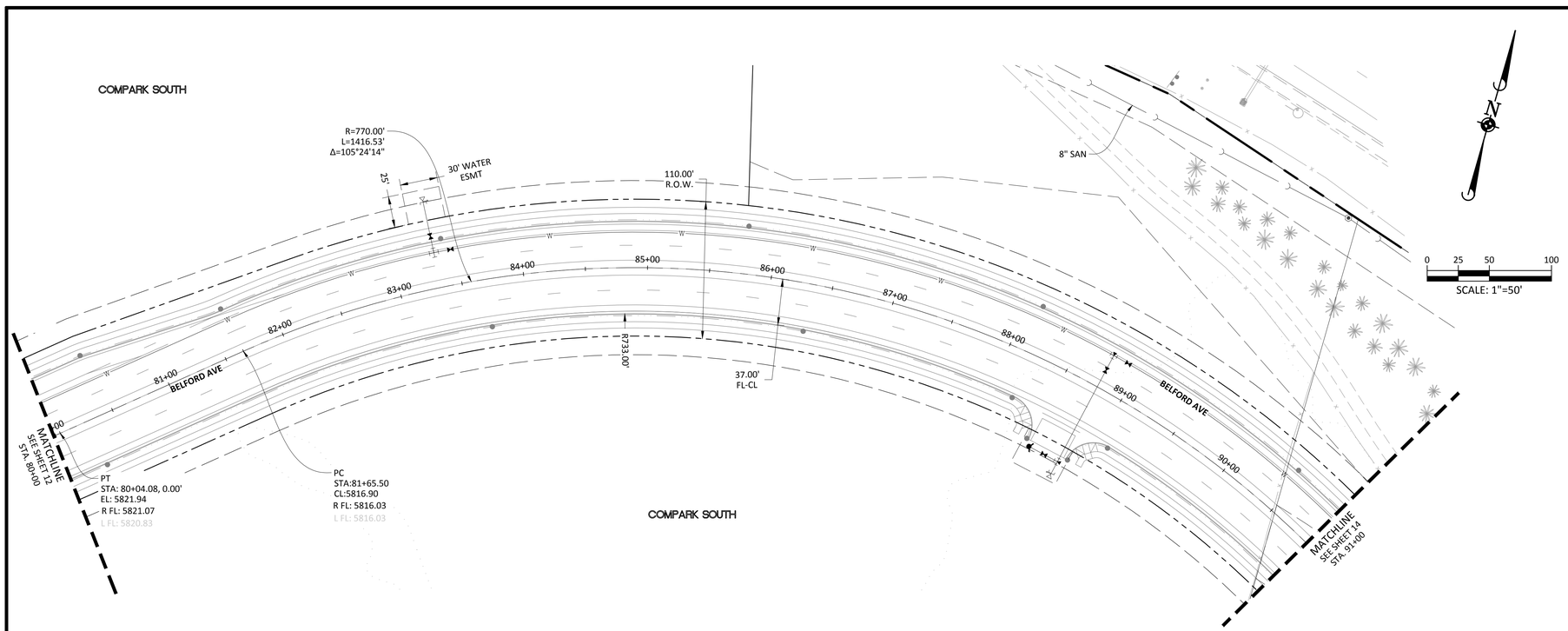
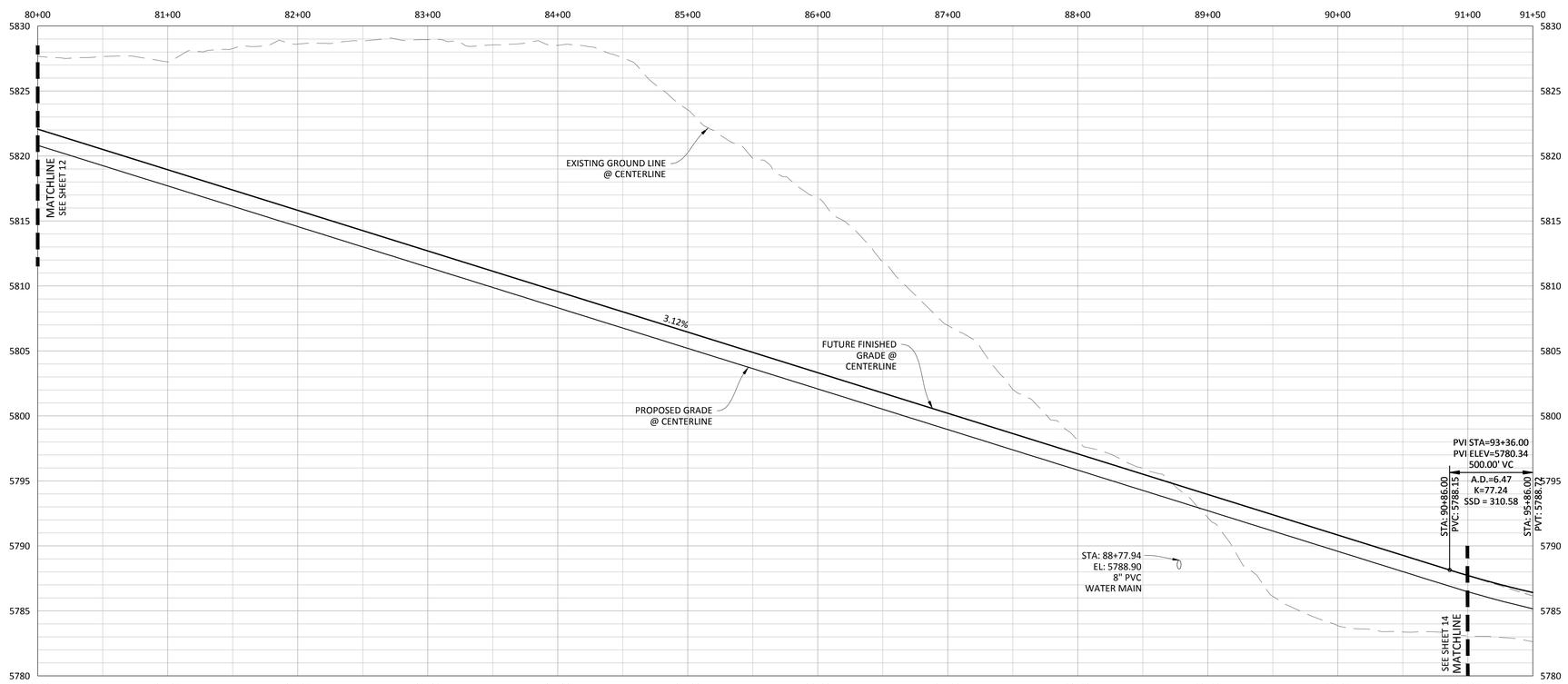
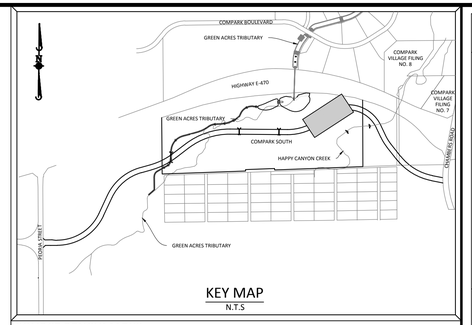


PLAN: FUTURE BELFORD AVENUE



PROFILE: BELFORD AVENUE



KEY MAP
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0 25 50 100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DRAWN BY	REVISIONS	DATE
ETG	C 3RD SUBMITTAL	6/24/16
	B 2ND SUBMITTAL	4/14/16
	A 1ST SUBMITTAL	11/2015

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
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DATE: 12/2015

SHEET
13 OF 40
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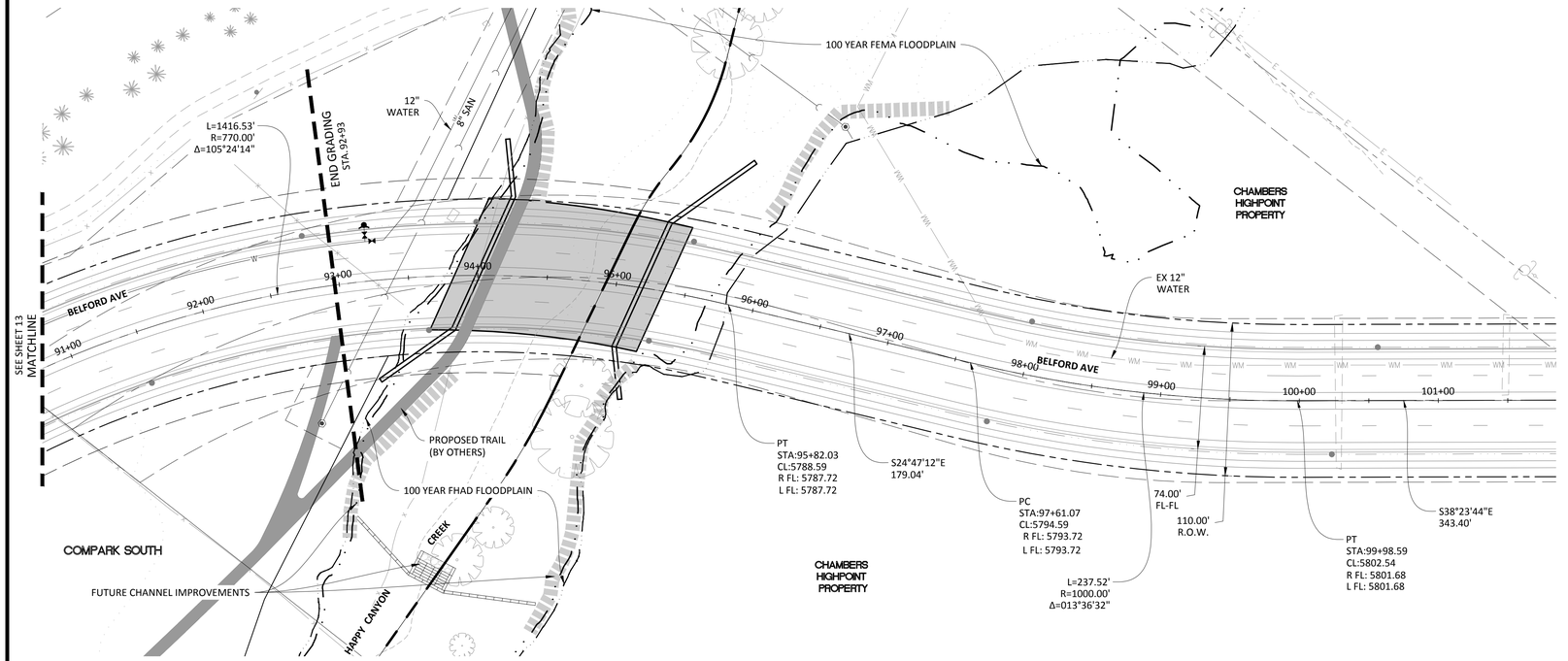
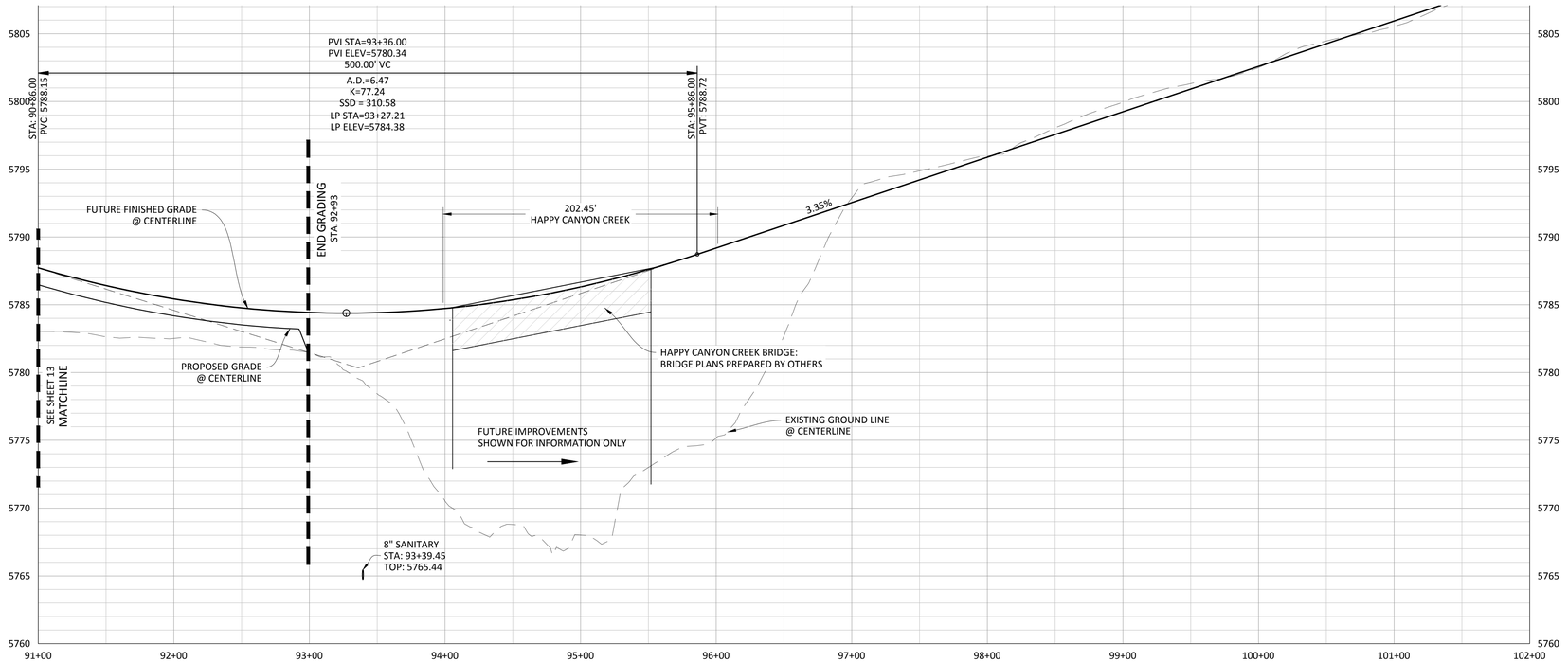
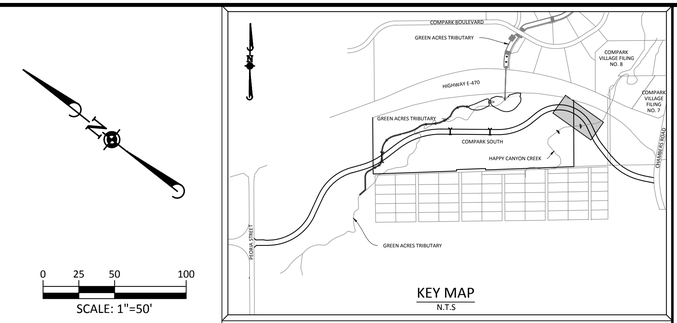


PLAN: FUTURE BELFORD AVENUE



PROFILE: BELFORD AVENUE



KEY MAP
N.T.S

0 25 50 100
SCALE: 1"=50'

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DRAWN BY	REVISIONS	DATE
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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

BELFORD AVENUE - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
14 OF 40
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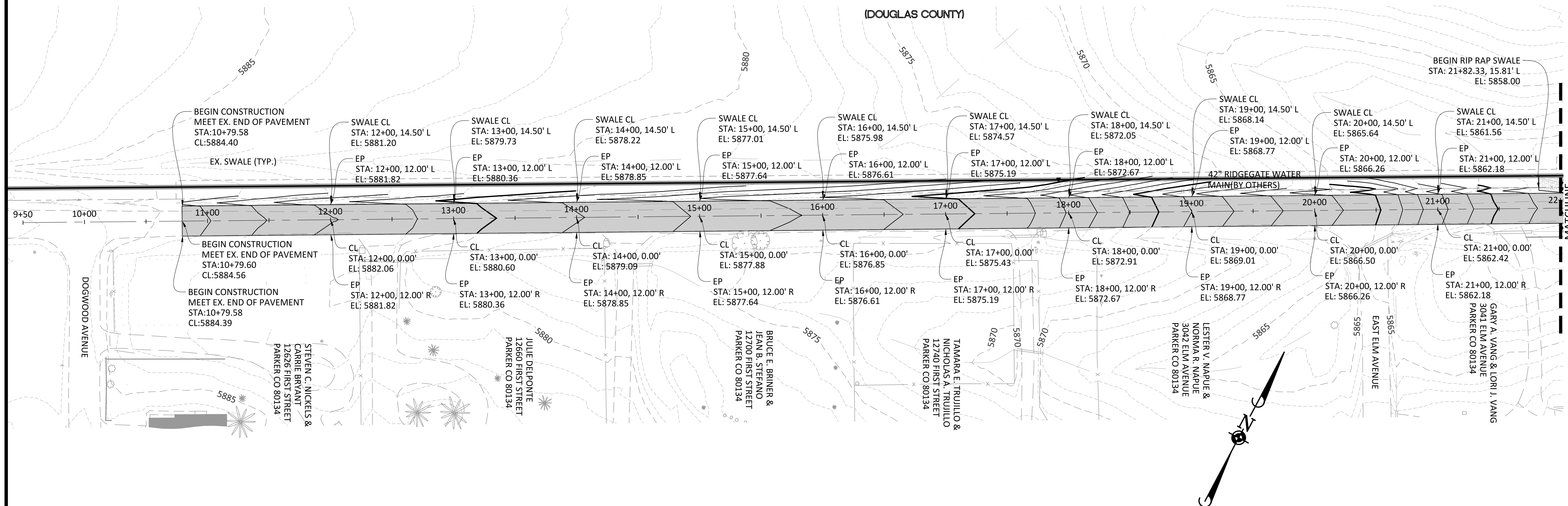
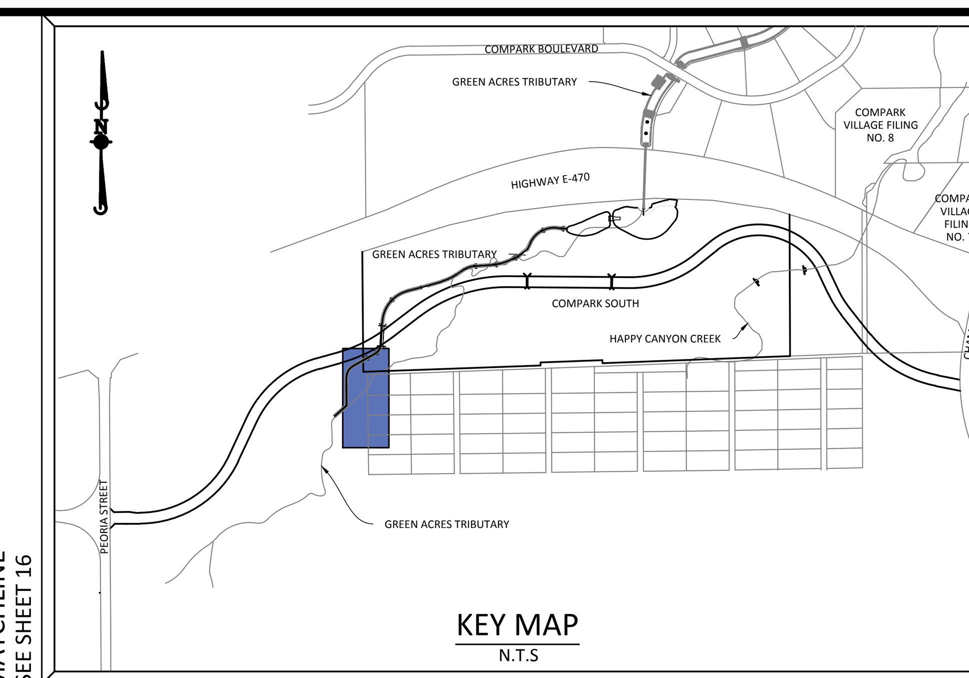


PLAN: FIRST STREET

0 25 50 100
SCALE: 1"=50'



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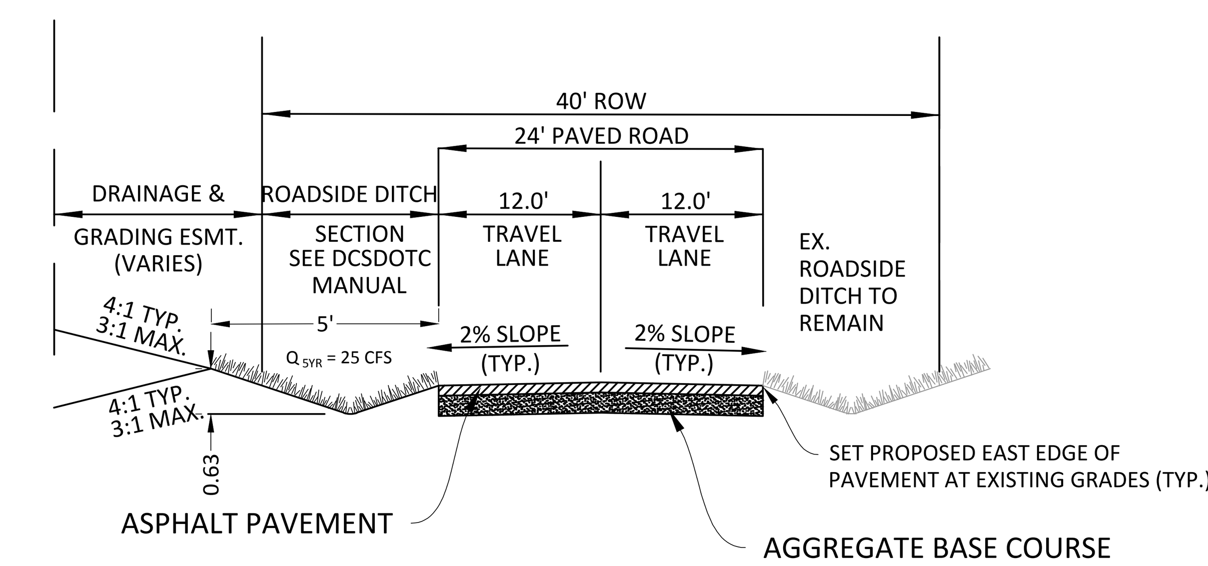
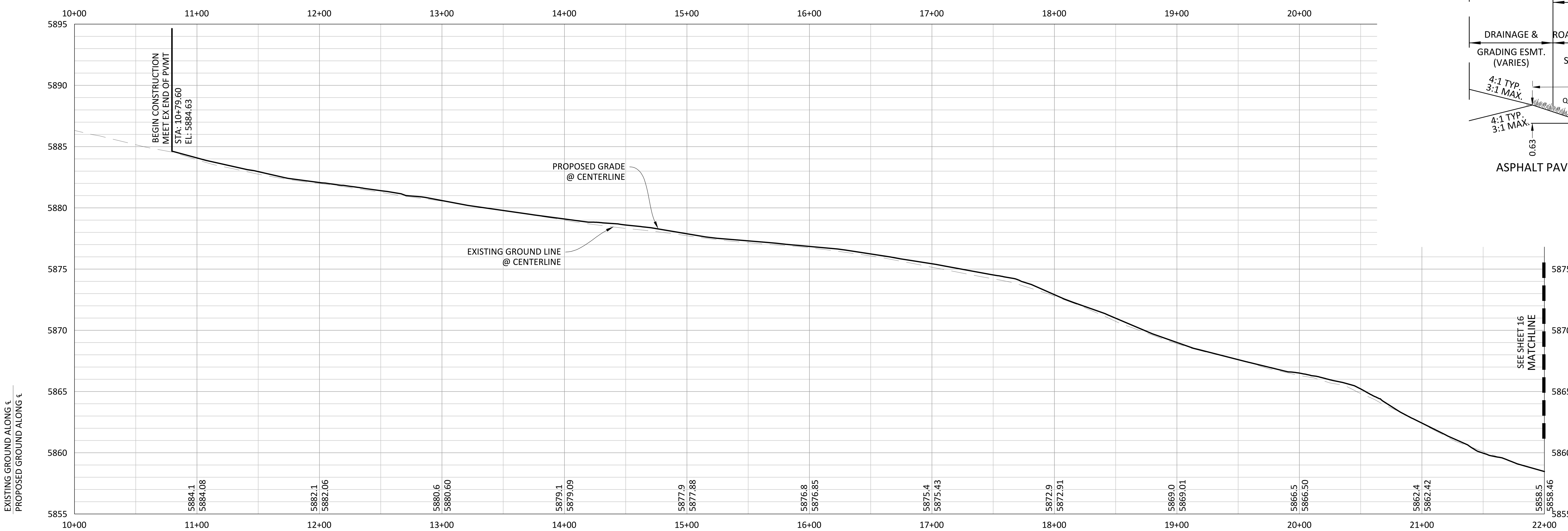


RURAL LOCAL
PROPOSED CONDITION
STA. 10+79.6-STA 22+34



PROFILE: FIRST STREET

0 25 50 100
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
FIRST STREET - PLAN & PROFILE

PROJ. MGR.: RJM
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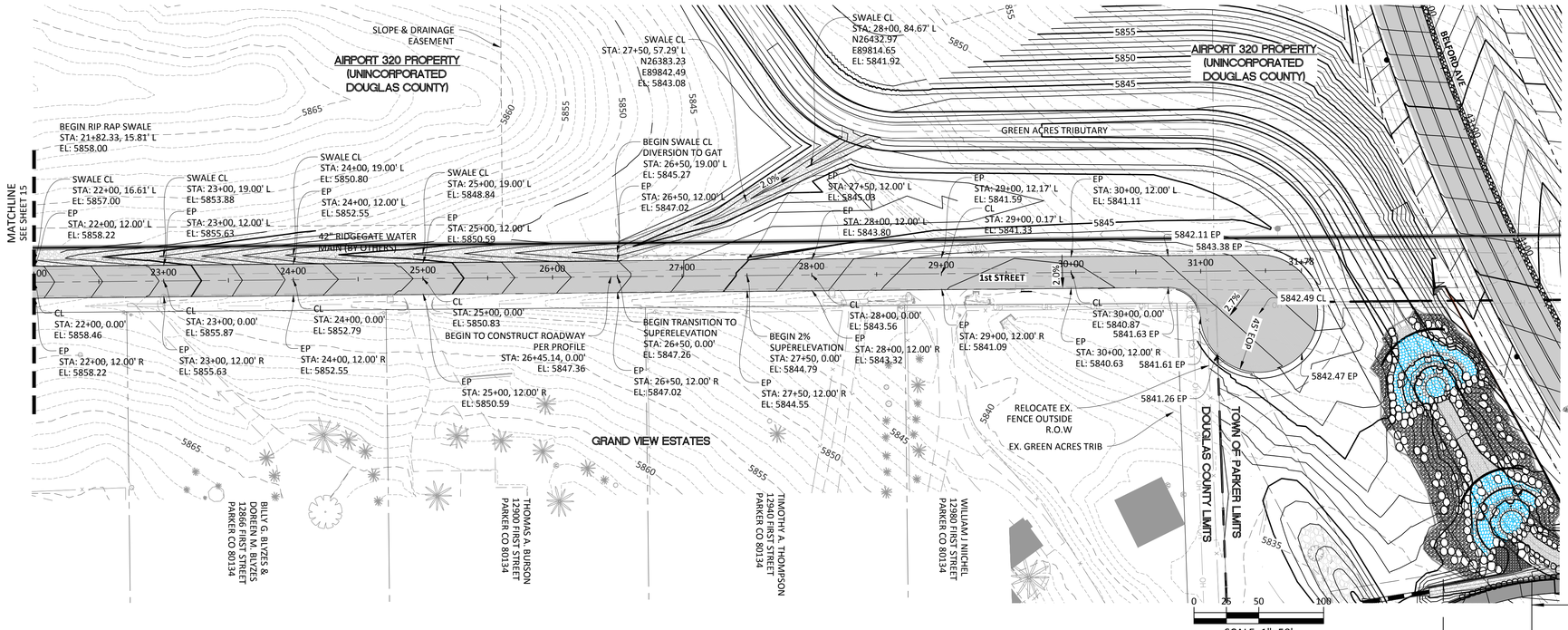
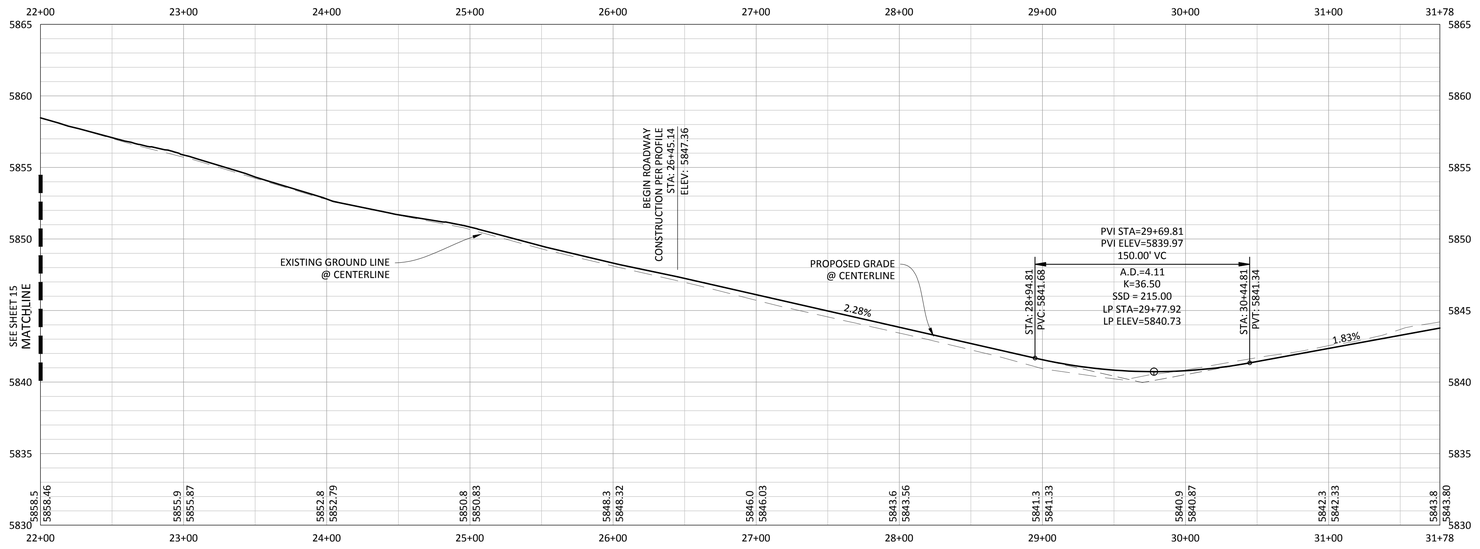


PLAN: FIRST STREET



PROFILE: FIRST STREET

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2) ALL STATIONING IS CENTERLINE UNLESS OTHERWISE NOTED.REFER TO FINAL PLAT FOR RIGHT-OF-WAY AND CENTERLINE DIMENSIONS AND HORIZONTAL CONTROL.
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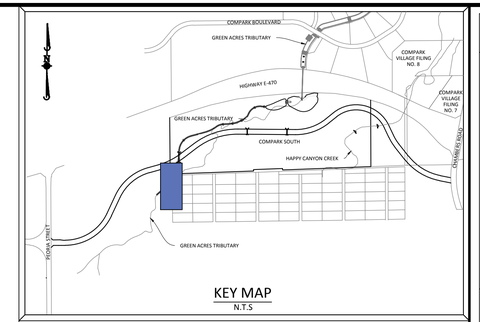
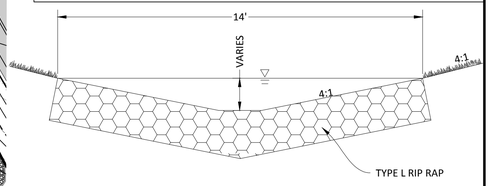
4) REFER TO STONEGATE VILLAGE METRO DISTICT APPROVED WATER AND SANITARY SEWER CONSTRUCTION PLANS FOR ALL PROPOSED WATER AND SANITARY SEWER LOCATIONS.



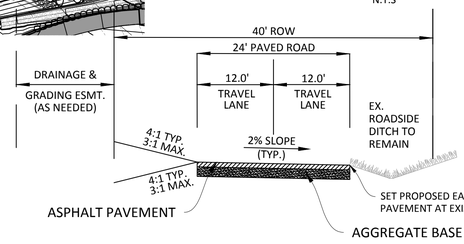
KEY MAP
N.T.S

SOURCE BENCHMARKS:

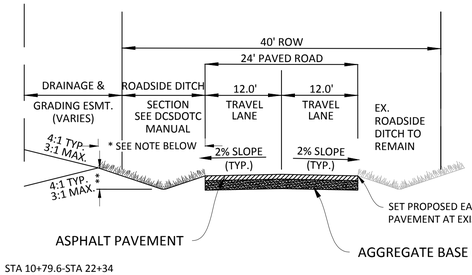
DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)



RIP RAP SWALE
N.T.S



RURAL LOCAL
PROPOSED CONDITION
STA 26+50 -STA 31+00



* WIDTH = 5' STA 10+79.6-STA 22+34
WIDTH = 14', STA 22+34-STA 26+50
** Q_{5YR}=25 CFS, DEPTH = 0.63' STA 10+79.6-STA 22+34
Q_{5YR}=57.8 CFS, DEPTH = 1.75' STA 22+34-STA 26+50

RURAL LOCAL
PROPOSED CONDITION
STA 10+79.6 -STA 26+50

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DRAWN BY	DATE	REVISIONS
ETG		
	C 6/24/16	3RD SUBMITTAL
	B 2/26/16	2ND SUBMITTAL
	A 11/2015	1ST SUBMITTAL

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
FIRST STREET - PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
16 OF 40
CLCPKC3 ---

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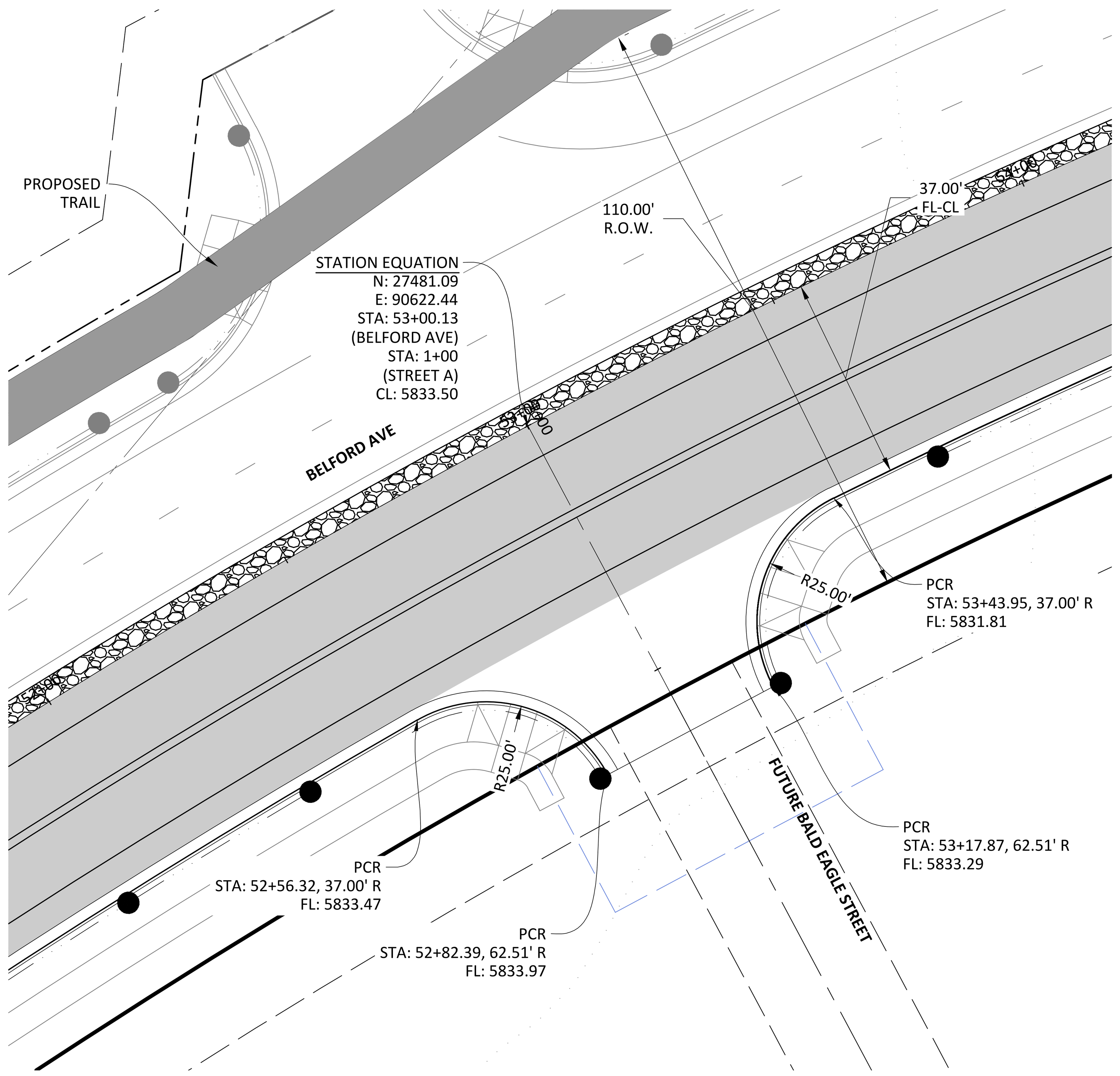
Plotted: 6/27/2016 7:55 PM Dwg Name: p:\Clpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawing\Plan Set\Town\CLCPKC3-1st Avenue P&P.dwg Updated By: jhoward



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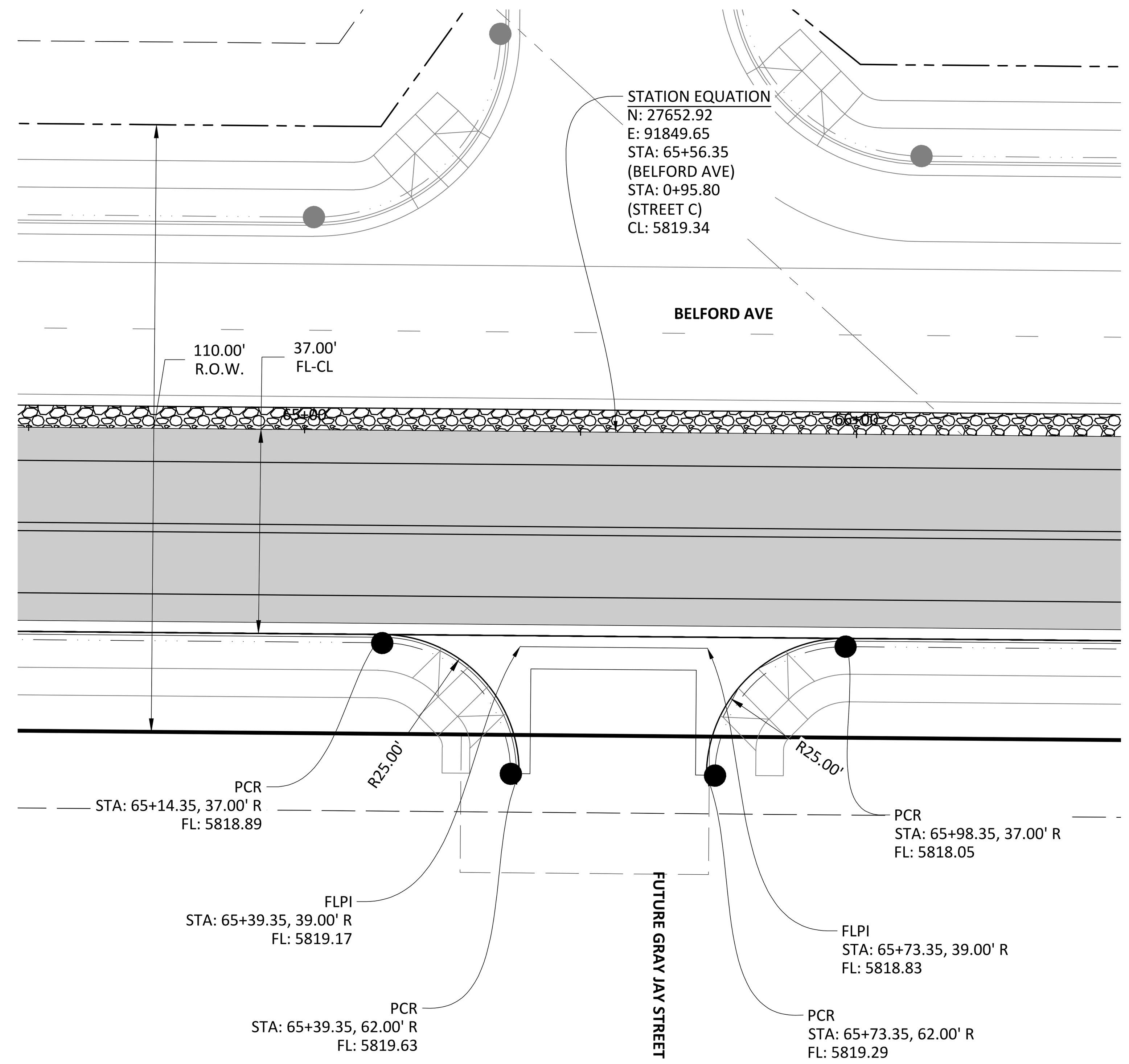

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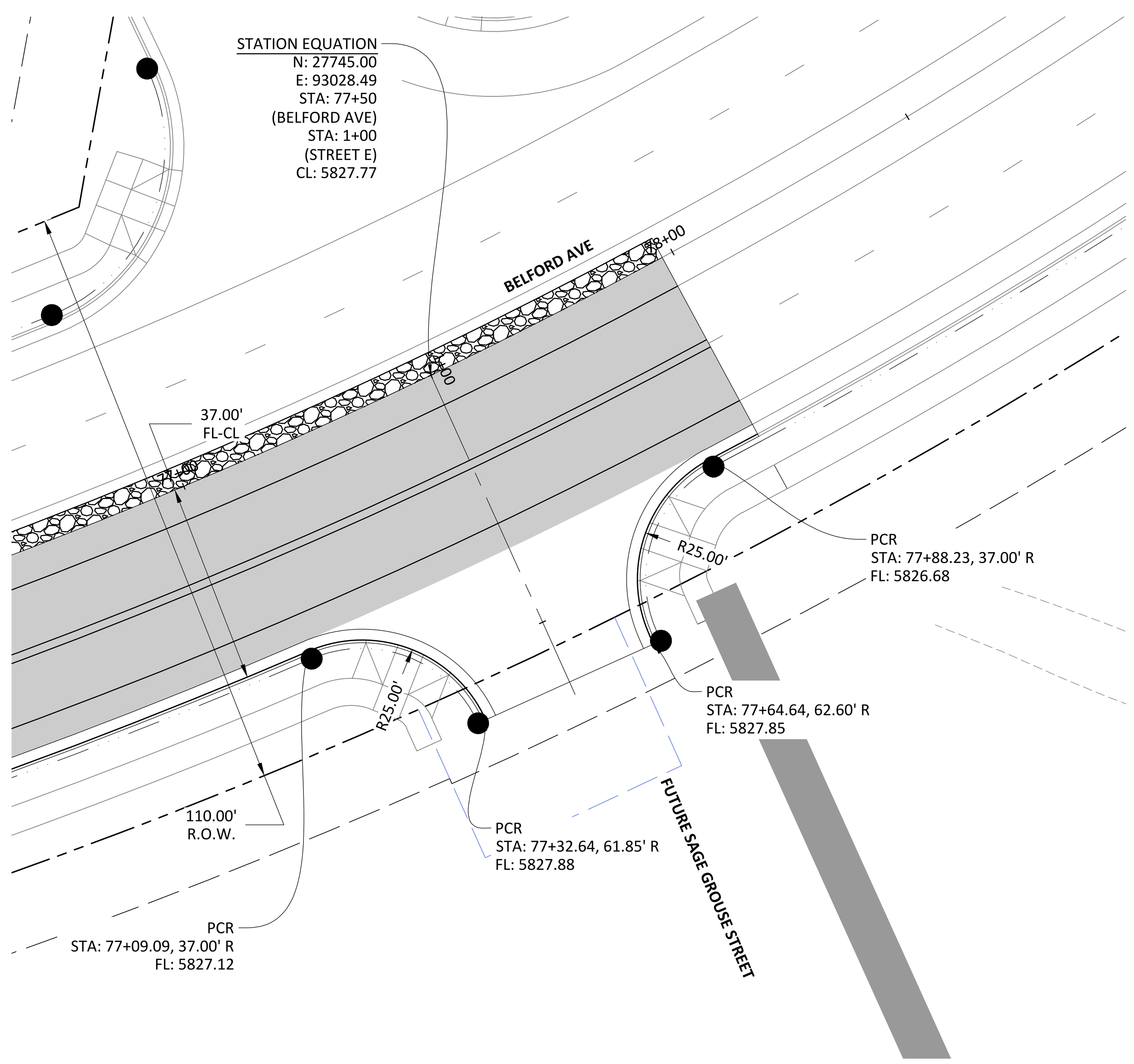

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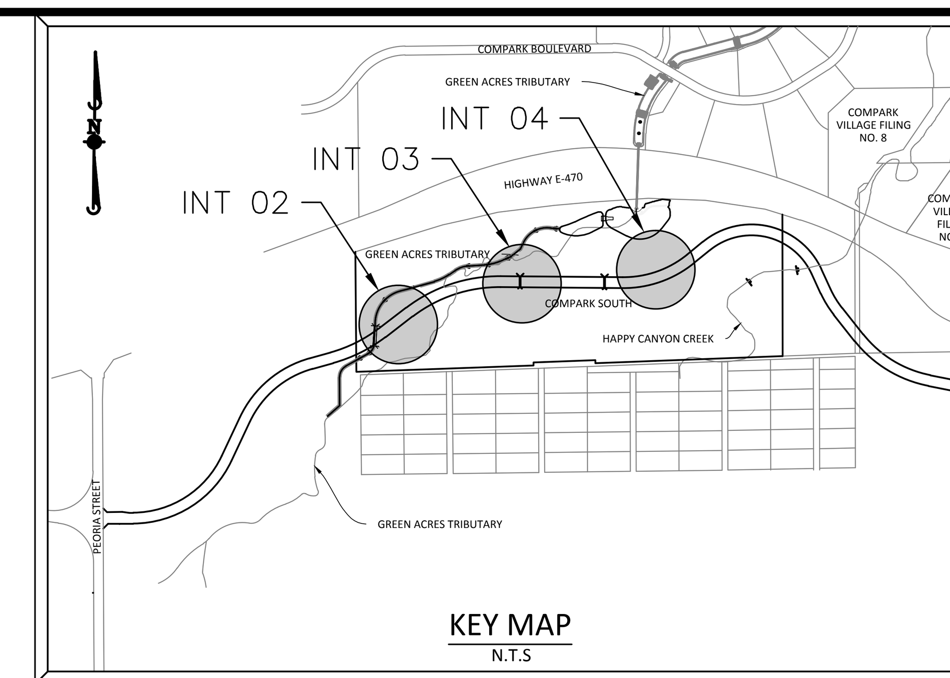

KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

0 10 20 40
SCALE: 1"=20'

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TOWN OF PARKER, DIRECTOR OF ENGINEERING   DATE

DATE	REVISIONS	DRAWN BY
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C 6/24/16	3RD SUBMITTAL	EG
B 4/11/16	2ND SUBMITTAL	
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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
INTERSECTION DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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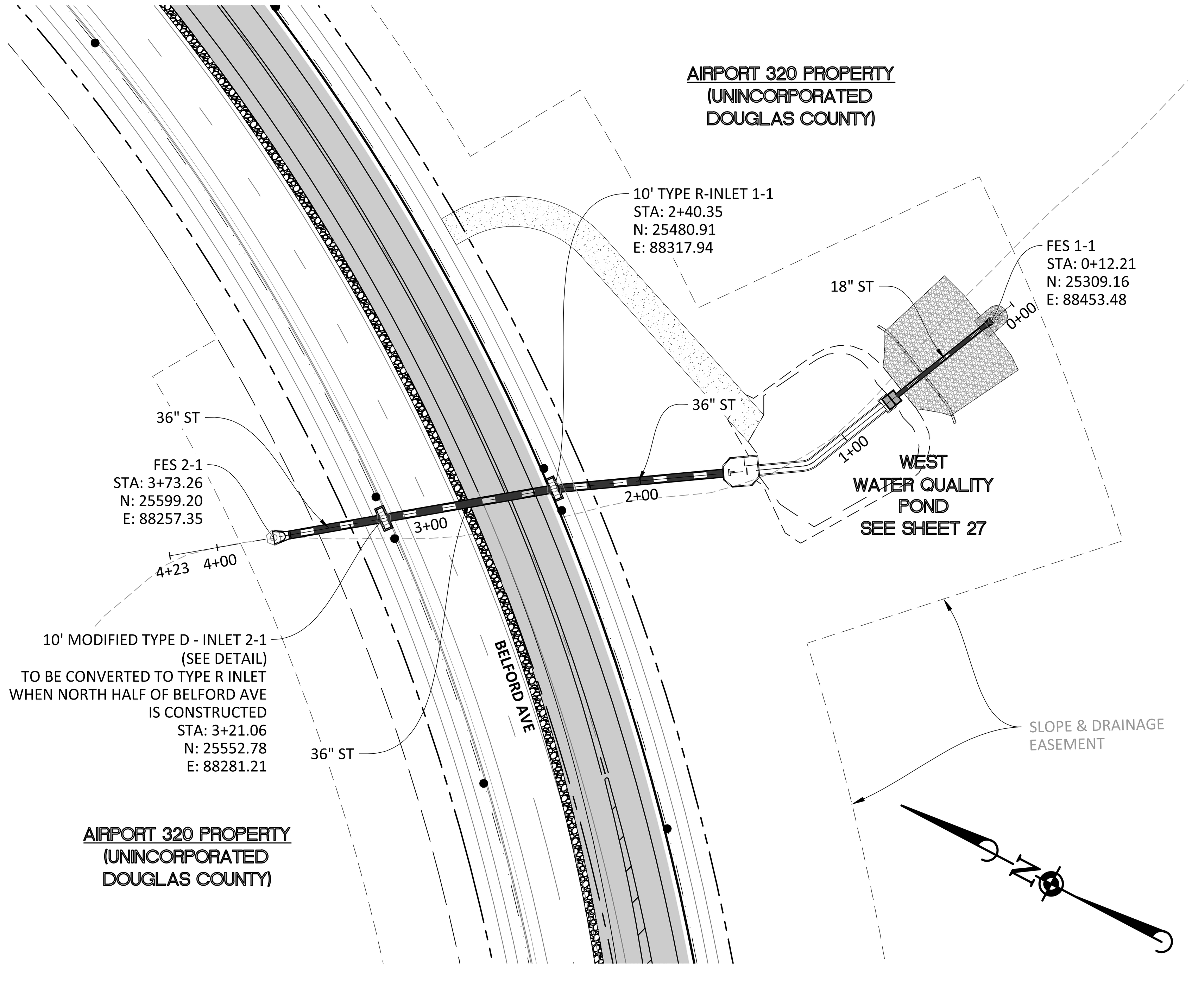

PLAN: STORM-1

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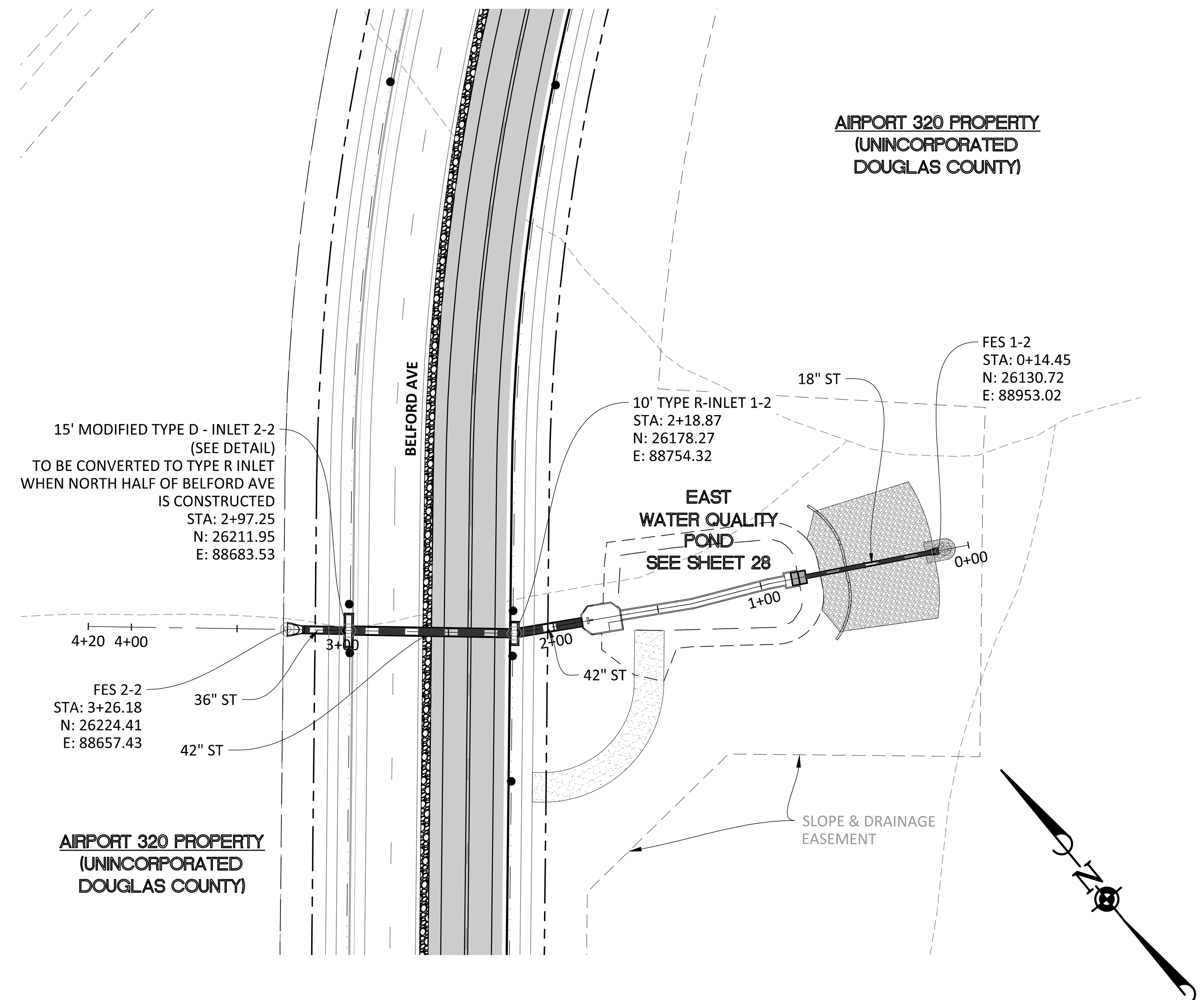
SCALE: 1"=50'



PLAN: STORM-2

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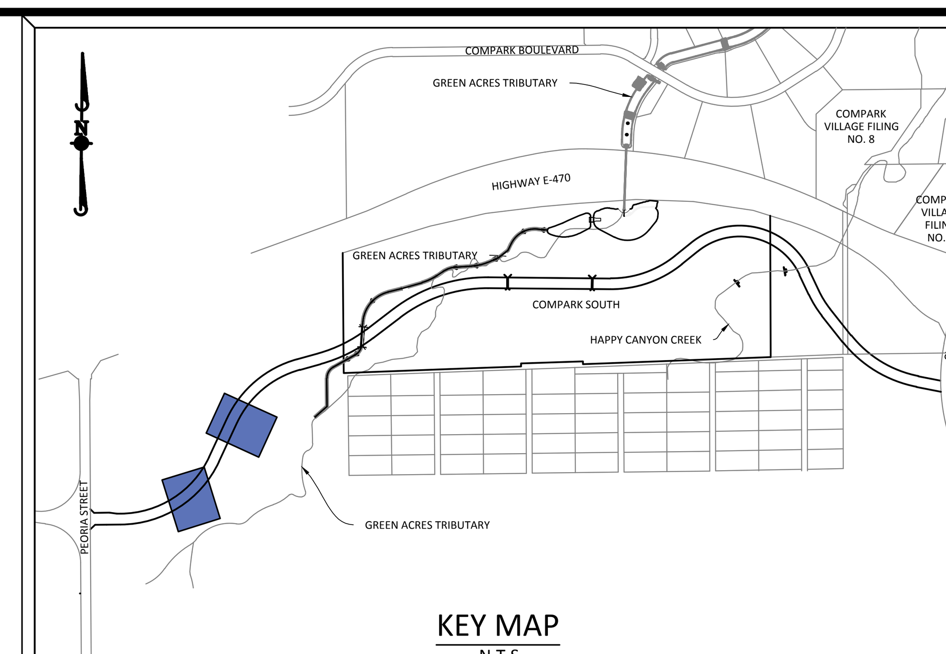
SCALE: 1"=50'



KEY MAP
N.T.S

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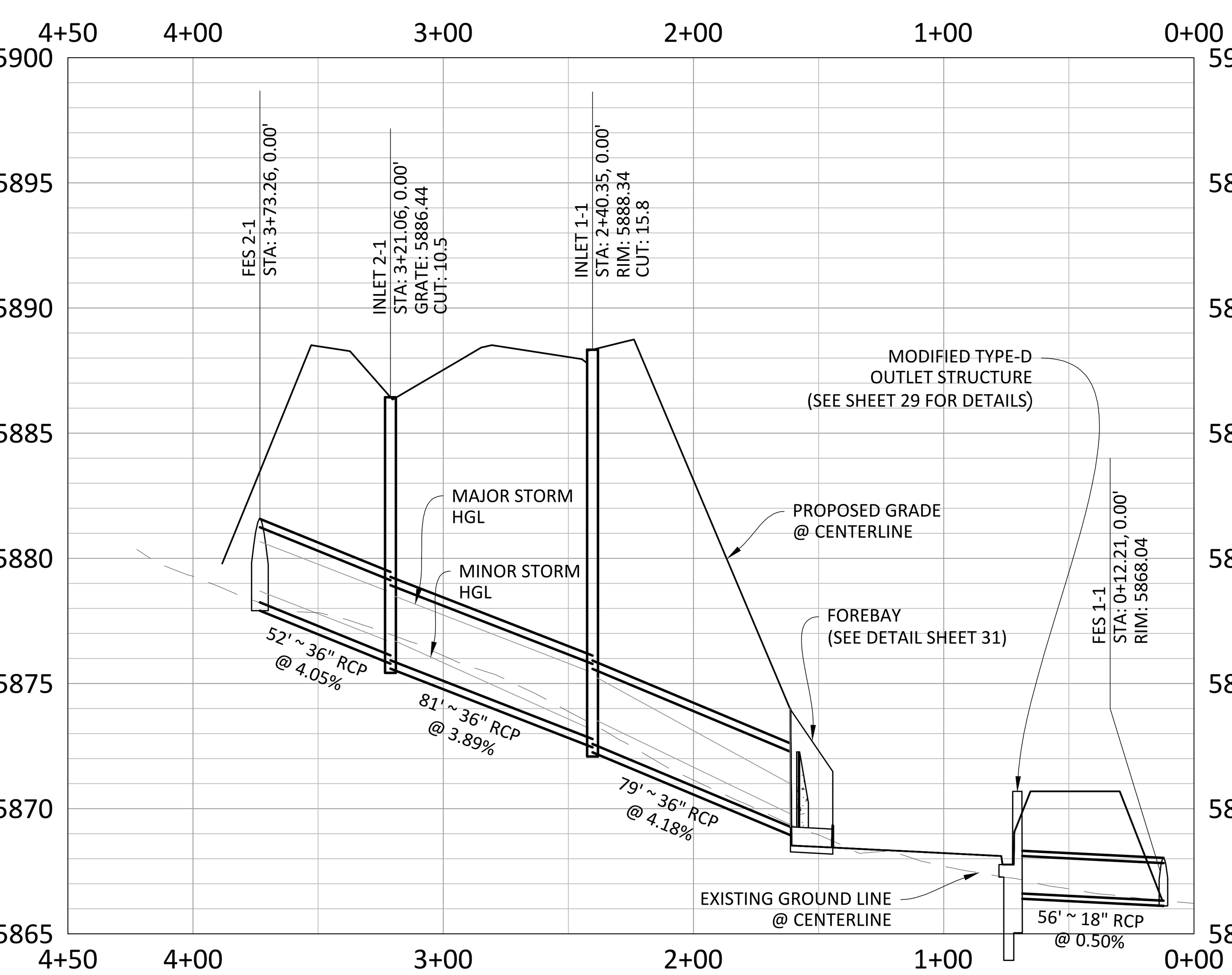

PROFILE: STORM-1

BELFORD AVE ℄ STA. 21+33.73

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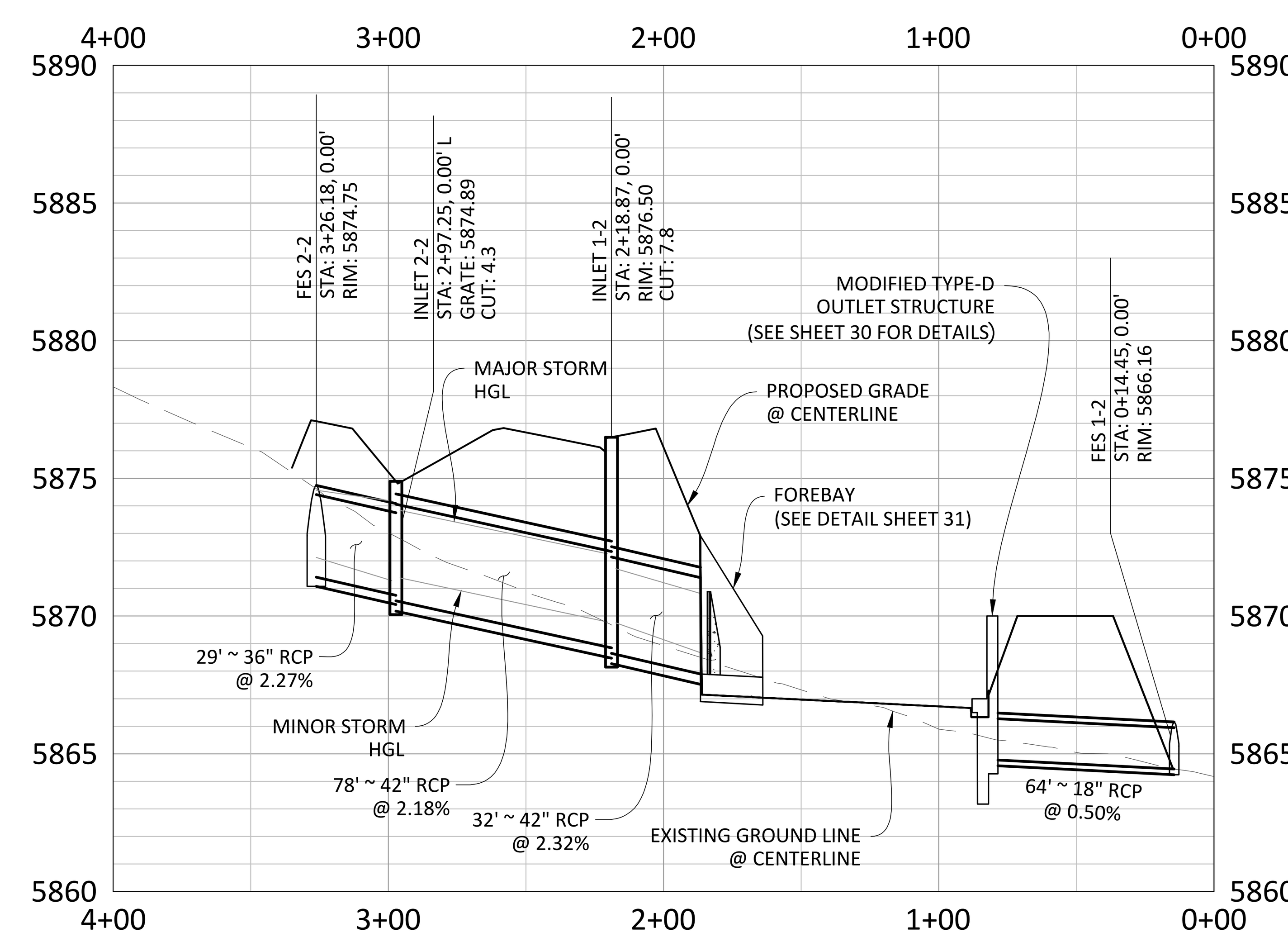
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'



PROFILE: STORM-2

BELFORD AVE ℄ STA. 29+38.95

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

	DATE	REVISIONS	DRAWN BY
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B	4/11/16	2ND SUBMITTAL	
A	11/2015	1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
STORM PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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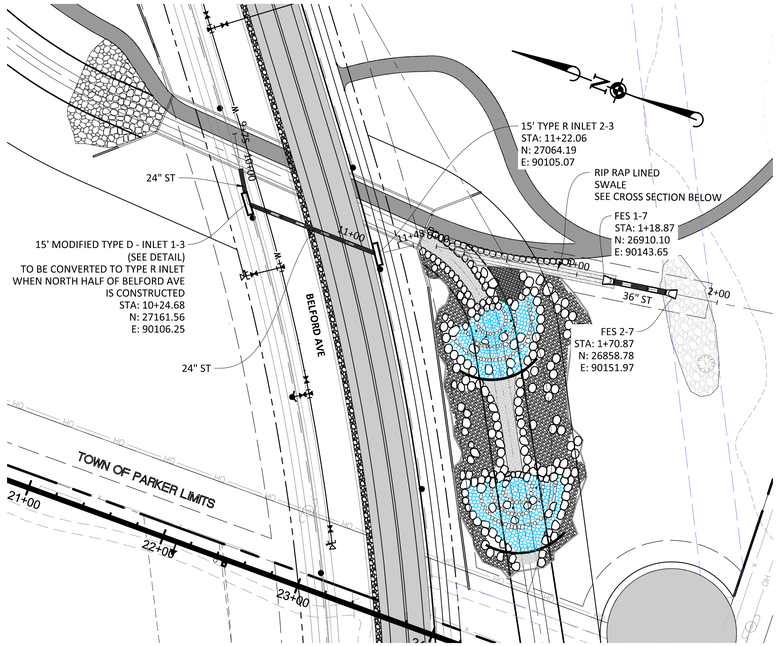
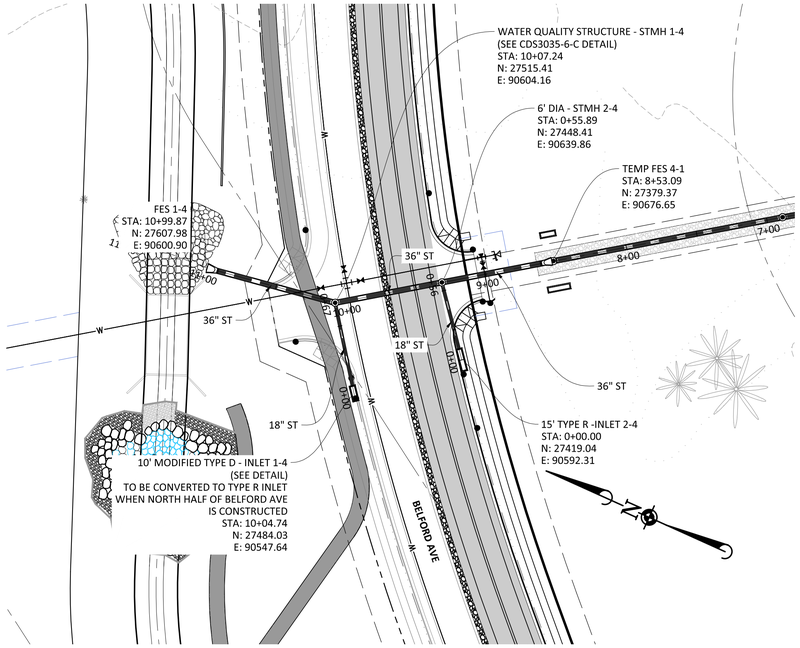
Plotted: 6/28/2016 10:17 AM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Storm (1).dwg Updated By: adrucker



PLAN: STORM-3 & STORM-7

0 25 50 100
SCALE: 1"=50'



PLAN: STORM-4

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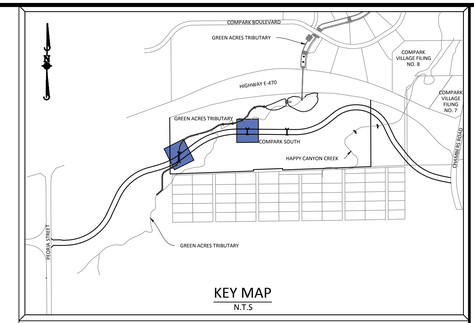
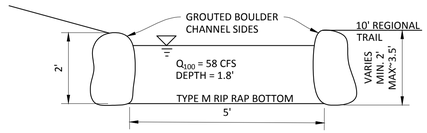


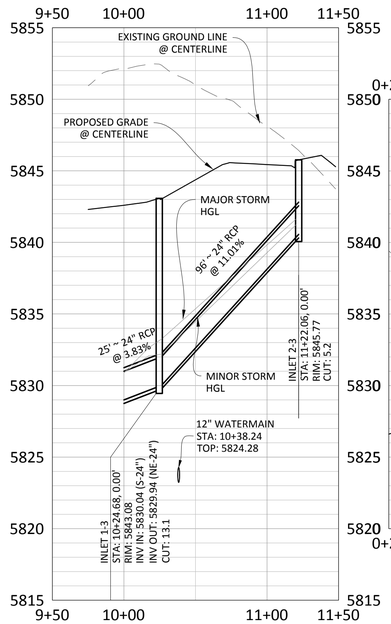
KEY MAP
N.T.S

SOURCE BENCHMARKS:

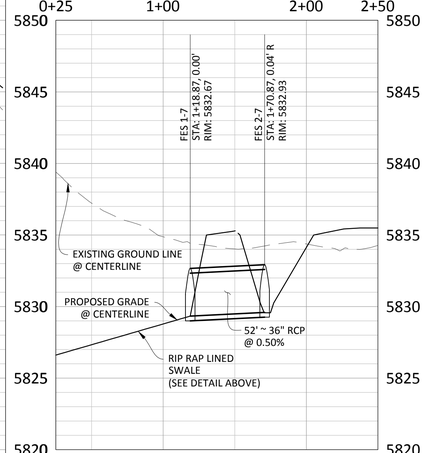
DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)



RIP RAP LINED SWALE
N.T.S



PROFILE: STORM-3
BELFORD AVE ℄ STA. 46+64.73



PROFILE: STORM-7

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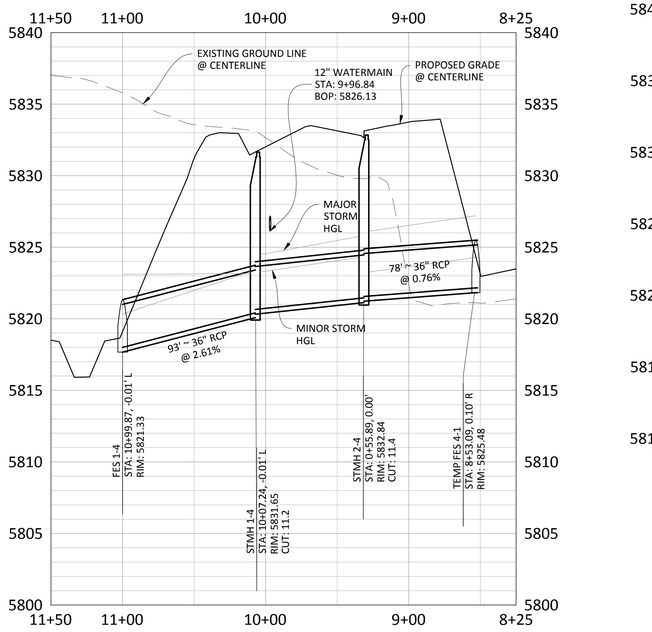
VERTICAL SCALE: 1"=5'



PROFILE: STORM-4
BELFORD AVE ℄ STA. 53+00.13

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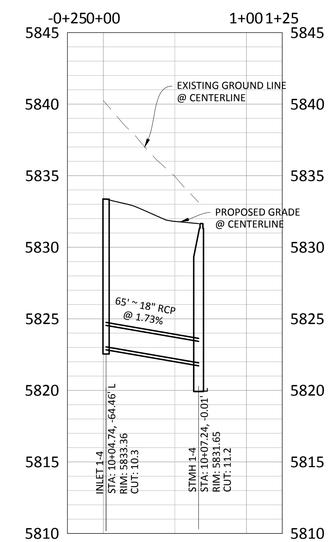
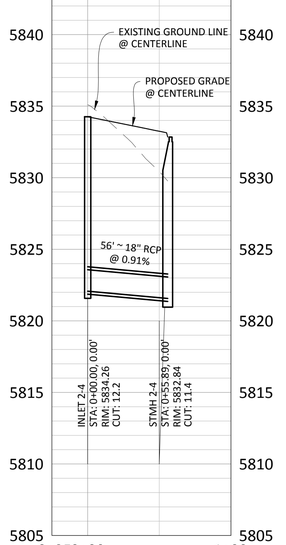
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'



PROFILE: STORM-4C
BELFORD AVE ℄ STA. 52+42



PROFILE: STORM-4D
BELFORD AVE ℄ STA. 52+42

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
STORM PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 19 OF 40
CLCPKC3 ---

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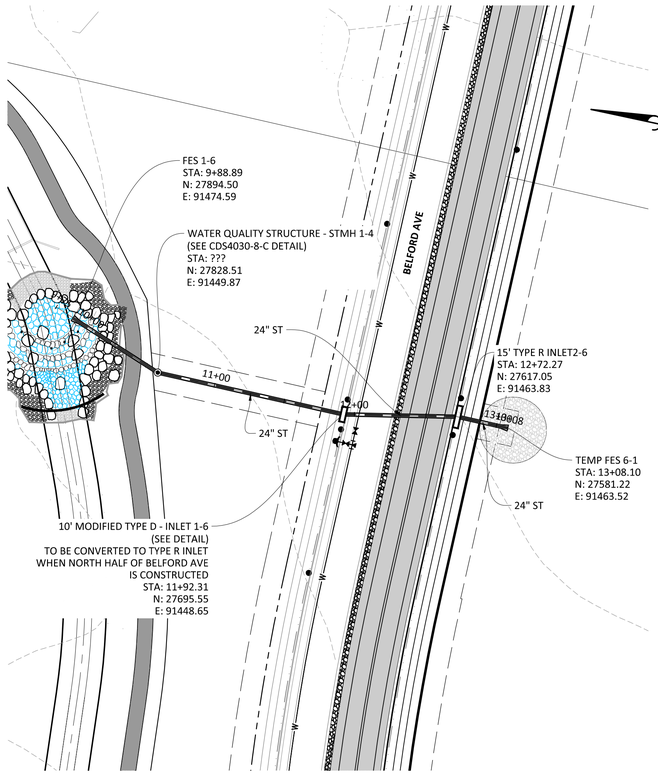

PLAN: STORM-6

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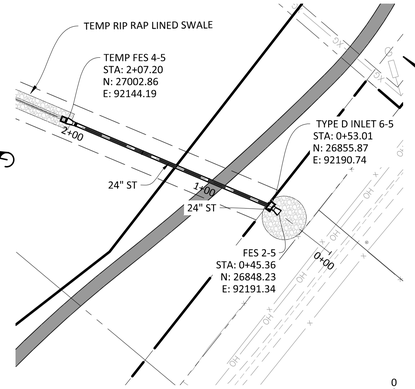
SCALE: 1"=50'



PLAN: STORM-5 (EAST BERM)

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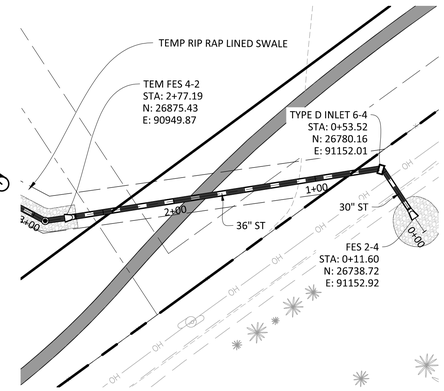
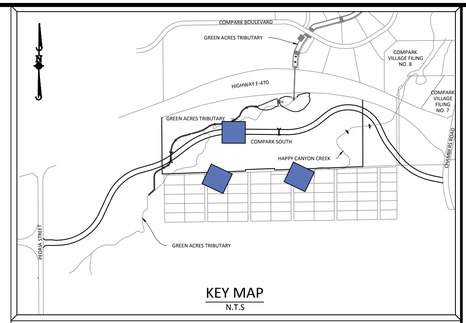
SCALE: 1"=50'



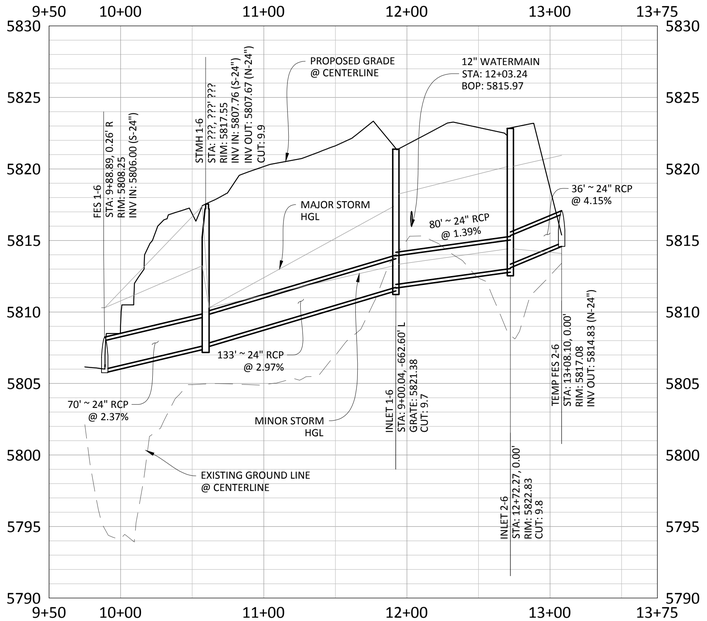
PLAN: STORM-4 (WEST BERM)



KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)



PROFILE: STORM-6
BELFORD AVE ℄ STA. 61+55.10

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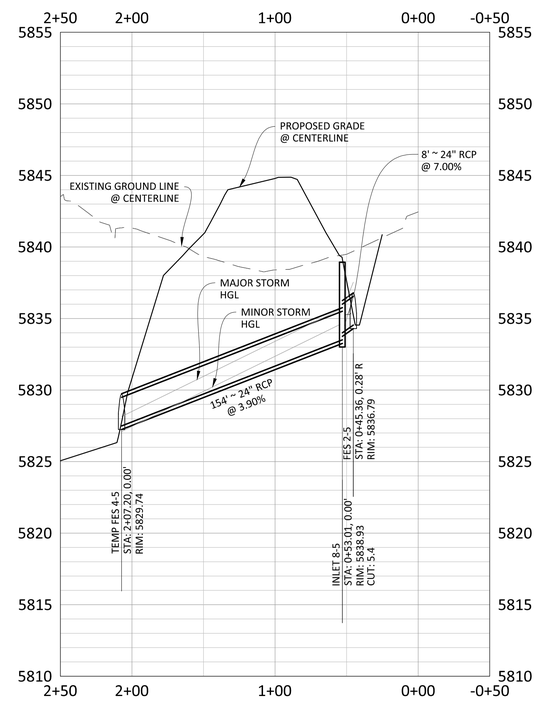
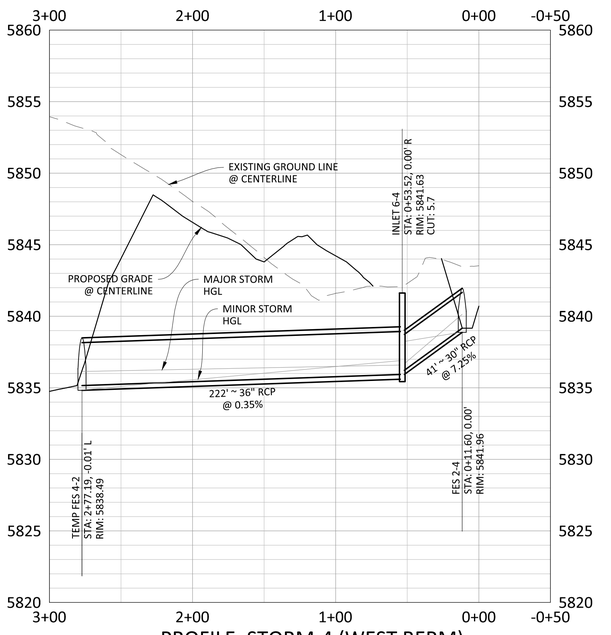
SCALE: 1"=50'
VERTICAL SCALE: 1"=5'



PROFILE: STORM-5 (EAST BERM)



PROFILE: STORM-4 (WEST BERM)

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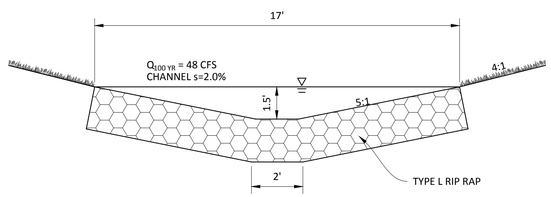
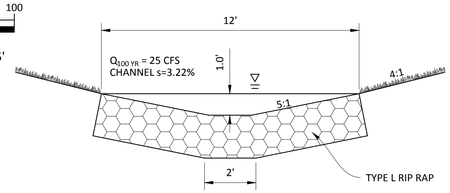


TEMPORARY RIP RAP SWALE
(EAST BERM)
N.T.S



TEMPORARY RIP RAP SWALE
(WEST BERM)
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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
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A 11/2015	1ST SUBMITTAL	

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

STORM PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
20 OF 40
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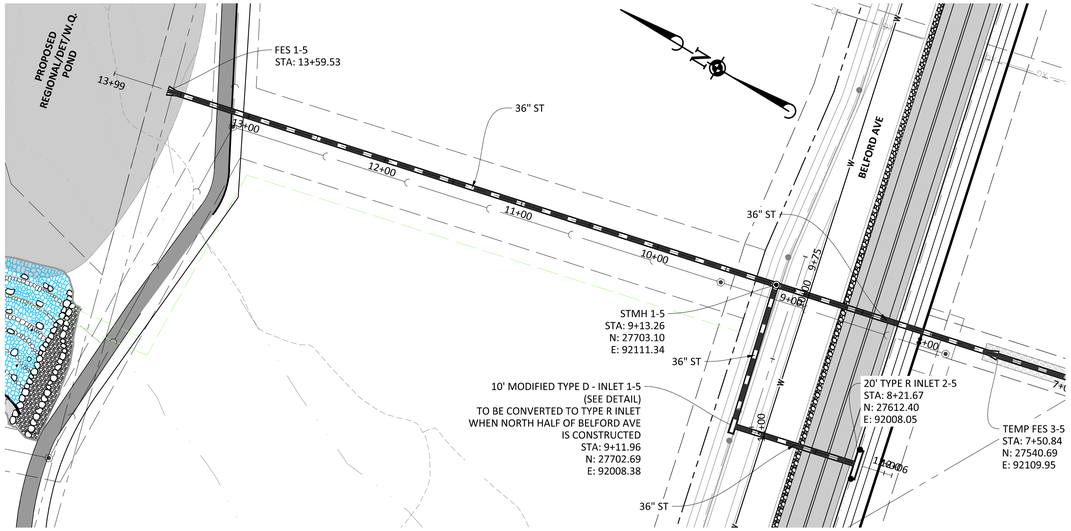
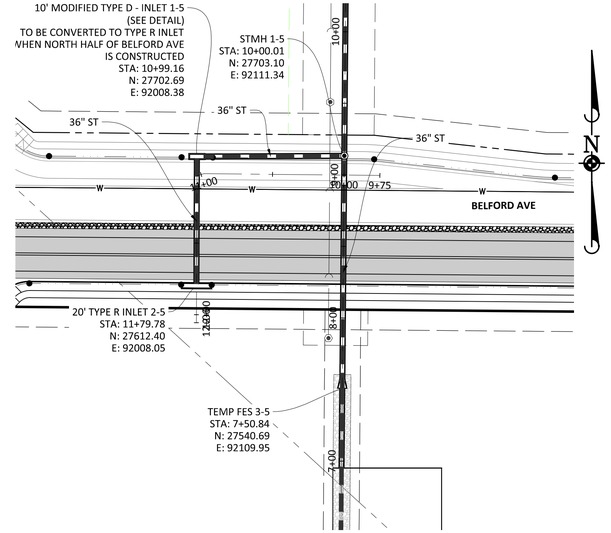


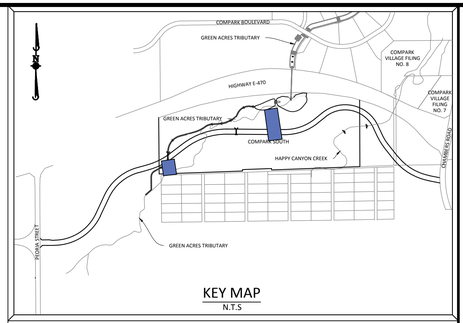
PLAN: STORM-5

SCALE: 1"=50'



PLAN: STORM-5A

SCALE: 1"=50'

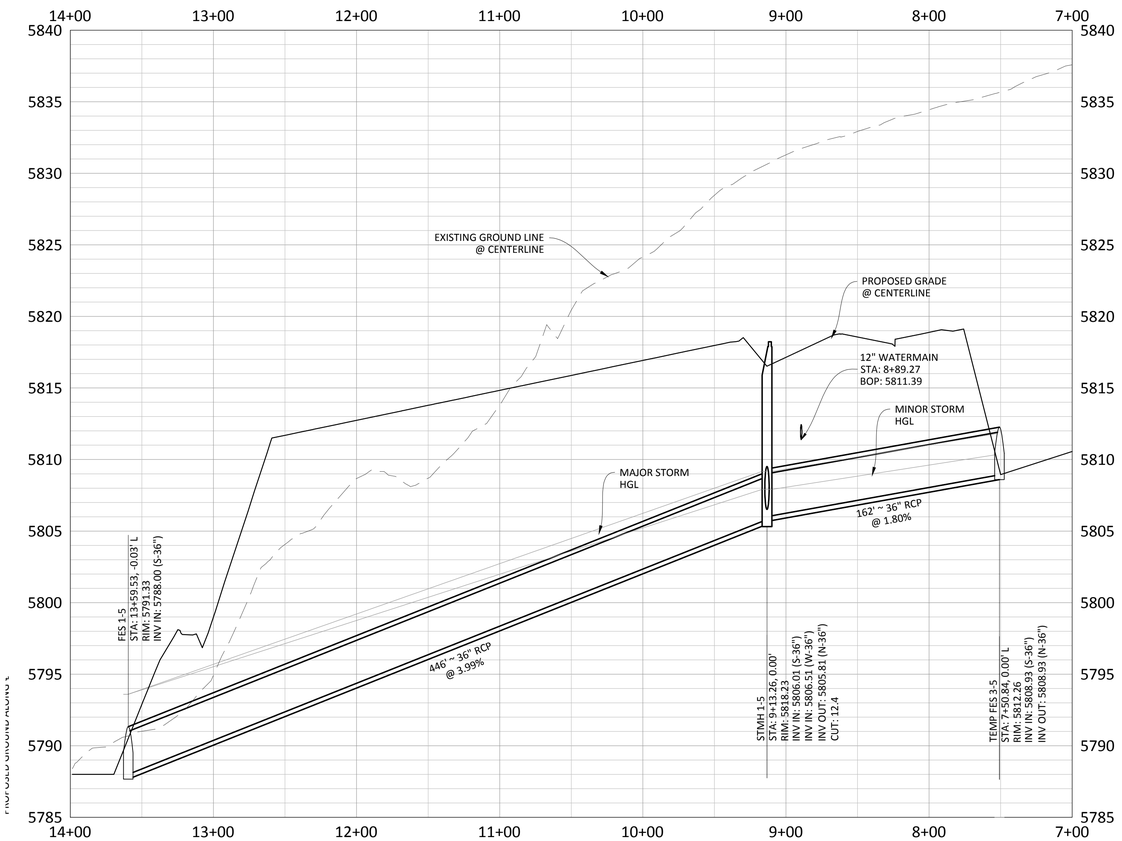


KEY MAP

N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

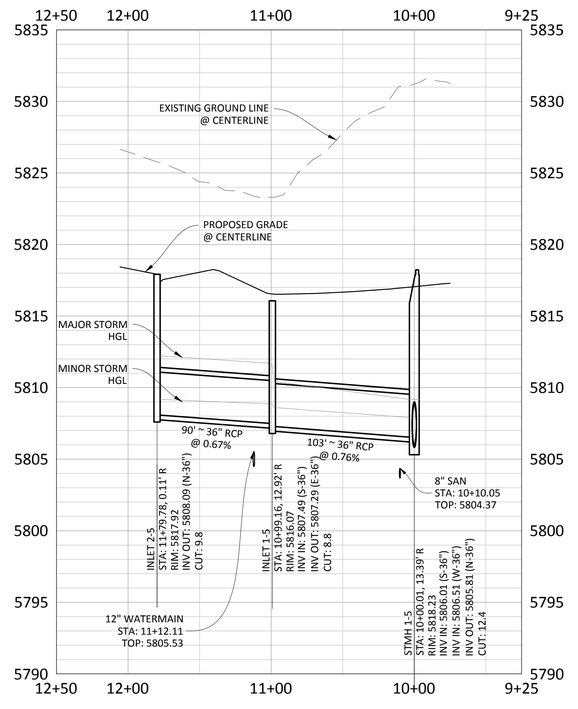


PROFILE: STORM-5

BELFORD AVE ℄ STA. 68+17.60

SCALE: 1"=50'

VERTICAL SCALE: 1"=5'



PROFILE: STORM-5A

BELFORD AVE ℄ STA. 67+14.89

SPECIAL STORM SEWER NOTE:

CONTRACTOR SHALL NOTE THAT INLET 1-5 IS NOT A STANDARD MODIFIED D-INLET AND NEEDS TO BE MODIFIED FOR THE 36" RCP OUTGOING STORM PIPE. THE INSIDE WIDTH OF THE BOX SHALL BE ENLARGED TO A MINIMUM OF 4'-6" (INSIDE WALL TO INSIDE WALL) VERSUS THE 3'-0" DIMENSION SHOWN ON CDOT'S M-604-12 DETAIL.

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

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TOWN OF PARKER, COLORADO

STORM PLAN & PROFILE

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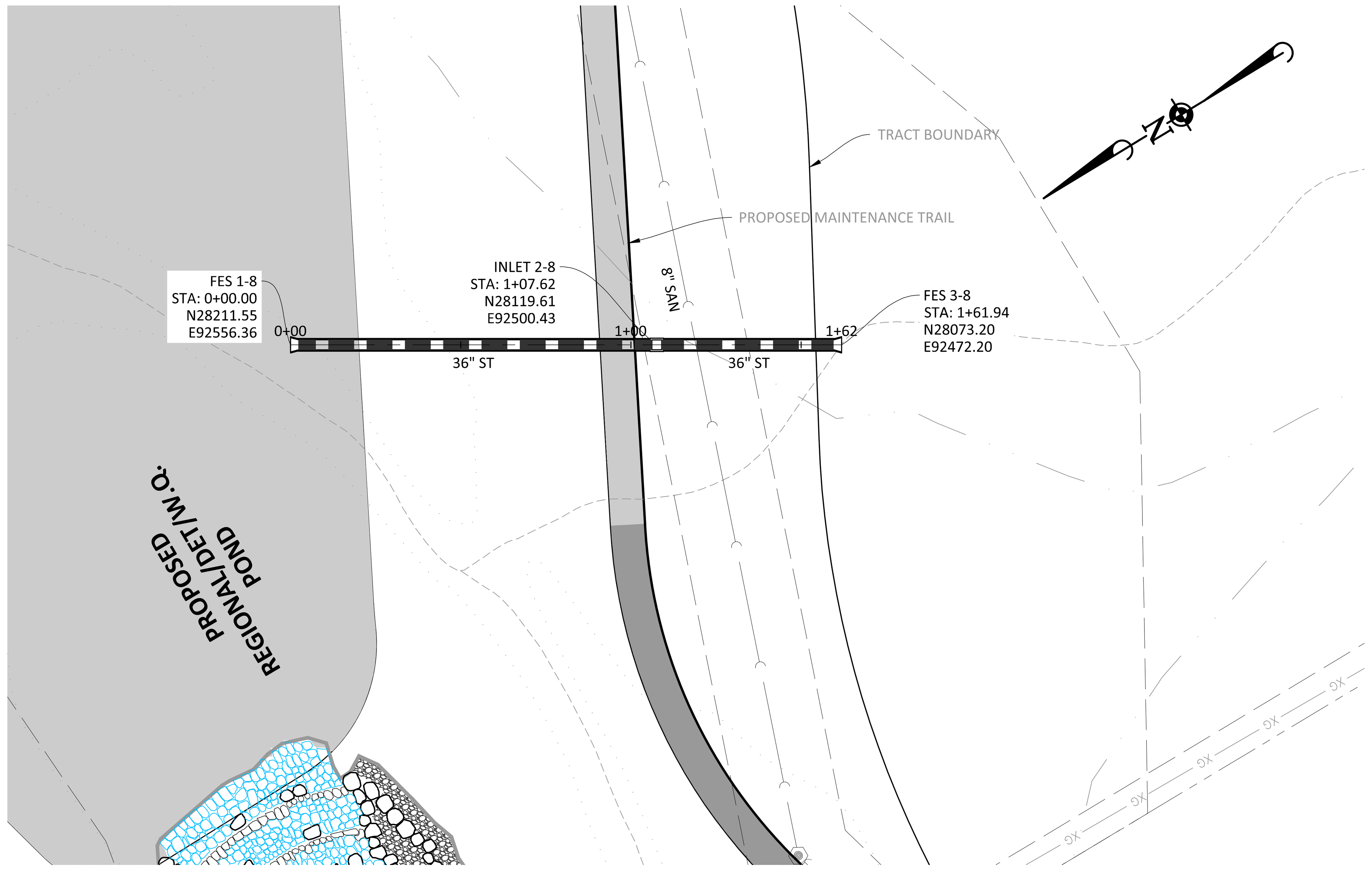

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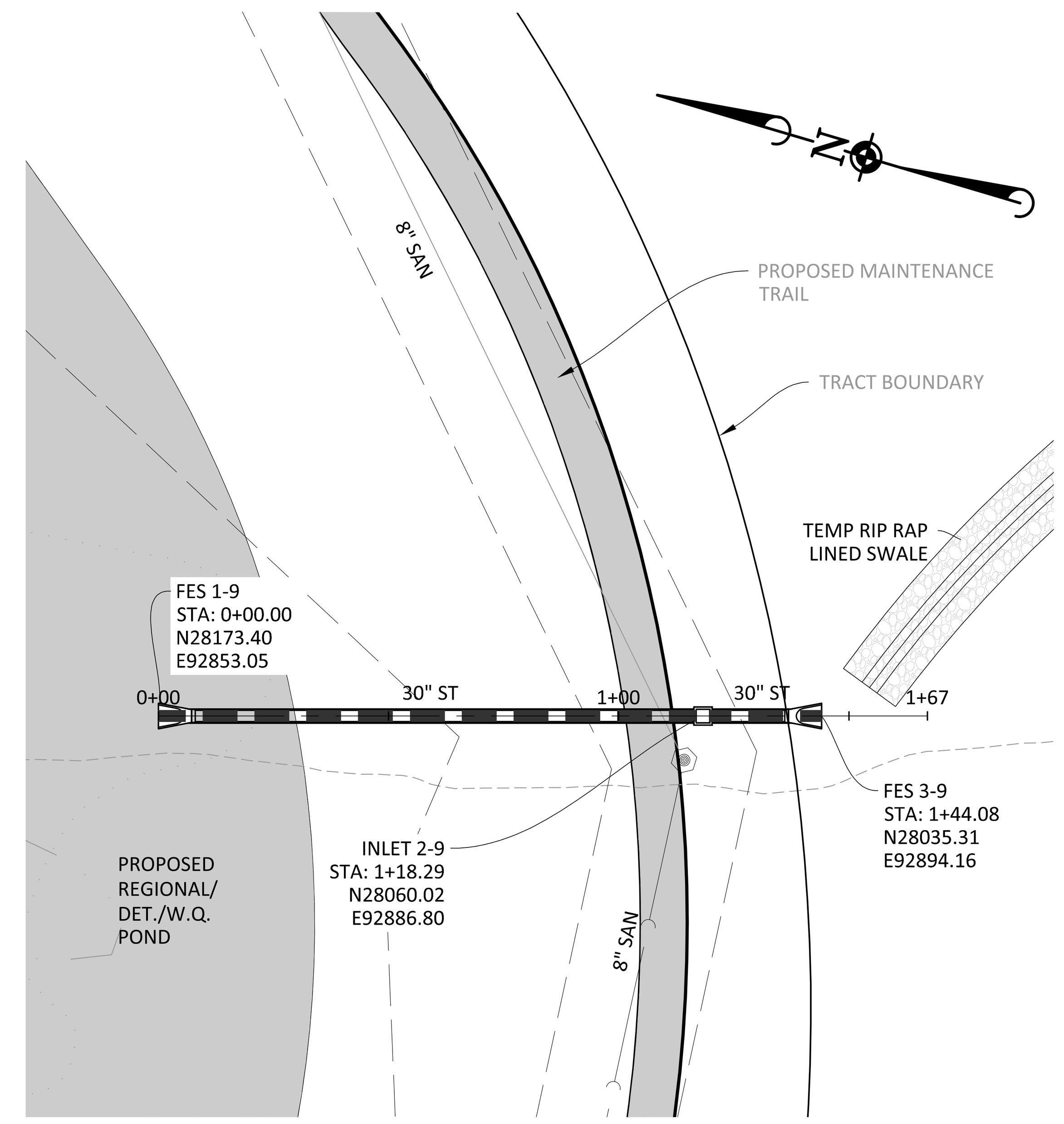
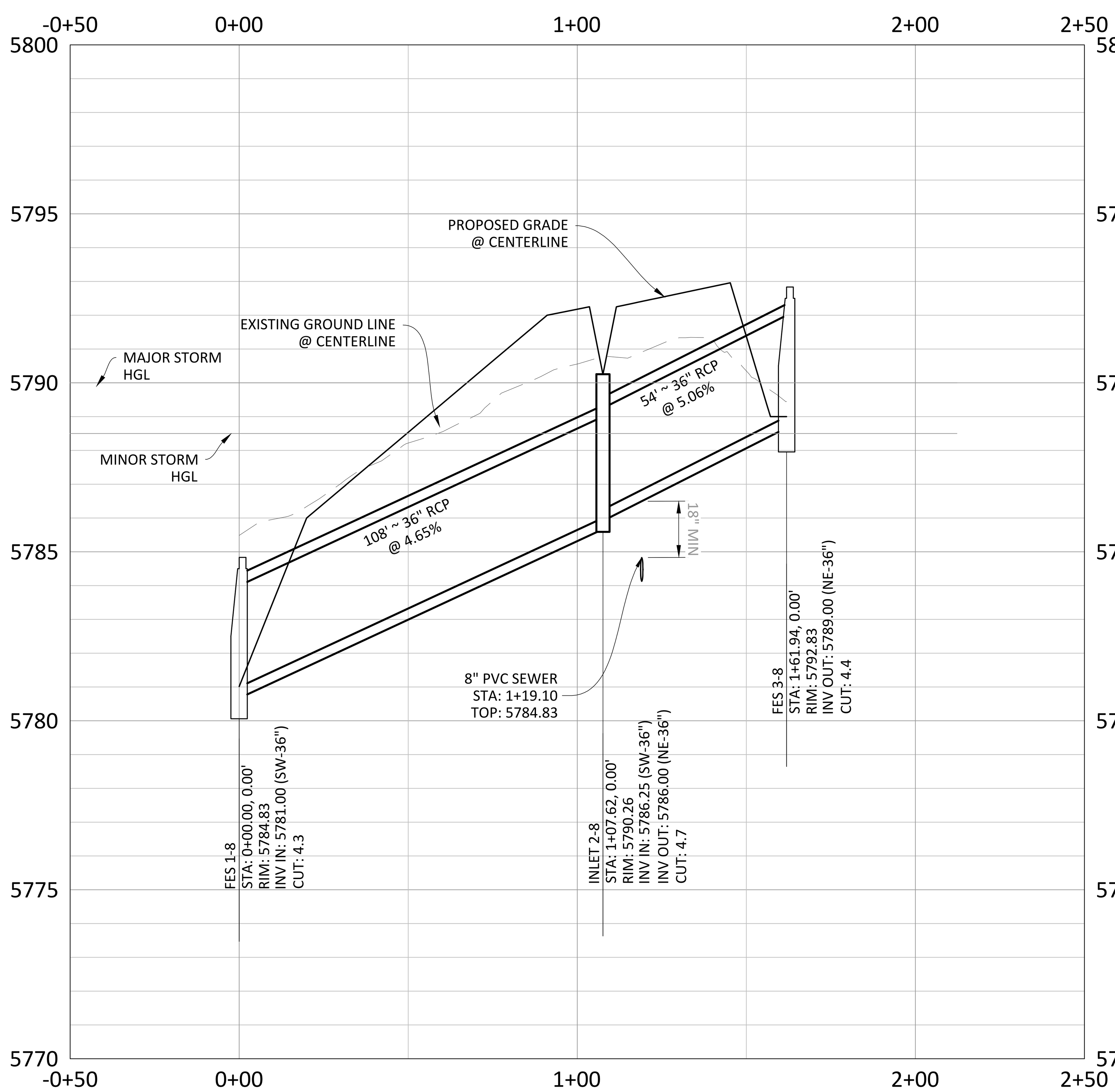
SCALE: 1"=30'

PLAN: STORM-8

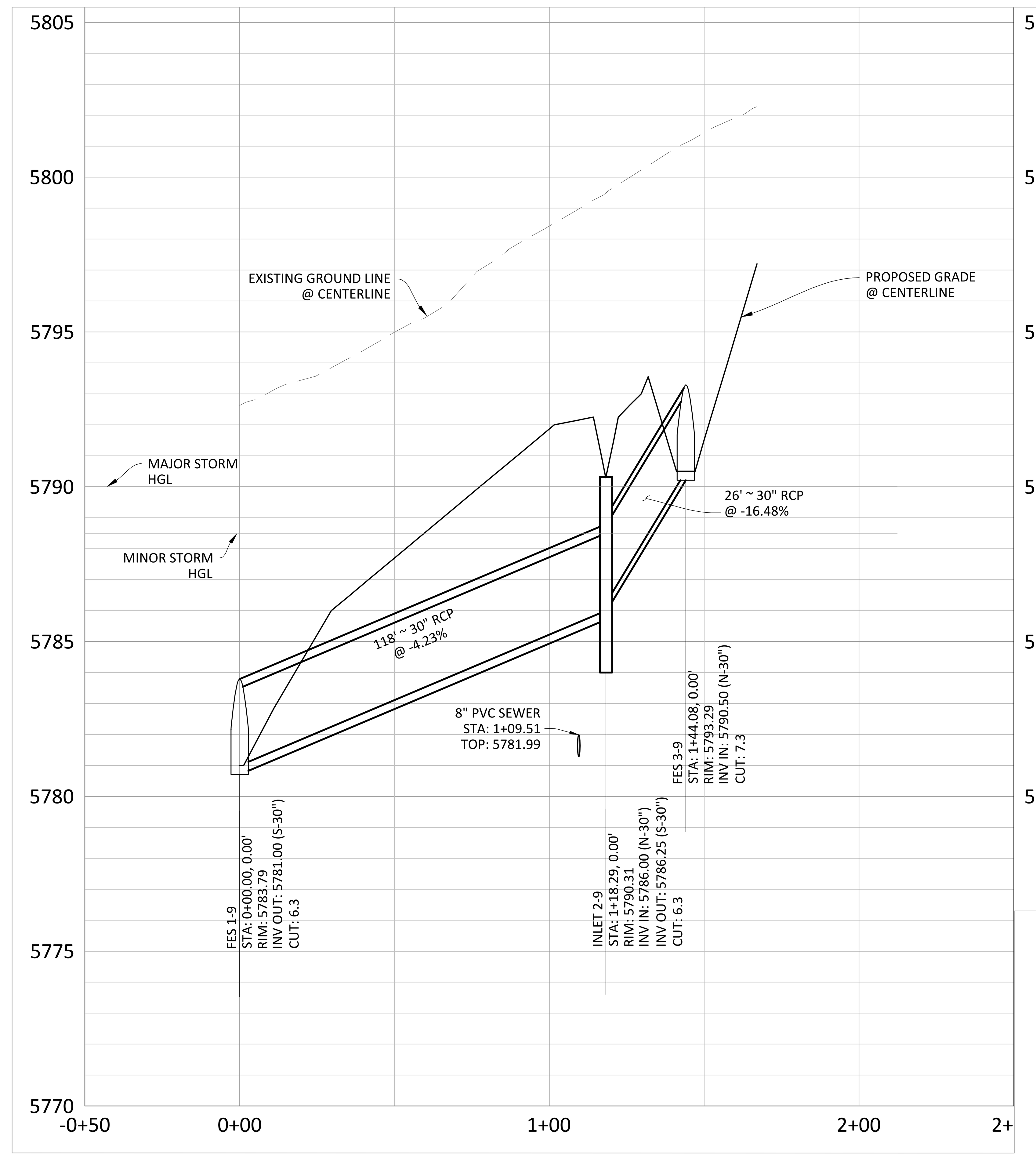


0 15 30 60
SCALE: 1"=30'

PLAN: STORM 9

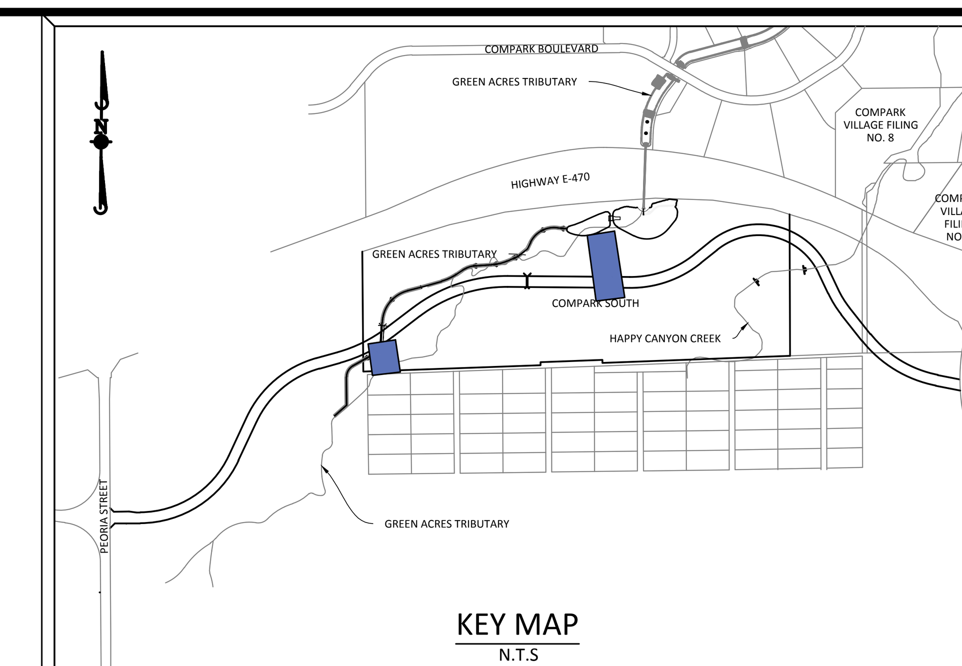


PROFILE: STORM-8



0 15 30 60
SCALE: 1"=30'
VERTICAL SCALE: 1"=3'

PROFILE: STORM 9



KEY MAP

N.T.S

SOURCE BENCHMARKS:

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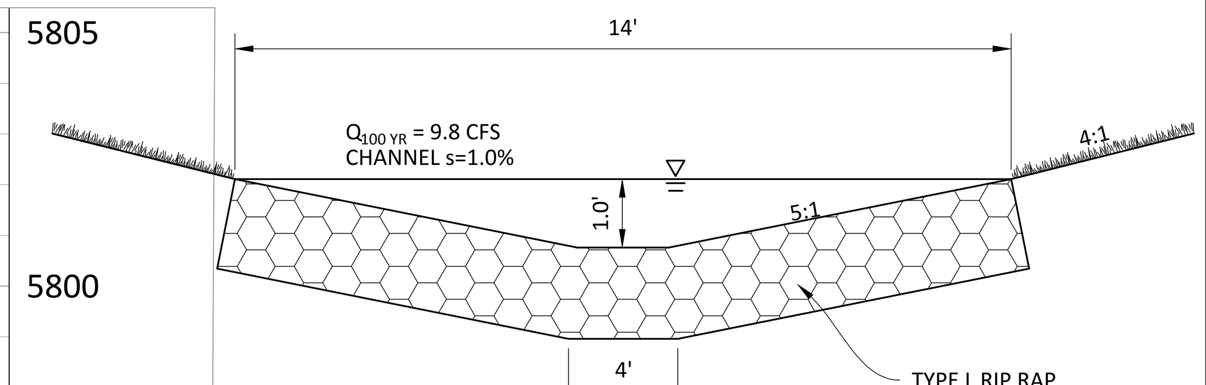
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)



TEMPORARY RIP RAP SWALE

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

	DATE	REVISIONS	DRAWN BY
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TOWN OF PARKER, COLORADO
STORM PLAN & PROFILE

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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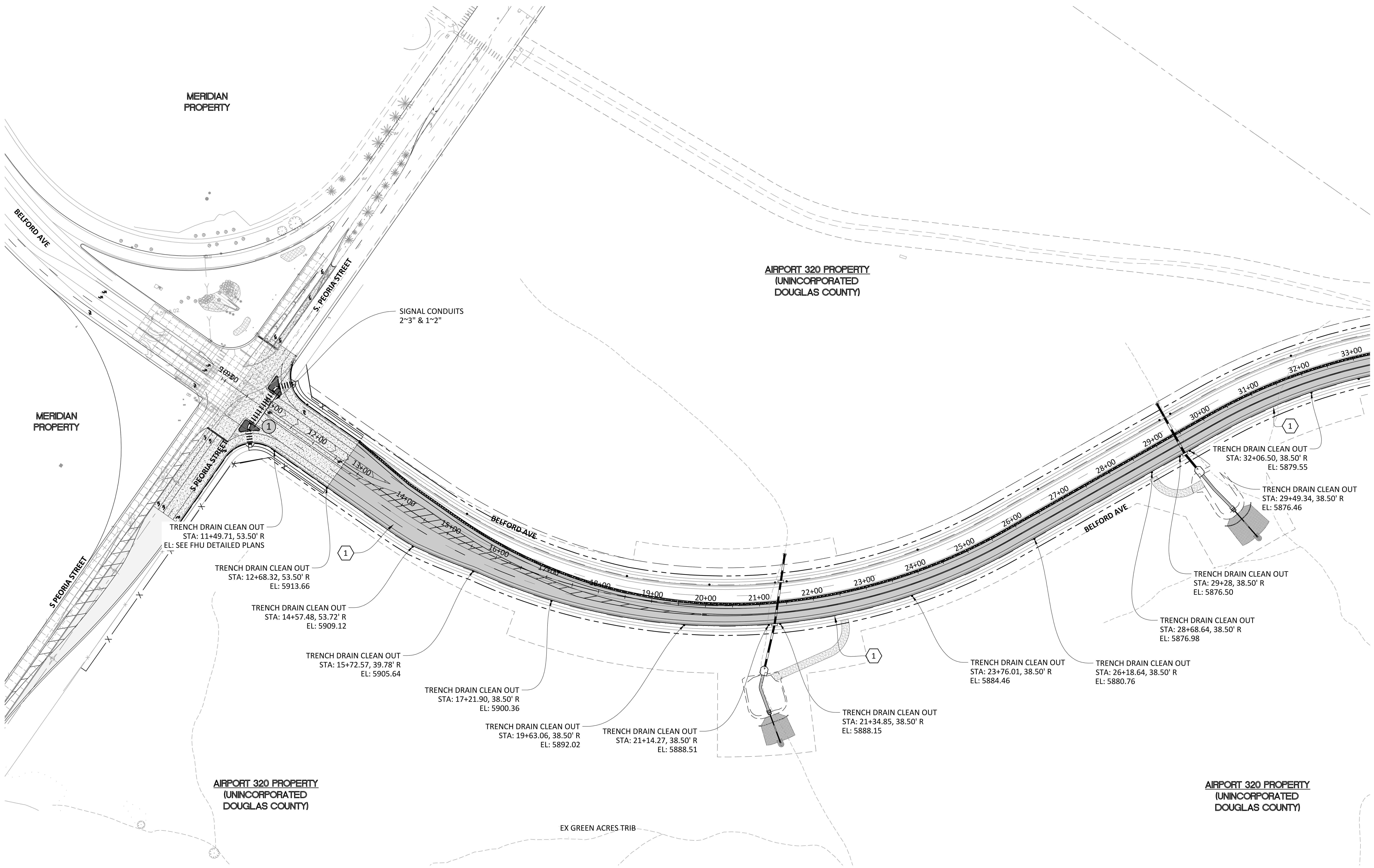
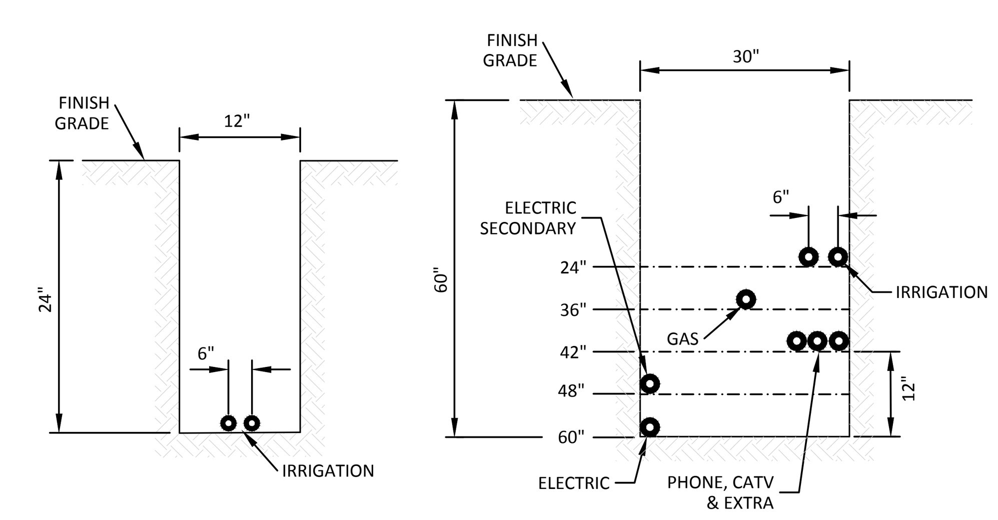


PLAN: BELFORD AVENUE

TRENCH DRAIN NOTES:

1. SEE DETAIL 31 OF STREET DETAILS FOR TRENCH DRAIN SPECIFICATIONS
2. TRENCH DRAINS SHALL TIE INTO STORM MANHOLES OR INLETS
3. CLEANOUTS SHALL BE PROVIDED AT ALL JUNCTIONS, ANGLE POINTS AND SPACED AT MAXIMUM 500' INTERVALS.



NOTE: MINIMUM REQUIREMENTS -
ELECTRIC - 12" FROM ALL OTHER UTILITIES
GAS - 12" FROM ALL OTHER UTILITIES

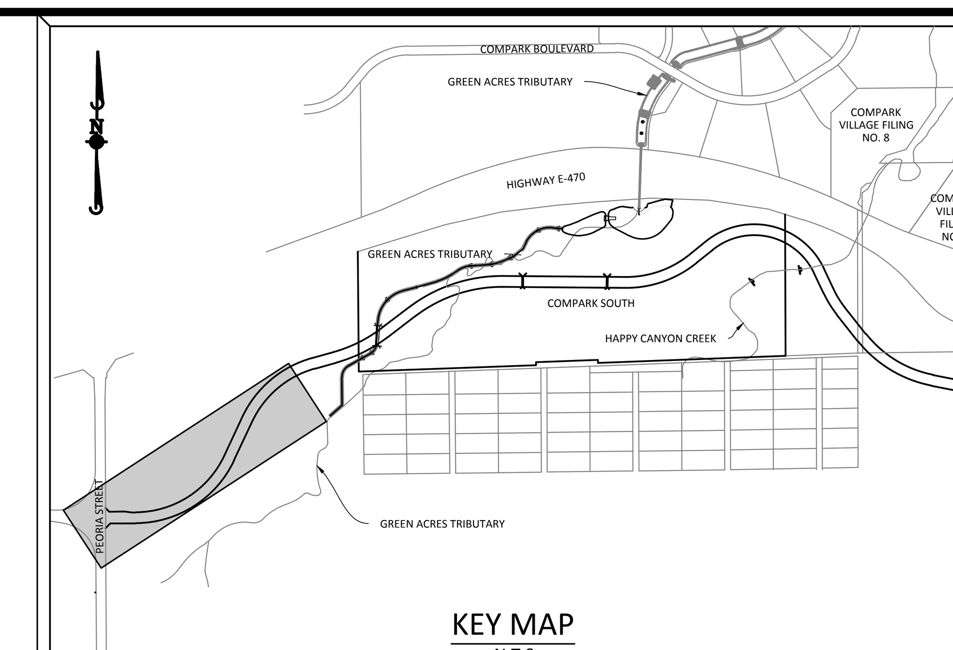
TYPICAL CONDUIT SLEEVE SECTIONS
N.T.S.

NOTES:

1. INSTALL CROSSINGS TO CLEAR THE ROW AND WALKS. INSTALL SLEEVES IN LINE WITH THE APPROPRIATE EASEMENTS.
2. EXTRA CROSSINGS ARE INSTALLED AT THE DISCRETION OF THE DEVELOPER.
3. THESE CROSSING LOCATIONS HAVE BEEN PROVIDED BY THE RESPECTIVE UTILITY COMPANIES AS OF THIS DATE. ANY CHANGES, ADDITIONS, OR RELOCATIONS RECEIVED BY MANHARD CONSULTING, LTD. AFTER PAVING HAS BEEN COMPLETED WILL HAVE TO BORED.
4. ALL ELECTRIC AND GAS CROSSINGS MUST BE SCHEDULE 40 GRAY PVC, PHONE AND TV ARE TO BE WHITE SCHEDULE 40 PVC. IRR AS SHOWN ABOVE.
5. ALL CROSSINGS MUST BE 95% COMPACTION AND TESTED. MARK BOTH ENDS OF SLEEVE WITH 2 X 4 POST-PAINTED.
6. XCEL REQUIRES ALL CROSSINGS TO HAVE TRACER WIRE INSTALLED NEXT TO THE SLEEVE.
7. ALL TRENCH LINES MUST BE WITHIN 6" OF FINISHED GRADE PER XCEL STANDARDS.
8. GRADE AT TRANSFORMERS MUST BE 100% TO FINISHED GRADE.

CAUTION:

HAVE ALL BURIED UTILITIES LOCATED PRIOR TO TRENCHING OR BORING.



KEY MAP
N.T.S

SOURCE BENCHMARKS:

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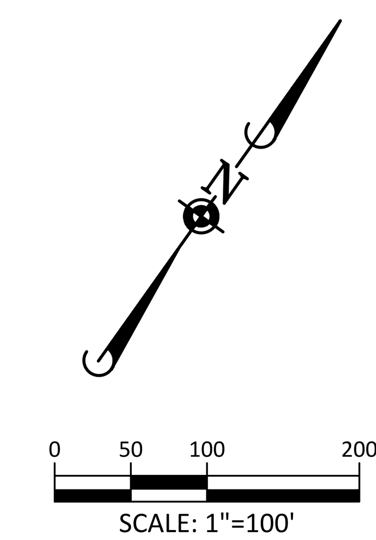

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LEGEND

⟨2⟩	CONSTRUCTION NOTE
(1)	UTILITY SLEEVE CROSSING N0.

CONSTRUCTION NOTES

1. 4" TRENCHDRAIN (TYP.)
2. 4" SCH 80 CONDUIT SLEEVE PIPE REQUIRED UNDER ALL ROADWAY CROSSINGS
3. BORE TRENCHDRAIN UNDER EXISTING ROADWAY
4. 2" CONDUIT W/ 14 GA. TRACER WIRE AND PULL ROPE FOR SIGNAL INTERCONNECT
5. ALL CONDUITS TO LANDSCAPED MEDIANS SHALL BE SWEPT UP AT 90° AND SHALL TERMINATE IN A PULL BOX SET TO FINISHED GRADE.
6. ALL INTERCONNECT CONDUITS SHALL BE SWEPT UP AT 90° TO 11"X17" QUASITE PULLBOXES. 400' SPACING MAXIMUM.

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TOWN OF PARKER, DIRECTOR OF ENGINEERING ____________ DATE

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B 4/11/16	2ND SUBMITTAL	
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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
CONDUIT SLEEVING & TRENCH DRAIN

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
23 OF 40
CLCPKC3 ---

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PENDING APPROVAL

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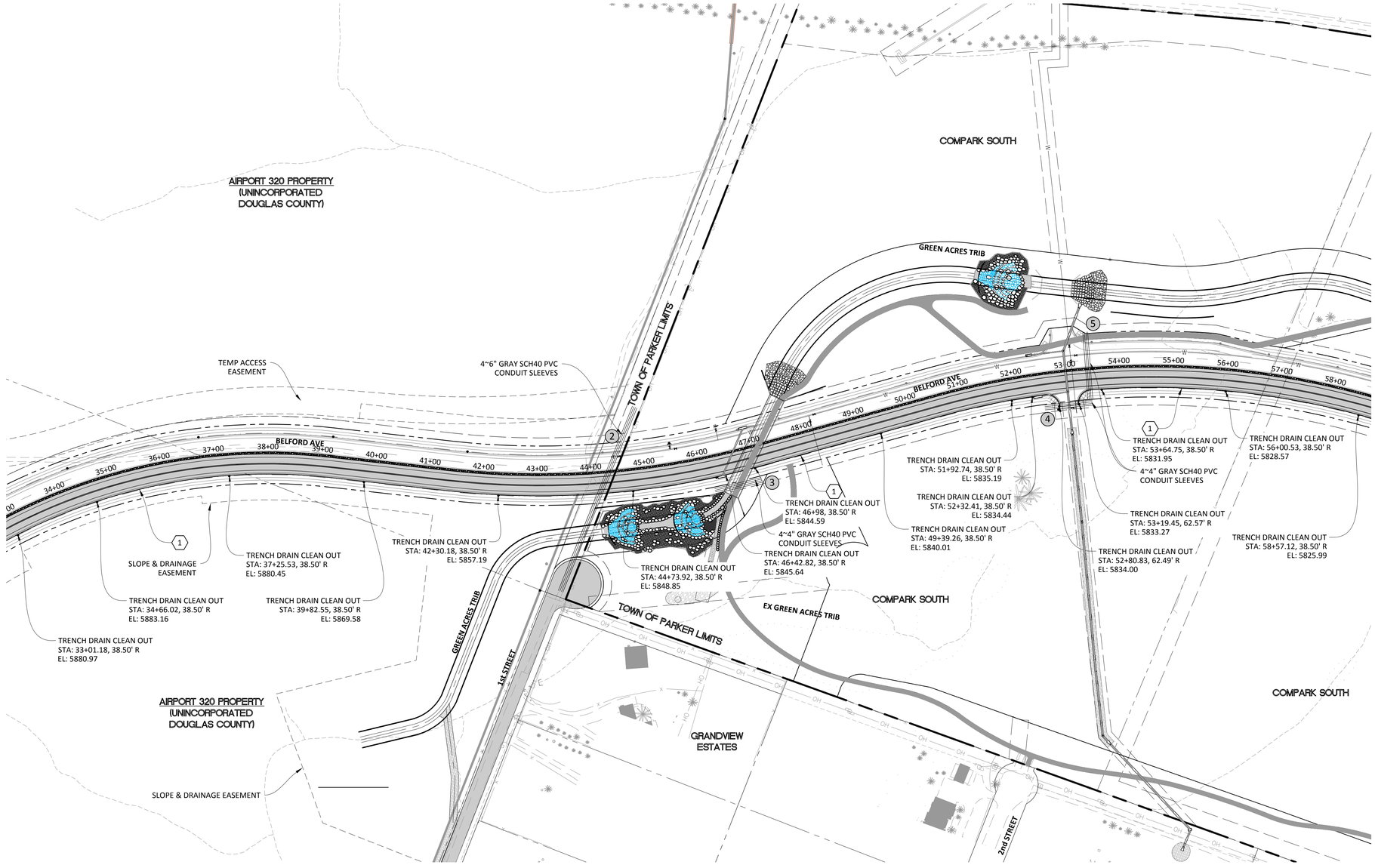

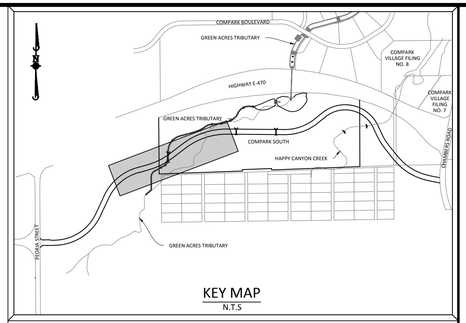

KEY MAP
N.T.S

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0 50 100 200
SCALE: 1"=100'

LEGEND

(2) CONSTRUCTION NOTE

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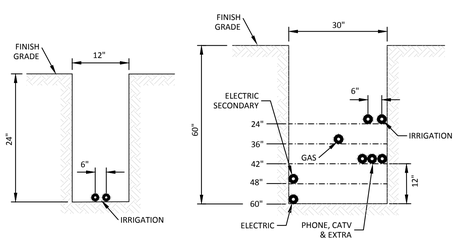

NOTE: MINIMUM REQUIREMENTS -
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TYPICAL CONDUIT SLEEVE SECTIONS
N.T.S.

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CONDUIT SLEEVING & TRENCH DRAIN

PROJ. MGR.: RJM
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DRAWN BY: ETG
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SHEET 24 OF 40
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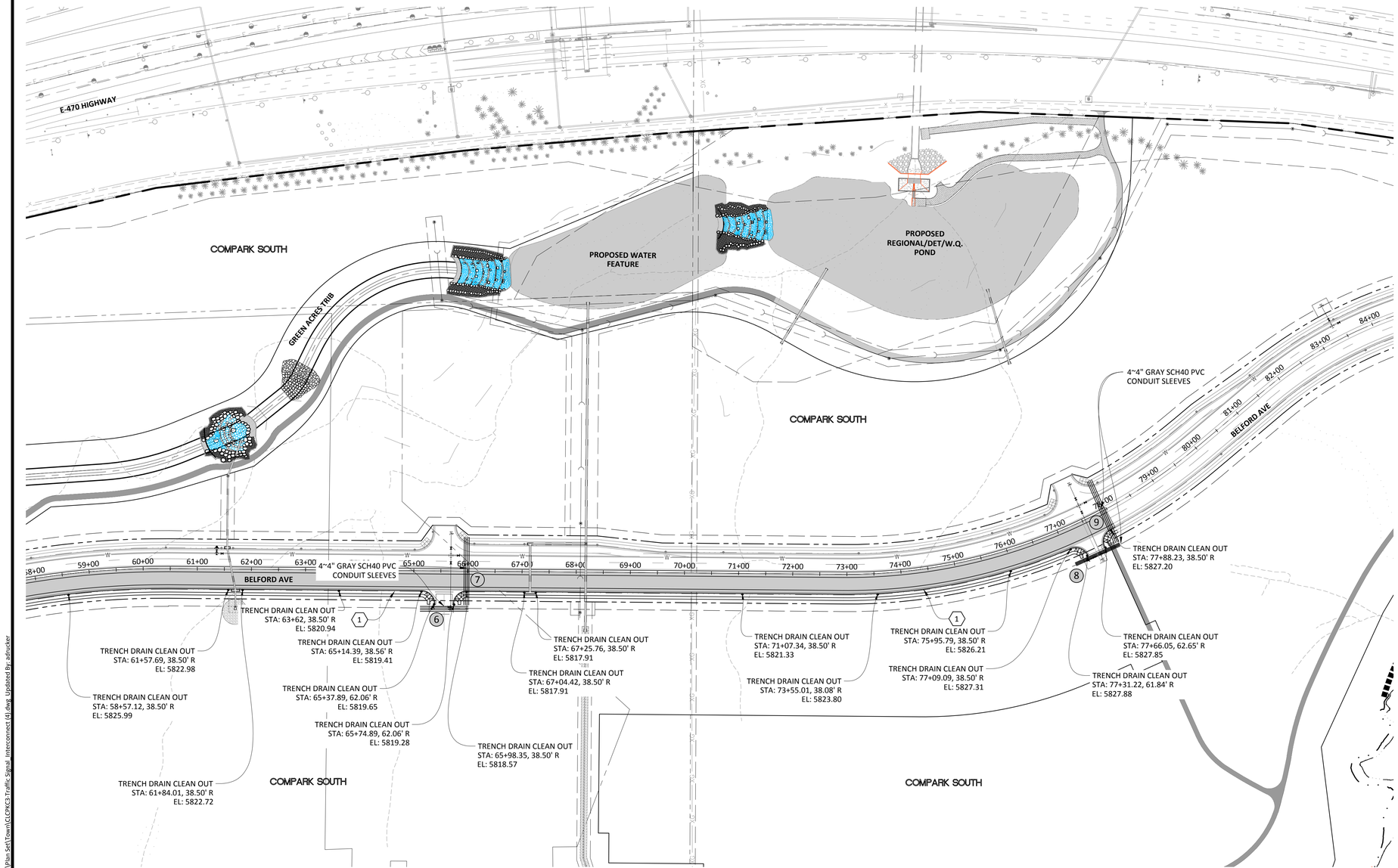
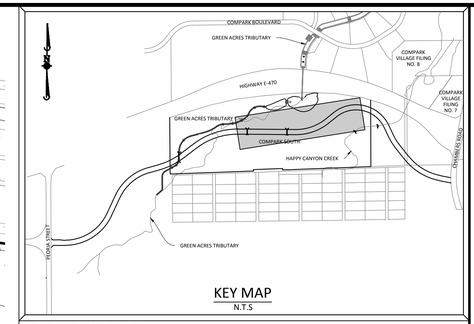




KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

N

0 50 100 200
SCALE: 1"=100'

811 Know what's below. Call before you dig.

LEGEND

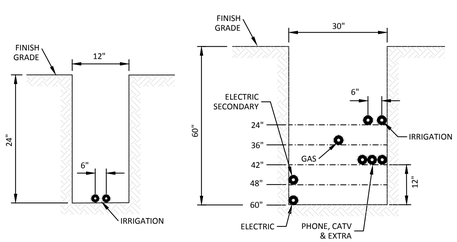
- (2) CONSTRUCTION NOTE
- (1) UTILITY SLEEVE CROSSING N0.

CONSTRUCTION NOTES

1. 4" TRENCHDRAIN (TYP.)
2. 4" SCH 80 CONDUIT SLEEVE PIPE REQUIRED UNDER ALL ROADWAY CROSSINGS
3. BORE TRENCHDRAIN UNDER EXISTING ROADWAY
4. 2" CONDUIT W/ 14 GA. TRACER WIRE AND PULL ROPE FOR SIGNAL INTERCONNECT
5. ALL CONDUITS TO LANDSCAPED MEDIANS SHALL BE SWEPT UP AT 90° AND SHALL TERMINATE IN A PULL BOX SET TO FINISHED GRADE.
6. ALL INTERCONNECT CONDUITS SHALL BE SWEPT UP AT 90° TO 11"X17" QUASITE PULLBOXES. 400' SPACING MAXIMUM.

TRENCH DRAIN NOTES:

1. SEE DETAIL 31 OF STREET DETAILS FOR TRENCH DRAIN SPECIFICATIONS
2. TRENCH DRAINS SHALL TIE INTO STORM MANHOLES OR INLETS
3. CLEANOUTS SHALL BE PROVIDED AT ALL JUNCTIONS, ANGLE POINTS AND SPACED AT MAXIMUM 500' INTERVALS.



NOTE: MINIMUM REQUIREMENTS -
ELECTRIC - 12" FROM ALL OTHER UTILITIES
GAS - 12" FROM ALL OTHER UTILITIES

TYPICAL CONDUIT SLEEVE SECTIONS
N.T.S.

NOTES:

1. INSTALL CROSSINGS TO CLEAR THE ROW AND WALKS. INSTALL SLEEVES IN LINE WITH THE APPROPRIATE EASEMENTS.
2. EXTRA CROSSINGS ARE INSTALLED AT THE DISCRETION OF THE DEVELOPER.
3. THESE CROSSING LOCATIONS HAVE BEEN PROVIDED BY THE RESPECTIVE UTILITY COMPANIES AS OF THIS DATE. ANY CHANGES, ADDITIONS, OR RELOCATIONS RECEIVED BY MANHARD CONSULTING, LTD. AFTER PAVING HAS BEEN COMPLETED WILL HAVE TO BORED.
4. ALL ELECTRIC AND GAS CROSSINGS MUST BE SCHEDULE 40 GRAY PVC, PHONE AND TV ARE TO BE WHITE SCHEDULE 40 PVC. IRR AS SHOWN ABOVE.
5. ALL CROSSINGS MUST BE 95% COMPACTION AND TESTED. MARK BOTH ENDS OF SLEEVE WITH 2 X 4 POST-PAINTED.
6. XCEL REQUIRES ALL CROSSINGS TO HAVE TRACER WIRE INSTALLED NEXT TO THE SLEEVE.
7. ALL TRENCH LINES MUST BE WITHIN 6" OF FINISHED GRADE PER XCEL STANDARDS.
8. GRADE AT TRANSFORMERS MUST BE 100% TO FINISHED GRADE.

CAUTION:

HAVE ALL BURIED UTILITIES LOCATED PRIOR TO TRENCHING OR BORING.

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DRAWN BY	REVISIONS	DATE
ETG	C 3RD SUBMITTAL	6/24/16
	B 2ND SUBMITTAL	4/14/16
	A 1ST SUBMITTAL	11/2015

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
CONDUIT SLEEVING & TRENCH DRAIN

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 25 OF 40
CLCPKC3 ---

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PENDING APPROVAL

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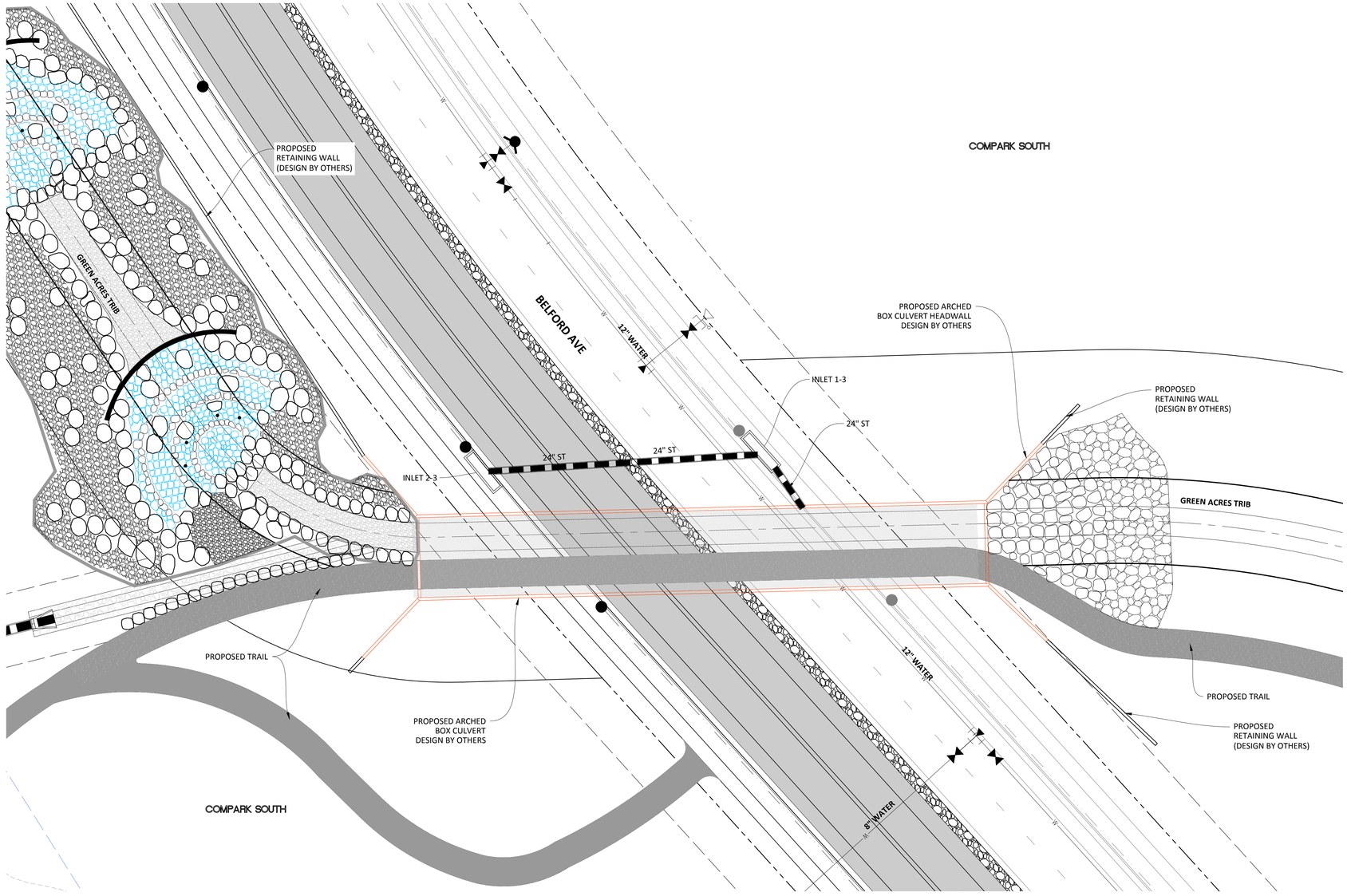

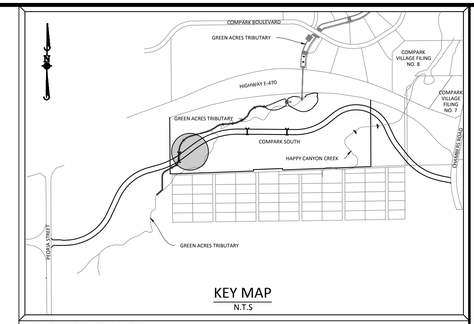

KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

SCALE: 1"=##'

Know what's **below.**
Call before you dig.

G.A.T. BOX CULVERT
TO BE CONSTRUCTED WITH DRAINAGE IMPROVEMENT CONSTRUCTION PLANS, GREEN ACRES TRIBUTARY, COMPARK VILLAGE SOUTH, FILING NO. 1

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
6/27/16	C 3RD SUBMITTAL	
4/11/16	B 2ND SUBMITTAL	
11/2015	A 1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
G.A.T. BOX CULVERT PLAN & DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
26 OF 40
CLCPKC3 ---

PENDING APPROVAL

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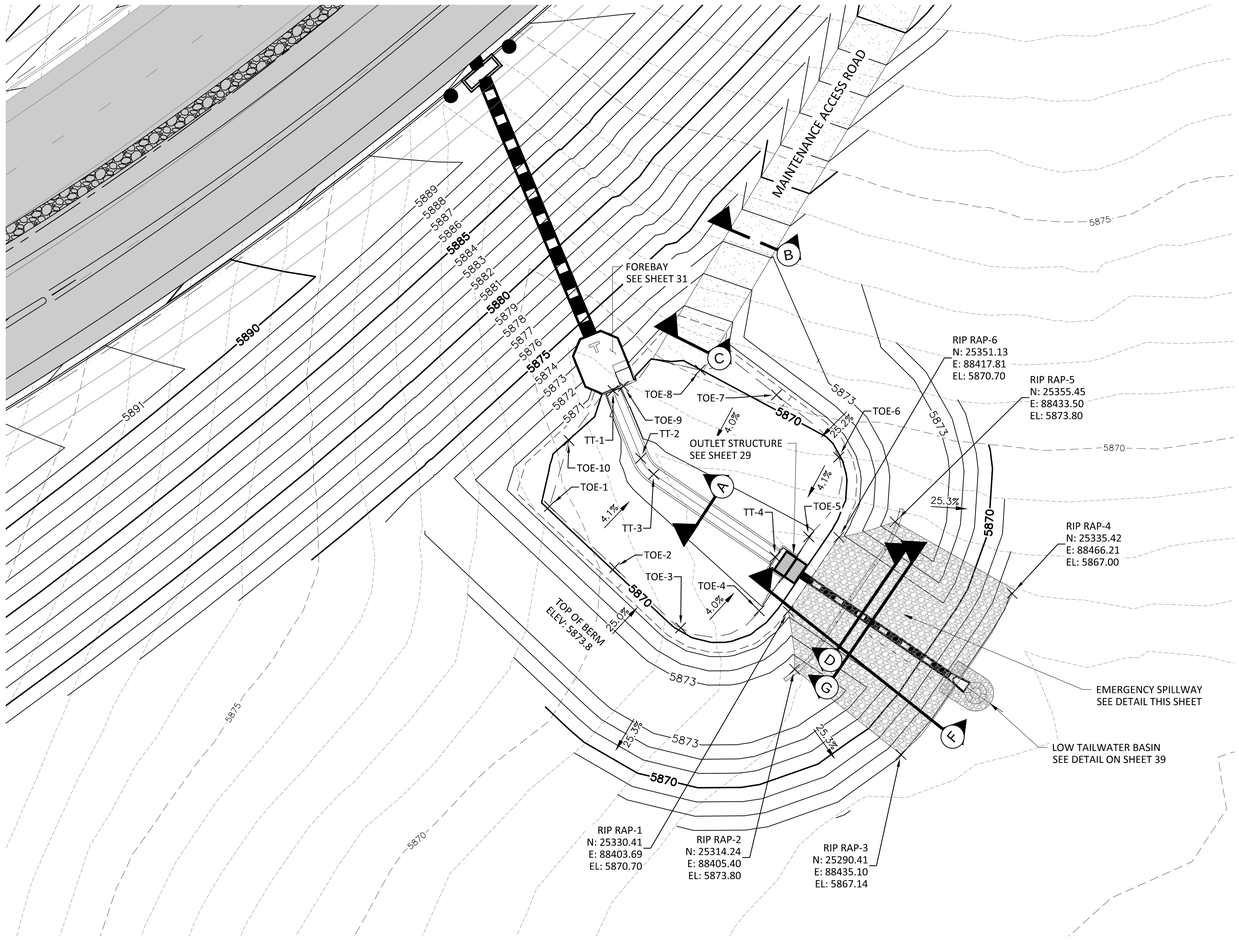
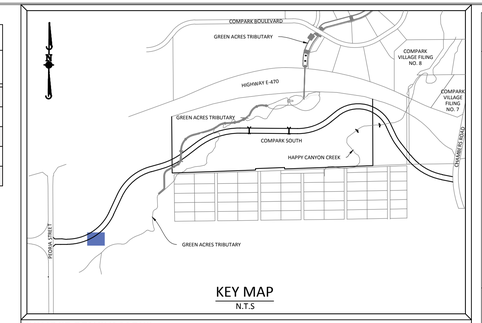
Plotted: 6/27/2016 8:08 PM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-GAT Box Culvert.dwg Updated By: adrucker



FREQUENCY STORM	REQUIRED VOLUMES (FT^3 OR AC.-FT.)	RECORD DRAWING CALCULATIONS					
		CALC. VOL.	BY:	DATE	CALC. VOL.	BY:	DATE
EURV	0.16 AC.-FT.						

0 10 20 40

SCALE: 1"=20'



KEY MAP
N.T.S

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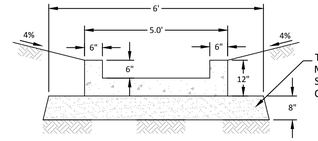
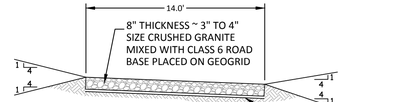
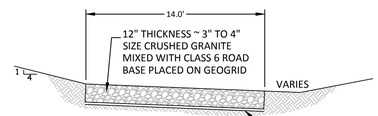


SECTION A
5.0' WIDE TRICKLE CHANNEL
½" = 1'-0"

NOTE: USE 4 POUNDS PER CU. YD. OF FIBRE MESH TO REINFORCE CONCRETE



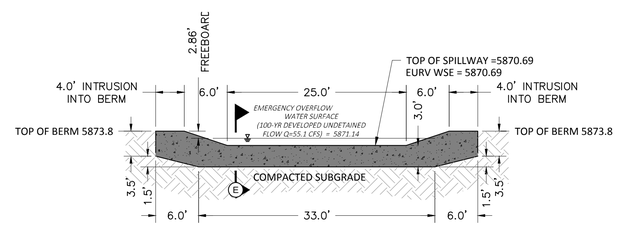
SECTION B
MAINTENANCE ACCESS ROAD
ABOVE EURV WATER SURFACE
¼" = 1'-0"



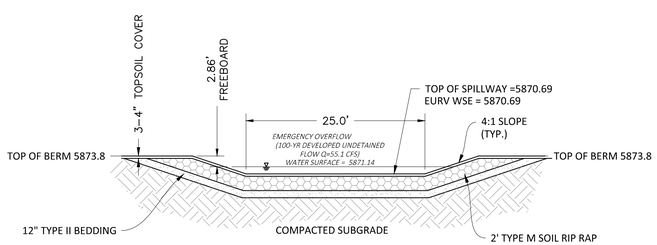
SECTION C
MAINTENANCE ACCESS ROAD
BELOW EURV WATER SURFACE
¼" = 1'-0"

Point Table

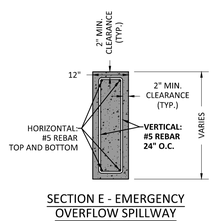
Point	Elevation	Northing	Easting	Description
TOE–1	5869.80	25359.77	88336.93	POND TOE
TOE–2	5869.79	25342.64	88355.14	POND TOE
TOE–3	5869.79	25325.82	88373.57	POND TOE
TOE–4	5869.06	25330.60	88395.52	POND TOE
TOE–5	5868.93	25351.29	88409.37	POND TOE
TOE–6	5869.88	25373.50	88417.74	POND TOE
TOE–7	5870.15	25390.92	88400.34	POND TOE
TOE–8	5869.99	25397.88	88379.04	POND TOE
TOE–9	5869.95	25393.34	88357.58	POND TOE
TOE–10	5869.96	25378.21	88342.37	POND TOE
TT–1	5868.45	25392.15	88354.68	Trickle Channel
TT–2	5868.35	25373.23	88362.42	Trickle Channel
TT–3	5868.32	25368.74	88366.05	Trickle Channel
TT–4	5868.11	25345.64	88399.94	Trickle Channel



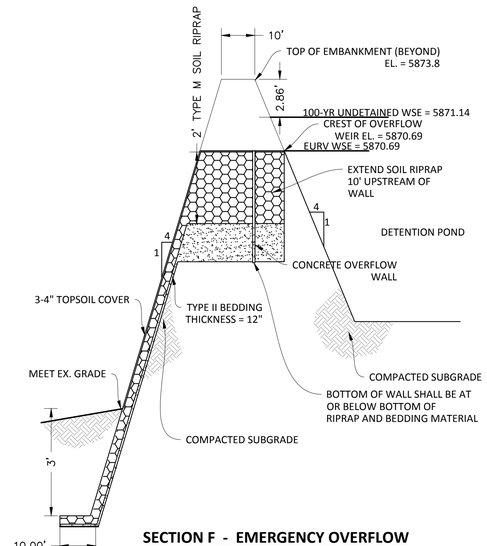
SECTION D - EMERGENCY OVERFLOW SPILLWAY CUTOFF WALL
1" = 10'



SECTION G - EMERGENCY OVERFLOW SPILLWAY



SECTION E - EMERGENCY OVERFLOW SPILLWAY
1" = 2'



SECTION F - EMERGENCY OVERFLOW SPILLWAY
1" = 20'H
1"=2'V

811 Know what's below. Call before you dig.

NOTE:

1. PRIOR TO FINAL TOP SOILING, SEEDING AND MULCHING, CONTRACTOR SHALL OBTAIN FINAL AS-BUILT VOLUME CHECK AND CERTIFICATION FROM THE ENGINEER. FAILURE TO DO SO WILL REQUIRE THE CONTRACTOR TO REMOVE AND REPLACE TOP SOIL MATERIALS AT HIS/HER EXPENSE.
2. REFER TO GENERAL NOTES ON SHEET 2 AND DETAILS ON FOLLOWING SHEETS
3. EMBANKMENT FILL SHALL MEET THE MINIMUM REQUIREMENTS OF TOWN OF PARKER AND THE GEOTECHNICAL REPORT. SEE GENERAL NOTES ON SHEET 2.
4. THIS WATER QUALITY BASIN HAS BEEN SIZED TO SERVE AS A TEMPORARY SEDIMENT BASIN DURING CONSTRUCTION. ONCE CONSTRUCTION IS COMPLETE, THE SPILLWAY SHALL BE LOWERED TO THE EURV WATER SURFACE ELEVATION, AS SHOWN ON THE DETAIL ON THIS SHEET.

TOWN OF PARKER APPROVALS

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
6/27/16	3RD SUBMITTAL	EG
4/14/16	2ND SUBMITTAL	
11/2015	1ST SUBMITTAL	

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
WEST WATER QUALITY POND PLAN

PROJ. MGR.: R.M
PROJ. ASSOC.: BRB
DRAWN BY: ETC
DATE: 12/2015

SHEET 27 OF 40
CLCPKC3

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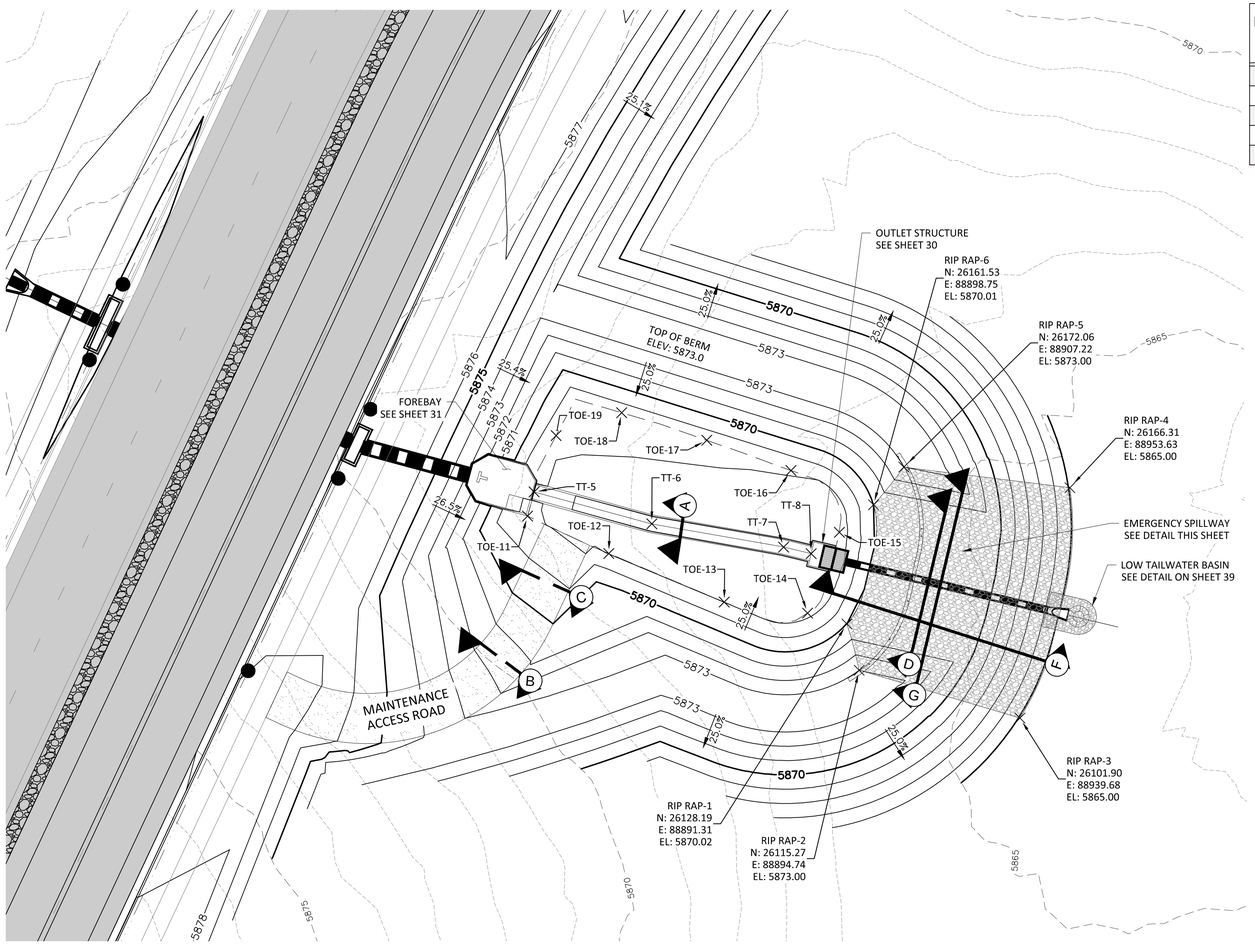
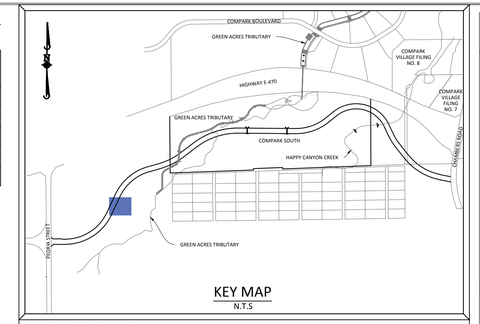


FREQUENCY STORM	REQUIRED VOLUMES (FT^3 OR AC.–FT.)	RECORD DRAWING CALCULATIONS					
		CALC. VOL.	BY:	DATE	CALC. VOL.	BY:	DATE
EURV	0.23 AC.-FT.						

N

0 10 20 40

SCALE: 1"=20'



KEY MAP
N.T.S

SOURCE BENCHMARKS:

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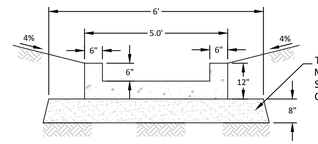
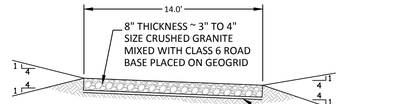
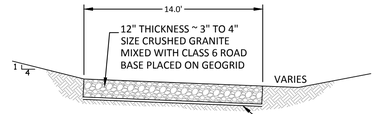


SECTION A
5.0' WIDE TRICKLE CHANNEL
½" = 1'-0"

NOTE: USE 4 POUNDS PER CU. YD. OF FIBRE MESH TO REINFORCE CONCRETE



SECTION B
MAINTENANCE ACCESS ROAD
ABOVE EURV WATER SURFACE
¼" = 1'-0"



SECTION C
MAINTENANCE ACCESS ROAD
BELOW EURV WATER SURFACE
¼" = 1'-0"

NOTE:

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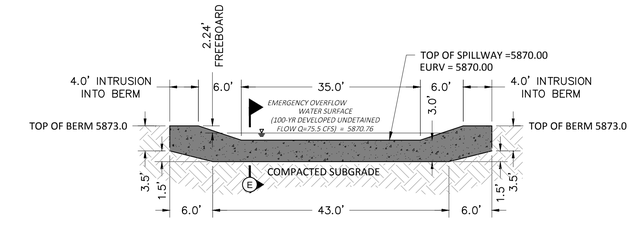
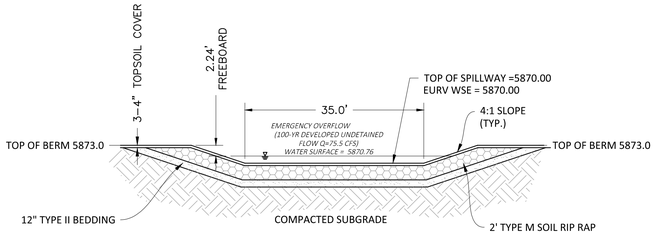
Point Table

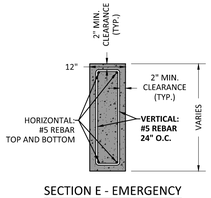
Point	Elevation	Northing	Easting	Description
TOE–11	5868.56	26158.38	88802.07	POND TOE
TOE–12	5867.99	26147.91	88824.77	POND TOE
TOE–13	5867.99	26134.33	88857.03	POND TOE
TOE–14	5867.77	26131.25	88880.33	POND TOE
TOE–15	5867.43	26153.85	88889.22	POND TOE
TOE–16	5868.07	26171.11	88875.68	POND TOE
TOE–17	5868.29	26179.55	88852.15	POND TOE
TOE–18	5868.47	26187.25	88828.37	POND TOE
TOE–19	5868.16	26180.86	88810.05	POND TOE
TT–5	5867.06	26165.13	88803.90	Trickle Channel
TT–6	5866.89	26156.19	88836.79	Trickle Channel
TT–7	5866.70	26149.71	88873.62	Trickle Channel
TT–8	5866.66	26147.87	88881.32	Trickle Channel



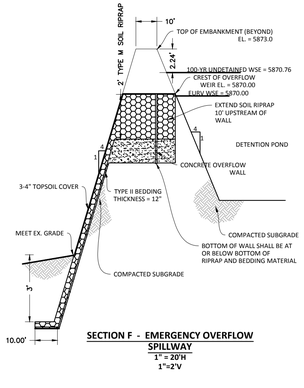
SECTION D - EMERGENCY OVERFLOW SPILLWAY CUTOFF WALL
1" = 10'



SECTION G - EMERGENCY OVERFLOW SPILLWAY
1" = 10'



SECTION E - EMERGENCY OVERFLOW SPILLWAY
1" = 2'



SECTION F - EMERGENCY OVERFLOW SPILLWAY
1" = 20'H
1"=2'V

Know what's **below.**
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TOWN OF PARKER APPROVALS

THE TOWN OF PARKER REVIEW CONSTITUTES GENERAL COMPLIANCE WITH THE TOWN'S STANDARDS AND APPROVED VARIANCES, SUBJECT TO THESE PLANS BEING STAMPED, SIGNED, AND DATED BY THE PROFESSIONAL ENGINEER OF RECORD. REVIEW BY THE TOWN DOES NOT CONSTITUTE APPROVAL OF THE PLAN DESIGN OR ACCURACY AND CORRECTNESS OF ENGINEERING CALCULATIONS. ERRORS IN THE DESIGN OR CALCULATIONS REMAIN THE RESPONSIBILITY OF THE REGISTERED PROFESSIONAL ENGINEER WHOSE STAMP AND SIGNATURE ARE AFFIXED TO THIS DOCUMENT.

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TOWN OF PARKER, DIRECTOR OF ENGINEERING — DATE

DRAWN BY	DATE	REVISIONS
EG	6/24/16	3RD SUBMITTAL
	4/14/16	2ND SUBMITTAL
	11/2015	1ST SUBMITTAL

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
EAST WATER QUALITY POND PLAN

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 28 OF 40
CLCPKC3

PENDING APPROVAL

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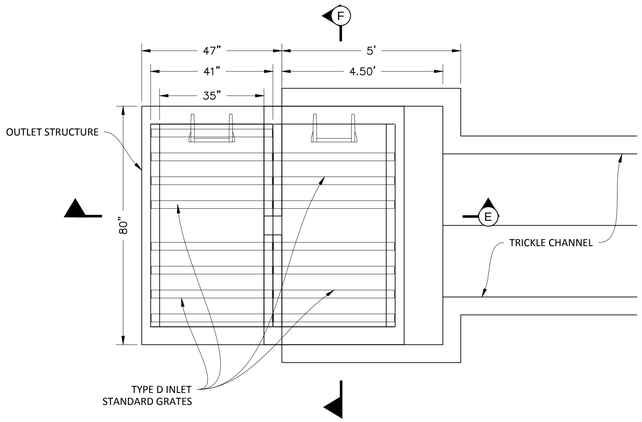
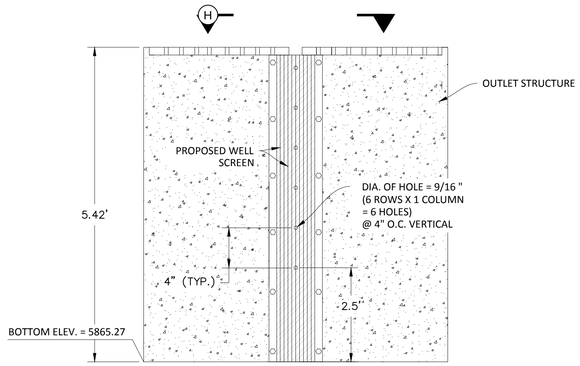
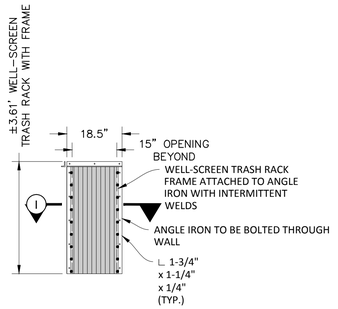
NOTE: DRAINAGE STRUCTURES REQUIRE FINAL SHOP DRAWINGS AND STRUCTURAL ENGINEERING TO BE SUBMITTED TO THE TOWN OF PARKER AND MANHARD CONSULTING FOR FINAL REVIEW AND APPROVAL. ANY CHANGE IN STRUCTURE TYPE, CONFIGURATION OR SHAPE WILL REQUIRE A "NOTICE OF CHANGE" AND WILL REQUIRE REVISIONS TO THE CIVIL DRAWINGS TO REFLECT THEIR CHANGES.



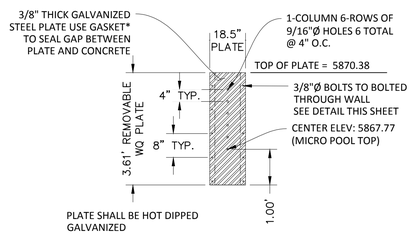
PLAN - WEST POND OUTLET STRUCTURE
1"=2'



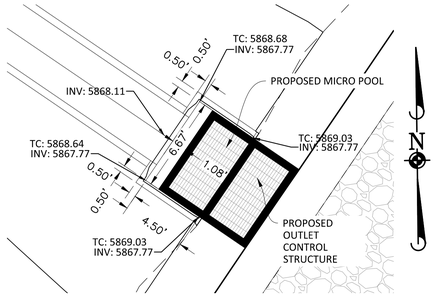
PROFILE VIEW SECTION F-F
N.T.S.



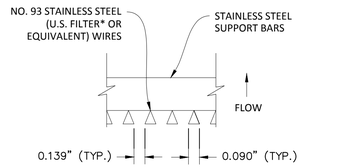
WELL-SCREEN TRASH RACK DETAIL
N.T.S.



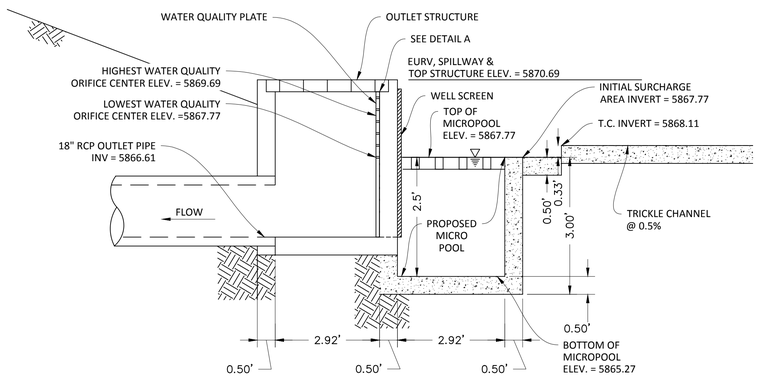
WATER QUALITY CONTROL PLATE
N.T.S.



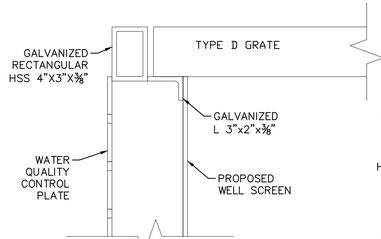
WEST POND INITIAL SURCHARGE AREA
1"=5'



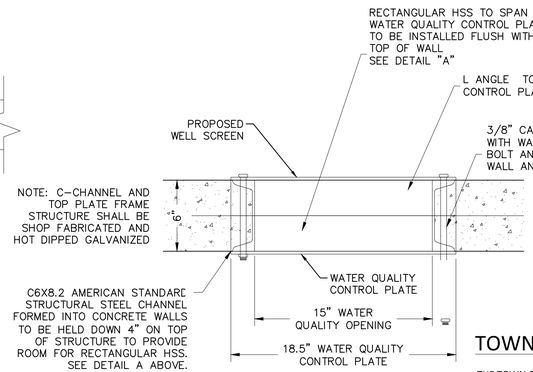
SECTION I-I WELL-SCREEN TRASH RACK
N.T.S.



PROFILE VIEW SECTION E-E
N.T.S.



DETAIL A
INSTALLATION INFORMATION
N.T.S.



SECTION H-H
OPENING DETAIL
N.T.S.

NOTES:

1. REFER TO CDOT M-604-11 STANDARD, TYPE 'D' INLET, FOR CONCRETE, STEEL, GRATE, AND STEP REQUIREMENTS, REINFORCING BARS SHALL BE PLACED IN ALL INTERIOR, EXTERIOR AND BASE WALLS.

2. STEPS SHALL BE PROVIDED IN ACCORDANCE WITH AASHTO M 199.

3. GRATES SHALL BE STANDARD GRATE TYPE.

4. CONTRACTOR SHALL PROVIDE SHOP DRAWINGS TO ENGINEER FOR REVIEW, PRIOR TO CONSTRUCTION.

5. CONTRACTOR TO HAVE PROFESSIONAL ENGINEER DESIGN AND CERTIFY THE OUTLET STRUCTURE.

* PROVIDE NEOPRENE GASKET (CLOSED CELL MEDIUM GASKET WITH ADHESIVE ON ONE SIDE, 1/4-IN. THICK X 2-IN. WIDE) BETWEEN THE WATER QUALITY PLATE AND THE CONCRETE OUTLET STRUCTURE.

TOWN OF PARKER APPROVALS

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2/5/16	2ND SUBMITTAL	
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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
OUTLET STRUCTURE WEST

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETC
DATE: 12/2015

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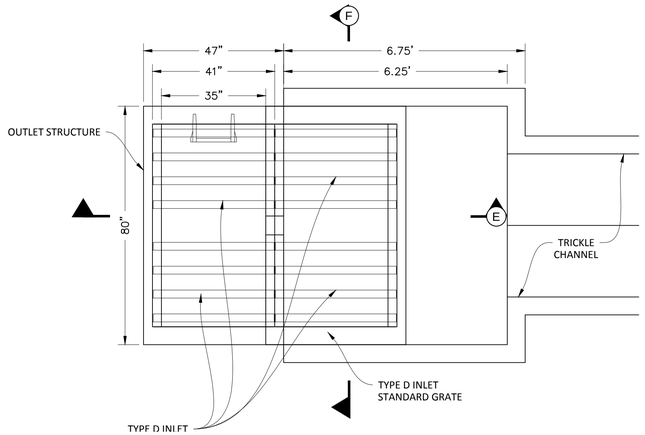
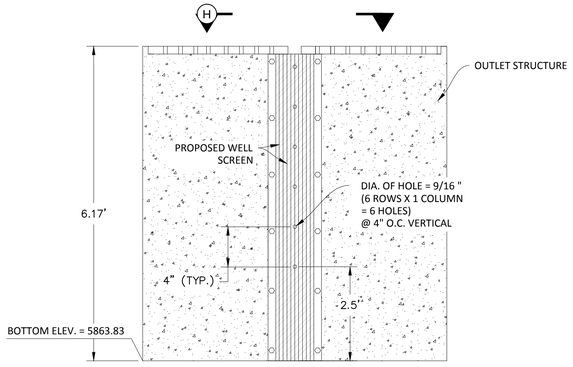
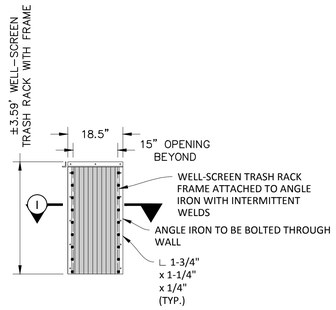


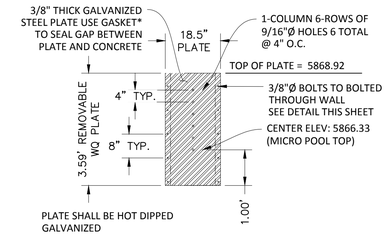
PLAN - EAST POND OUTLET STRUCTURE
1"=2'



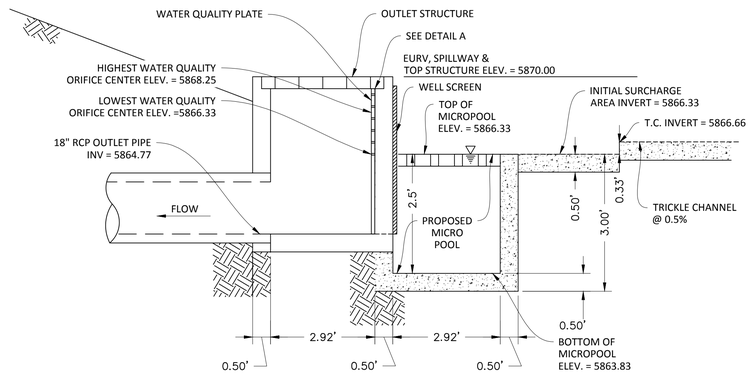
PROFILE VIEW SECTION F-F
N.T.S.



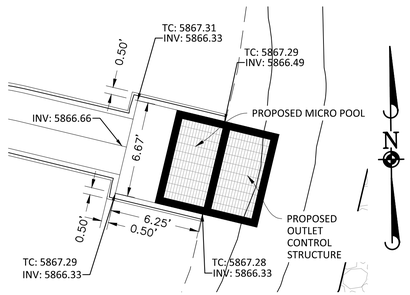
WELL-SCREEN
TRASH RACK DETAIL
N.T.S.



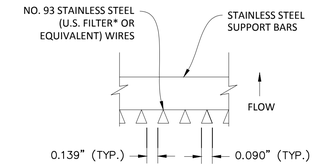
WATER QUALITY
CONTROL PLATE
N.T.S.



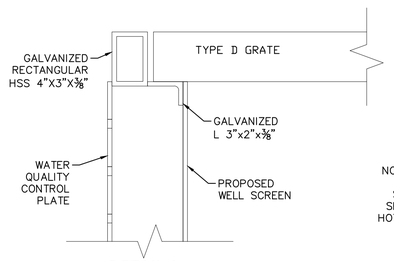
PROFILE VIEW SECTION E-E
N.T.S.



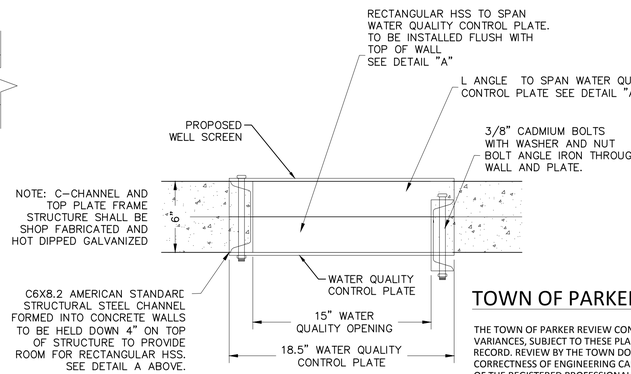
EAST POND INITIAL SURCHARGE AREA
1"=5'



SECTION I-I WELL-SCREEN TRASH RACK
N.T.S.



DETAIL A
INSTALLATION INFORMATION
N.T.S.



SECTION H-H
OPENING DETAIL
N.T.S.

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

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3	4/1/16	2ND SUBMITTAL	
2	11/2015	1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
OUTLET STRUCTURE EAST

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

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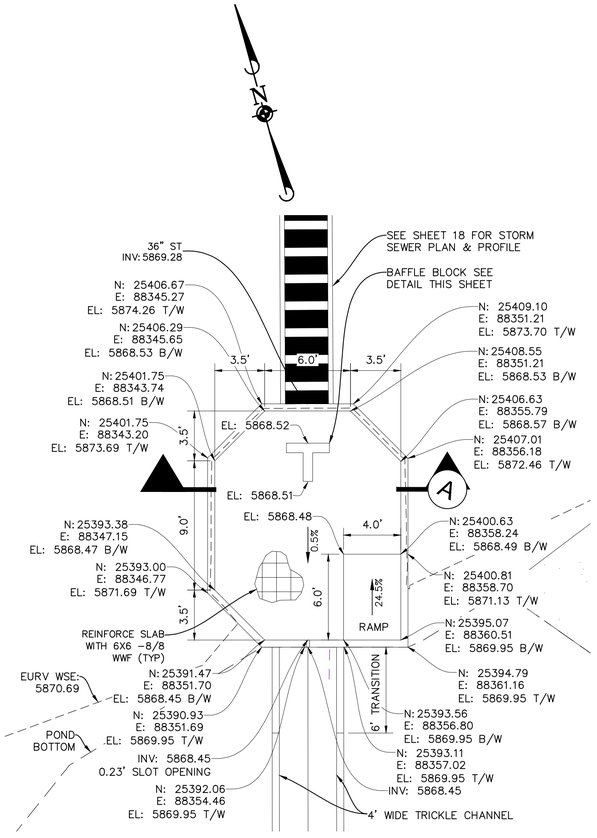
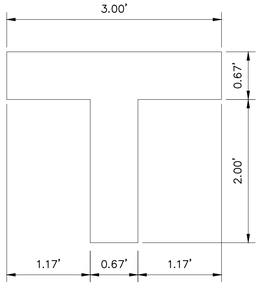


WEST POND FOREBAY

1"=5'



WEST POND FOREBAY
BAFFLE BLOCK DETAIL

1"=1'

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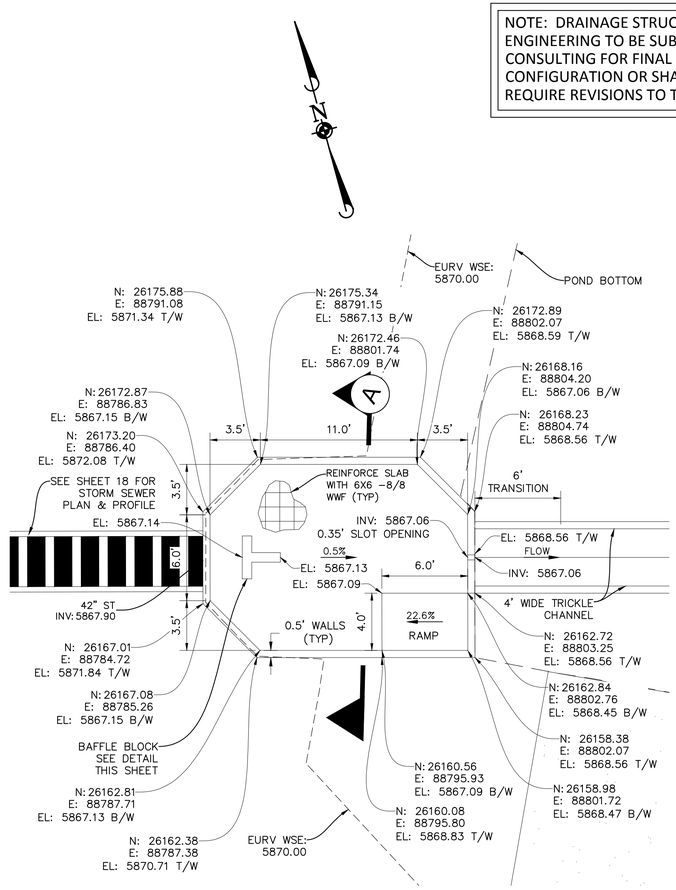
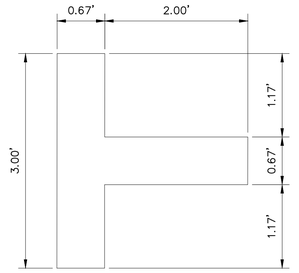


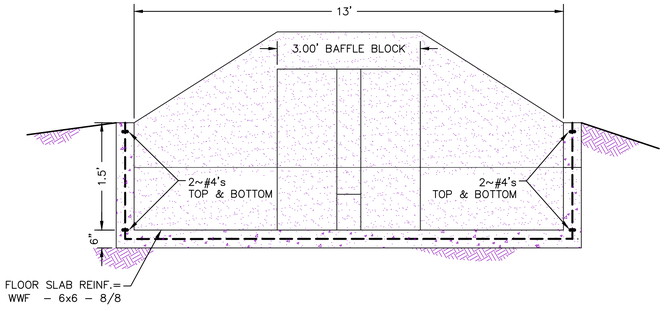
EAST POND FOREBAY

1"=5'



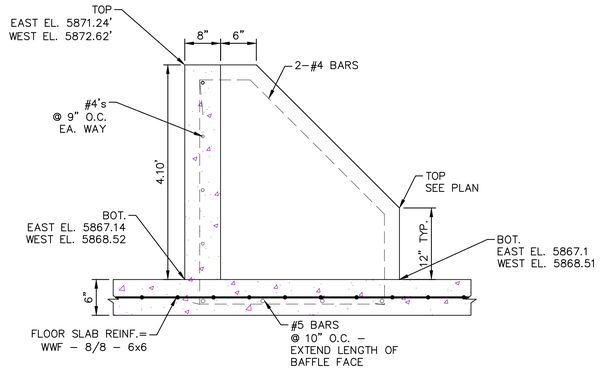
EAST POND FOREBAY
BAFFLE BLOCK DETAIL

1"=1'



SECTION A-A

N.T.S.



BAFFLE BLOCK
REINFORCING DETAIL

1"=0.5'

Know what's **below.**
Call before you dig.

TOWN OF PARKER APPROVALS

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

FOREBAY PLAN

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
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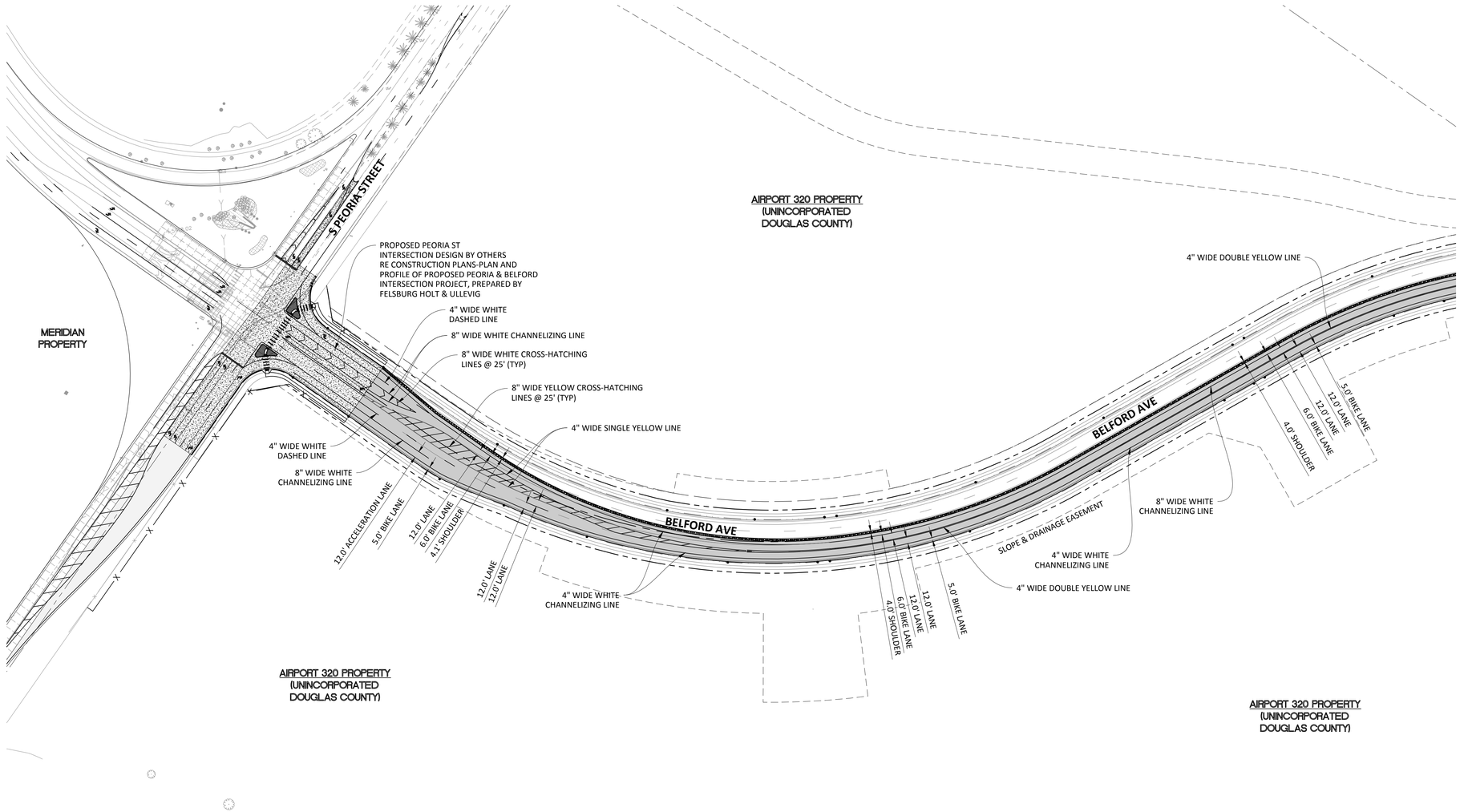
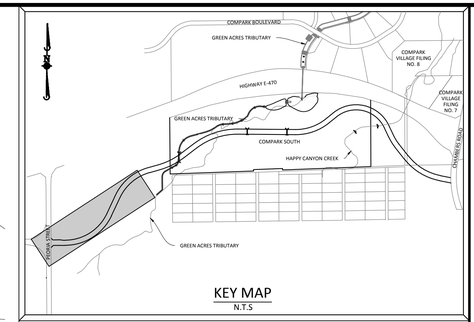
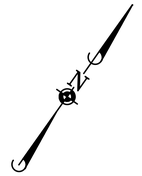




KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)



0 50 100 200
SCALE: 1"=100'

811 Know what's below. Call before you dig.

LEGEND

IIIII	CROSS WALK 24" X 10' WHITE EVENLY SPACED
↑	THROUGH LANE
↰	LEFT TURN ONLY
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NOTES

1. ALL LANES ARE 12' WIDE UNLESS LABELLED OTHERWISE.

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3. THE CONTRACTOR INSTALLING SIGNS SHALL BE RESPONSIBLE FOR THE LOCATING AND PROTECTING OF ALL UNDERGROUND UTILITIES.

4. TYPE III (LIGHTED) BARRICADES SHALL BE SET AT THE ENDS OF ROADWAYS SEPARATING FINISHED (AND/OR ACCEPTED) AND UNFINISHED CONSTRUCTION AREAS AND SHALL BE MAINTAINED BY THE CONTRACTOR/DEVELOPER. A "ROAD CLOSED AHEAD" AND "TO BE EXTENDED" WARNING SIGNS SHALL BE INSTALLED APPROPRIATELY IN ADVANCE OF THE TYPE III BARRICADES.

5. SPECIAL CARE SHALL BE TAKEN IN SIGN LOCATIONS TO ENSURE AN UNOBSTRUCTED VIEW OF EACH SIGN.

6. WHERE STOP SIGN CONTROL IS APPROPRIATE, 36-INCH STOP SIGNS SHALL BE USED FOR APPROACHES TO ANY ROADWAY THAT IS CLASSIFIED AS A COLLECTOR OR GREATER.

SIGNAGE AND STRIPING NOTES (CONT):

7. A 7-FOOT MINIMUM POST LENGTH SHALL BE MAINTAINED FROM THE BOTTOM OF THE SIGN PANEL TO THE GROUND. THIS REQUIREMENT FOR VERTICAL CLEARANCE IS FOR ALL SIGNS.

8. DELINEATION OF ROADWAYS SHALL BE AS SPECIFIED IN THE COLORADO DEPARTMENT OF TRANSPORTATION M AND S STANDARDS.

9. RAISED MEDIAN ISLAND NOSES SHALL HAVE R4-7 SIGNS AT EACH END.

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11. DIAMOND GRADE MATERIAL SHALL BE USED ON ALL STOP SIGN AND OVERHEAD SIGNS. ALL OTHER ROADSIDE TRAFFIC CONTROL DEVICES SHALL USE HIGH INTENSITY GRADE SHEETING. NO FLUORESCENT YELLOW-GREEN SHEETING SHALL BE USED UNLESS SPECIFICALLY APPROVED BY THE TOWN OF PARKER.

SIGNAGE AND STRIPING NOTES (CONT):

12. ALL STREET NAME SIGNS SHALL BE HIGH INTENSITY, EXTRUDED, GREEN AND WHITE BLADES. ARTERIAL AND COLLECTOR STREET NAME SIGNS SHALL BE 9-INCH BLADES AND HAVE MIXED CASE LETTERING. LOCAL STREET NAME SIGNS SHALL BE 6-INCH BLADES WITH ALL CAPITALIZED LETTERING.

13. ALL LAYOUTS FOR INTERNALLY ILLUMINATED STREET NAME SIGNS SHALL BE SUBMITTED TO THE TOWN FOR REVIEW AND APPROVAL PRIOR TO FABRICATION.

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SHALL LINE UP WITH HANDICAP RAMPS.

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(SAND OR WATER BLAST CURING COMPOUND PRIOR TO INSTALLATION OF MARKINGS.)

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TOWN OF PARKER, DIRECTOR OF ENGINEERING DATE

DATE	REVISIONS	DRAWN BY
6/27/16	C 3RD SUBMITTAL	ETG
4/11/16	B 2ND SUBMITTAL	
11/2015	A 1ST SUBMITTAL	

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Construction Managers • Environmental Scientists • Landscape Architects • Planners

COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
SIGNAGE AND STRIPING

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 32 OF 40
CLCPKC3 ---

PENDING APPROVAL

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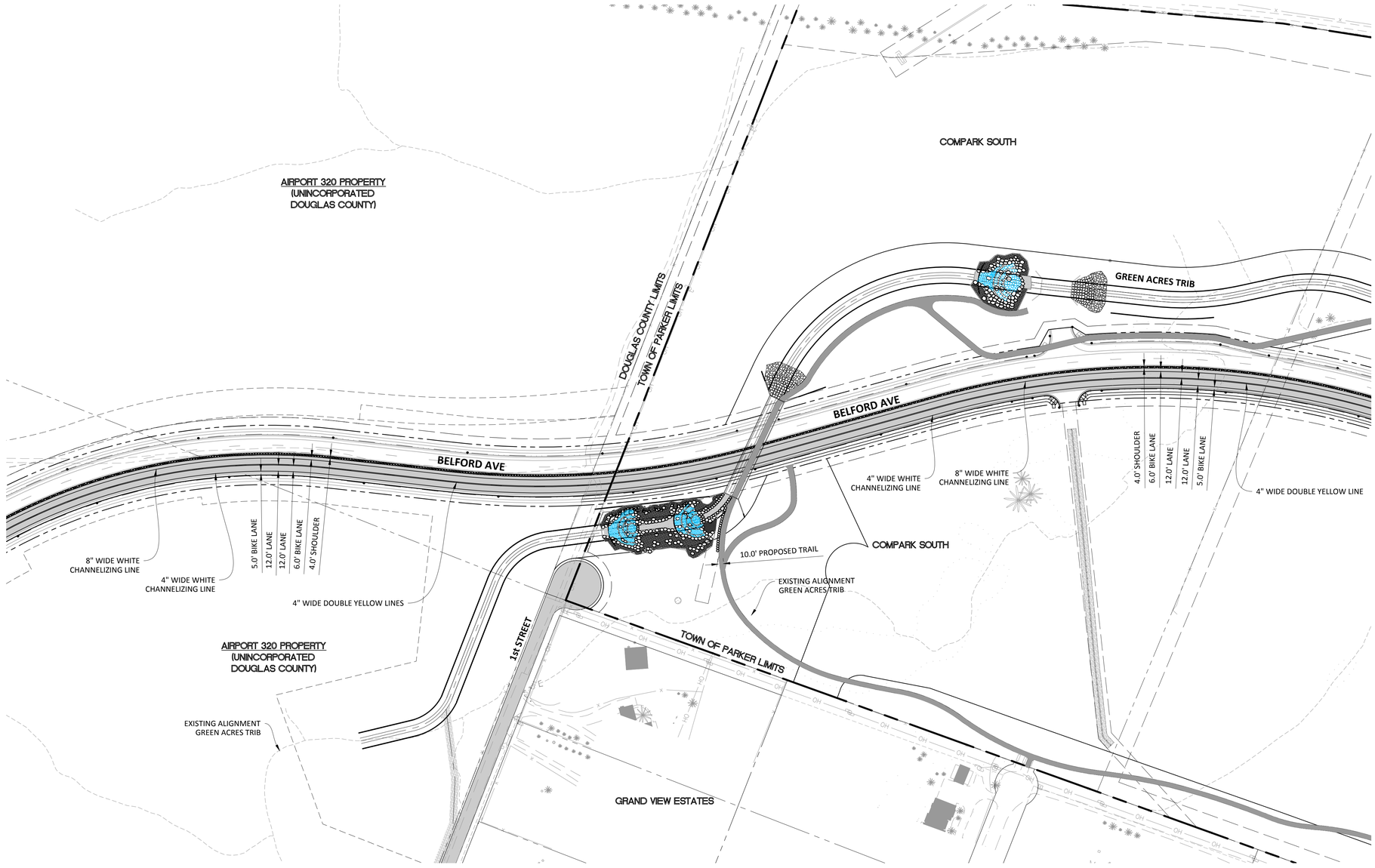
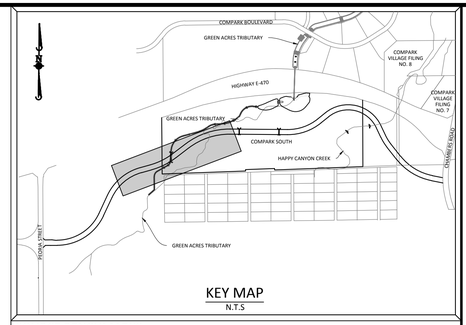
Plotted: 6/27/2016 8:13 PM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Signage and Striping (1).dwg Updated By: adtucker





KEY MAP
N.T.S

SOURCE BENCHMARKS:

DOUGLAS COUNTY BM 1.115010
A DOUGLAS COUNTY GIS MONUMENT SET IN CONCRETE LOCATED APPROXIMATELY 130 FEET SOUTHWESTERLY OF THE CENTERLINE OF CHAMBERS ROAD AND 95 FEET NORTHWESTERLY OF THE CENTERLINE OF COMPARK BOULEVARD. ELEVATION = 5752.84 (NAVD 88)

0 50 100 200
SCALE: 1"=100'

811
Know what's **below.**
Call before you dig.

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DRAWN BY	REVISIONS	DATE
ETG	C 3RD SUBMITTAL	6/24/16
	B 2ND SUBMITTAL	4/11/16
	A 1ST SUBMITTAL	11/2015

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
SIGNAGE AND STRIPING

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
33 OF 40
CLCPKC3 ---

PENDING APPROVAL

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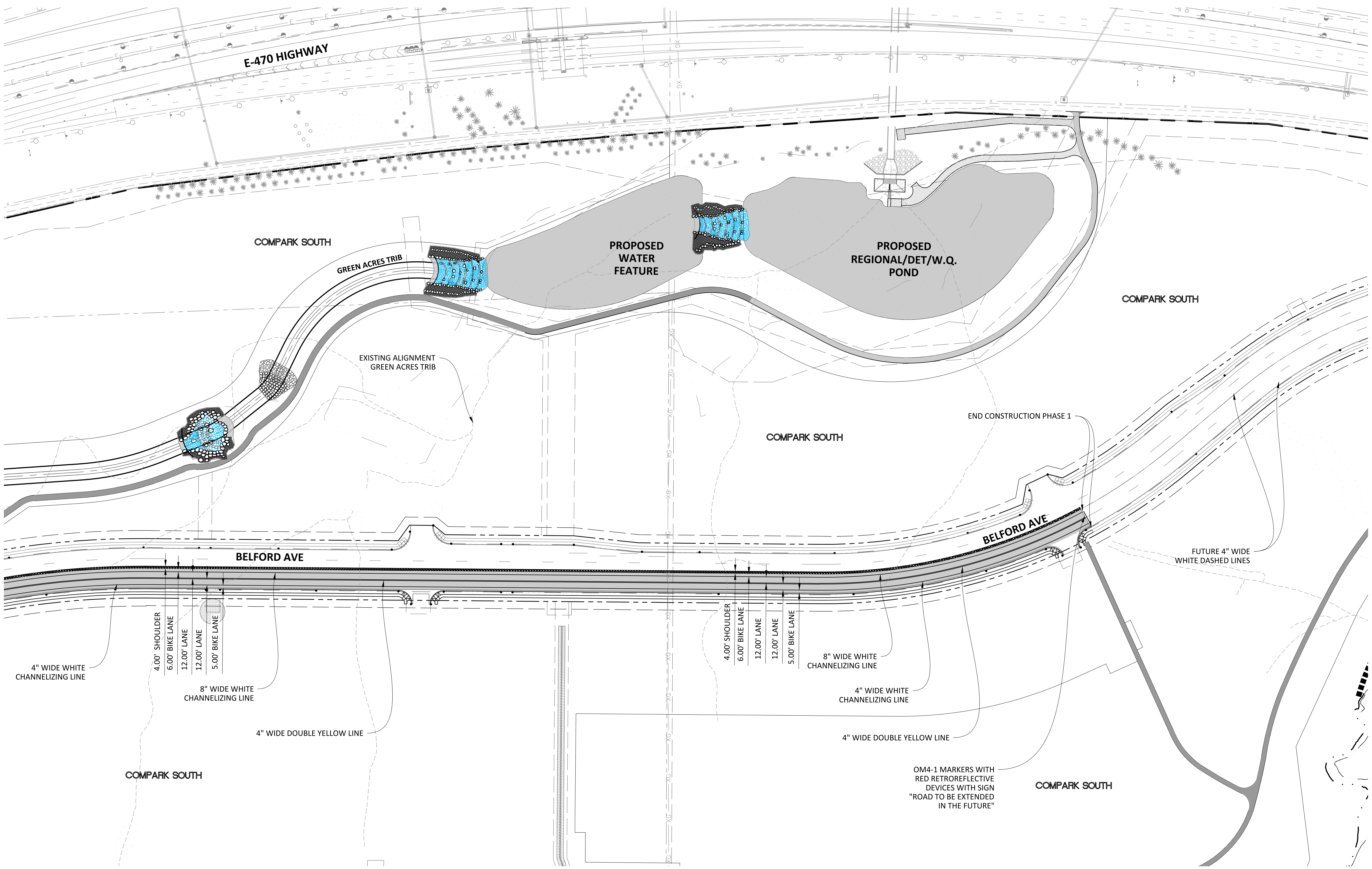
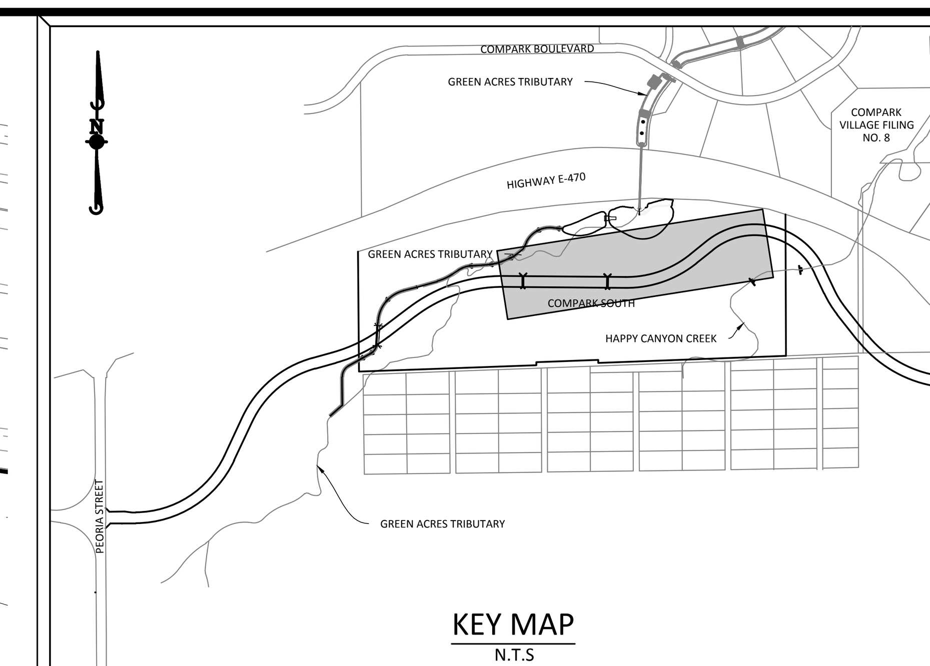
Plotted: 6/27/2016 8:15 PM Dwg Name: p:\Clpkc3\consouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Signage and Striping (2).dwg Updated By: adrucker





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A 11/2015	1ST SUBMITTAL	EG

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TOWN OF PARKER, COLORADO
SIGNAGE AND STRIPING

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
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SHEET
34 OF 40
CLCPKC3 ---

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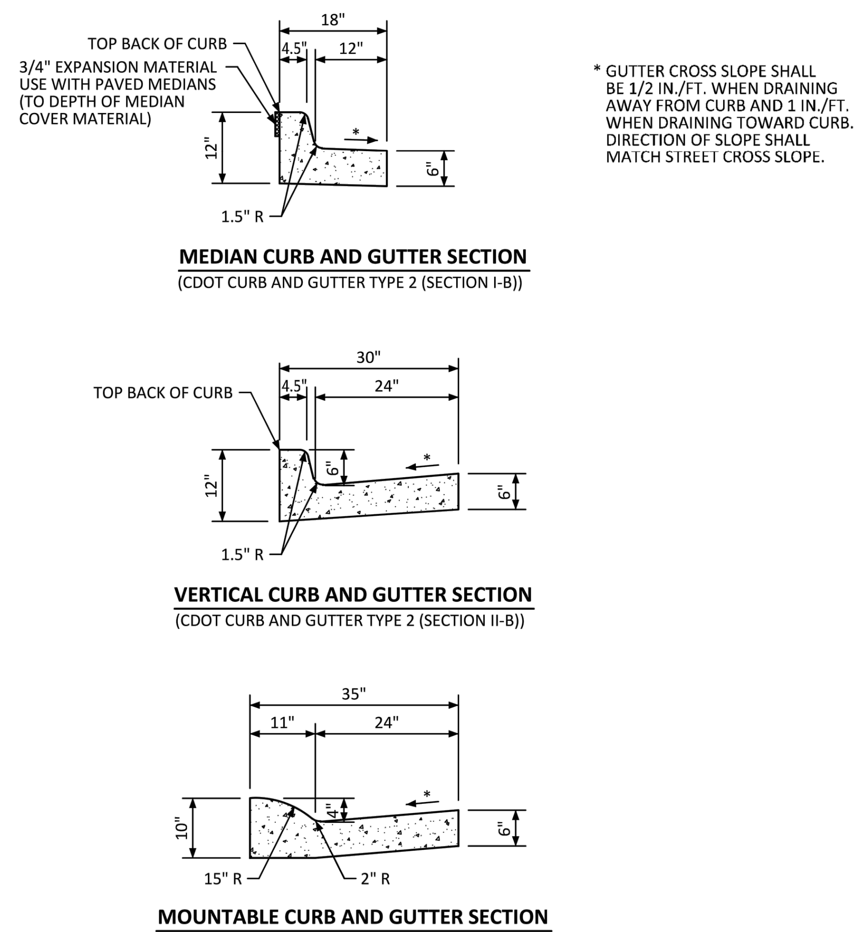
PENDING APPROVAL

Plotted: 6/27/2016 8:16 PM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Signage and Striping (3).dwg Updated By: adrucker

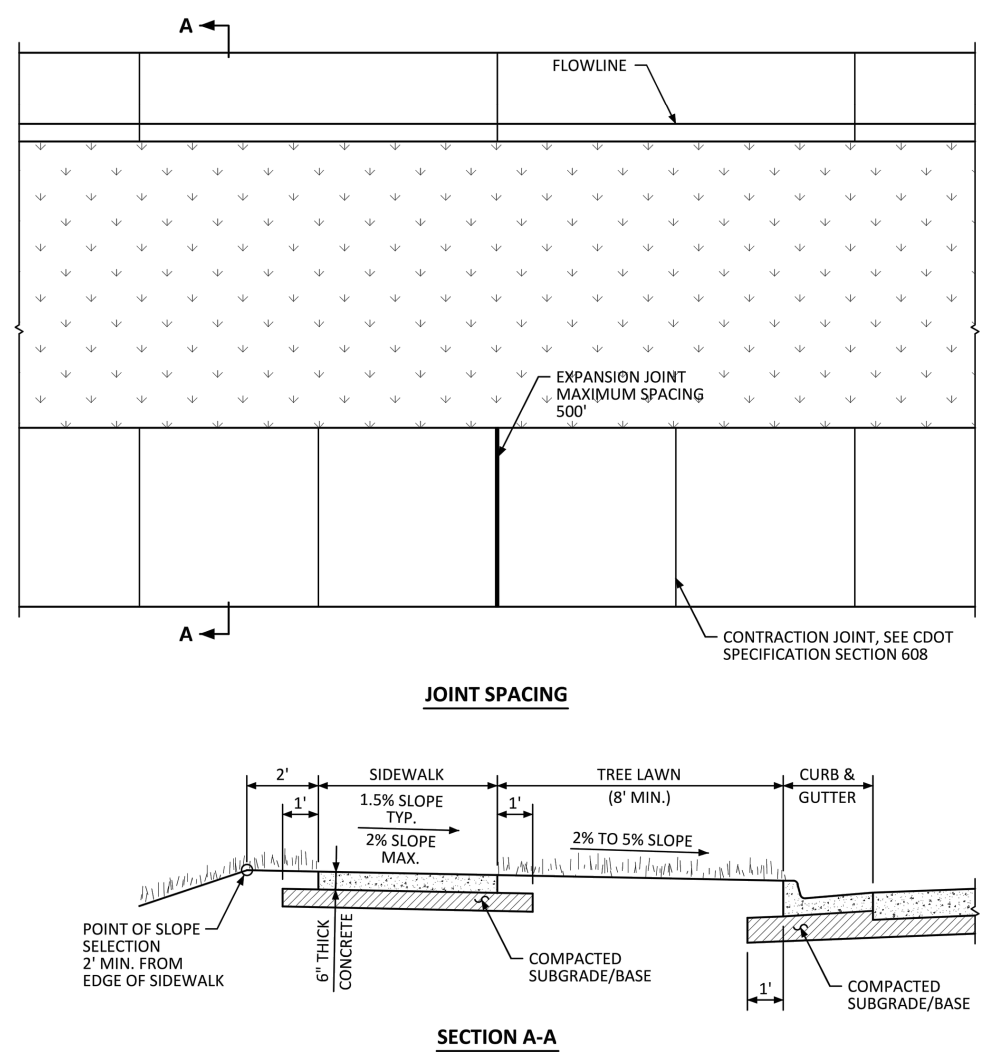


NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO

CURB, GUTTER, AND SIDEWALK SECTIONS STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 3 | 1 OF 1



GENERAL NOTES

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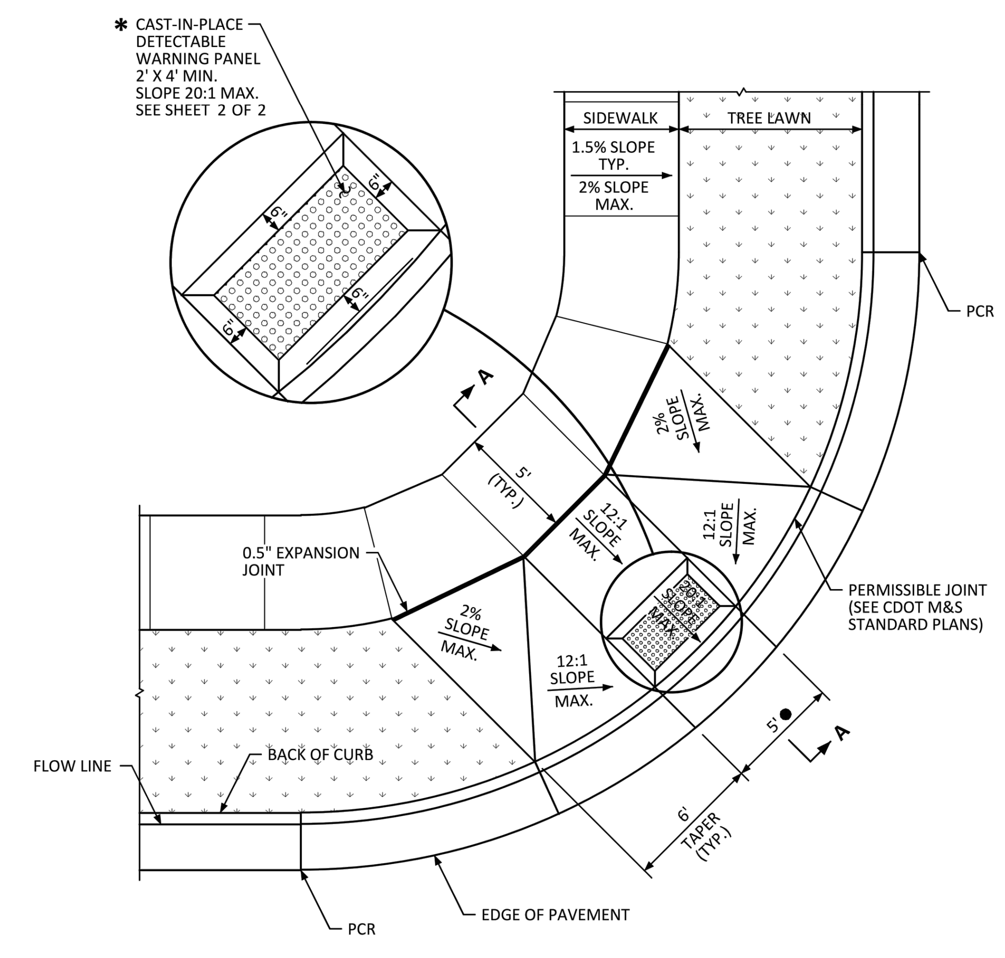
Town of Parker COLORADO

DETACHED SIDEWALK STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 4 | 1 OF 2



✱ DETECTABLE WARNINGS SHALL BE ONE OF THE PRODUCTS APPROVED FOR USE AS LISTED ON CDOT'S APPROVED LIST.

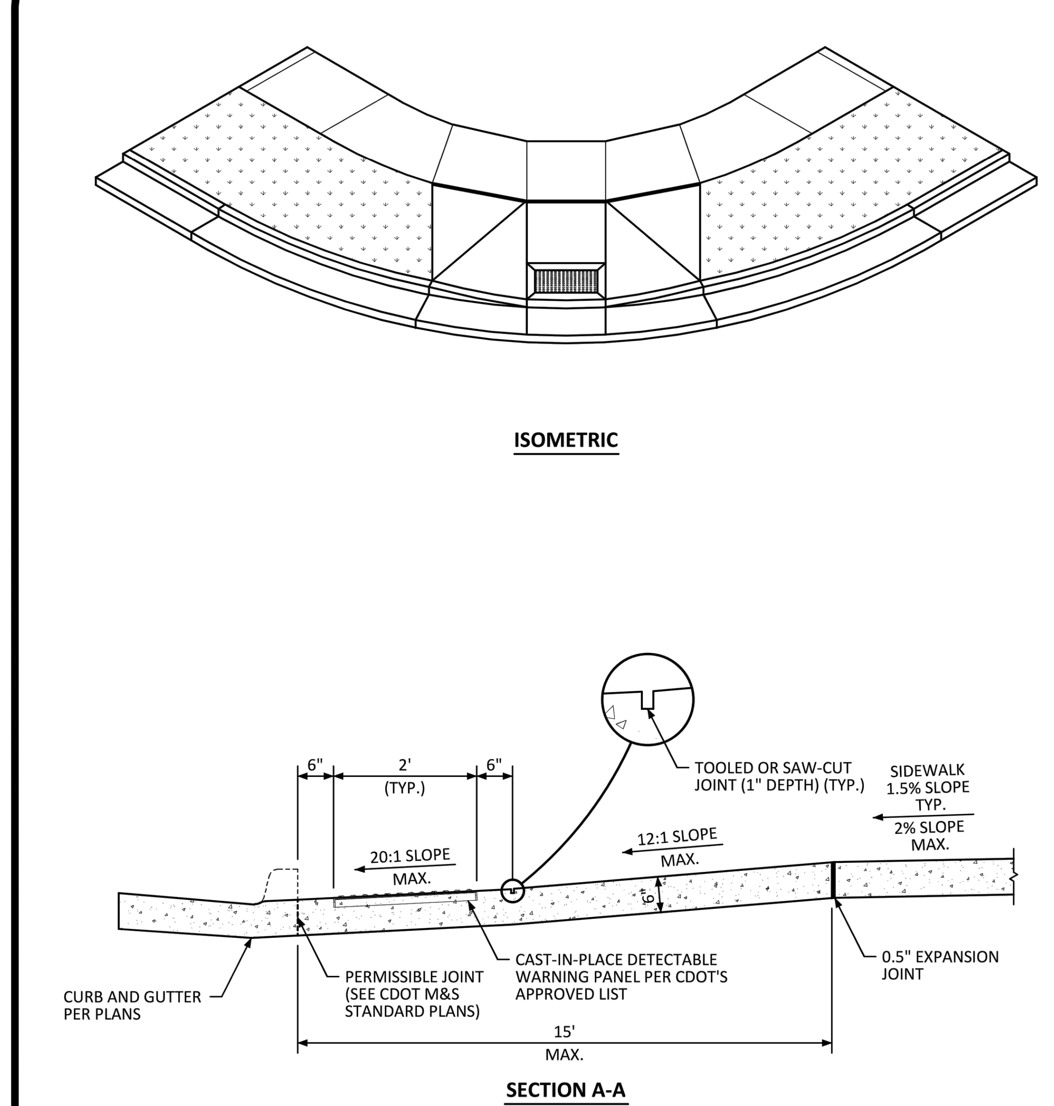
● FOR RESIDENTIAL COLLECTOR/COLLECTOR LAYOUT OR COLLECTOR/ARTERIAL LAYOUT, CURB RAMP SHALL BE 7' WIDE.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO

DIAGONAL CURB RAMP (DETACHED SIDEWALK) LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 15 | 1 OF 2



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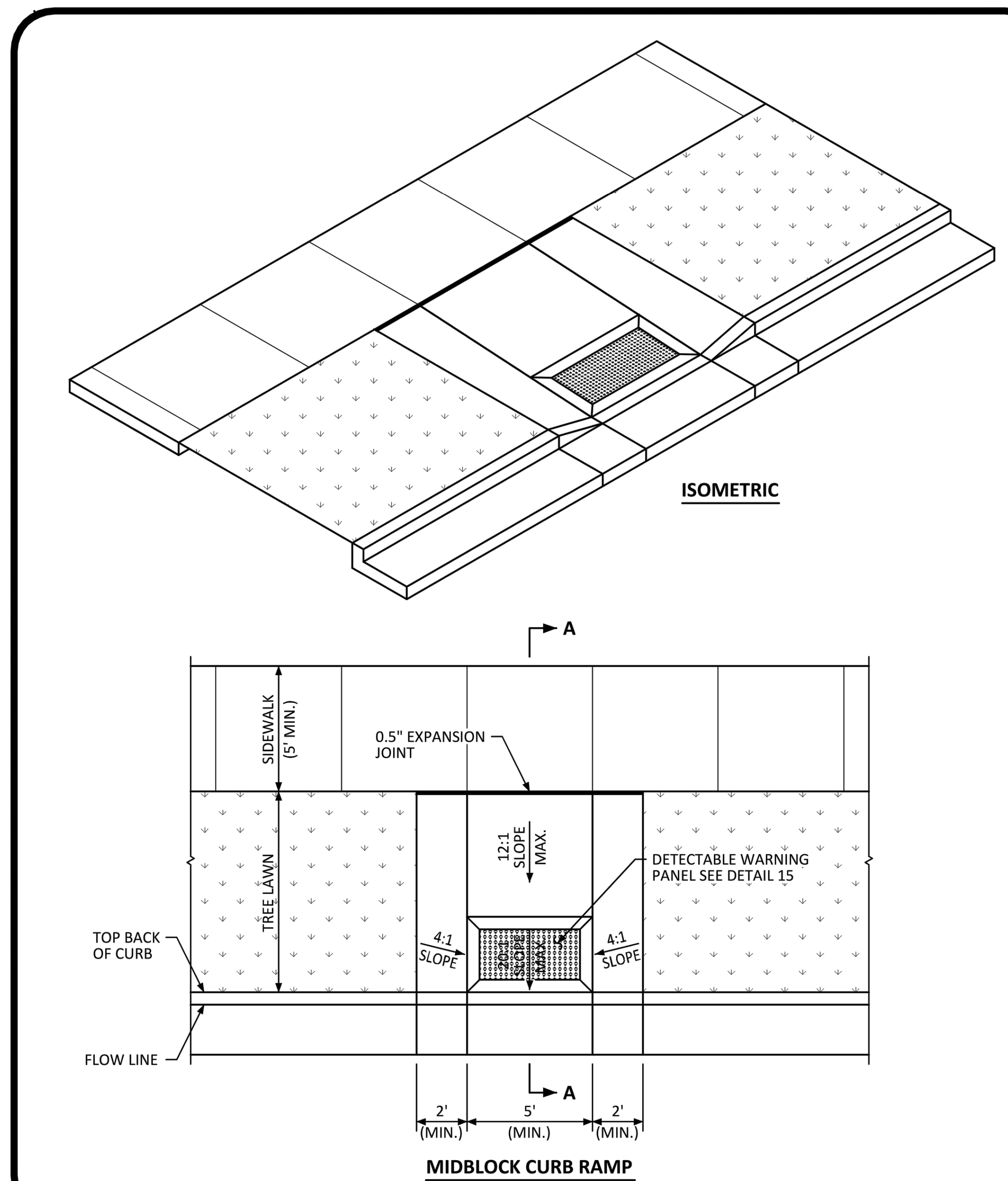
Town of Parker COLORADO

DIAGONAL CURB RAMP LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 15 | 2 OF 2



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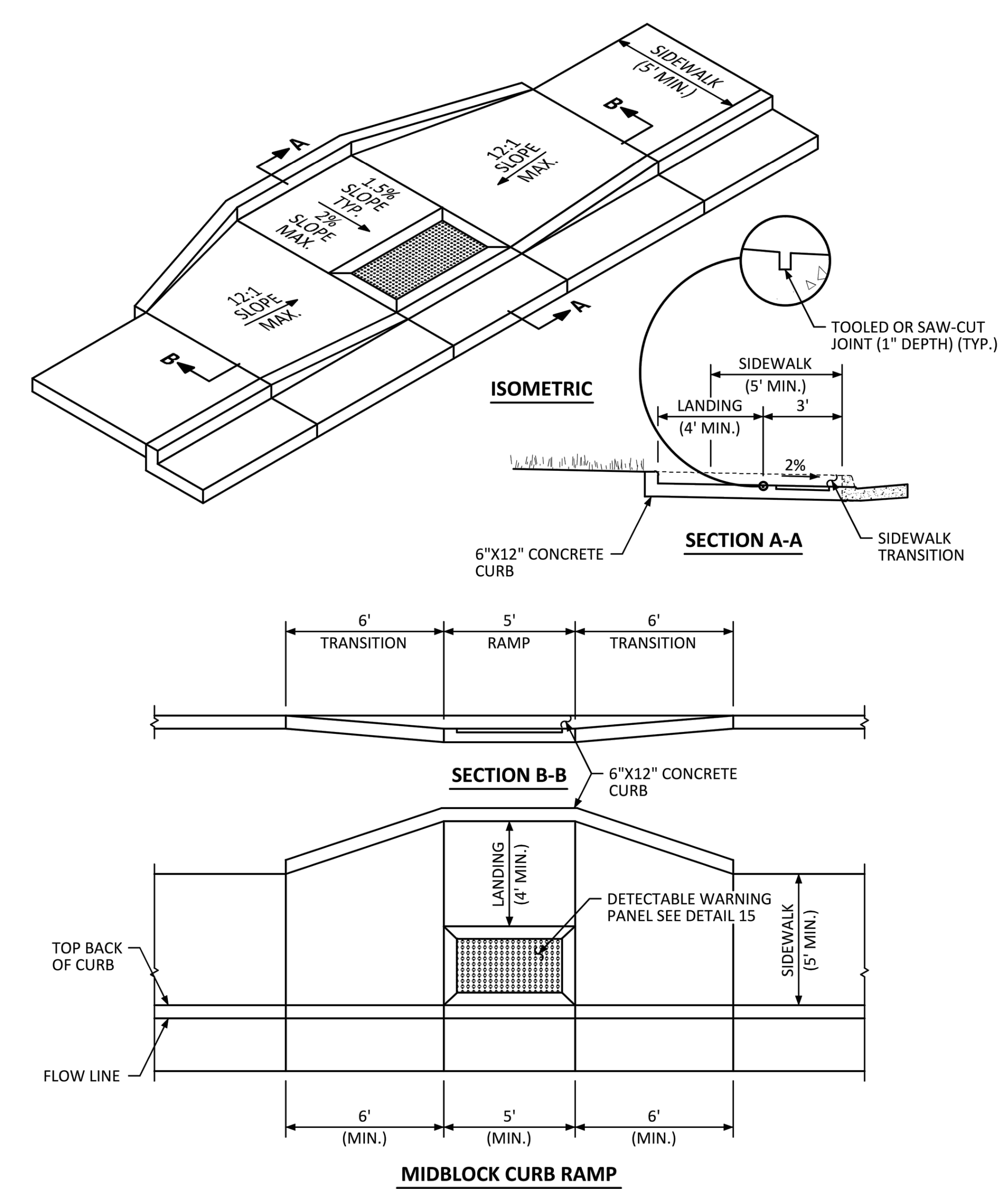
Town of Parker COLORADO

MIDBLOCK CURB RAMP LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 17 | 1 OF 2



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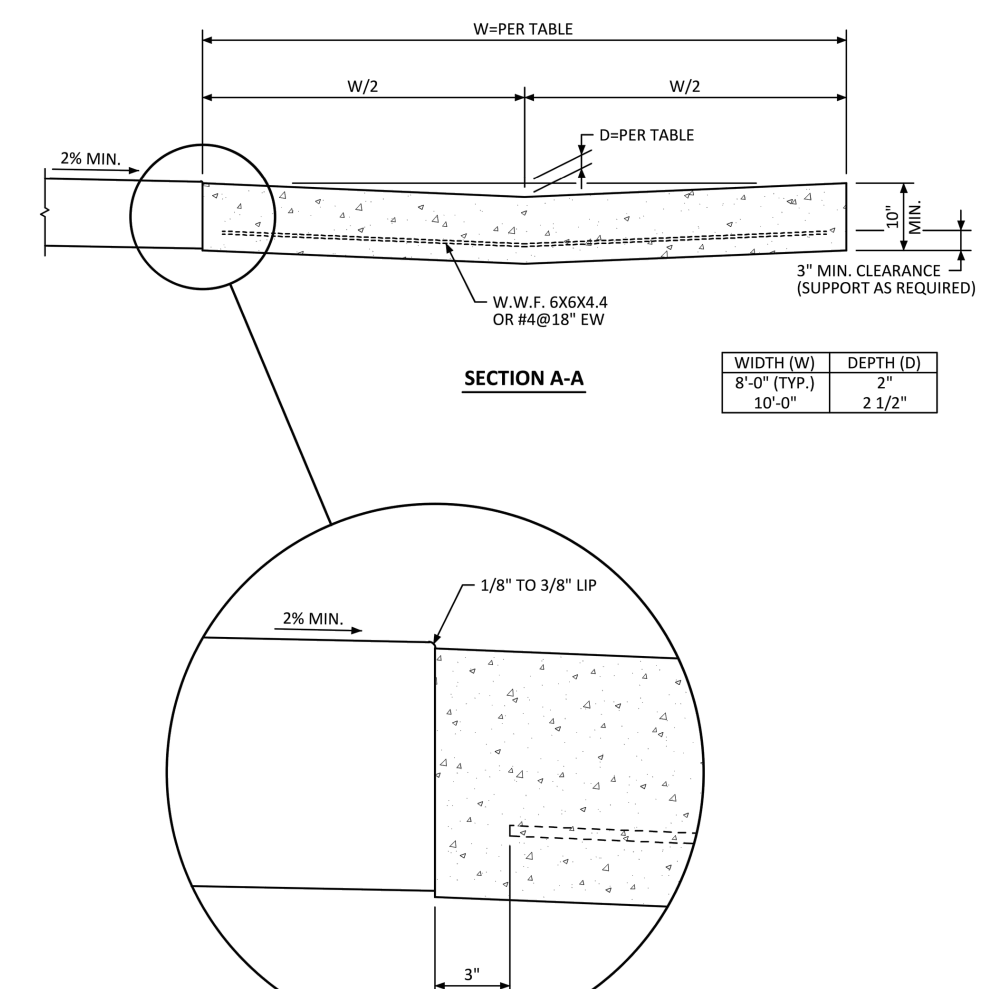
Town of Parker COLORADO

MIDBLOCK CURB RAMP LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 17 | 2 OF 2



WIDTH (W)	DEPTH (D)
8'-0" (TYP.)	2"
10'-0"	2 1/2"

GENERAL NOTES

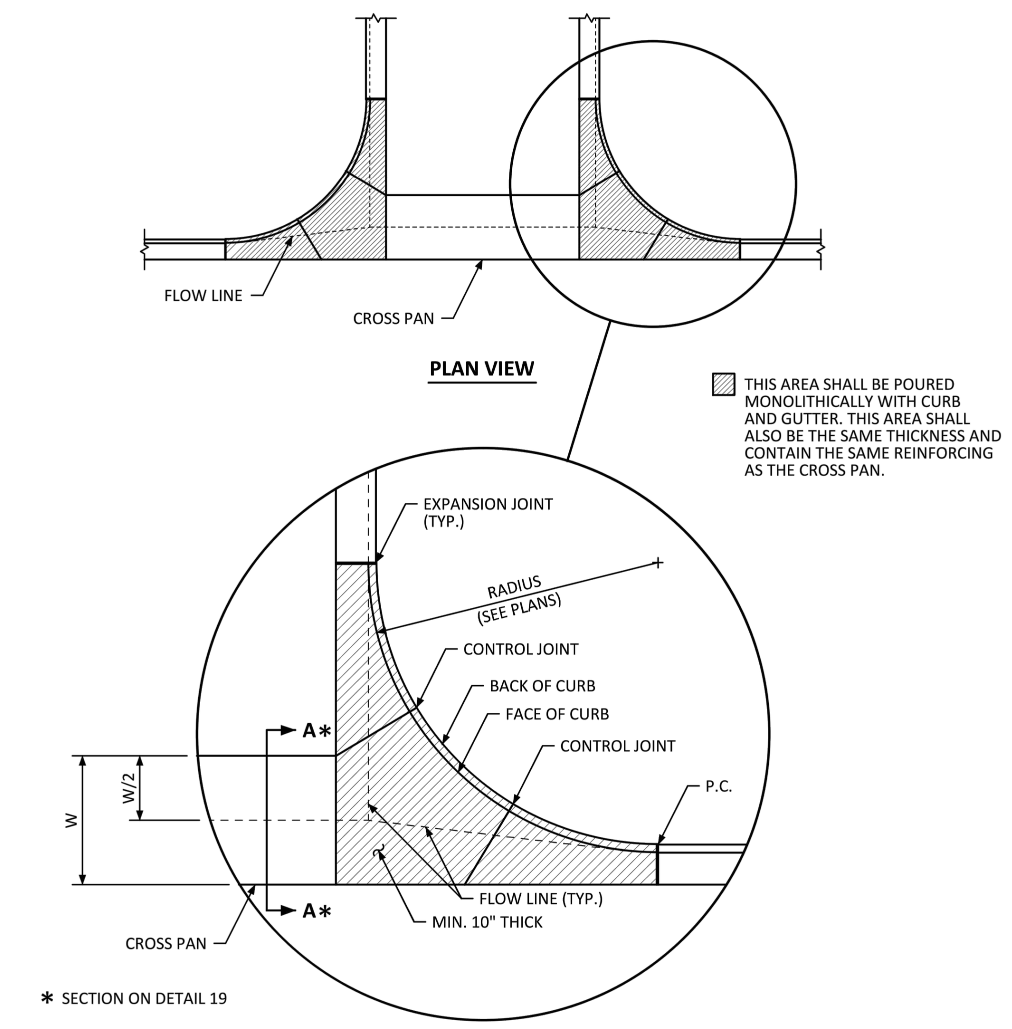
1. CONTRACTION JOINTS SHALL BE PROVIDED AT 10' MAXIMUM SPACING.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO

CROSS PAN LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 19 | 1 OF 1



GENERAL NOTES

1. EXPANSION JOINTS SHALL BE SEALED IN ACCORDANCE WITH THE LATEST CDOT M&S STANDARD PLANS.
2. REINFORCING SHALL BE CONTINUOUS FROM CROSS PAN TO APRONS AND PLACED AS SHOWN IN STANDARD DETAIL 19.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO

INTERSECTION CROSS PAN LAYOUT STANDARD DETAIL

DATE AUGUST 2014 | DETAIL 20 | 1 OF 1

	DATE	REVISIONS	DRAWN BY
C			
C	6/24/16	3RD SUBMITTAL	
B	4/11/16	2ND SUBMITTAL	
A	11/2015	1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

STREET DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 35 OF 40

CLCPKC3 ---

PENDING APPROVAL

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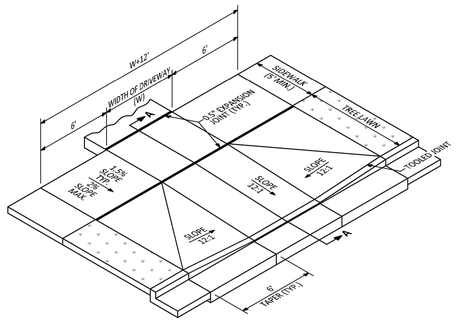
Plotted: 6/27/2016 8:17 PM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Street Details.dwg Updated By: bbaltzer



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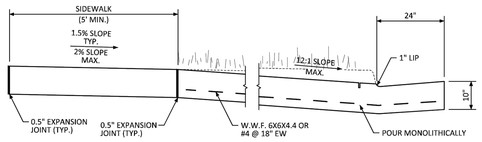
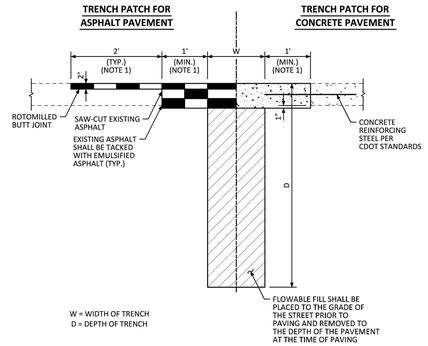


SECTION A-A

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **COMMERCIAL DRIVEWAY WITH DETACHED SIDEWALK STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 21 2 OF 2



GENERAL NOTES

1. SEE SECTION 9 OF THE ROADWAY CRITERIA MANUAL FOR LIMITS OF PATCHING.

ASPHALT PAVEMENT NOTES

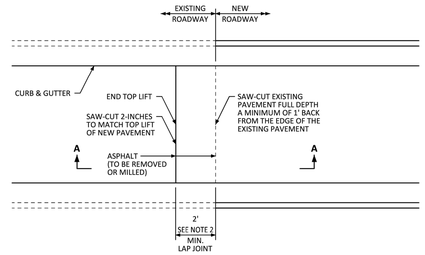
1. HOT MIX ASPHALT PATCH TO BE 6" THICK OR EXISTING PAVEMENT THICKNESS +1" (WHICHEVER IS GREATEST).
2. THE MINIMUM LIFT THICKNESS SHALL BE AT LEAST THREE TIMES (PREFERABLY FOUR TIMES) THE NOMINAL AGGREGATE SIZE. MAXIMUM LIFT THICKNESS SHALL BE FIVE TIMES THE NOMINAL AGGREGATE SIZE.
3. THE TOP LIFT OF ALL HMA PAVEMENT SECTIONS SHALL BE 2" THICK AND GRADING SX.

CONCRETE PAVEMENT NOTES

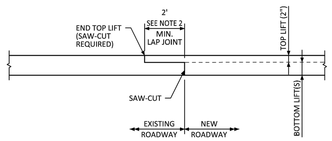
1. CONCRETE PAVEMENT THICKNESS SHALL BE 1 INCH GREATER THAN EXISTING CONCRETE PAVEMENT.
2. CONCRETE SHALL BE CDOT CLASS P.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **MINIMUM STREET PATCH DETERMINATION STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 26 1 OF 1



PLAN



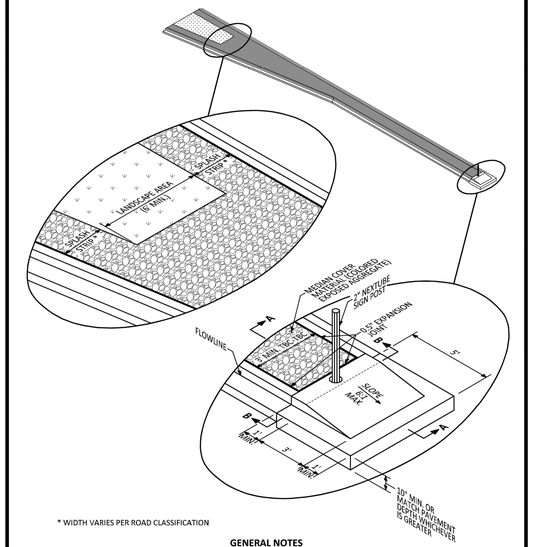
SECTION A-A

GENERAL NOTES

1. SAW-CUT EXISTING PAVEMENT FULL DEPTH TO PROVIDE A VERTICAL EDGE PRIOR TO PLACEMENT OF NEW ASPHALT AND SAW-CUT THE LAP JOINT 2-INCHES DEEP AT THE LAP JOINT DISTANCE.
2. THIS DETAIL APPLIES TO BOTH TRANSVERSE (WITH A 2-FOOT MIN. LAP JOINT) AND LONGITUDINAL (WITH A 1-FOOT MIN. LAP JOINT) ASPHALT JOINTS BETWEEN EXISTING AND NEW PAVEMENT.
3. SPECIFICATIONS AND ILLUSTRATIONS FOR CONCRETE PAVEMENT JOINTS ARE LOCATED IN CDOT'S M&S STANDARD PLANS AND CDOT'S STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION.
4. TEMPORARY ASPHALT RAMPS PLACED AT A 20:1 MAX. SLOPE SHALL BE REMOVED OR MILLED PRIOR TO PLACING FINAL ASPHALT.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **ASPHALT CONNECTION BETWEEN EXISTING AND NEW PAVEMENT STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 27 1 OF 1



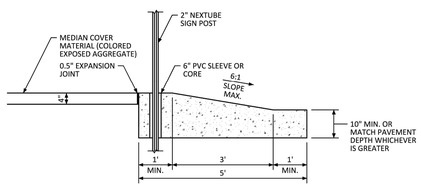
* WIDTH VARIES PER ROAD CLASSIFICATION

GENERAL NOTES

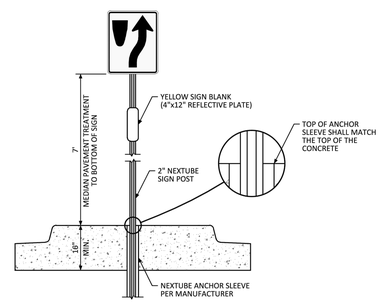
1. MEDIAN COVER MATERIAL SHALL BE DAVIS COLOR "RUSTIC BROWN" AND HAVE AN EXPOSED AGGREGATE FINISH. CONCRETE SHALL BE CDOT CLASS "B" WITH 3/8" MAXIMUM AGGREGATE SIZE.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **MEDIAN BULL NOSE ISOMETRIC STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 28 1 OF 2



SECTION A-A



SECTION B-B

GENERAL NOTES

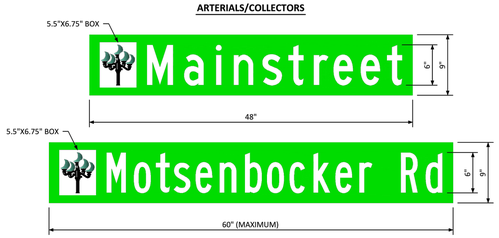
1. IF MEDIAN WIDTH IS GREATER THAN 12', ADDITIONAL DELINEATORS WILL BE REQUIRED. COORDINATE WITH DESIGNATED TOWN AUTHORITY.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **MEDIAN BULL NOSE TYPICAL SECTIONS STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 28 2 OF 2

LOCAL STREETS

ARTERIALS/COLLECTORS

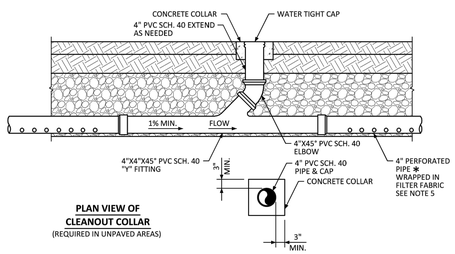


GENERAL NOTES

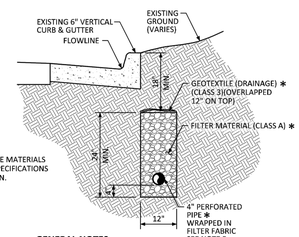
1. STREET NAME SIGNS SHALL BE ON EXTRUDED ALUMINUM BLANKS. ARTERIALS/COLLECTORS SHALL HAVE 9" HIGH PANELS. LOCALS MAY HAVE 6" HIGH PANELS. ARTERIAL/COLLECTOR SIZE BLANKS SHALL NOT EXCEED 60". LOCAL SIZE BLANKS SHALL NOT EXCEED 48".
2. SIGN POSTS FOR INSTALLING STREET NAME SIGNS SHALL BE 12 GAUGE New/S-SquareTube STEEL. FINISH TO BE HOT DIPPED GALVANIZED (ASTM A-653 G90). SIZE OF POST TO BE NOMINAL 2" x 2".
3. SIGN MOUNTING HARDWARE TO BE ZINC OR CADMIUM PLATED.
4. SIGN SHEETING SHALL BE REFLECTORIZED AND AFFIXED TO BOTH SIDES OF STREET NAME SIGN BLANK. PRIMARY SHEETING MATERIAL TO BE HIGH INTENSITY PRISMATIC WHITE WITH GREEN TRANSPARENT ELECTRO-CUT FILM. TOWN LAMP LOGO TO BE BLACK FILM ON WHITE SHEETING.
5. STREET NAME FONTS SHALL BE STANDARD HIGHWAY GOTHIC SERIES. TOTAL CHARACTERS INCLUDING SUFFIX SHALL NOT EXCEED 14.
6. MOUNTING HEIGHTS AND LOCATIONS TO BE PER MUTCD GUIDELINES OR AS DIRECTED BY THE TOWN.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **GROUND MOUNTED STREET NAME PANELS** | DATE AUGUST 2014 | DETAIL 33 1 OF 1



PLAN VIEW OF CLEANOUT COLLAR
(REQUIRED IN UNPAVED AREAS)



✱ SPECIFICATIONS FOR THESE APPLICABLE MATERIALS ARE LOCATED IN CDOT'S STANDARD SPECIFICATIONS FOR ROAD AND BRIDGE CONSTRUCTION.

GENERAL NOTES

1. TRENCH DRAIN SHALL BE LOCATED HORIZONTALLY AT EDGE OF CONTINUOUS IMPERMEABLE SECTION.
2. TRENCH DRAINS SHALL BE TRANSITIONED TO PVC SCH. 40, NON-PERFORATED PIPE WHEN RAN UNDER ROADWAY HARDSCAPES/INTERSECTIONS.
3. CLEANOUTS SHALL BE PROVIDED AT ALL JUNCTIONS, ANGLE POINTS AND SPACED MAX. OF 500' INTERVALS.
4. TRENCH DRAINS SHALL TIE INTO STORM MANHOLE OR INLETS.
5. PERFORATED PIPE MATERIAL SHALL CONSIST OF CONTECH A-2000 PERFORATED PIPE, SDR-26 PERFORATED PRESSURE PIPE, HDPE SCH. 40 PERFORATED PIPE, N-12 ADS PIPE OR APPROVED EQUAL.

NO CHANGES ARE TO BE MADE TO THIS DRAWING WITHOUT WRITTEN PERMISSION OF THE TOWN OF PARKER.

Town of Parker COLORADO | **TRENCH DRAIN DETAIL SECTION STANDARD DETAIL** | DATE AUGUST 2014 | DETAIL 31 1 OF 1

DRAWN BY	DATE	REVISIONS	
		C	6/24/16 3RD SUBMITTAL
		B	4/14/16 2ND SUBMITTAL
ETG		A	11/2015 1ST SUBMITTAL

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
STREET DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 36 OF 40
CLCPKC3 ---

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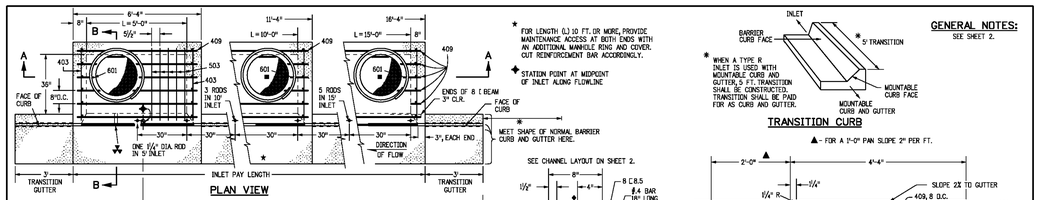

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CAD Ver.: MicroStation V8 Scale: Not to Scale Units: English	

Sheet Revisions	
Date:	Comments

Colorado Department of Transportation
4201 East Arkansas Avenue
Denver, Colorado 80222
Phone: (303) 757-9083
Fax: (303) 757-9820
Project Development Branch DD/LTA

CURB INLET TYPE R

Issued By: Project Development Branch July 4, 2012

STANDARD PLAN NO.
M-604-12
Sheet No. 1 of 2

MARK	BAR # OR SIZE	O.C. SPACING	TYPE	ALL INLETS L = 5 FT. NO. REQ'D.	ALL INLETS L = 5 FT. LENGTH	INLETS: H ≤ 5 FT. L = 10 FT. NO. REQ'D.	INLETS: H ≤ 5 FT. L = 10 FT. LENGTH	INLETS: H ≤ 5 FT. L = 15 FT. NO. REQ'D.	INLETS: H ≤ 5 FT. L = 15 FT. LENGTH	INLETS: H > 5 FT. L = 10 FT. NO. REQ'D.	INLETS: H > 5 FT. L = 10 FT. LENGTH	INLETS: H > 5 FT. L = 15 FT. NO. REQ'D.	INLETS: H > 5 FT. L = 15 FT. LENGTH
401	4	11"	II	15	*	21	*	28	*	11	*	11	*
402	4	11"	II	11	*	13	*	18	*	7	*	7	*
403	4	9"	II	*	4'-0"	*	4'-0"	*	4'-0"	*	4'-0"	*	4'-0"
405	4	6"	VI	11	6'-10"	21	6'-10"	31	8'-10"	11	6'-10"	11	6'-10"
406	4	6"	VIII	7	8'-10"	7	13'-10"	7	18'-10"	7	8'-10"	7	8'-10"
407	4	9"	II	*	5'-10"	*	10'-10"	*	15'-10"	*	5'-10"	*	5'-10"
408	4	12"	II	3	6'-10"	3	11'-10"	3	16'-0"	3	11'-10"	3	16'-0"
409	4	8"	II	6	5'-10"	6	10'-10"	6	15'-10"	6	10'-10"	6	15'-10"
410	4	11"	VIII							3	*	3	*
411	4	11"	II							3	5'-2"	3	10'-2"
412	4	11"	II							3	2'-6"	3	2'-6"
413	4	9"	II							7	10'-10"	7	15'-10"
501	5	5/8"	IV	11	3'-4"	22	3'-4"	33	3'-4"	22	3'-4"	33	3'-4"
502	5	5/8"	III							11	11'-5"	17	11'-5"
503	5	5/8"	II	5	3'-6"	16	3'-6"	27	3'-6"	6	3'-6"	6	3'-6"
504	5	5/8"	IX									5	8'-4"
601	6	2 1/2"	V	2	8'-10"	2	8'-10"	2	8'-10"	2	8'-10"	4	8'-10"
BC8.5				1	5'-10"	1	10'-10"	1	15'-10"	1	10'-10"	1	15'-10"
				2 BARS, 1 RODS		4 BARS, 3 RODS		6 BARS, 5 RODS		4 BARS, 3 RODS		6 BARS, 5 RODS	

* VARIABLE REFER TO TABLE TWO.
■ INCLUDE #4, 18 IN. BARS (SEE CHANNEL LAYOUT).

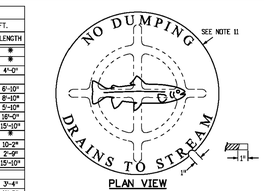
REGULAR INLETS | DROP BOX INLETS

TABLE ONE ~ BAR LIST FOR CURB INLETS, TYPE "R"

"H"	LENGTH 401	LENGTH 402	LENGTH 410	NO. REQ'D. REGULAR 403	NO. REQ'D. REGULAR 407	NO. REQ'D. DROP BOX 403	NO. REQ'D. DROP BOX 407	L = 5 FT. CONC. CU. YDS.	L = 5 FT. STEEL LBS.	L = 10 FT. CONC. CU. YDS.	L = 10 FT. STEEL LBS.	L = 15 FT. CONC. CU. YDS.	L = 15 FT. STEEL LBS.
3'-0"	2'-8"	1'-8"		10	7			3.2	285	5.3	497	7.4	706
3'-6"	2'-11"	2'-2"		10	7			3.4	305	5.7	528	7.9	747
4'-0"	3'-2"	2'-8"		12	9			3.7	326	6.0	559	8.4	786
4'-6"	4'-1"	3'-2"		12	9			3.9	334	6.4	571	8.8	803
5'-0"	4'-5"	3'-8"		14	11			4.1	354	6.7	602	9.3	844
5'-6"	5'-2"	4'-2"	3'-5"	16	13	15	8	4.4	375	6.0	607	7.4	850
6'-0"	5'-8"	4'-8"	3'-11"	16	13	16	9	4.8	382	6.2	616	7.6	860
6'-6"	6'-1"	5'-2"	4'-5"	18	15	18	8	4.8	402	6.4	637	7.8	880
7'-0"	6'-8"	5'-8"	4'-11"	20	17	19	10	5.0	423	6.6	654	8.0	897
7'-6"	7'-2"	6'-2"	5'-5"	20	17	20	10	5.3	430	6.9	664	8.3	907
8'-0"	7'-8"	6'-8"	5'-11"	22	19	22	12	5.5	451	7.1	684	8.5	927
8'-6"	8'-2"	7'-2"	6'-5"	24	21	23	14	5.7	471	7.3	702	8.7	944
9'-0"	8'-8"	7'-8"	6'-11"	24	21	24	14	6.0	479	7.8	711	9.0	954
9'-6"	9'-2"	8'-2"	7'-5"	26	23	26	15	6.2	499	7.8	732	9.2	974
10'-0"	9'-8"	8'-8"	7'-11"	28	25	27	18	6.4	520	8.0	749	9.4	992
10'-6"	10'-2"	9'-2"	8'-5"	28	25	28	18	6.7	527	8.3	759	9.7	1001
11'-0"	10'-8"	9'-8"	8'-11"	30	27	30	20	6.9	547	8.5	779	9.8	1022

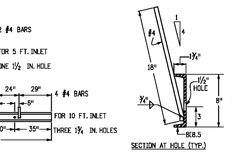
NOTES: FOR L = 5 FT., L = 10 FT., AND L = 15 FT.
REGULAR INLETS: TOTAL QUANTITIES NEEDED ARE OUTSIDE THE HEAVY BLACK LINE.
DROP BOX INLETS: TOTAL QUANTITIES NEEDED ARE INSIDE THE HEAVY BLACK LINE.
STEEL WEIGHTS DO NOT INCLUDE STRUCTURAL STEEL CHANNEL.

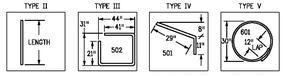
TABLE TWO ~ BARS AND QUANTITIES VARIABLE WITH "H"



GENERAL NOTES

1. CONCRETE SHALL BE CLASS B. INLET MAY BE CAST-IN-PLACE OR PRECAST.
2. CONCRETE WALLS SHALL BE FORMED ON BOTH SIDES AND SHALL BE 8 IN. THICK.
3. INLET STEPS SHALL BE IN CONFORMANCE WITH AASHTO M 199.
4. CURB FACE ASSEMBLY SHALL BE GALVANIZED AFTER WELDING.
5. EXPOSED CONCRETE CORNERS SHALL BE CHAMFERED ¾ IN. CURB AND GUTTER CORNERS SHALL BE FINISHED TO MATCH THE EXISTING CURB AND GUTTER BEYOND THE TRANSITION GUTTER.
6. REINFORCING BARS SHALL BE DEFORMED AND SHALL HAVE A 2 IN.MINIMUM CLEARANCE. ALL REINFORCING BARS SHALL BE EPOXY COATED.
7. DIMENSIONS AND WEIGHTS OF TYPICAL MANHOLE RING AND COVER ARE NOMINAL.
8. MATERIAL FOR MANHOLE RINGS AND COVERS SHALL BE GRAY OR DUCTILE CAST IRON IN ACCORDANCE WITH SUBSECTION 712.06.
9. SINCE PIPE ENTRIES INTO THE INLET ARE VARIABLE, THE DIMENSIONS SHOWN ARE TYPICAL. ACTUAL DIMENSIONS AND QUANTITIES FOR CONCRETE AND REINFORCEMENT SHALL BE AS REQUIRED IN THE WORK. QUANTITIES INCLUDE VOLUMES OCCUPIED BY PIPES.
10. STRUCTURAL STEEL SHALL BE GALVANIZED AND SHALL BE IN ACCORDANCE WITH SUBSECTION 712.06.
11. ALL MANHOLE COVERS SHALL BE CAST WITH A "NO DUMPING DRAINS TO STREAM" MESSAGE AND A FISH SYMBOL. THE SURFACE OF THE MANHOLE COVER SHALL HAVE A NON-SLIP PATTERN.





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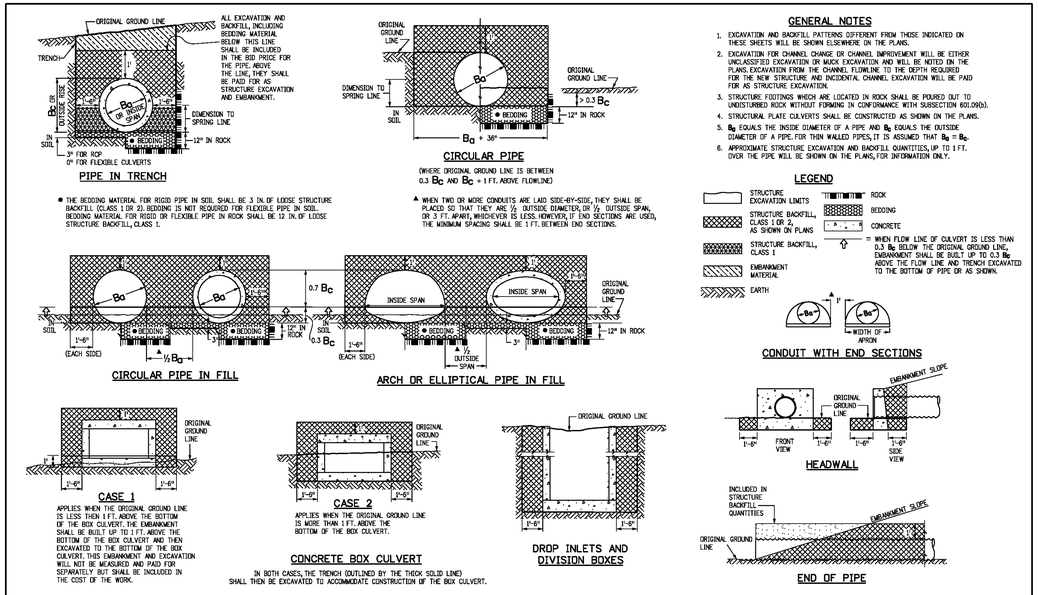

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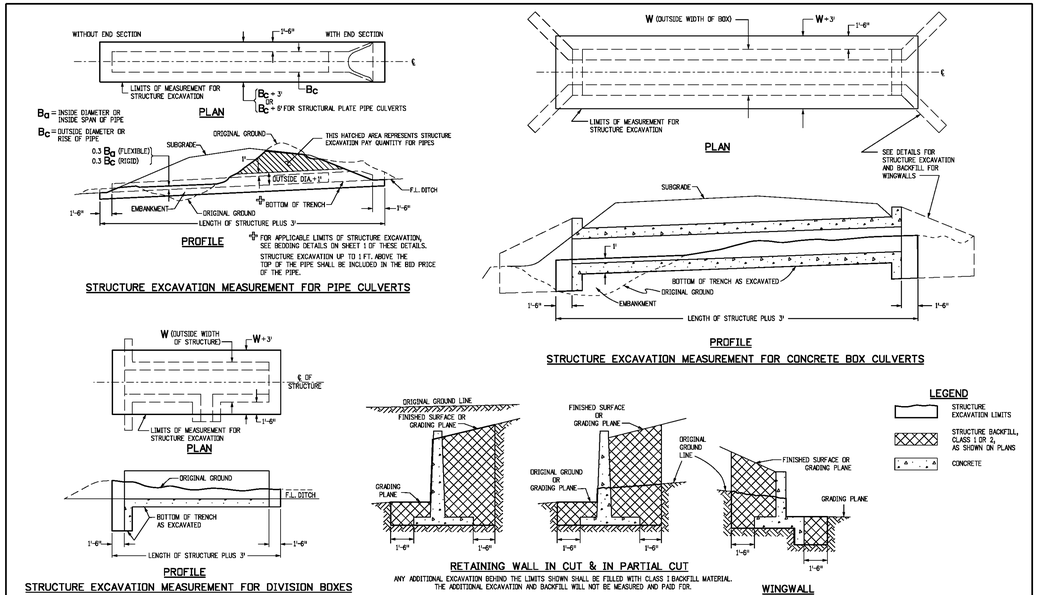

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STORM DETAILS

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SHEET
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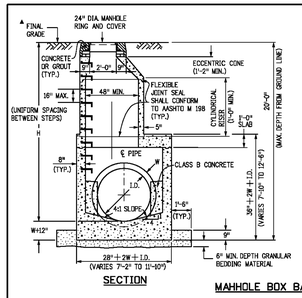
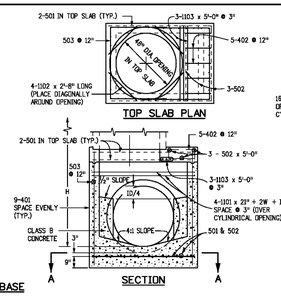


SECTION

MAHHOLE BOX BASE



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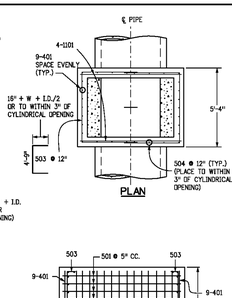
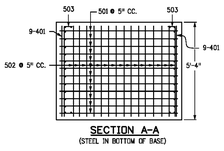




SECTION A-A
(STEEL IN BOTTOM OF BASE)

GENERAL NOTES

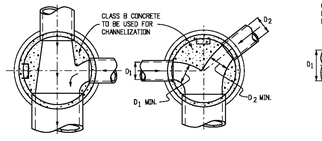
1. SINCE ALL PIPE ENTRIES INTO THE BASE ARE VARIABLE, THE DIMENSIONS SHOWN ARE TYPICAL ACTUAL DIMENSIONS AND QUANTITIES FOR CONCRETE AND REINFORCEMENT SHALL BE AS REQUIRED IN THE WORK.
2. THE PRECAST FLAT TOP MAY BE USED ON ANY MANHOLE. THE ECCENTRIC CONE MAY BE USED WHEN THE MANHOLE "H" HEIGHT IS AT LEAST 8 FT.
3. THE MANHOLE RING FRAME SHALL BE SET IN A BED OF GROUT. THE FRAME SHALL BE SURROUNDED WITH A CEMENT GROUT IN UNPAVED AREA, OR A CONCRETE COLLAR IN PAVED AREA. SEE DETAILS ON SHEETS 2 AND 3.
4. DESIGN OF BOX BASE IS BASED ON STRAIGHT RUNS OF PIPE OR CHANGE IN DIRECTION OF LESS THAN 45°. SPECIAL DESIGN IS REQUIRED FOR 45° OR GREATER.
5. PRECAST MANHOLES AND REINFORCEMENT SHALL CONFORM TO AASHTO M 199 (ASTM C 478).
6. CAST-IN-PLACE MANHOLES SHALL BE CLASS B CONCRETE.
7. STEPS SHALL BE REQUIRED WHEN THE MANHOLE DEPTH EXCEEDS 3 FT.-6 IN. AND SHALL CONFORM TO AASHTO M 199.
8. ALL REINFORCING STEEL SHALL BE GRADE 60 AND EPOXY COATED. VERTICAL STEEL SHALL BE PLACED AT CENTERLINE OF WALL. ALL BARS SHALL HAVE A 2 IN. MINIMUM CLEARANCE.
9. ALL PIPE ENTRIES INTO THE BASE OF MANHOLE SHALL BE CONNECTED BY OPEN CHANNELIZATION ADJUSTED FOR PIPE SIZE, SHAPE, SLOPE, AND DIRECTION OF FLOW. DETAILS SHOWN ARE TYPICAL FOR INSTALLATIONS WITH ALL INVERTS OF SAME RELATIVE ELEVATION. FOR EXCESSIVE ELEVATION DIFFERENCE BETWEEN INVERTS, SPECIAL BASE/CHANNEL DETAILS WILL BE SHOWN ON THE PLANS.
10. FLOW CHANNELS AND INVERTS SHALL BE FORMED BY SHAPING WITH CLASS B CONCRETE OR APPROVED GROUT.
11. STUB-OUTS SHALL EXTEND 2 FT. MINIMUM BEYOND OUTSIDE WALL SURFACE OF MANHOLE AND BE SATISFACTORILY PLUGGED.
12. THE SLOPE OF THE MANHOLE COVER SHALL MATCH THE ROADWAY PROFILE AND CROSS SLOPE.

▲ WHEN FINAL GRADE IS PAVEMENT SURFACE, RECESS MANHOLE RING AND COVER 1/4" MIN. TO 1/2" MAX.

MARK	SIZE	TYPE	WT. w/FT.	BARS	I.D. 54"	60"	66"	72"	84"	96"	FORMULAS
401	4	I	0.668	(NO. REQ'D.) (LENGTH) WEIGHT *	18 8'-1" 97.2	18 8'-8" 104.2	18 9'-3" 111.2	18 9'-10" 118.2	18 11'-0" 132.5	18 12'-2" 146.3	401 BAR LENGTH = 32" + 2W + I.D.
402	4	III	0.668	(NO. REQ'D.) (LENGTH) WEIGHT *	5 5'-5" 18.1	5 6'-0" 20.0	5 6'-7" 22.0	5 7'-2" 23.8	5 8'-4" 27.8	5 9'-6" 31.7	402 BAR LENGTH = I.D. + 2W
501	5	I	1.043	(NO. REQ'D.) (LENGTH) WEIGHT *	17 7'-5" 131.5	17 8'-0" 141.8	17 8'-7" 152.2	17 9'-2" 162.5	17 10'-4" 183.2	17 11'-5" 203.9	501 BAR LENGTH = 24" + I.D. + 2W
502	5	I	1.043	(NO. REQ'D.) (LENGTH) WEIGHT *	22 7'-0" 114.7	23 7'-6" 119.9	25 8'-0" 130.4	26 8'-6" 135.6	29 9'-6" 151.2	32 10'-6" 166.9	502 NUMBER BARS REQ'D. = 3 + $\left(\frac{24+I.D.+2W}{9"} +1\right)$
503	5	II	1.043	(NO. REQ'D.) (LENGTH) WEIGHT *	18 12'-10" 214.2	16 13'-5" 223.5	18 14'-0" 262.6	18 14'-7" 273.8	18 15'-9" 328.5	20 16'-11" 423.5	503 NUMBER BARS REQ'D. = $\left(\frac{134+I.D.+2W}{9"} +1\right)$ BAR LENGTH = 4'-9"+(I.D+W)/2
504	5	I	1.043	(NO. REQ'D.) (LENGTH) WEIGHT *	12 8'-1" 101.2	14 8'-8" 129.6	14 9'-3" 135.1	16 9'-10" 164.1	18 11'-0" 206.5	20 12'-2" 253.8	504 NUMBER BARS REQ'D. = $2\left(\frac{2W+I.D.+4}{9"} +1\right)$ BAR LENGTH = 32"+2W+I.D. @ 12"
1101	11	I	5.313	(NO. REQ'D.) (LENGTH) WEIGHT *	4 7'-2" 152.3	4 7'-8" 164.7	4 8'-4" 177.1	4 8'-11" 189.5	4 10'-4" 214.3	4 11'-3" 239.1	1101 BAR LENGTH = 21" + I.D. + 2W
1102	11	I	5.313	(NO. REQ'D.) (LENGTH) WEIGHT *	BENDING TYPE I 4 2'-8" 56.7	STRAIGHT 4 2'-8" 56.7	4 2'-8" 56.7	4 2'-8" 56.7	4 2'-8" 56.7	4 2'-8" 56.7	
1103	11	I	5.313	(NO. REQ'D.) (LENGTH) WEIGHT *	TYPE II 3 5'-0" 79.7	3 5'-0" 79.7	3 5'-0" 79.7	3 5'-0" 79.7	3 5'-0" 79.7	3 5'-0" 79.7	
* REINFORCING STEEL TOTAL					965.6	1,037.5	1,127.2	1,204.0	1,380.2	1,601.6	TYPE III 12" 12" 2" 16"+W+I.D./2 I.D.x2W+38"
CONCRETE - CUBIC YARDS - TOTAL					6.0	6.6	7.3	8.0	9.5	11.1	

NOTE: QUANTITIES ARE BASED ON SAME SIZE PIPE ENTRANCE TO AND EXIT FROM, BASE AND A 4 FT. MANHOLE ENTRANCE INTO TOP SLAB OF BASE.

QUANTITIES FOR CONCRETE MANHOLE BOX BASE



TYPICAL CHANNELIZATION DETAILS

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MANHOLES

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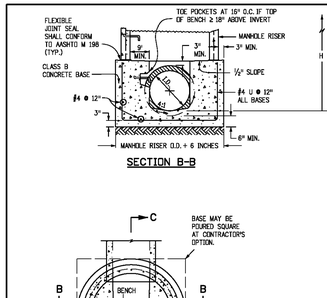

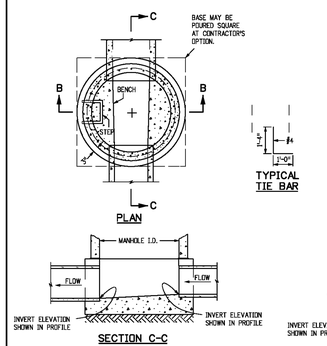

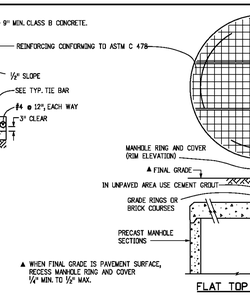

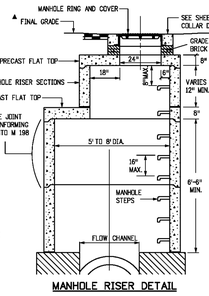

LEGEND

- SUITABLE SUBGRADE
- GRANULAR BEDDING MATERIAL
- CONCRETE

PRECAST MANHOLE BASES NOTES:

1. THE BASE SLAB SHALL BE POURED MONOLITHICALLY WITH BOTTOM RISER SECTION.
2. PRECAST MANHOLE BASES SHALL FIT THE CONDITIONS AND LOCATIONS FOR WHICH THEY ARE INTENDED WITHOUT ANY FIELD MODIFICATIONS. ANY MANHOLE BASE WHICH REQUIRES FIELD CUTTING OR MODIFICATION IN ORDER TO FIT THE LOCATIONS INTENDED WILL BE REJECTED BY THE ENGINEER AND REMOVED AND REPLACED BY THE CONTRACTOR AT NO COST TO THE DEPARTMENT.
3. PRECAST MANHOLE BASES SHALL BE BEDDED ON AN APPROVED GRANULAR BEDDING MATERIAL AS SHOWN ABOVE.

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MANHOLES

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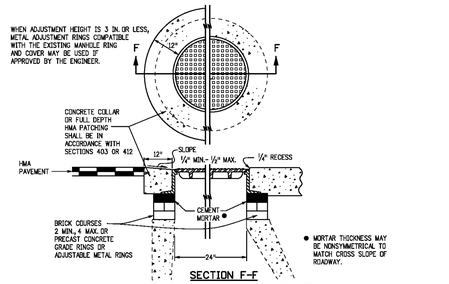
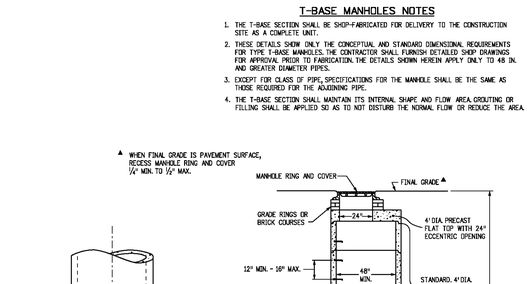
T-BASE MANHOLES NOTES

1. THE T-BASE SECTION SHALL BE SHOP-FABRICATED FOR DELIVERY TO THE CONSTRUCTION SITE AS A COMPLETE UNIT.
2. THESE DETAILS SHOW ONLY THE CONCEPTUAL AND STANDARD DIMENSIONAL REQUIREMENTS FOR TYPE T-BASE MANHOLES. THE CONTRACTOR SHALL FURNISH DETAILED SHOP DRAWINGS FOR APPROVAL PRIOR TO FABRICATION. THE DETAILS SHOWN HEREIN APPLY ONLY TO 48 IN. AND GREATER DIAMETER PIPES.
3. EXCEPT FOR CLASS OF PIPE, SPECIFICATIONS FOR THE MANHOLE SHALL BE THE SAME AS THOSE REQUIRED FOR THE ADJOINING PIPE.
4. THE T-BASE SECTION SHALL MAINTAIN ITS INTERNAL SHAPE AND FLOW AREA. GROUTING OR FILLING SHALL BE APPLIED SO AS TO NOT DISTURB THE NORMAL FLOW OR REDUCE THE AREA.





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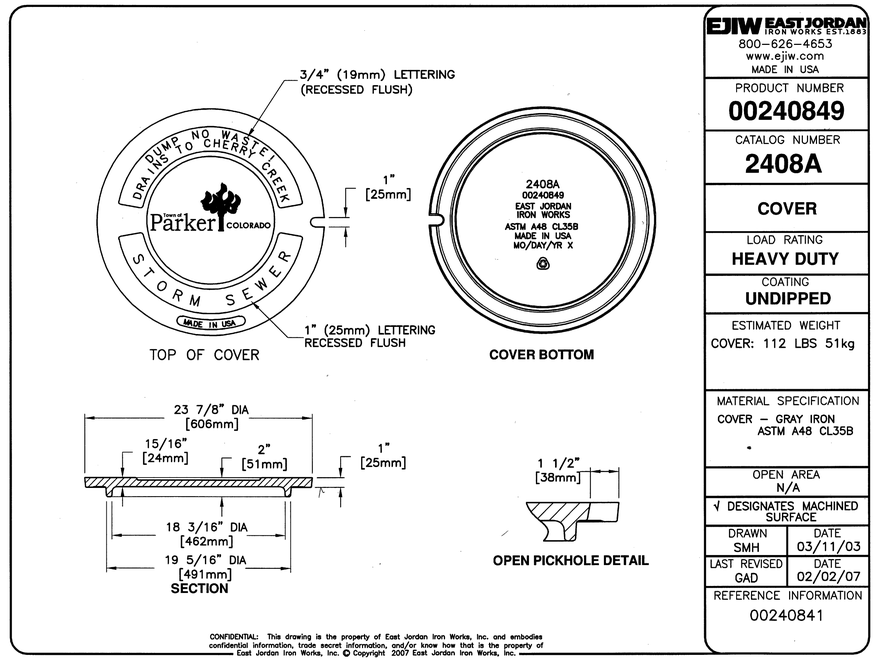

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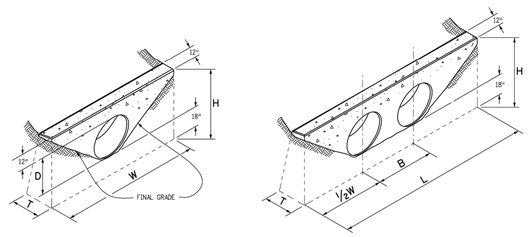


CONCRETE HEADWALL INSTALLATIONS

SEE STANDARD PLAN M-601-10 FOR REINFORCING DETAILS.

PIPE		PIPE DIAMETER (AND EQUIVALENT DIAMETER) (IN.)											
		18		24		30		36		42		48	
TYPE	MATERIAL	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE
CIRCULAR	RIGID	1.0	1.3	1.5	2.0	2.0	2.7	2.8	3.6	3.6	4.6	4.6	6.0
	FLEXIBLE	1.1	1.4	1.6	2.1	2.2	3.0	3.0	4.0	3.9	5.3	5.0	6.8
ELLIPTICAL	RIGID	23 x 14		30 x 19		38 x 24		45 x 29		53 x 34		60 x 38	
		0.9	1.2	1.3	1.6	1.7	2.2	2.3	2.9	2.9	3.7	3.5	4.4
ARCH	METAL	22 x 13		29 x 18		36 x 22		43 x 27		50 x 31		58 x 36	
		0.9	1.3	1.4	1.9	1.8	2.4	2.4	3.4	3.2	4.4	3.4	5.0

CONCRETE QUANTITIES FOR ONE CONCRETE HEADWALL (CUBIC YARDS)

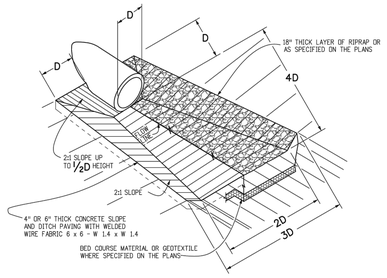
THICKNESS	MATERIAL	PIPE DIAMETER (IN.)						
		18	24	30	36	42	48	
4"	CONCRETE	0.4	0.8	1.2				
6"	CONCRETE				2.6	3.6	4.7	
18"	RIPRAP	2.0	3.5	5.4	7.8	10.7	13.9	

PIPE OUTLET PAVING (CUBIC YARDS)

NOTE: VOLUME OCCUPIED BY PIPE HAS BEEN DEDUCTED.

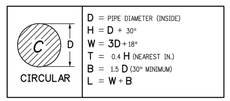
GENERAL NOTES

1. FOR SIZE AND LOCATION OF PIPES, SEE THE PLANS.
2. ALL CONCRETE SHALL BE CLASS B.
3. FOOTINGS IN ROCK SHALL BE POURED OUT TO ROCK AND NOT FORMED IN ACCORDANCE WITH SUBSECTION 601.09(b).
4. EXPOSED CONCRETE CORNERS SHALL BE CHAMFERED ¾ IN.
5. HEADWALL SHALL HAVE REINFORCING STEEL INSTALLED IN A PATTERN SIMILAR TO STANDARD PLAN M-601-10.
6. THE COST OF REINFORCING STEEL SHALL BE INCLUDED IN THE WORK UNLESS THE STEEL QUANTITIES ARE LISTED IN THE PLANS AND ARE PAID FOR SEPARATELY.



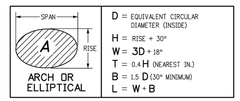
PIPE OUTLET PAVING

MAY BE USED WITH MULTIPLE PIPES.



D = PIPE DIAMETER (INSIDE)
H = D + 30"
W = 3D + 18"
T = 0.4 H (NEARIST IN.)
B = 1.5 D (30" MINIMUM)
L = W + B

TYPE OF PIPE — HEADWALL DIMENSIONS



D = EQUIVALENT CIRCULAR DIAMETER (INSIDE)
H = RISE + 30"
W = 3D + 18"
T = 0.4 H (NEARIST IN.)
B = 1.5 D (30" MINIMUM)
L = W + B

TYPE OF PIPE — HEADWALL DIMENSIONS

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CAD Ver.: MicroStation V8 Scale: Not to Scale Units: English				

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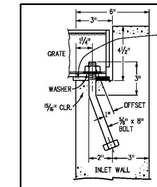
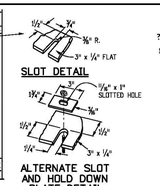
HEADWALLS AND PIPE OUTLET PAVING

Issued By: Project Development Branch July 4, 2012

STANDARD PLAN NO. M-601-12

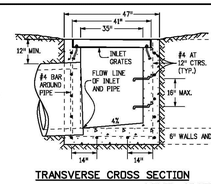
Sheet No. 1 of 1



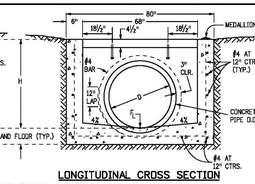


ALTERNATE SLOT AND HOLD DOWN PLATE DETAIL

GRATE INSTALLATION DETAIL



TRANSVERSE CROSS SECTION

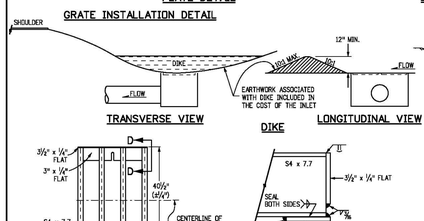


LONGITUDINAL CROSS SECTION

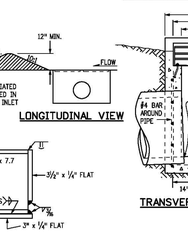
LEVEL GRATE INSTALLATION

GENERAL NOTES

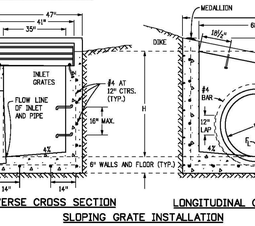
1. INLET TYPE D IS NOT HS-20 RATED AND SHALL NOT BE PLACED IN PAVED ROADWAYS. THIS INLET SHALL BE USED ONLY OUTSIDE PAVED ROADWAYS.
2. CONCRETE SHALL BE CLASS B. INLET MAY BE CAST-IN-PLACE OR PRECAST.
3. SEE PLANS FOR SIZE AND LOCATION OF PIPE.
4. STRUCTURAL STEEL FOR GRATES AND GRATE INSTALLATION HARDWARE SHALL BE GALVANIZED AND SHALL BE IN ACCORDANCE WITH SUBSECTION 712.06.
5. STANDARD INLET GRATES SHALL BE USED ON ALL TYPE D INLETS UNLESS CLOSE MESH GRATES ARE SPECIFIED ON THE PLANS.
6. CLOSE MESH GRATES ARE RECOMMENDED WHERE FOOT TRAFFIC OR BICYCLE ROUTES ARE IN CLOSE PROXIMITY TO GRATE. THIS GRATE IS NOT ADA COMPLIANT OR BICYCLE FRIENDLY AND SHALL NOT BE PLACED DIRECTLY IN SIDEWALKS, CROSSWALKS OR BIKE PATHS.
7. STEPS SHALL BE PROVIDED WHEN INLET DIMENSION "H" IS EQUAL TO OR GREATER THAN 3 FT.-6 IN. AND SHALL CONFORM WITH AASHTO M 199.
8. REINFORCING BARS SHALL BE EPOXY COATED AND DEFORMED #4, AND SHALL HAVE A 2 IN. MINIMUM CLEARANCE. CUT OR BEND BARS AROUND PIPE AS REQUIRED.
9. ALL INLETS SHALL HAVE A 4 IN. DIA. METAL MEDALLION WITH A "NO DUMPING DRAINS TO STREAM" MESSAGE ON IT. THE MEDALLION SHALL HAVE A FISH SYMBOL WITH A BLUE BACKGROUND. IT SHALL BE FIRMLY ATTACHED TO THE INLET'S SURFACE WITH A PERMANENT FASTENER.



NO. PIECES	DESCRIPTION	LENGTH	LBS PER FT.	WEIGHT (LBS.)
8	54 x 7.7 BEAM	40"	7.70	206
4	3½" x ¼" FLAT	28⅝"	2.98	26
4	3" x ¼" FLAT	28⅝"	2.55	24
TOTAL LBS. = 256				

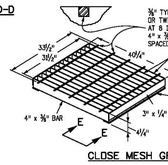


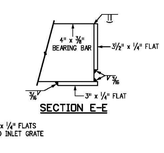
TRANSVERSE CROSS SECTION



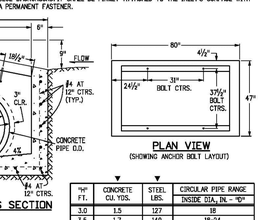
LONGITUDINAL CROSS SECTION

SLOPING GRATE INSTALLATION





OUTLET PIPE INSIDE DIA. FT. - "D"	MIN. "H" FT.
1.5	3.0
2.0	3.5
2.5	4.0
3.0	4.5
3.5	5.0



PLAN VIEW

(SHOWING ANCHOR BOLT LAYOUT)

"H" FT.	CONCRETE CU. YDS.	STEEL LBS.	CIRCULAR PIPE RANGE INSIDE DIA. IN. - "D"
3.0	1.5	127	18
3.5	1.7	149	18-24
4.0	1.9	157	18-30
4.5	2.0	179	18-36
5.0	2.2	187	18-42
5.5	2.4	208	18-42
6.0	2.6	215	18-42
6.5	2.8	238	18-42
7.0	2.9	243	18-42
7.5	3.1	264	18-42
8.0	3.3	271	18-42
8.5	3.5	292	18-42
9.0	3.6	299	18-42
9.5	3.8	320	18-42
10.0	4.0	327	18-42

▼ CONCRETE AND STEEL QUANTITIES ARE FOR ONE ENTIRE INLET BEFORE DEDUCTION FOR VOLUME OCCUPIED BY PIPE. WEIGHT OF STEEL INCLUDES A RING FOR THE MAXIMUM PIPE DIAMETER.

QUANTITIES FOR ONE INLET

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Last Modification Date: 07/04/12	Initials: LTA			
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INLET, TYPE D

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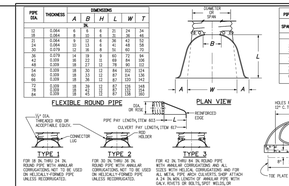
STANDARD PLAN NO. M-604-11

Sheet No. 1 of 1



CONCRETE HEADWALL INSTALLATIONS

SEE STANDARD PLAN M-601-10 FOR REINFORCING DETAILS.

PIPE		PIPE DIAMETER (AND EQUIVALENT DIAMETER) (IN.)											
		18		24		30		36		42		48	
TYPE	MATERIAL	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE	SINGLE	DOUBLE
CIRCULAR	RIGID	1.0	1.3	1.5	2.0	2.0	2.7	2.8	3.6	3.6	4.6	4.6	6.0
	FLEXIBLE	1.1	1.4	1.6	2.1	2.2	3.0	3.0	4.0	3.9	5.3	5.0	6.8
ELLIPTICAL	RIGID	23 x 14		30 x 19		38 x 24		45 x 29		53 x 34		60 x 38	
		0.9	1.2	1.3	1.6	1.7	2.2	2.3	2.9	2.9	3.7	3.5	4.4
ARCH	METAL	22 x 13		29 x 18		36 x 22		43 x 27		50 x 31		58 x 36	
		0.9	1.3	1.4	1.9	1.8	2.4	2.4	3.4	3.2	4.4	3.4	5.0

CONCRETE QUANTITIES FOR ONE CONCRETE HEADWALL (CUBIC YARDS)

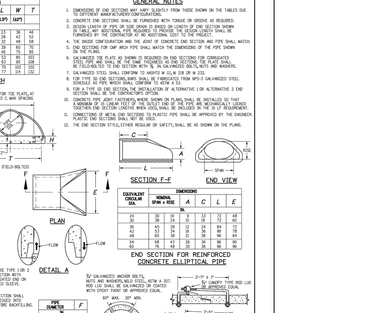
THICKNESS	MATERIAL	PIPE DIAMETER (IN.)						
		18	24	30	36	42	48	
4"	CONCRETE	0.4	0.8	1.2				
6"	CONCRETE				2.6	3.6	4.7	
18"	RIPRAP	2.0	3.5	5.4	7.8	10.7	13.9	

PIPE OUTLET PAVING (CUBIC YARDS)

NOTE: VOLUME OCCUPIED BY PIPE HAS BEEN DEDUCTED.

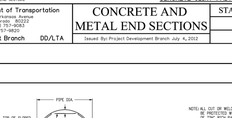
GENERAL NOTES

1. FOR SIZE AND LOCATION OF PIPES, SEE THE PLANS.
2. ALL CONCRETE SHALL BE CLASS B.
3. FOOTINGS IN ROCK SHALL BE POURED OUT TO ROCK AND NOT FORMED IN ACCORDANCE WITH SUBSECTION 601.09(b).
4. EXPOSED CONCRETE CORNERS SHALL BE CHAMFERED ¾ IN.
5. HEADWALL SHALL HAVE REINFORCING STEEL INSTALLED IN A PATTERN SIMILAR TO STANDARD PLAN M-601-10.
6. THE COST OF REINFORCING STEEL SHALL BE INCLUDED IN THE WORK UNLESS THE STEEL QUANTITIES ARE LISTED IN THE PLANS AND ARE PAID FOR SEPARATELY.



PIPE OUTLET PAVING

MAY BE USED WITH MULTIPLE PIPES.



D = PIPE DIAMETER (INSIDE)
H = D + 30"
W = 3D + 18"
T = 0.4 H (NEARIST IN.)
B = 1.5 D (30" MINIMUM)
L = W + B

TYPE OF PIPE — HEADWALL DIMENSIONS

D = EQUIVALENT CIRCULAR DIAMETER (INSIDE)
H = RISE + 30"
W = 3D + 18"
T = 0.4 H (NEARIST IN.)
B = 1.5 D (30" MINIMUM)
L = W + B

TYPE OF PIPE — HEADWALL DIMENSIONS

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Drawing File Name: 6030120101.dgn				
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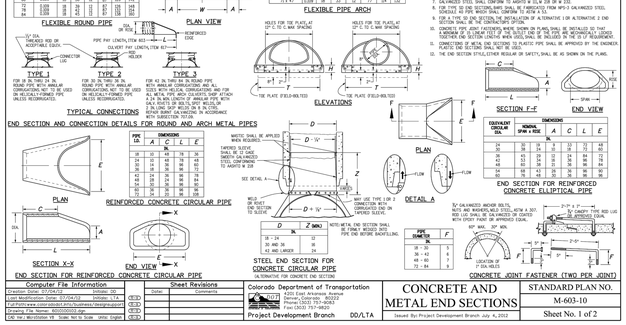
CONCRETE AND METAL END SECTIONS

Issued By: Project Development Branch July 4, 2012

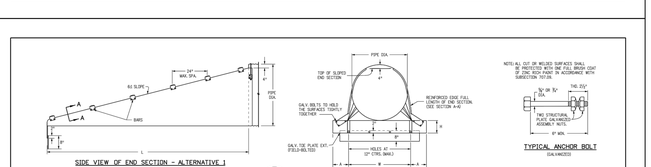
STANDARD PLAN NO. M-603-10

Sheet No. 1 of 2



GENERAL NOTES

1. DIMENSIONS OF END SECTIONS MAY VARY SLIGHTLY FROM THOSE SHOWN ON THE TABLES DUE TO DIFFERENT MANUFACTURING PROCEDURES.
2. CONCRETE END SECTIONS SHALL BE FURNISHED WITH TONGUE OR GROOVE AS REQUIRED.
3. DESIGN LENGTH OF PIPE OR SIDE DRAIN IS BASED ON LENGTH OF END SECTION SHOWN PLUS 4 IN. FOR CONCRETE END SECTIONS. ANY ADDITIONAL LENGTH SHALL BE FURNISHED BY THE CONTRACTOR AT NO ADDITIONAL COST TO THE PROJECT.
4. THE INSIDE CONFIGURATION AND THE JOINT OF CONCRETE END SECTION AND PIPE SHALL MATCH.
5. END SECTIONS FOR CMP ARCH PIPE SHALL MATCH THE DIMENSIONS OF THE PIPE SHOWN ON THE PLANS.
6. CONCRETE SADDLE TOE PLATE OR SHOWN IS REQUIRED ON END SECTIONS FOR CORRUGATED STEEL PIPE AND SHALL BE OF THE SAME THICKNESS AS THE SECTIONS. TOE PLATE SHALL BE FIELD-DRILLED TO END SECTION WITH ⅞" DIA GALVANIZED BOLTS, NUTS AND WASHERS.
7. GALVANIZED STEEL SHALL CONFORM TO AASHTO M 218, M 36 OR M 232.
8. FOR TYPE SD END SECTIONS, RAMPS SHALL BE FABRICATED FROM NPS-3 GALVANIZED STEEL PIPE, ASTM A 53, GRADE B, SCHEDULE 40 OR 80.
9. FOR A TYPE SD END SECTION, THE INSTALLATION OF A REMOVABLE 1.5R OR ALTERNATIVE 2 END SECTION SHALL BE WITH ½" EXPANSION JOINTS.
10. GALVANIZED BOLTS, NUTS AND WASHERS SHOWN ON PLANS SHALL BE INSTALLED SO THAT A MINIMUM OF ½ THREAD LENGTH OF THE SHANK OF THE BOLTS ARE MECHANICALLY LOCKED TOGETHER END SECTION LENGTHS WHEN USED, SHALL BE INCLUDED IN THE 10 FT REQUIREMENT.
11. ALL EXPOSED METAL SURFACES OF THE GALVANIZED STEEL SHALL BE IMPROVED BY THE ENDWELDS PERFECTED BY A FINISH COAT OF ZINC RICH PAINT.
12. THE END SECTION STYLE, EITHER REGULAR OR SAFETY, SHALL BE AS SHOWN ON THE PLANS.



END SECTION AND CONNECTION DETAILS FOR ROUND AND ARCH METAL PIPES

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CONCRETE AND METAL END SECTIONS

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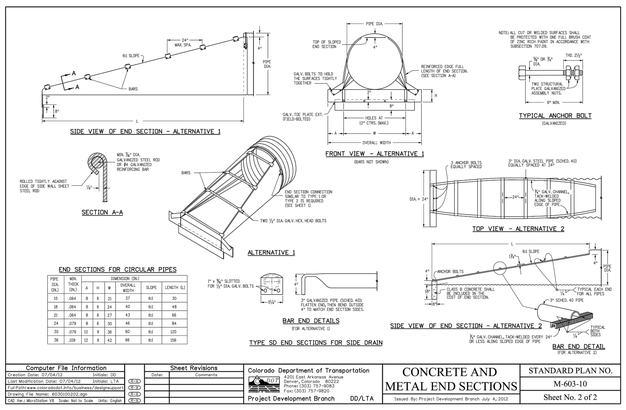
STANDARD PLAN NO. M-603-10

Sheet No. 2 of 2



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CONCRETE AND METAL END SECTIONS

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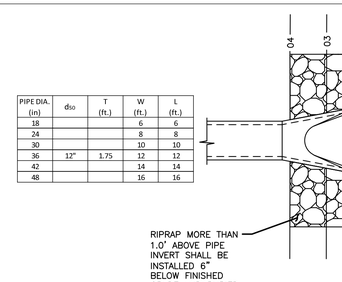
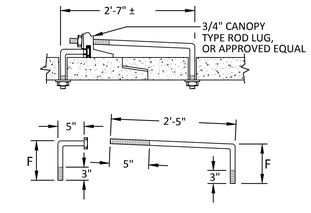
STANDARD PLAN NO. M-603-10

Sheet No. 3 of 2

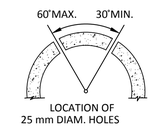


PIPE DIA. (in)	d_{50}	T (ft.)	W (ft.)	L (ft.)
18			6	6
24			8	8
30			10	10
36	12"	1.75	12	12
42			14	14
48			16	16



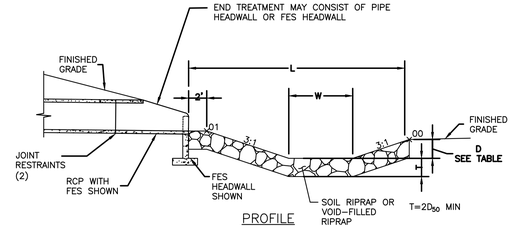
3/4" GALVANIZED ANCHOR BOLTS, NUTS AND WASHERS, MILD STEEL, ASTM A 307. ROD LUG SHALL BE COATED WITH COAL-TAR, EPOXY PAINT OR APPROVED EQUAL.

PIPE DIAMETER	F
18" - 30"	5"
36" - 42"	6"
48" - 60"	7"
72" - 84'	9"



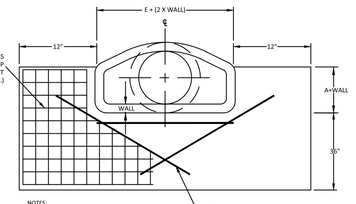
CONCRETE JOINT FASTENER (TWO PER JOINT)

N.T.S.



LOW TAILWATER RIPRAP BASIN

N.T.S.



PIPE DIA.	A	E
18"	9"	36"
24"	9.5"	48"
30"	12"	60"
36"	15"	72"
42"	21"	78"
48"	24"	84"

FLARED END SECTION TOEWALL DETAIL

N.T.S.

Know what's below. Call before you dig.

Plotted: 6/27/2016 8:18 PM Dwg Name: p:\Clpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Storm Details.dwg Updated By: rkatz

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DRAWN BY	DATE	REVISIONS
ETG	12/2015	1ST SUBMITTAL
ETG	4/14/16	2ND SUBMITTAL
ETG	6/27/16	3RD SUBMITTAL

COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE

TOWN OF PARKER, COLORADO

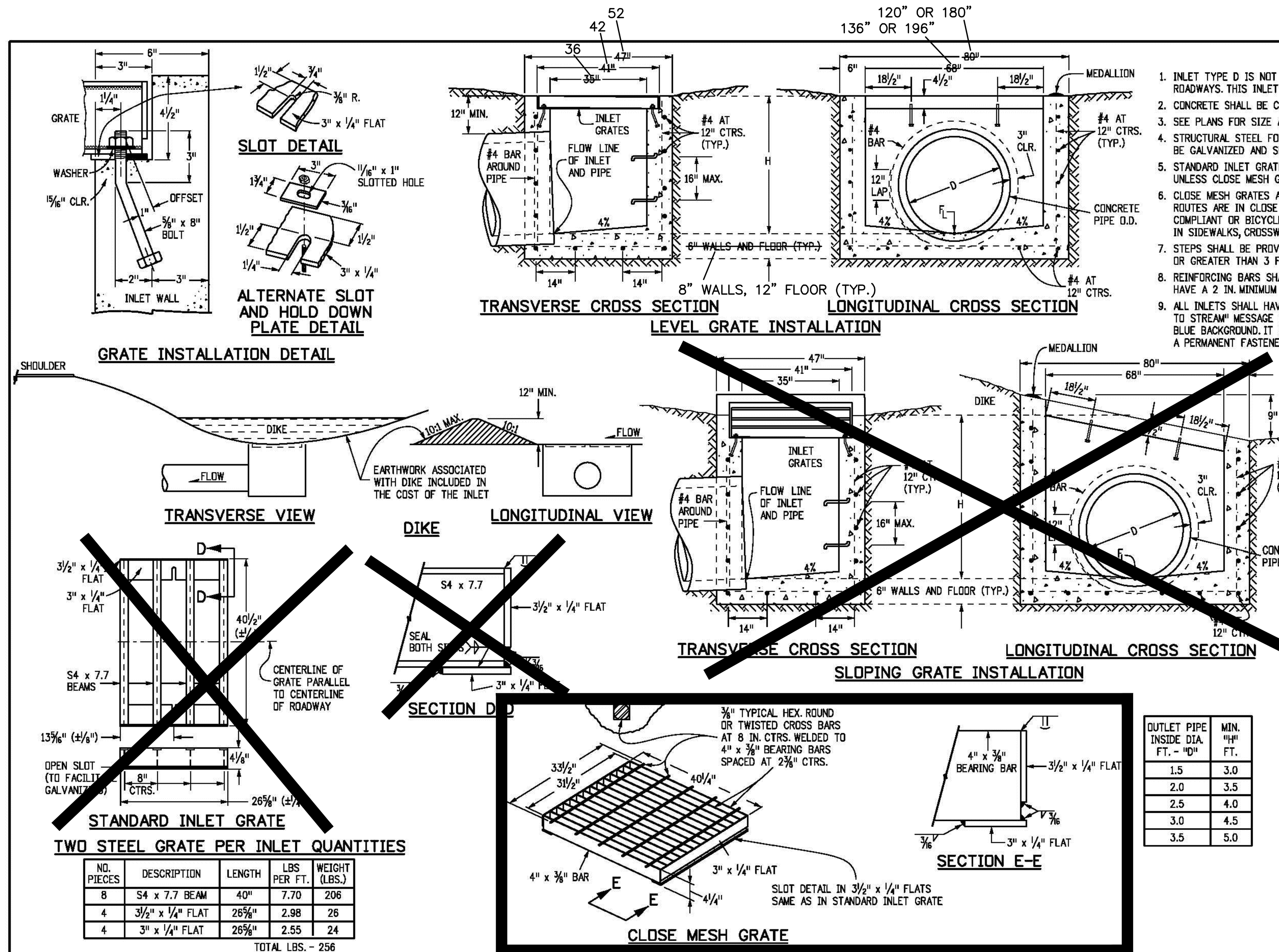
STORM DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET 39 OF 40

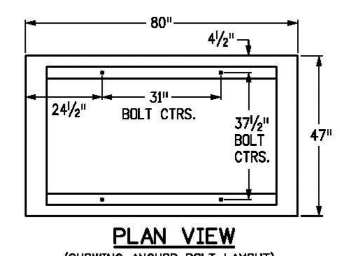
CLCPKC3 ---

PENDING APPROVAL



GENERAL NOTES

1. INLET TYPE D IS NOT HS-20 RATED AND SHALL NOT BE PLACED IN PAVED ROADWAYS. THIS INLET SHALL BE USED ONLY OUTSIDE PAVED ROADWAYS.
2. CONCRETE SHALL BE CLASS B. INLET MAY BE CAST-IN-PLACE OR PRECAST.
3. SEE PLANS FOR SIZE AND LOCATION OF PIPE.
4. STRUCTURAL STEEL FOR GRATES AND GRATE INSTALLATION HARDWARE SHALL BE GALVANIZED AND SHALL BE IN ACCORDANCE WITH SUBSECTION 712.06.
5. STANDARD INLET GRATES SHALL BE USED ON ALL TYPE D INLETS UNLESS CLOSE MESH GRATES ARE SPECIFIED ON THE PLANS.
6. CLOSE MESH GRATES ARE RECOMMENDED WHERE FOOT TRAFFIC OR BICYCLE ROUTES ARE IN CLOSE PROXIMITY TO GRATE. THIS GRATE IS NOT ADA COMPLIANT OR BICYCLE FRIENDLY AND SHALL NOT BE PLACED DIRECTLY IN SIDEWALKS, CROSSWALKS OR BIKE PATHS.
7. STEPS SHALL BE PROVIDED WHEN INLET DIMENSION "H" IS EQUAL TO OR GREATER THAN 3 FT.-6 IN. AND SHALL CONFORM WITH AASHTO M 199.
8. REINFORCING BARS SHALL BE EPOXY COATED AND DEFORMED #4, AND SHALL HAVE A 2 IN. MINIMUM CLEARANCE. CUT OR BEND BARS AROUND PIPE AS REQUIRED.
9. ALL INLETS SHALL HAVE A 4 IN. DIA. METAL MEDALLION WITH A "NO DUMPING DRAINS TO STREAM" MESSAGE ON IT. THE MEDALLION SHALL HAVE A FISH SYMBOL WITH A BLUE BACKGROUND. IT SHALL BE FIRMLY ATTACHED TO THE INLET'S SURFACE WITH A PERMANENT FASTENER.



PLAN VIEW
(SHOWING ANCHOR BOLT LAYOUT)

TWO STEEL GRATE PER INLET QUANTITIES

NO. PIECES	DESCRIPTION	LENGTH	LBS PER FT.	WEIGHT (LBS.)
8	S4 x 7.7 BEAM	40"	7.70	206
4	3½" x ¼" FLAT	26⅝"	2.98	26
4	3" x ¼" FLAT	26⅝"	2.55	24

TOTAL LBS. - 256

OUTLET PIPE INSIDE DIA. FT. - "D"	MIN. "H" FT.
1.5	3.0
2.0	3.5
2.5	4.0
3.0	4.5
3.5	5.0

"H" FT.	CONCRETE CU. YDS. ▼	STEEL LBS. ▼	CIRCULAR PIPE RANGE INSIDE DIA., IN. - "D"
3.0	1.5	127	18
3.5	1.7	149	18-24
4.0	1.9	157	18-30
4.5	2.0	179	18-36
5.0	2.2	187	18-42
5.5	2.4	208	18-42
6.0	2.6	215	18-42
6.5	2.8	236	18-42
7.0	2.9	243	18-42
7.5	3.1	264	18-42
8.0	3.3	271	18-42
8.5	3.5	292	18-42
9.0	3.6	299	18-42
9.5	3.8	320	18-42
10.0	4.0	327	18-42

▼ CONCRETE AND STEEL QUANTITIES ARE FOR ONE ENTIRE INLET BEFORE DEDUCTION FOR VOLUME OCCUPIED BY PIPE. WEIGHT OF STEEL INCLUDES A RING FOR THE MAXIMUM PIPE DIAMETER.

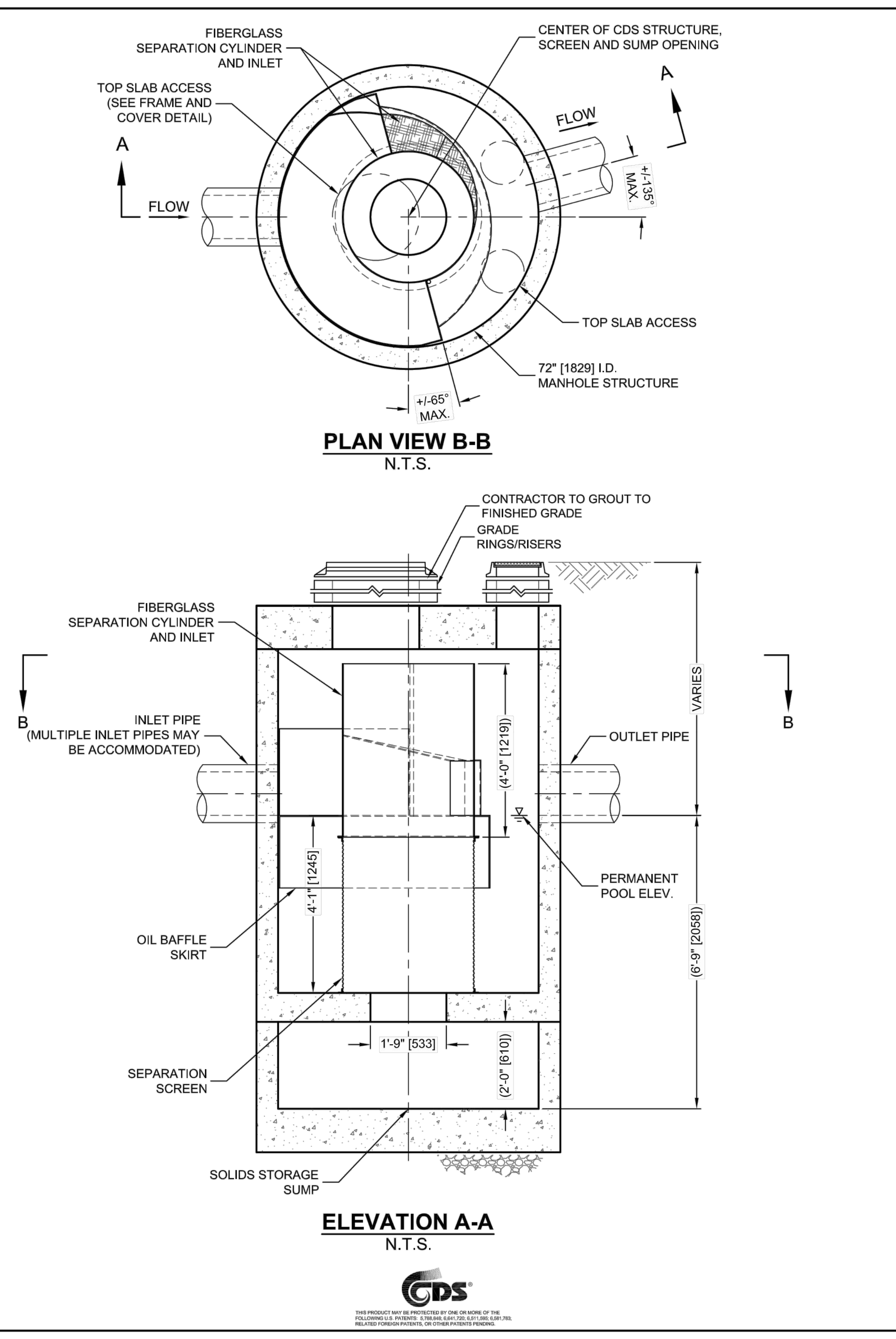
QUANTITIES FOR ONE INLET

Computer File Information		Sheet Revisions	
Creation Date: 07/04/12	Initials: DD	Date:	Comments
Last Modification Date: 07/04/12	Initials: LTA		
Full Path: www.coloradodot.info/business/designsupport			
Drawing File Name: 6040110101.dgn			
CAD Ver.: MicroStation V8 Scale: Not to Scale Units: English			

Colorado Department of Transportation
4201 East Arkansas Avenue
Denver, Colorado 80222
Phone: (303) 757-9083
Fax: (303) 757-9820
Project Development Branch DD/LTA

MODIFIED
INLET, TYPE D
Issued By: Project Development Branch July 4, 2012

STANDARD PLAN NO.
M-604-11
Sheet No. 1 of 1



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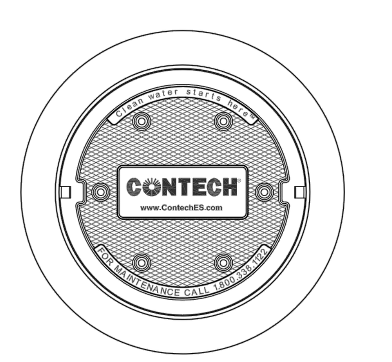
CDS3035-6-C DESIGN NOTES

CDS3035-6-C RATED TREATMENT CAPACITY IS 3.8 CFS [107.6 L/s], OR PER LOCAL REGULATIONS. MAXIMUM HYDRAULIC INTERNAL BYPASS CAPACITY IS 20.0 CFS [566 L/s]. IF THE SITE CONDITIONS EXCEED 20.0 CFS [566 L/s], AN UPSTREAM BYPASS STRUCTURE IS REQUIRED.

THE STANDARD CDS3035-6-C CONFIGURATION IS SHOWN. ALTERNATE CONFIGURATIONS ARE AVAILABLE AND ARE LISTED BELOW. SOME CONFIGURATIONS MAY BE COMBINED TO SUIT SITE REQUIREMENTS.

CONFIGURATION DESCRIPTION
GRATED INLET ONLY (NO INLET PIPE)
GRATED INLET WITH INLET PIPE OR PIPES
CURB INLET ONLY (NO INLET PIPE)
CURB INLET WITH INLET PIPE OR PIPES
SEPARATE OIL BAFFLE (SINGLE INLET PIPE REQUIRED FOR THIS CONFIGURATION)
SEDIMENT WEIR FOR NJDEP / NJCAT CONFORMING UNITS



FRAME AND COVER
(DIAMETER VARIES)
N.T.S.

SITE SPECIFIC DATA REQUIREMENTS

STRUCTURE ID			
WATER QUALITY FLOW RATE (CFS OR L/s)			*
PEAK FLOW RATE (CFS OR L/s)			*
RETURN PERIOD OF PEAK FLOW (YRS)			*
SCREEN APERTURE (2400 OR 4700)			*
PIPE DATA:	I.E.	MATERIAL	DIAMETER
INLET PIPE 1	*	*	*
INLET PIPE 2	*	*	*
OUTLET PIPE	*	*	*
RIM ELEVATION			*
ANTI-FLOTATION BALLAST		WIDTH	HEIGHT
		*	*
NOTES/SPECIAL REQUIREMENTS:			
* PER ENGINEER OF RECORD			

GENERAL NOTES
1. CONTECH TO PROVIDE ALL MATERIALS UNLESS NOTED OTHERWISE.
2. DIMENSIONS MARKED WITH ( ) ARE REFERENCE DIMENSIONS. ACTUAL DIMENSIONS MAY VARY.
3. FOR FABRICATION DRAWINGS WITH DETAILED STRUCTURE DIMENSIONS AND WEIGHTS, PLEASE CONTACT YOUR CONTECH ENGINEERED SOLUTIONS LLC REPRESENTATIVE. www.ContechES.com
4. CDS WATER QUALITY STRUCTURE SHALL BE IN ACCORDANCE WITH ALL DESIGN DATA AND INFORMATION CONTAINED IN THIS DRAWING.
5. STRUCTURE SHALL MEET AASHTO HS20 AND CASTINGS SHALL MEET HS20 (AASHTO M 306) LOAD RATING, ASSUMING GROUNDWATER ELEVATION AT, OR BELOW, THE OUTLET PIPE INVERT ELEVATION. ENGINEER OF RECORD TO CONFIRM ACTUAL GROUNDWATER ELEVATION.
6. PVC HYDRAULIC SHEAR PLATE IS PLACED ON SHELF AT BOTTOM OF SCREEN CYLINDER. REMOVE AND REPLACE AS NECESSARY DURING MAINTENANCE CLEANING.

INSTALLATION NOTES
A. ANY SUB-BASE, BACKFILL DEPTH, AND/OR ANTI-FLOTATION PROVISIONS ARE SITE-SPECIFIC DESIGN CONSIDERATIONS AND SHALL BE SPECIFIED BY ENGINEER OF RECORD.
B. CONTRACTOR TO PROVIDE EQUIPMENT WITH SUFFICIENT LIFTING AND REACH CAPACITY TO LIFT AND SET THE CDS MANHOLE STRUCTURE (LIFTING CLUTCHES PROVIDED).
C. CONTRACTOR TO ADD JOINT SEALANT BETWEEN ALL STRUCTURE SECTIONS, AND ASSEMBLE STRUCTURE.
D. CONTRACTOR TO PROVIDE, INSTALL, AND GROUT PIPES. MATCH PIPE INVERTS WITH ELEVATIONS SHOWN.
E. CONTRACTOR TO TAKE APPROPRIATE MEASURES TO ASSURE UNIT IS WATER TIGHT, HOLDING WATER TO FLOWLINE INVERT MINIMUM. IT IS SUGGESTED THAT ALL JOINTS BELOW PIPE INVERTS ARE GROUTED.

CONTECH ENGINEERED SOLUTIONS LLC
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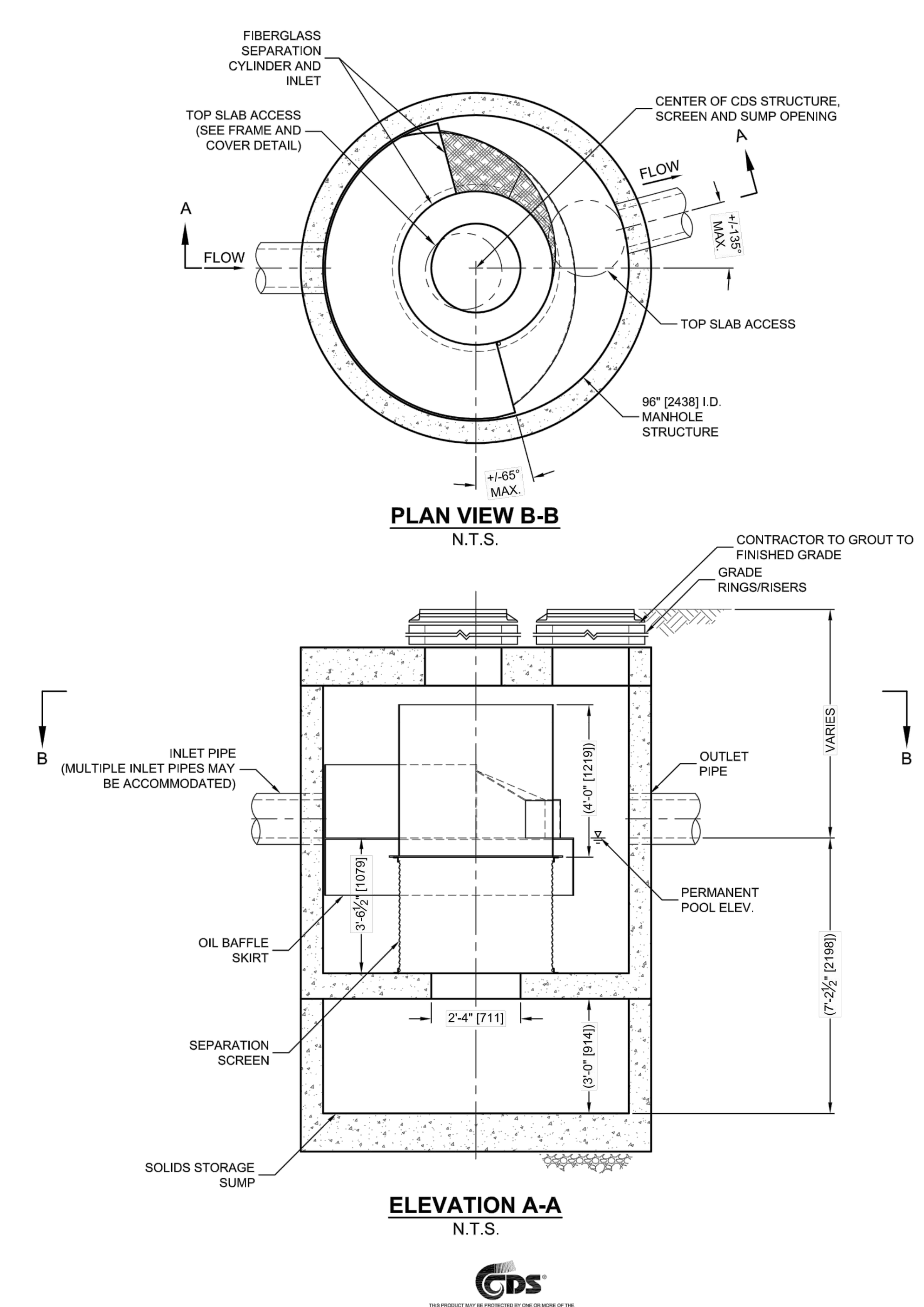
9025 Centre Pointe Dr., Suite 400, West Chester, OH 45069
800-338-1122 513-645-7000 513-645-7993 FAX

CDS3035-6-C
INLINE CDS
STANDARD DETAIL



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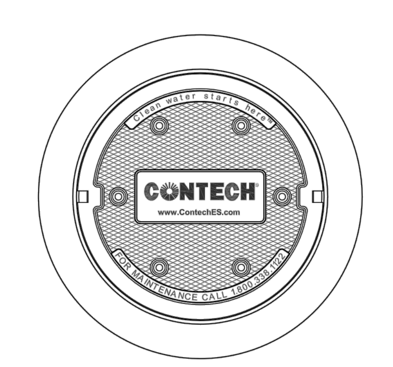
CDS4030-8-C DESIGN NOTES

CDS4030-8-C RATED TREATMENT CAPACITY IS 4.5 CFS [127.4 L/s], OR PER LOCAL REGULATIONS. MAXIMUM HYDRAULIC INTERNAL BYPASS CAPACITY IS 30.0 CFS [850 L/s]. IF THE SITE CONDITIONS EXCEED 30.0 CFS [850 L/s], AN UPSTREAM BYPASS STRUCTURE IS REQUIRED.

THE STANDARD CDS4030-8-C CONFIGURATION IS SHOWN. ALTERNATE CONFIGURATIONS ARE AVAILABLE AND ARE LISTED BELOW. SOME CONFIGURATIONS MAY BE COMBINED TO SUIT SITE REQUIREMENTS.

CONFIGURATION DESCRIPTION
GRATED INLET ONLY (NO INLET PIPE)
GRATED INLET WITH INLET PIPE OR PIPES
CURB INLET ONLY (NO INLET PIPE)
CURB INLET WITH INLET PIPE OR PIPES
SEPARATE OIL BAFFLE (SINGLE INLET PIPE REQUIRED FOR THIS CONFIGURATION)
SEDIMENT WEIR FOR NJDEP / NJCAT CONFORMING UNITS



FRAME AND COVER
(DIAMETER VARIES)
N.T.S.

SITE SPECIFIC DATA REQUIREMENTS

STRUCTURE ID			
WATER QUALITY FLOW RATE (CFS OR L/s)			*
PEAK FLOW RATE (CFS OR L/s)			*
RETURN PERIOD OF PEAK FLOW (YRS)			*
SCREEN APERTURE (2400 OR 4700)			*
PIPE DATA:	I.E.	MATERIAL	DIAMETER
INLET PIPE 1	*	*	*
INLET PIPE 2	*	*	*
OUTLET PIPE	*	*	*
RIM ELEVATION			*
ANTI-FLOTATION BALLAST		WIDTH	HEIGHT
		*	*
NOTES/SPECIAL REQUIREMENTS:			
* PER ENGINEER OF RECORD			

GENERAL NOTES
1. CONTECH TO PROVIDE ALL MATERIALS UNLESS NOTED OTHERWISE.
2. DIMENSIONS MARKED WITH ( ) ARE REFERENCE DIMENSIONS. ACTUAL DIMENSIONS MAY VARY.
3. FOR FABRICATION DRAWINGS WITH DETAILED STRUCTURE DIMENSIONS AND WEIGHTS, PLEASE CONTACT YOUR CONTECHENGINEERED SOLUTIONS LLC REPRESENTATIVE. www.ContechES.com
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INSTALLATION NOTES
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800-338-1122 513-645-7000 513-645-7993 FAX

CDS4030-8-C
INLINE CDS
STANDARD DETAIL

	DATE	REVISIONS	DRAWN BY
C			
C	6/24/16	3RD SUBMITTAL	
B	4/11/16	2ND SUBMITTAL	
A	11/2015	1ST SUBMITTAL	EG

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COMPARK VILLAGE SOUTH, FILING NO. 1 - BELFORD AVENUE
TOWN OF PARKER, COLORADO
STORM DETAILS

PROJ. MGR.: RJM
PROJ. ASSOC.: BRB
DRAWN BY: ETG
DATE: 12/2015

SHEET
40 OF 40
CLCPKC3 ---

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PENDING APPROVAL

Plotted: 6/27/2016 8:18 PM Dwg Name: p:\Clcpkc3\comsouth03-ultimate belford ave\dwg\Eng\final drawings\Plan Set\Town\CLCPKC3-Storm Details.dwg Updated By: rkatz