



**GENERAL NOTES:** \*GRADING AND EROSION CONTROL PLAN (GEC) TO BE USED INTERCHANGEABLE WITH STORMWATER MANAGEMENT PLAN (SWMP).

1. THIS STORMWATER MANAGEMENT PLAN (SWMP) HAS BEEN DEVELOPED IN ACCORDANCE WITH GOOD ENGINEERING, HYDROLOGIC, AND POLLUTION CONTROL PRACTICES TO MEET STANDARDS SET FORTH IN THE COLORADO DISCHARGE PERMIT SYSTEM (CDPS) GENERAL PERMIT FOR STORMWATER DISCHARGES ASSOCIATED WITH CONSTRUCTION ACTIVITY – PERMIT CERTIFICATION COR400000, EFFECTIVE APRIL 1, 2024 AND EXPIRING MARCH 31, 2029. THIS SWMP WAS ALSO DEVELOPED TO MEET EL PASO COUNTY REQUIREMENTS. EL PASO COUNTY REGULATES STORMWATER THROUGH THEIR EROSION AND STORMWATER QUALITY CONTROL PERMIT (ESQCP).
2. THE PERMITTEE AND THEIR CONTRACTORS MUST IMPLEMENT PROVISIONS OF THE SWMP AS WRITTEN AND UPDATED, FROM COMMENCEMENT OF CONSTRUCTION ACTIVITY UNTIL FINAL STABILIZATION IS ACHIEVED.
3. THE PLAN MUST REMAIN ON SITE OR BE ON SITE WHEN CONSTRUCTION ACTIVITIES ARE OCCURRING AT THE SITE UNLESS THE PERMITTEE HAS SPECIFIED AN ALTERNATE LOCATION AND OBTAINED APPROVAL FROM THE WATER QUALITY CONTROL DIVISION (WQCD).
4. THIS SWMP SHOULD BE VIEWED AS A LIVING DOCUMENT CONTINUOUSLY REVIEWED AND MODIFIED AS PART OF THE OVERALL PROCESS OF ASSESSING AND MANAGING STORMWATER QUALITY ISSUES AT THE SITE. THE SWMP MUST BE AMENDED WHEN THE FOLLOWING OCCURS:
  - A. CHANGE IN DESIGN, CONSTRUCTION, OPERATION, OR MAINTENANCE OF THE SITE REQUIRING IMPLEMENTATION OF NEW OR REVISED CONTROL MEASURES (CMs),
  - B. THE SWMP PROVES INEFFECTIVE IN CONTROLLING POLLUTANTS IN STORMWATER RUNOFF IN COMPLIANCE WITH THE PERMIT CONDITIONS,
  - C. CONTROL MEASURES IDENTIFIED IN THE SWMP ARE NO LONGER NECESSARY AND ARE REMOVED;
  - D. CORRECTIVE ACTIONS ARE TAKEN ON SITE THAT RESULT IN A CHANGE TO THE SWMP; AND
  - E. IF THE SITE, OR AN AREA OF THE SITE, QUALIFIES FOR AND IMPLEMENTS A REDUCED INSPECTION FREQUENCY.
5. SWMP REVISIONS MUST INCLUDE A NOTATION THAT IDENTIFIES: THE DATE OF SITE CHANGE, THE CM(s) REMOVED, OR MODIFIED; LOCATION(S) OF THOSE CMs; AND ANY CHANGES TO THE CMs. UNDOCUMENTED CHANGES AND OUTSTANDING REVISIONS RENDER THE SWMP NON-COMPLIANT WITH THE GENERAL PERMIT.
6. ALL TEMPORARY STRUCTURAL PERIMETER CMs ON THE SWMP SHEETS WILL BE INSTALLED BEFORE ANY CONSTRUCTION ACTIVITIES TAKE PLACE IN THAT AREA.
7. CMs WILL BE FIELD FIT TO ON-SITE CONDITIONS AND CONSTRUCTION DISTURBANCES. DIMENSIONS AND QUANTITIES OF STRUCTURAL CMs MAY DIFFER THAN INDICATED AND SHOULD BE REVISED ON THE PLAN ONCE INSTALLED.
8. UNLESS INFEASIBLE, TOPSOIL WILL BE PRESERVED FOR AREAS OF THE SITE THAT WILL UTILIZE VEGETATIVE COVER FOR FINAL STABILIZATION. SEE SEED MIX IN TAB 14 OF THE SWMP REPORT.
9. CONSTRUCTION CONTRACTOR WILL MINIMIZE TO THE EXTENT FEASIBLE DISTURBANCES TO EXISTING VEGETATION AT THE SITE.
10. TEMPORARY STABILIZATION MUST BE IMPLEMENTED FOR EARTH DISTURBING ACTIVITIES AT ANY PORTION OF THE SITE WHERE SUCH ACTIVITIES HAVE CEASED FOR MORE THAN 14 CALENDAR DAYS UNLESS THE FUNCTION OF THE AREA REQUIRES IT TO REMAIN DISTURBED, OR PHYSICAL CHARACTERISTICS OF THE TERRAIN OR CLIMATE PREVENT STABILIZATION. FOR AREAS WHICH EXCEED THE 14-DAY STABILIZATION TIMELINE, THE SWMP MUST DOCUMENT CONSTRAINTS NECESSITATING THE ALTERNATE SCHEDULES, PROVIDE THE ALTERNATE STABILIZATION SCHEDULE, AND IDENTIFY ALL LOCATIONS WHERE ALTERNATIVE SCHEDULES ARE APPLICABLE ON THE SITE MAP.
11. BULK STORAGE (55 GALLONS OR GREATER) OF PETROLEUM PRODUCTS OR OTHER CHEMICALS WILL HAVE ADEQUATE PROTECTION TO CONTAIN ALL SPILLS AND PREVENT ANY SPILLED MATERIAL FROM LEAVING THE SITE OR ENTERING THE STORMWATER SYSTEM OR SURFACE WATERS.
12. SOLID WASTE, INDUSTRIAL WASTE, YARD WASTE, AND ANY OTHER POLLUTANTS MUST BE CONTROLLED USING CMs.
13. THERE ARE NO STORMWATER INLETS WITHIN THE PROJECT AREA.
14. LIMITS OF DISTURBANCE TO INCLUDE ALL GRADING AND SURFACE DISTURBING WORK (CM INSTALLATION, RUTTING 3 IN. OR DEEPER, ETC.).
15. AGRICULTURALLY MANAGED CROP LAND WILL BE RETURNED TO LANDOWNER IN A SURFACE ROUGHENED CONDITION, WITHOUT SEED AND MULCH, PER AGRICULTURAL LANDOWNER DIRECTIVE. ALL OTHER DISTURBED AREAS THAT WERE PREVIOUSLY VEGETATED WILL USE SEED AND MULCH (SM) AS FORM OF FINAL RESOTRATION. CONTRACTOR TO UTILIZE THE SEED MIX PROVIDED IN TAB 14 OF THE SWMP REPORT. CONTRACTOR TO MARKUP LOCATIONS OF SM IN PLANS ONCE PRESCRIBED IN THE FIELD.
16. LOCATIONS OF WATERBODIES SHOWN ON SWMP MAPS MAY DIFFER FROM TOPOGRAPHY AND ACTUAL LOCATIONS IDENTIFIED IN THE FIELD DUE TO AERIAL IMAGING.
17. PRIMARY LOCATIONS FOR EQUIPMETN AND MATERIAL STAGING TO BE AT STAGING AYRD PERMITTED SEPARATELY FROM THIS TRANSSION LINE WORK.
18. A CONCRETE WASHOUT (CWA) WILL BE LOCATED AT ANY WORK AREAS WHERE CONCRETE WILL BE POURED. CWAs PLANNED TO BE MOBILE TYPE (ECO-PAN OR SIMILAR) AND NOT TO BE LEFT IN FLOODPLAIN FOR EXTENDED PERIODS OF TIME. ONCE CONCRETE POURING ACTIVITIES FOR STRUCTURES IN FLOODPLAINS CEASES, CWA TO REMOVED FROM FLOODPLAIN AND MAINTAINED PER THE SPEC.
19. REFER TO VEGETATION AND TOPOGRAPHY (VT) DETAIL FOR INFORMATION REGARDING REQUIRED BUFFER DISTANCES FOR USE OF VT IN LIEU OF STRUCTURAL CONTROL MEASURE.
20. SEE TAB 1.E AND TAB 11 OF THE SWMP REPORT FOR DETAILS ON EXISTING VEGETATION ALONG THE PROJECT.
21. LOCATIONS OF PROPOSED PERMANENT AND TEMPORARY CULVERTS INSPECTED AND VERIFIED BY EL PASO COUNTY AS PART OF LOCAL ACCESS AND RIGHT-OF-WAY PERMITTING PROCESS.

[illegible]



**EL PASO COUNTY STANDARD NOTES:**

1. NOTWITHSTANDING ANYTHING DEPICTED IN THESE PLANS IN WORDS OR GRAPHIC REPRESENTATION, ALL DESIGN AND CONSTRUCTION RELATED TO ROADS, STORM DRAINAGE, AND EROSION CONTROL SHALL CONFORM TO THE STANDARDS AND REQUIREMENTS OF THE MOST RECENT VERSION OF THE RELEVANT ADOPTED EL PASO COUNTY (EPC) STANDARDS, INCLUDING THE LAND DEVELOPMENT CODE (LDC), THE ENGINEERING CRITERIA MANUAL (ECM), THE DRAINAGE CRITERIA MANUAL (DCM) VOLUME 1 AND 2. ANY DEVIATIONS FROM REGULATIONS AND STANDARDS MUST BE REQUESTED, AND APPROVED, IN WRITING.
2. A PRECONSTRUCTION MEETING BETWEEN THE PERMIT HOLDER(S) AND EL PASO COUNTY SHALL BE HELD PRIOR TO ANY CONSTRUCTION ACTIVITIES. IT IS THE RESPONSIBILITY OF THE PERMIT HOLDER(S) TO COORDINATE THE MEETING TIME AND PLACE WITH COUNTY STAFF. NO LAND DISTURBANCE OR CONSTRUCTION ACTIVITIES BEYOND THE INSTALLATION OF THE INITIAL CONSTRUCTION CONTROL MEASURES (CCMS), AS INDICATED ON THE APPROVED GEC PLAN OR CDS WITH GEC PLANS, MAY OCCUR PRIOR TO RECEIVING A NOTICE TO PROCEED (NTP) ISSUED BY THE ECM ADMINISTRATOR. FAILURE TO OBTAIN A NOTICE TO PROCEED PRIOR TO BEGINNING LAND DISTURBING ACTIVITIES MAY RESULT IN AN IMMEDIATE STOP WORK ORDER (SWO).
3. CONSTRUCTION CONTROL MEASURES MUST BE INSTALLED PRIOR TO COMMENCEMENT OF ACTIVITIES THAT COULD CONTRIBUTE POLLUTANTS TO STORMWATER. STORMWATER RUNOFF FROM ALL DISTURBED AREAS AND SOIL STORAGE AREAS MUST UTILIZE OR FLOW TO ONE OR MORE CCM(S) TO MINIMIZE EROSION OR SEDIMENT IN THE DISCHARGE. THE CCM(S) MUST CONTAIN OR FILTER FLOWS IN ORDER TO PREVENT THE BYPASS OF FLOWS WITHOUT TREATMENT AND MUST BE APPROPRIATE FOR STORMWATER RUNOFF FROM DISTURBED AREAS AND FOR THE EXPECTED FLOW RATE, DURATION, AND FLOW CONDITIONS (E.G., SHEET OR CONCENTRATED FLOW).
4. ALL CCMS SHALL BE MAINTAINED AND REMAIN IN EFFECTIVE OPERATING CONDITION UNTIL FINAL STABILIZATION IS ACHIEVED. THE QUALIFIED STORMWATER MANAGER (QSM) SHALL ASSESS THE ADEQUACY OF CCMS AT THE SITE AND IDENTIFY IF CHANGES TO THOSE CCMS ARE NEEDED TO ENSURE THE CONTINUED EFFECTIVE PERFORMANCE OF THE CCMS.
5. PRIOR TO CONSTRUCTION THE PERMIT HOLDER(S) SHALL VERIFY THE LOCATION OF EXISTING UTILITIES.
6. MANAGEMENT OF THE STORMWATER MANAGEMENT PLAN (SWMP) DURING CONSTRUCTION IS THE RESPONSIBILITY OF THE DESIGNATED QSM. THE SWMP SHALL BE LOCATED ON-SITE OR DIGITALLY ACCESSIBLE AT ALL TIMES DURING CONSTRUCTION ACTIVITIES AND MUST BE IMPLEMENTED AS WRITTEN FROM THE START OF CONSTRUCTION ACTIVITY UNTIL FINAL STABILIZATION IS ACHIEVED. THE QSM SHALL AMEND THE SWMP WHEN THERE IS A CHANGE IN DESIGN, CONSTRUCTION, OPERATION, OR MAINTENANCE OF THE SITE WHICH WOULD REQUIRE THE IMPLEMENTATION OF NEW OR REVISED CCMS OR IF THE SWMP PROVES TO BE INEFFECTIVE IN CONTROLLING POLLUTANTS IN STORMWATER RUNOFF ASSOCIATED WITH CONSTRUCTION ACTIVITY OR WHEN CCMS ARE NO LONGER NECESSARY AND ARE REMOVED. THE QSM SHALL MAINTAIN A RECORD OF AMENDMENTS MADE TO THE SWMP THAT INCLUDES THE DATE AND IDENTIFICATION OF THE CHANGES.
7. EARTH DISTURBANCES SHALL BE CONDUCTED IN SUCH A MANNER SO AS TO EFFECTIVELY MINIMIZE ACCELERATED SOIL EROSION AND RESULTING SEDIMENTATION. ALL DISTURBANCES SHALL BE DESIGNED, CONSTRUCTED, AND COMPLETED SO THAT THE EXPOSED AREA OF ANY DISTURBED LAND SHALL BE LIMITED TO THE SHORTEST PRACTICAL PERIOD OF TIME. PRE-EXISTING VEGETATION SHALL BE PROTECTED AND MAINTAINED WITHIN 50 HORIZONTAL FEET OF A RECEIVING WATER UNLESS SHOWN TO BE INFEASIBLE AND SPECIFICALLY REQUESTED AND APPROVED. IN ADDITION TO MAINTAINING 50 HORIZONTAL FEET OF PRE-EXISTING VEGETATION UPGRADIENT OF A RECEIVING WATER (UNLESS INFEASIBLE AND APPROVED), THE PERMIT HOLDER(S) MUST INSTALL CCMS UPGRADIENT OF THE VEGETATIVE BUFFER.
8. TEMPORARY STABILIZATION MEASURES SHALL BE IMPLEMENTED ON DISTURBED AREAS AND STOCKPILES WHERE GROUND DISTURBING CONSTRUCTION ACTIVITY HAS PERMANENTLY CEASED OR TEMPORARILY CEASED FOR LONGER THAN 14 DAYS.
9. EROSION CONTROL BLANKET (ECB) OR OTHER APPROVED CONTROL MEASURE(S) SHALL BE USED ON SLOPES STEEPER THAN 3:1.
10. VEHICLE TRACKING CONTROLS (VTC) MUST BE IMPLEMENTED TO MINIMIZE VEHICLE TRACKING OF SEDIMENT FROM DISTURBED AREAS. VTCS MUST INCLUDE A STRUCTURE CONTROL MEASURE (E.G., TRACKING PAD) AND MAY INCLUDE A NON-STRUCTURAL CONTROL MEASURE (E.G., SWEEPING). MATERIAL TRACKED OFF-SITE SHALL BE CLEANED UP AND PROPERLY DISPOSED OF IMMEDIATELY.
11. ANY TEMPORARY OR PERMANENT CONTROL MEASURE DESIGNED AND CONSTRUCTED FOR THE CONVEYANCE OF STORMWATER AROUND, THROUGH, OR FROM THE EARTH DISTURBANCE AREA SHALL BE A STABILIZED CONVEYANCE DESIGNED TO MINIMIZE EROSION AND THE DISCHARGE OF SEDIMENT OFF-SITE.
12. NO PERSON SHALL CAUSE THE IMPEDIMENT OF STORMWATER FLOW IN THE CURB AND GUTTER, PERMANENT CONTROL MEASURES (PCMS), OR DITCHES EXCEPT WITH APPROVED SEDIMENT CONTROL MEASURES.
13. ALL PCMS SHALL BE INSTALLED AS DESIGNED IN THE APPROVED PLANS. ANY PROPOSED CHANGES THAT AFFECT THE DESIGN OR FUNCTION OF PCMS MUST BE APPROVED BY THE ECM ADMINISTRATOR PRIOR TO IMPLEMENTATION.
14. SOIL COMPACTION MUST BE MINIMIZED IN AREAS WHERE INFILTRATION PCMS WILL BE INSTALLED OR IN AREAS WHERE FINAL STABILIZATION WILL BE ACHIEVED BY VEGETATIVE COVER. AREAS DESIGNATED FOR INFILTRATION PCMS SHALL ALSO BE PROTECTED FROM SEDIMENTATION DURING CONSTRUCTION UNTIL FINAL STABILIZATION IS ACHIEVED. IF SOIL COMPACTION DOES OCCUR IN AREAS WHERE FINAL STABILIZATION WILL BE ACHIEVED BY VEGETATIVE COVER OR IN AREAS WHERE INFILTRATION PCMS WILL BE INSTALLED, DECOMPACTION OF THE SOIL MUST BE COMPLETED PRIOR TO PLANTING OR INSTALLATION OF THE PCM(S). AN INFILTRATION TEST MUST BE CONDUCTED FOR ALL INFILTRATION PCMS AND THE INFILTRATION TEST RESULTS SUBMITTED TO EL PASO COUNTY PRIOR TO PRELIMINARY ACCEPTANCE (PA).
16. FINAL STABILIZATION MUST BE IMPLEMENTED AT ALL APPLICABLE CONSTRUCTION SITES. FINAL STABILIZATION IS ACHIEVED WHEN ALL GROUND DISTURBING ACTIVITIES AT THE SITE HAVE BEEN COMPLETED AND PERMANENT STABILIZATION METHODS ARE COMPLETE. WHEN USING VEGETATIVE COVER AS A PERMANENT STABILIZATION METHOD, THE VEGETATION SHALL BE EVENLY DISTRIBUTED PERENNIAL VEGETATION AND OF THE VARIETY AND SPECIES FOUND IN THE COUNTY-APPROVED SEED MIXES OR IN THE APPROVED GEC PLAN. VEGETATION COVERAGE SHALL BE, AT A MINIMUM, EQUAL TO 70% OF WHAT WOULD HAVE BEEN PROVIDED BY NATIVE VEGETATION IN A LOCAL, UNDISTURBED AREA OR ADEQUATE REFERENCE SITE. ALL TEMPORARY CCMS SHALL BE REMOVED UPON FINAL STABILIZATION AND PRIOR TO STORMWATER PERMIT TERMINATION.
18. STORMWATER DISCHARGES FROM CONSTRUCTION SITES SHALL NOT CAUSE OR THREATEN TO CAUSE POLLUTION, CONTAMINATION, OR DEGRADATION OF STATE WATERS. ALL WORK AND EARTH DISTURBANCE SHALL BE DONE IN A MANNER THAT MINIMIZES POLLUTION OF ANY ON-SITE OR OFF-SITE WATERS, INCLUDING WETLANDS.
19. CONCRETE WASH WATER SHALL BE CONTAINED AND DISPOSED OF IN ACCORDANCE WITH THE SWMP. NO WASH WATER SHALL BE DISCHARGED TO OR ALLOWED TO BE DISCHARGED OFFSITE OR TO ENTER STATE WATERS, INCLUDING ANY SURFACE OR SUBSURFACE STORM DRAINAGE SYSTEM OR CONTROL MEASURES. CONCRETE WASHOUT AREAS SHALL NOT BE LOCATED IN AN AREA WHERE SHALLOW GROUNDWATER MAY BE PRESENT, OR WITHIN 50 FEET OF A SURFACE WATER BODY, CREEK, OR STREAM.
20. DURING CONSTRUCTION DEWATERING OPERATIONS, UNCONTAMINATED GROUNDWATER MAY BE DISCHARGED ON-SITE IN ACCORDANCE WITH THE COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT'S (CDPHE) LOW RISK DISCHARGE GUIDANCE POLICY FOR DISCHARGES OF UNCONTAMINATED GROUNDWATER TO LAND. IF CONSTRUCTION DEWATERING OPERATIONS ARE UNABLE TO MEET ALL CRITERIA, CONDITIONS, AND CONTROL MEASURE REQUIREMENTS OF THE LOW RISK DISCHARGE GUIDANCE POLICY, A COLORADO DISCHARGE PERMIT SYSTEM (CDPS) GENERAL PERMIT COG080000 WILL BE REQUIRED.

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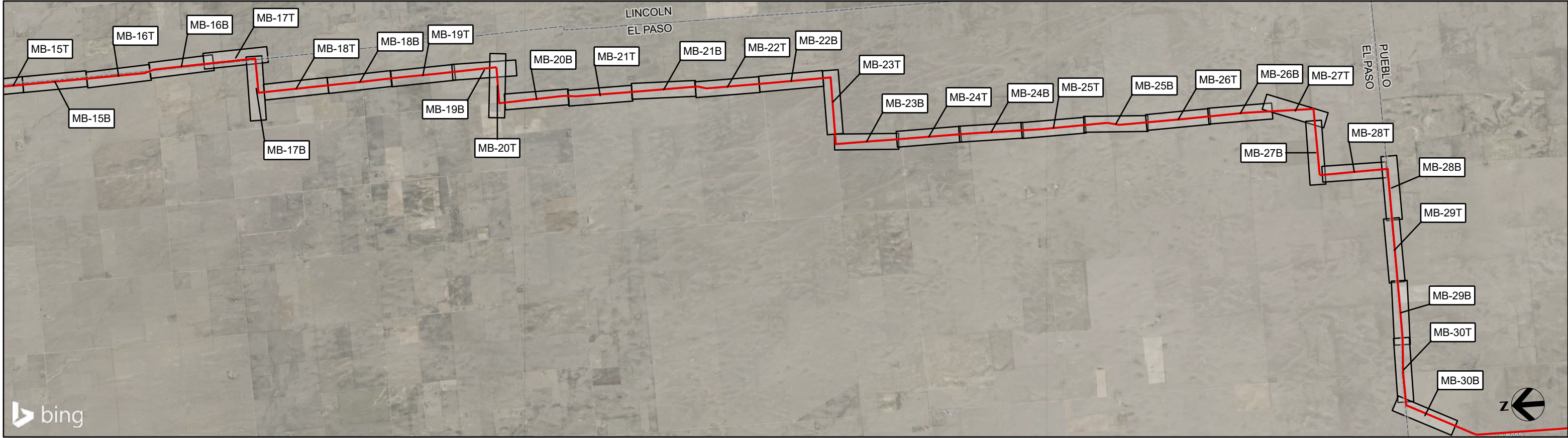
**EL PASO COUNTY STANDARD NOTES:**

19. CONTRACTOR SHALL BE RESPONSIBLE FOR THE REMOVAL OF ALL WASTE FROM THE CONSTRUCTION SITE FOR DISPOSAL IN ACCORDANCE WITH LOCAL AND STATE REGULATORY REQUIREMENTS. NO CONSTRUCTION DEBRIS, TREE SLASH, BUILDING MATERIAL WASTES, OR UNUSED BUILDING MATERIALS SHALL BE BURIED, DUMPED, OR DISCHARGED AT THE SITE.
20. THE PERMIT HOLDER(S) SHALL BE RESPONSIBLE FOR THE REMOVAL OF ALL CONSTRUCTION DEBRIS, DIRT, TRASH, ROCK, SEDIMENT, SOIL, AND SAND THAT MAY ACCUMULATE IN ROADS, STORM DRAINS AND OTHER DRAINAGE CONVEYANCE SYSTEMS AND STORMWATER APPURTENANCES AS A RESULT OF SITE DEVELOPMENT.
21. THE QUANTITY OF MATERIALS STORED ON THE PROJECT SITE SHALL BE LIMITED, AS MUCH AS PRACTICAL, TO THAT QUANTITY REQUIRED TO PERFORM THE WORK IN AN ORDERLY SEQUENCE. ALL MATERIALS STORED ON-SITE SHALL BE STORED IN A NEAT, ORDERLY MANNER, IN THEIR ORIGINAL CONTAINERS, WITH ORIGINAL MANUFACTURER'S LABELS.
22. MATERIALS SHALL NOT BE TEMPORARILY PLACED OR STORED IN THE STREET, ALLEY, OR OTHER PUBLIC WAY, UNLESS IN ACCORDANCE WITH AN APPROVED TRAFFIC CONTROL PLAN. APPROPRIATE CMS SHALL BE UTILIZED BASED ON SPECIFIC CONDITIONS AND CIRCUMSTANCES.
23. BULK STORAGE (I.E., INDIVIDUAL CONTAINERS OF 55 GALLONS OR GREATER) OF ALLOWED PETROLEUM PRODUCTS OR OTHER ALLOWED LIQUID SHALL REQUIRE ADEQUATE SECONDARY CONTAINMENT, OR EQUIVALENT PROTECTION, TO CONTAIN ALL SPILLS ON-SITE AND TO PREVENT ANY SPILLED MATERIALS FROM ENTERING STATE WATERS, ANY SURFACE OR SUBSURFACE STORM DRAINAGE SYSTEM, OR OTHER FACILITIES.
24. NO CHEMICAL(S) HAVING THE POTENTIAL TO BE RELEASED IN STORMWATER ARE TO BE STORED OR USED ON-SITE UNLESS PERMISSION FOR THE USE OF SUCH CHEMICAL(S) IS GRANTED IN WRITING BY THE ECM ADMINISTRATOR. IN GRANTING APPROVAL FOR THE USE OF SUCH CHEMICAL(S), SPECIAL CONDITIONS AND MONITORING MAY BE REQUIRED.
25. ON AREAS OF EXPOSED SOIL, MINIMIZE DUST THROUGH THE APPROPRIATE APPLICATION OF WATER OR OTHER DUST SUPPRESSION TECHNIQUES. WATER APPLICATION MUST BE CONDUCTED IN A MANNER TO PREVENT DISCHARGE OFFSITE UNLESS AUTHORIZED BY A CDPS OR NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) PERMIT.
26. ALL CONSTRUCTION TRAFFIC MUST ENTER/EXIT THE SITE ONLY AT APPROVED CONSTRUCTION ACCESS POINTS.
27. FOR SITES WHERE A SOILS REPORT IS REQUIRED, THE APPROVED SOILS REPORT FOR THIS SITE SHALL BE CONSIDERED A PART OF THESE PLANS.
28. PERMIT HOLDER(S) AND THEIR AGENTS SHALL COMPLY WITH THE "COLORADO WATER QUALITY CONTROL ACT" (TITLE 25, ARTICLE 8, CRS), AND THE "CLEAN WATER ACT" (33 USC 1344), IN ADDITION TO THE REQUIREMENTS OF THE LAND DEVELOPMENT CODE, DRAINAGE CRITERIA MANUAL VOLUME 2, AND ENGINEERING CRITERIA MANUAL. ALL APPLICABLE LOCAL, STATE, AND FEDERAL PERMITS MUST BE OBTAINED PRIOR TO CONSTRUCTION. IN THE EVENT OF CONFLICTS BETWEEN THESE REQUIREMENTS AND OTHER LAWS, RULES, OR REGULATIONS OF OTHER FEDERAL, STATE, LOCAL, OR COUNTY AGENCIES, THE MOST RESTRICTIVE LAWS, RULES, OR REGULATIONS SHALL APPLY.
29. AT LEAST TEN (10) DAYS PRIOR TO THE ANTICIPATED START OF CONSTRUCTION, FOR PROJECTS THAT WILL DISTURB ONE (1) ACRE OR MORE OR LESS THAN 1 ACRE AND PART OF A LARGER COMMON PLAN OF DEVELOPMENT OR SALE THAT WOULD DISTURB 1 OR MORE ACRES, THE PERMIT HOLDER(S) SHALL SUBMIT A PERMIT APPLICATION FOR STORMWATER DISCHARGE (COR400000 PERMIT) TO THE CDPHE WATER QUALITY DIVISION. THE APPLICATION CONTAINS CERTIFICATION OF COMPLETION OF A SWMP, OF WHICH THIS GEC PLAN MAY BE A PART. FOR INFORMATION OR APPLICATION MATERIALS CONTACT:

COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT  
WATER QUALITY CONTROL DIVISION  
WQCD – PERMITS  
4300 CHERRY CREEK DRIVE SOUTH  
DENVER, CO 80246-1530  
ATTN: PERMITS UNIT

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June  
2026



**XCEL TLINE: PWAY SEG 5 EL PASO  
COUNTY BUILD GEC PLANS**

KEY MAP

FILE NAME PWAY Seg 5 El  
Paso County Build

SHEET No. 5

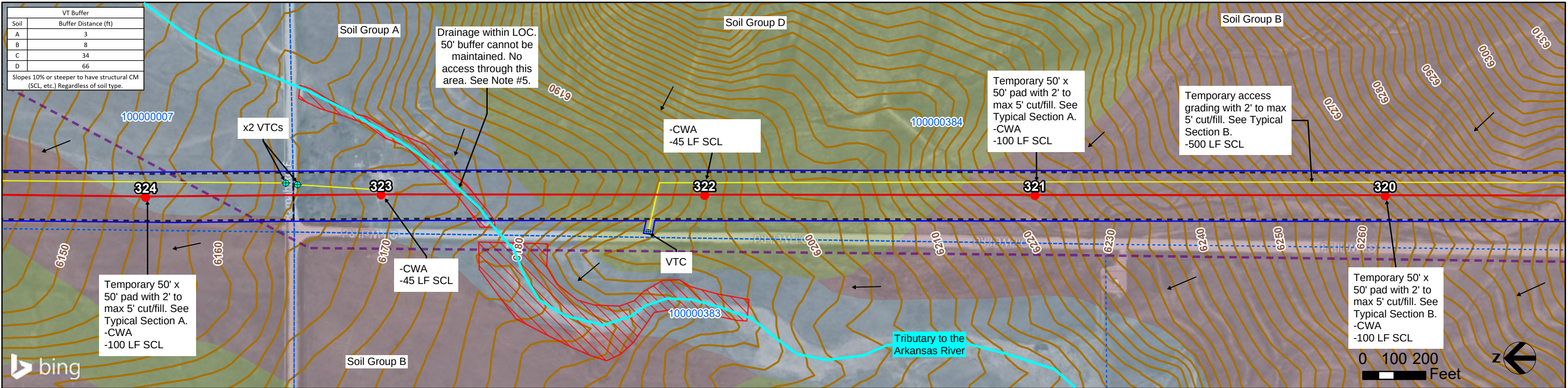
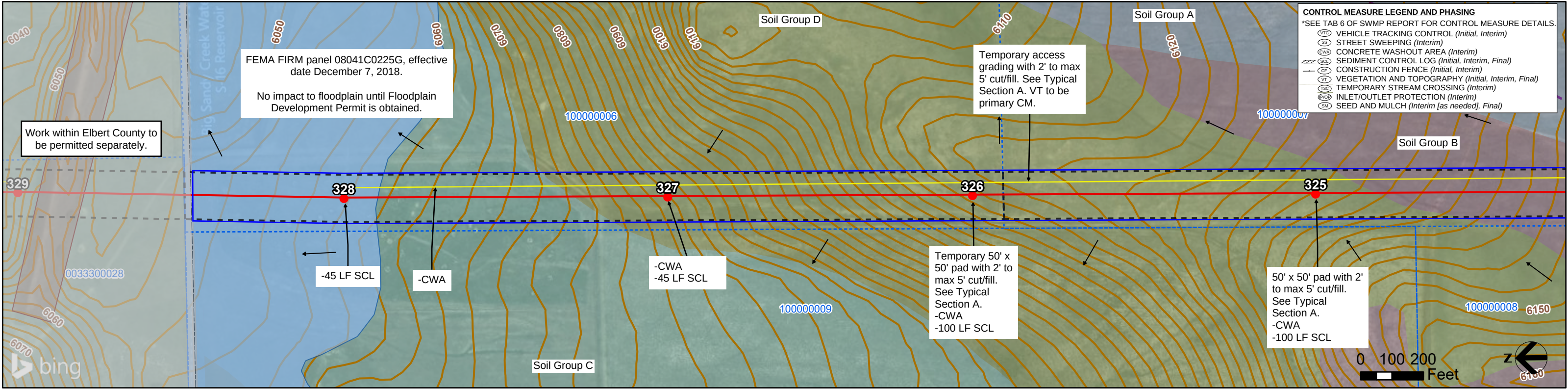
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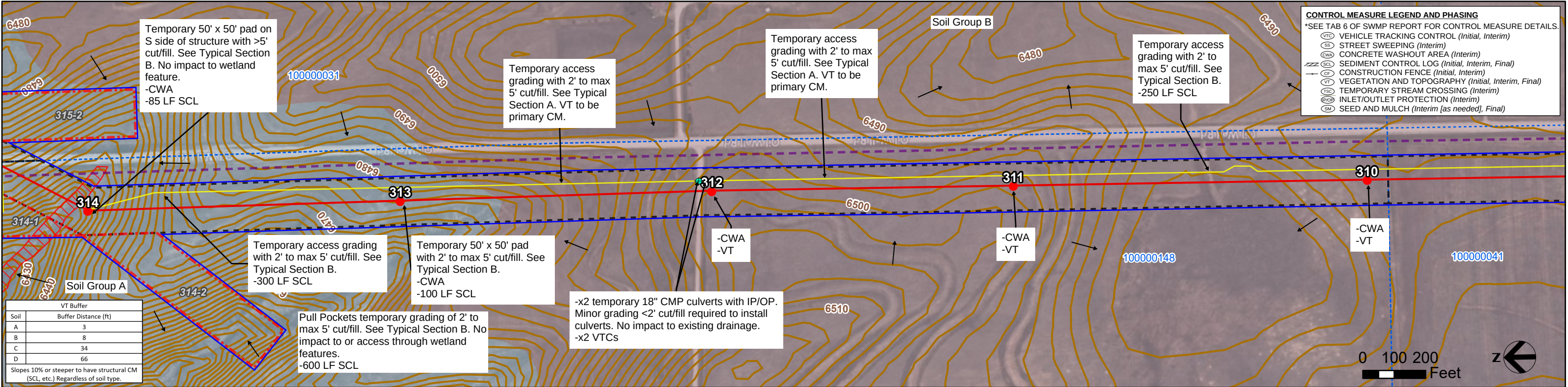
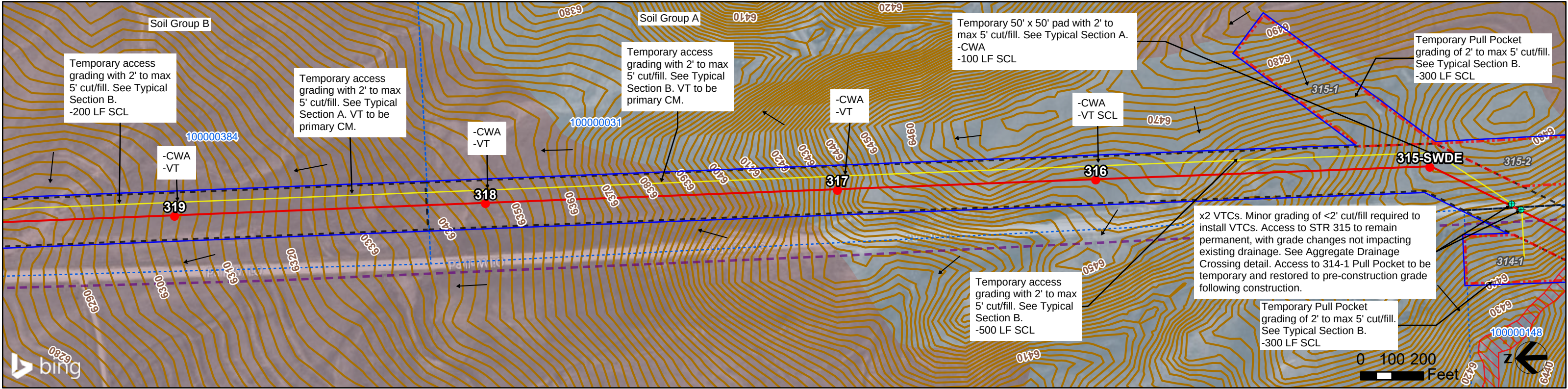
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**XCEL TLIN: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 7

MB-2T, MB-2B

→ Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

▭ Limits of Construction

▭ Buried gas utility

▭ Overhead distribution

▭ Underground distribution

▭ Existing Xcel transmission

▭ Existing transmission (non-Xcel)

▭ Wetland feature (TetraTech field surveyed)

▭ Wetland feature (TetraTech desktop surveyed)

▭ Colorado Segmentation Stream

● Access Point

**FEMA Flood Hazard**

▭ Zone A

▭ Zone AE

**NOTES:**

1. Disturbance anticipated to be limited to drive and crush access in the ROW (assumed 20' wide centered on access route), access grading, work pad grading around the structure where shown, individual structure pole excavation (assume 25' radius around each pole), pull site grading, and minor grading where ROW meets existing roadways. Grading and disturbance not to extend outside of Xcel's ROW.

2. Flow direction shown where surface flow direction is discernible given topography. Stormwater inspector to update active site maps with flow arrows accordingly and the location where stormwater has potential to leave the site.

3. Topsoil to be stripped, segregated from subsoil, and stockpiled for use during restoration. Install downgradient CMs for stockpiles during interim phase of construction. Contractor to update site maps with stockpile and CM locations.

4. Street sweep as necessary.

5. Named and unnamed drainages, steams, creeks, ditches, etc. within the LOC to maintain a 50' vegetative buffer where feasible. If a 50' vegetative buffer cannot be maintained, utilize sediment controls to prevent sediment transportation into waters. Avoid all transportation over waters unless infeasible. If infeasible, utilize matting or best management practices and contact Xcel Siting and Land Rights prior to drive-over.

6. VTC to be structural measure installed at existing grade unless otherwise noted. Contractor to install fence (CF or BF) at VTC to prevent drive-around if needed. Access areas going from dirt to dirt, consider utilizing VTC signage as structural control measure.

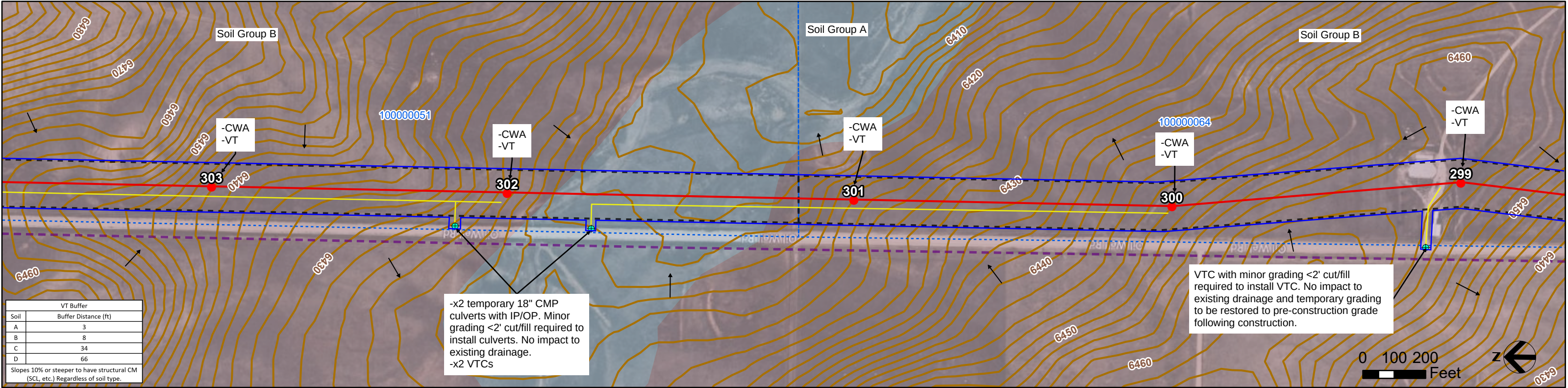
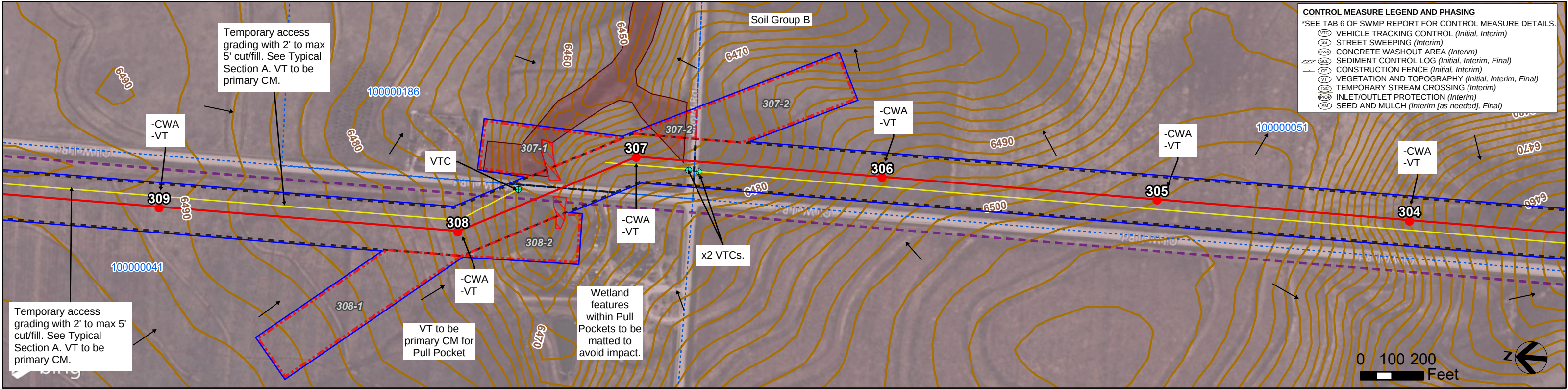
7. Contractor not to disturb wetlands unless confirmation of compliance with Clean Water Act Section 404 is provided by Siting and Land Rights Agent.

8. Disturbance within Pull Pocket expected to be minimal unless otherwise shown on maps. VT to be primary CM (see VT Buffer Table). If grading is required within Pull Pocket and VT buffer cannot be maintained, contractor to install SCL.

9. Contractor to install perimeter fencing (Boundary Fence, CF, etc.) if needed to delineate VT buffer extents. If contractor cannot maintain VT Buffer distance, SCL to be used as CM for disturbance.

10. Assume approximately 20% of access route to be disturbed due to equipment and vehicle access unless otherwise noted. Contractor to install CMs downgradient of disturbance if sediment transport is evident and VT buffer cannot be maintained.





**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 8

MB-3T, MB-3B

— Surface Flow

— 2' Contour (USGS)

— County Boundary

— Municipalities

— Parcel

— Centerline

— Access Road

— PSCo

— Easement/ROW

— Pull Pocket

— Laydown Yard

● Structure

**Hydrologic Soil Group**

A

B

C

D

— Limits of Construction

— Buried gas utility

— Overhead distribution

— Underground distribution

— Existing Xcel transmission

— Existing transmission (non-Xcel)

— Wetland feature (TetraTech field surveyed)

— Wetland feature (TetraTech desktop surveyed)

— Colorado Segmentation Stream

— Access Point

**FEMA Flood Hazard**

Zone A

Zone AE

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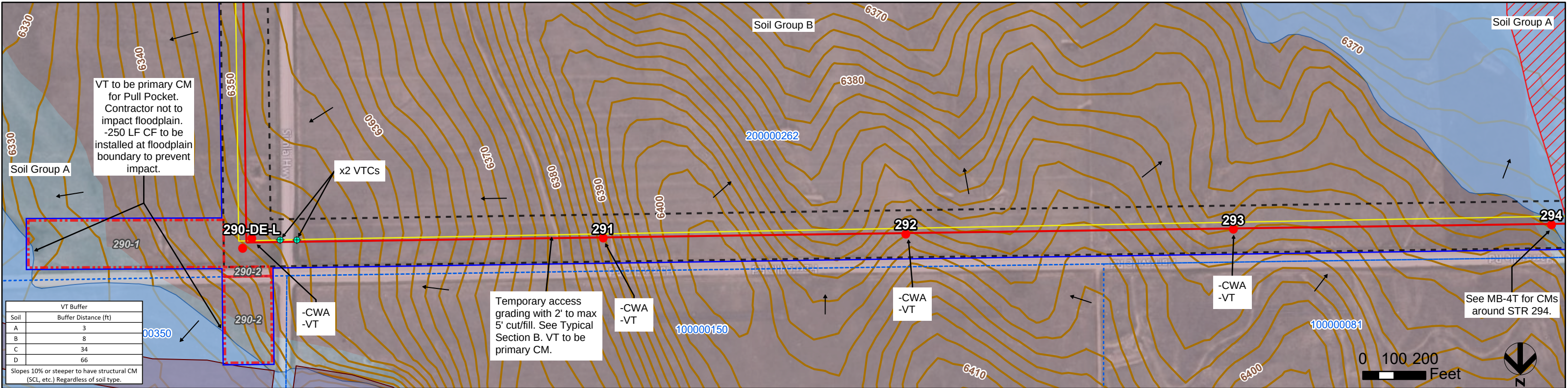
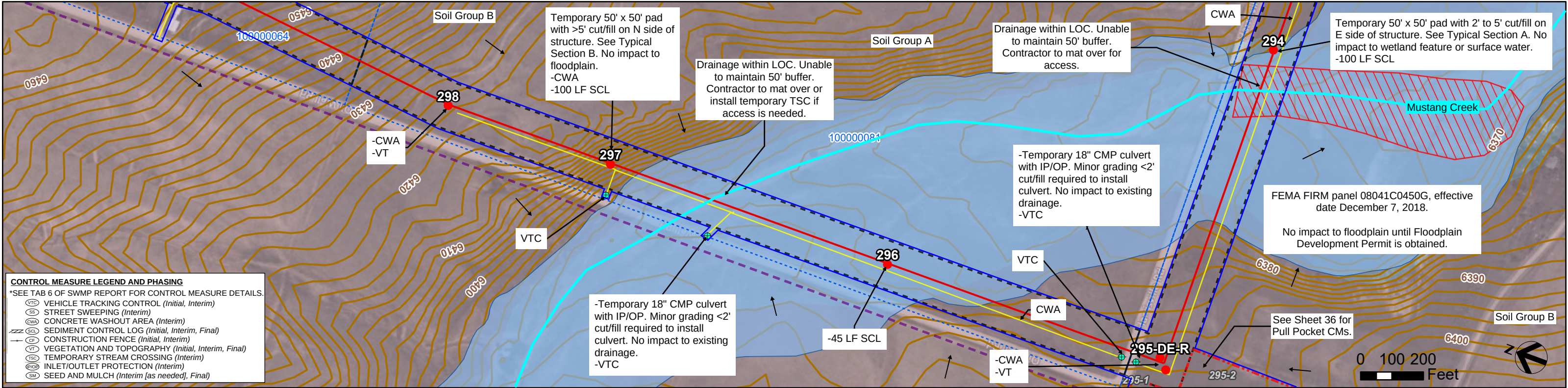
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| CONTROL MEASURE LEGEND AND PHASING                     |                                                     |
|--------------------------------------------------------|-----------------------------------------------------|
| *SEE TAB 6 OF SWMP REPORT FOR CONTROL MEASURE DETAILS. |                                                     |
| (VTC)                                                  | VEHICLE TRACKING CONTROL (Initial, Interim)         |
| (SS)                                                   | STREET SWEEPING (Interim)                           |
| (CWA)                                                  | CONCRETE WASHOUT AREA (Interim)                     |
| (SCL)                                                  | SEDIMENT CONTROL LOG (Initial, Interim, Final)      |
| (CF)                                                   | CONSTRUCTION FENCE (Initial, Interim)               |
| (VT)                                                   | VEGETATION AND TOPOGRAPHY (Initial, Interim, Final) |
| (TSC)                                                  | TEMPORARY STREAM CROSSING (Interim)                 |
| (IOP)                                                  | INLET/OUTLET PROTECTION (Interim)                   |
| (SM)                                                   | SEED AND MULCH (Interim [as needed], Final)         |

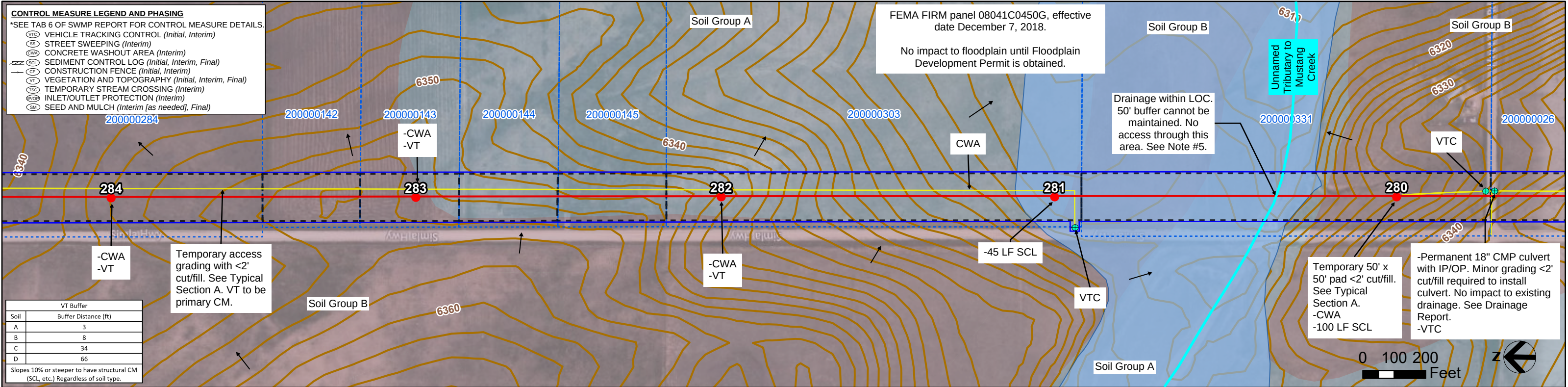
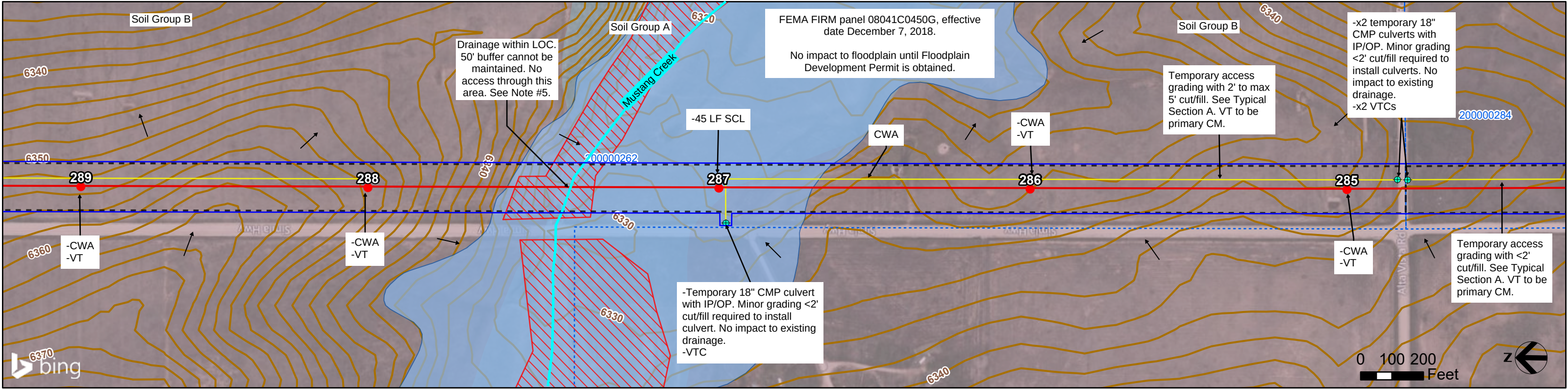
| VT Buffer |                      |
|-----------|----------------------|
| Soil      | Buffer Distance (ft) |
| A         | 3                    |
| B         | 8                    |
| C         | 34                   |
| D         | 66                   |

Slopes 10% or steeper to have structural CM (SCL, etc.) Regardless of soil type.











**XCEL TLIN: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 10

MB-5T, MB-5B



Surface Flow



2' Contour (USGS)



County Boundary



Municipalities



Parcel



Centerline



Access Road



PSCo



Easement/ROW



Pull Pocket



Laydown Yard



Structure



A



B



C



D



Limits of Construction



Buried gas utility



Overhead distribution



Underground distribution



Existing Xcel transmission



Existing transmission (non-Xcel)



Wetland feature (TetraTech field surveyed)



Wetland feature (TetraTech desktop surveyed)



Colorado Segmentation Stream



Access Point



Zone A



Zone AE

**NOTES:**

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3. Topsoil to be stripped, segregated from subsoil, and stockpiled for use during restoration. Install downgradient CMs for stockpiles during interim phase of construction. Contractor to update site maps with stockpile and CM locations.

4. Street sweep as necessary.

5. Named and unnamed drainages, steams, creeks, ditches, etc. within the LOC to maintain a 50' vegetative buffer where feasible. If a 50' vegetative buffer cannot be maintained, utilize sediment controls to prevent sediment transportation into waters. Avoid all transportation over waters unless infeasible. If infeasible, utilize matting or best management practices and contact Xcel Siting and Land Rights prior to drive-over.

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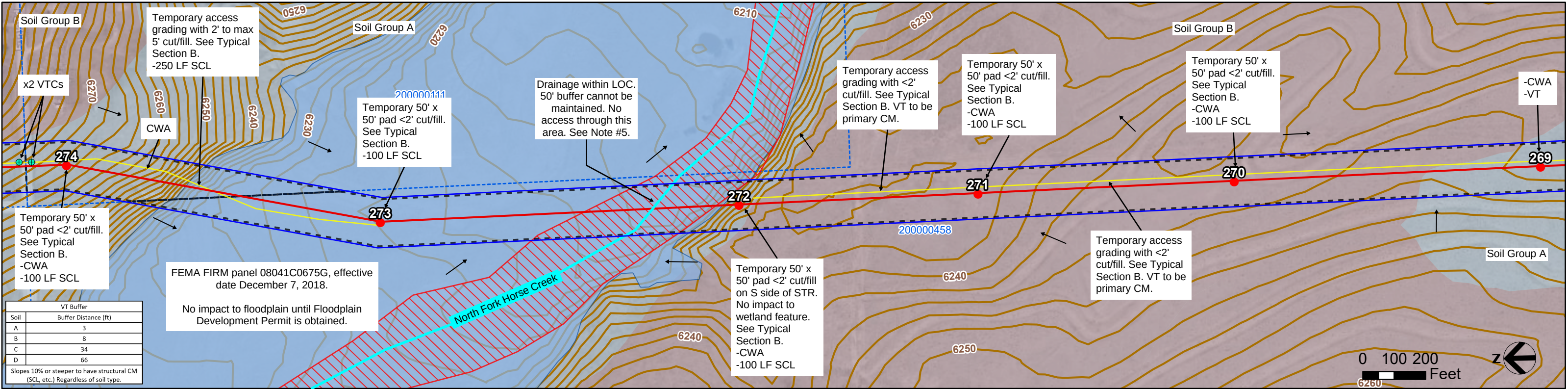
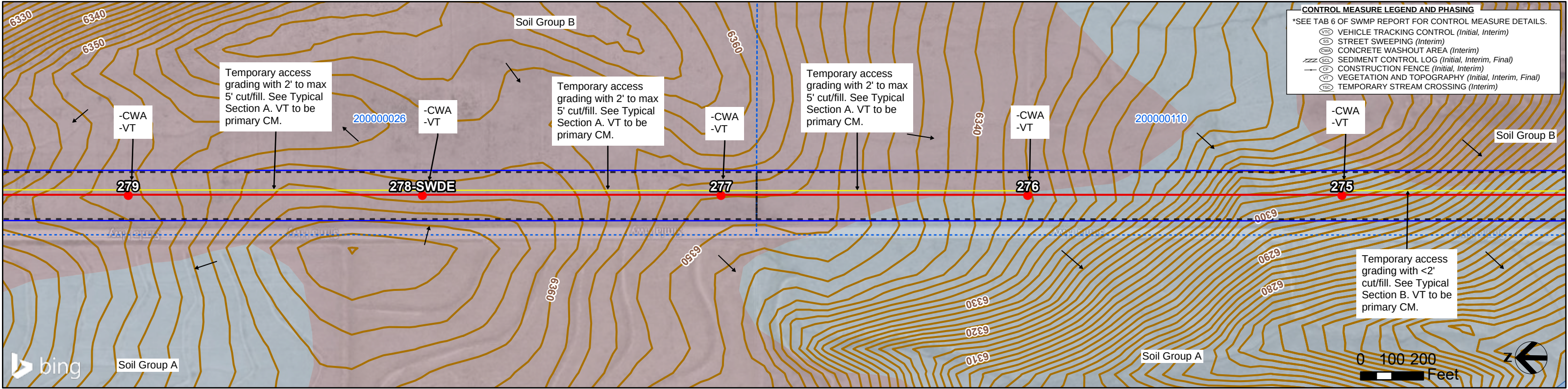
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**XCEL TLIN: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 11

MB-6T, MB-6B

- Surface Flow
- 2' Contour (USGS)
- County Boundary
- Municipalities
- Parcel
- Centerline
- Access Road
- PSCo
- Easement/ROW
- Pull Pocket
- Laydown Yard
- Structure
- Hydrologic Soil Group
  - A
  - B
  - C
  - D
- Limits of Construction
- Buried gas utility
- Overhead distribution
- Underground distribution
- Existing Xcel transmission
- Existing transmission (non-Xcel)
- Wetland feature (TetraTech field surveyed)
- Wetland feature (TetraTech desktop surveyed)
- Colorado Segmentation Stream
- Access Point
- FEMA Flood Hazard
  - Zone A
  - Zone AE

**NOTES:**

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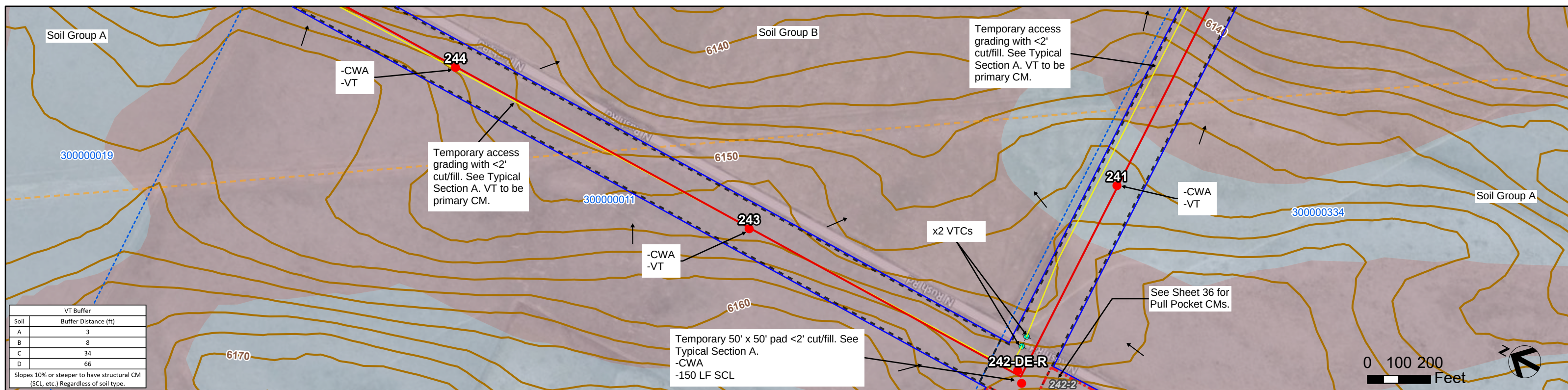
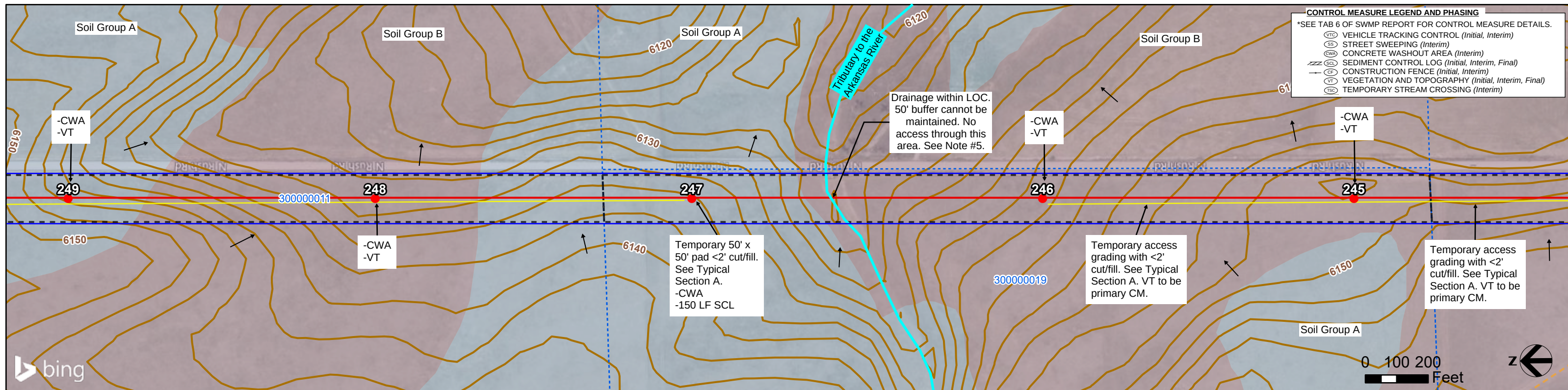






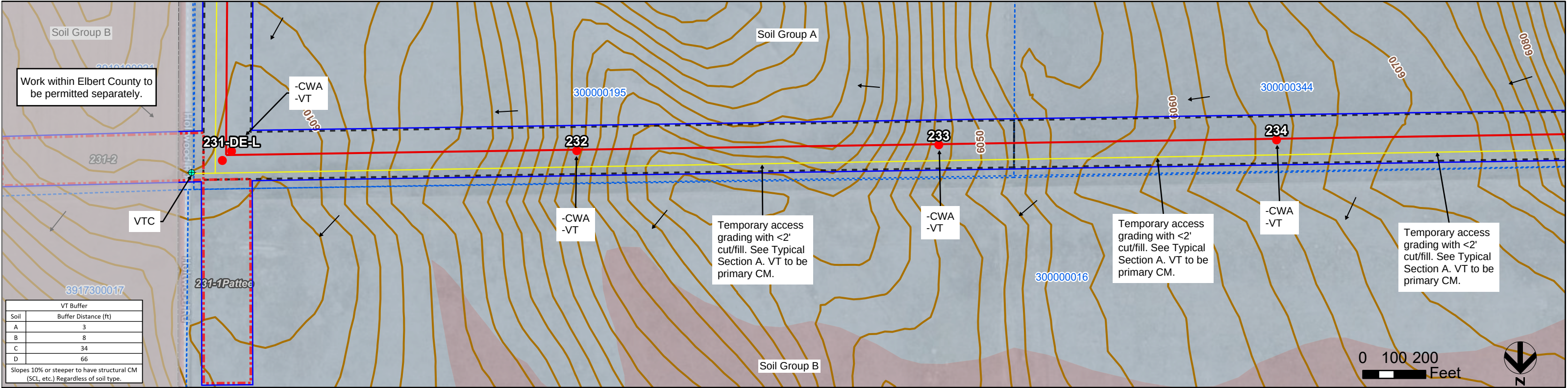
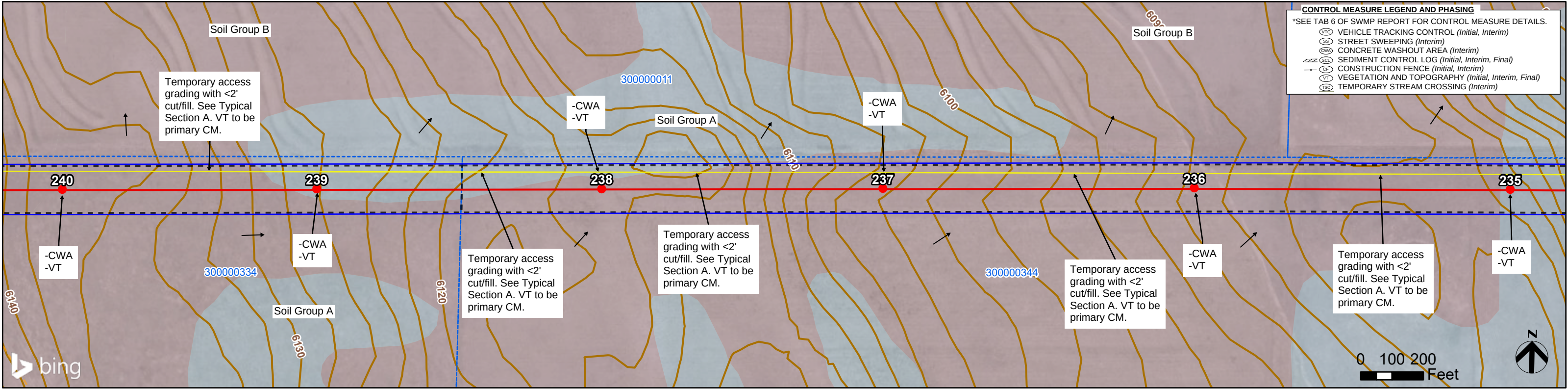






|                                                                                     |                                                                             |                                                                                                                                                                                                                                                                                                                                                                       |     |     |     |     |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |          |           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
|-------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----|-----|-----|-----|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|-----------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|   | <p><b>XCEL TLINE: PWAY SEG<br/>5 EL PASO COUNTY<br/>BUILD GEC PLANS</b></p> | <p>→ Surface Flow<br/>— 2' Contour (USGS)<br/>▬ County Boundary<br/>▨ Municipalities<br/>▨ Parcel<br/>— Centerline<br/>— Access Road<br/>▬ PSCo<br/>▬ Easement/ROW<br/>▨ Pull Pocket<br/>▨ Laydown Yard<br/>● Structure</p> <p><b>Hydrologic Soil Group</b></p> <table border="0"> <tr> <td>■ A</td> <td>■ C</td> </tr> <tr> <td>■ B</td> <td>■ D</td> </tr> </table> | ■ A | ■ C | ■ B | ■ D | <p>▭ Limits of Construction<br/>- - Buried gas utility<br/>- - - Overhead distribution<br/>- - - Underground distribution<br/>- - - Existing Xcel transmission<br/>- - - Existing transmission (non-Xcel)</p> <p>▨ Wetland feature (TetraTech field surveyed)<br/>▨ Wetland feature (TetraTech desktop surveyed)<br/>▨ Colorado Segmentation Stream<br/>● Access Point</p> <p><b>FEMA Flood Hazard</b></p> <table border="0"> <tr> <td>■ Zone A</td> </tr> <tr> <td>■ Zone AE</td> </tr> </table> | ■ Zone A | ■ Zone AE | <p><b>NOTES:</b></p> <ol style="list-style-type: none"> <li>Disturbance anticipated to be limited to drive and crush access in the ROW (assumed 20' wide centered on access route), access grading, work pad grading around the structure where shown, individual structure pole excavation (assume 25' radius around each pole), pull site grading, and minor grading where ROW meets existing roadways. Grading and disturbance not to extend outside of Xcel's ROW.</li> <li>Flow direction shown where surface flow direction is discernible given topography. Stormwater inspector to update active site maps with flow arrows accordingly and the location where stormwater has potential to leave the site.</li> <li>Topsoil to be stripped, segregated from subsoil, and stockpiled for use during restoration. Install downgradient CMs for stockpiles during interim phase of construction. Contractor to update site maps with stockpile and CM locations.</li> <li>Street sweep as necessary.</li> <li>Named and unnamed drainages, steams, creeks, ditches, etc. within the LOC to maintain a 50' vegetative buffer where feasible. If a 50' vegetative buffer cannot be maintained, utilize sediment controls to prevent sediment transportation into waters. Avoid all transportation over waters unless infeasible. If infeasible, utilize matting or best management practices and contact Xcel Siting and Land Rights prior to drive-over.</li> <li>VTC to be structural measure installed at existing grade unless otherwise noted. Contractor to install fence (CF or BF) at VTC to prevent drive-around if needed. Access areas going from dirt to dirt, consider utilizing VTC signage as structural control measure.</li> <li>Contractor not to disturb wetlands unless confirmation of compliance with Clean Water Act Section 404 is provided by Siting and Land Rights Agent.</li> <li>Disturbance within Pull Pocket expected to be minimal unless otherwise shown on maps. VT to be primary CM (see VT Buffer Table). If grading is required within Pull Pocket and VT buffer cannot be maintained, contractor to install SCL.</li> <li>Contractor to install perimeter fencing (Boundary Fence, CF, etc.) if needed to delineate VT buffer extents. If contractor cannot maintain VT Buffer distance, SCL to be used as CM for disturbance.</li> <li>Assume approximately 20% of access route to be disturbed due to equipment and vehicle access unless otherwise noted. Contractor to install CMs downgradient of disturbance if sediment transport is evident and VT buffer cannot be maintained.</li> </ol> |
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| ■ B                                                                                 | ■ D                                                                         |                                                                                                                                                                                                                                                                                                                                                                       |     |     |     |     |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |          |           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
| ■ Zone A                                                                            |                                                                             |                                                                                                                                                                                                                                                                                                                                                                       |     |     |     |     |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |          |           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |
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|  | <p>June<br/>2026</p> <p>SHEET 14</p> <p>MB-9T, MB-9B</p>                    |                                                                                                                                                                                                                                                                                                                                                                       |     |     |     |     |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |          |           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |







**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 15

MB-10T, MB-10B

→ Surface Flow

— 2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

□ Limits of Construction

— Buried gas utility

Overhead distribution

Underground distribution

Existing Xcel transmission

Existing transmission (non-Xcel)

Wetland feature (TetraTech field surveyed)

Wetland feature (TetraTech desktop surveyed)

Colorado Segmentation Stream

Access Point

**FEMA Flood Hazard**

Zone A

Zone AE

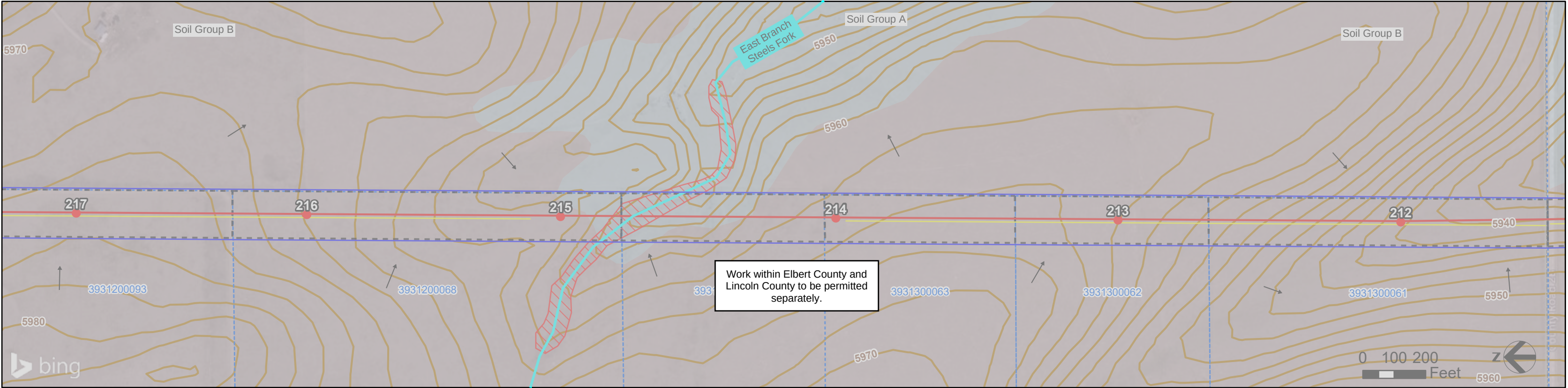
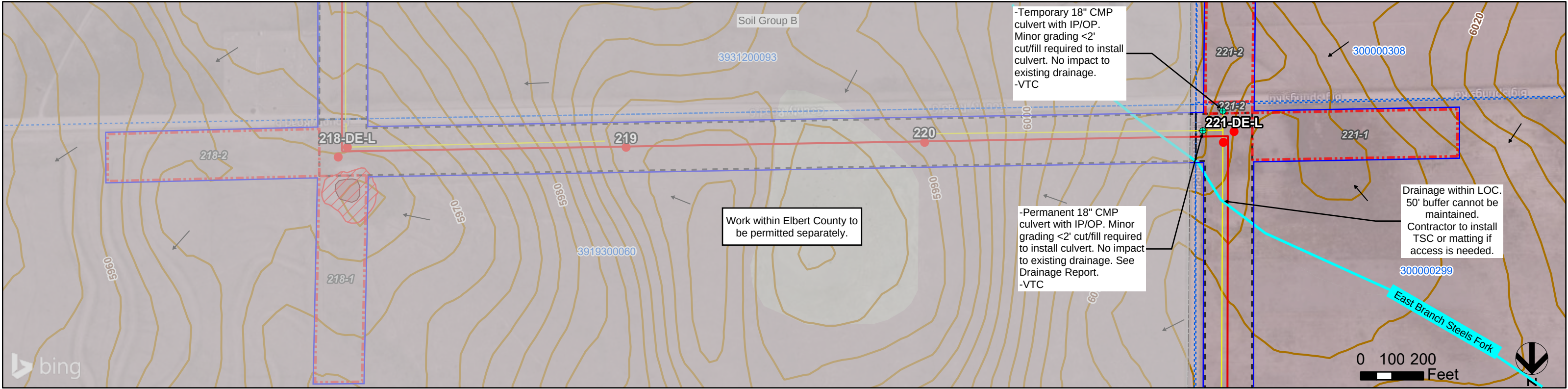
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**XCEL TLINE: PWAY SEG  
5 EL PASO COUNTY  
BUILD GEC PLANS**

June  
2026

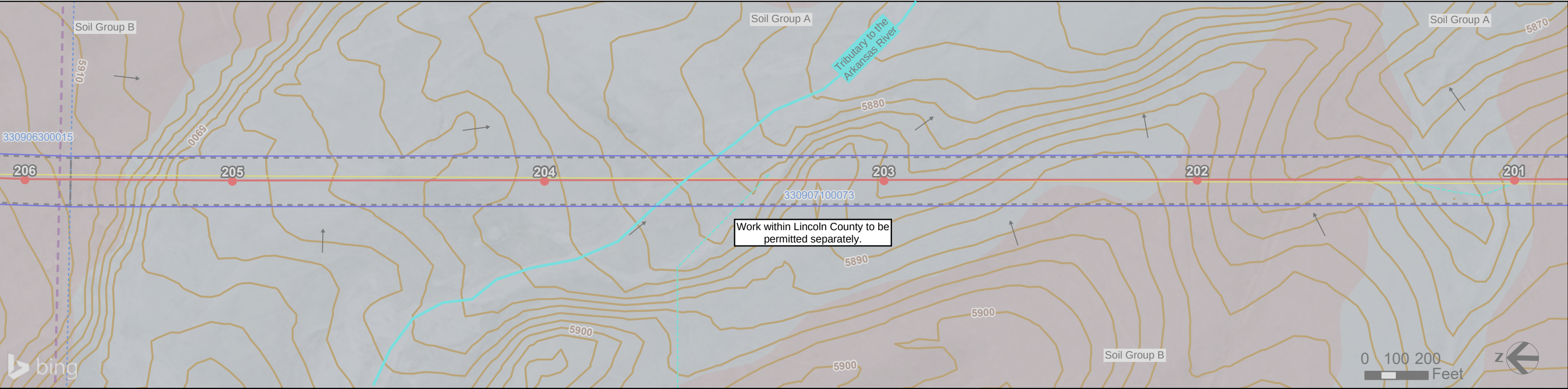
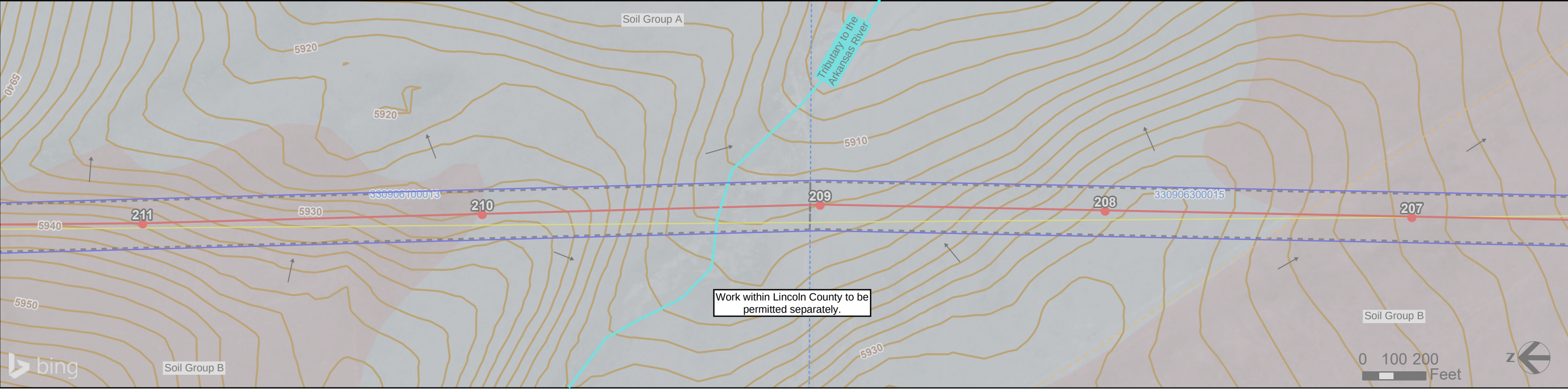
SHEET 17  
MB-12T, MB-12B

|                              |                                              |
|------------------------------|----------------------------------------------|
| Surface Flow                 | Limits of Construction                       |
| 2' Contour (USGS)            | Buried gas utility                           |
| County Boundary              | Overhead distribution                        |
| Municipalities               | Underground distribution                     |
| Parcel                       | Existing Xcel transmission                   |
| Centerline                   | Existing transmission (non-Xcel)             |
| Access Road                  | Wetland feature (TetraTech field surveyed)   |
| PSCo                         | Wetland feature (TetraTech desktop surveyed) |
| Easement/ROW                 | Colorado Segmentation Stream                 |
| Pull Pocket                  | Access Point                                 |
| Laydown Yard                 |                                              |
| Structure                    |                                              |
| <b>Hydrologic Soil Group</b> | <b>FEMA Flood Hazard</b>                     |
| A                            | Zone A                                       |
| B                            | Zone AE                                      |
| C                            |                                              |
| D                            |                                              |

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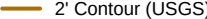
**XCEL TLINE: PWAY SEG**  
**5 EL PASO COUNTY**  
**BUILD GEC PLANS**

June  
2026

SHEET 18

MB-13T, MB-13B

 Surface Flow

 2' Contour (USGS)

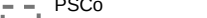
 County Boundary

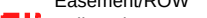
 Municipalities

 Parcel

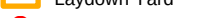
 Centerline

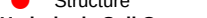
 Access Road

 PSCo

 Easement/ROW

 Pull Pocket

 Laydown Yard

 Structure

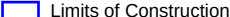
**Hydrologic Soil Group**

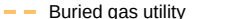
A

B

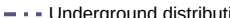
C

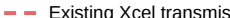
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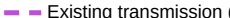
 Limits of Construction

 Buried gas utility

 Overhead distribution

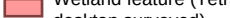
 Underground distribution

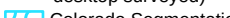
 Existing Xcel transmission

 Existing transmission (non-Xcel)

 Wetland feature (TetraTech field surveyed)

 Wetland feature (TetraTech desktop surveyed)

 Colorado Segmentation Stream

 Access Point

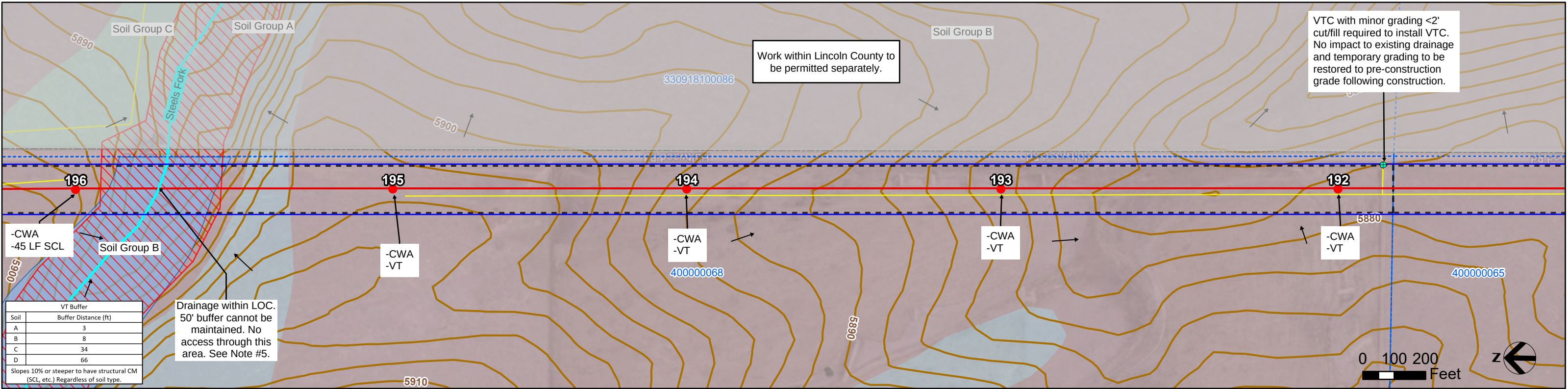
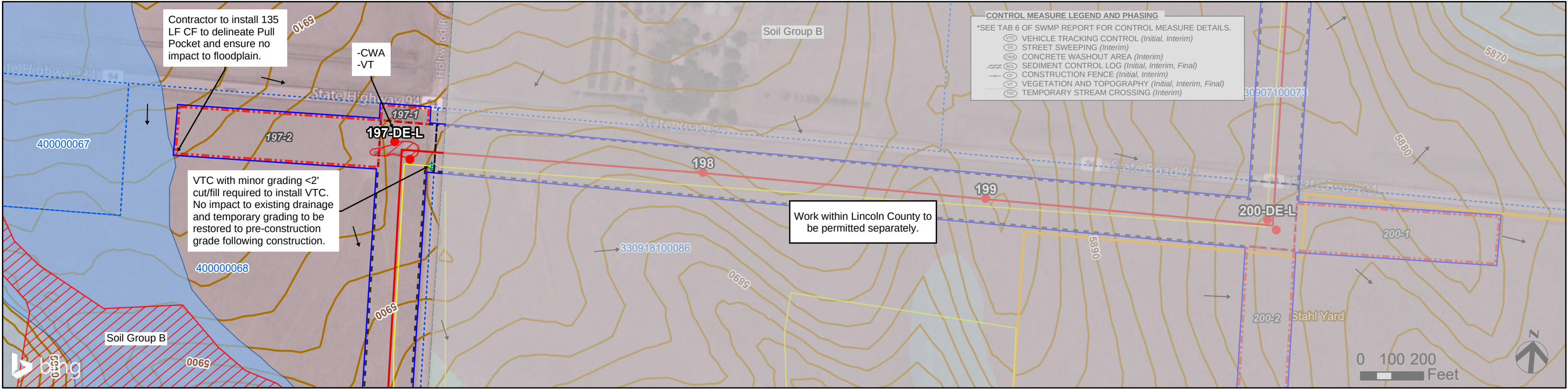
**FEMA Flood Hazard**

Zone A

Zone AE

**NOTES:**  
1. Disturbance anticipated to be limited to drive and crush access in the ROW (assumed 20' wide centered on access route), access grading, work pad grading around the structure where shown, individual structure pole excavation (assume 25' radius around each pole), pull site grading, and minor grading where ROW meets existing roadways. Grading and disturbance not to extend outside of Xcel's ROW.  
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3. Topsoil to be stripped, segregated from subsoil, and stockpiled for use during restoration. Install downgradient CMs for stockpiles during interim phase of construction. Contractor to update site maps with stockpile and CM locations.  
4. Street sweep as necessary.  
5. Named and unnamed drainages, steams, creeks, ditches, etc. within the LOC to maintain a 50' vegetative buffer where feasible. If a 50' vegetative buffer cannot be maintained, utilize sediment controls to prevent sediment transportation into waters. Avoid all transportation over waters unless infeasible. If infeasible, utilize matting or best management practices and contact Xcel Siting and Land Rights prior to drive-over.  
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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 19

MB-14T, MB-14B

Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

A

B

C

D

Limits of Construction

Buried gas utility

Overhead distribution

Underground distribution

Existing Xcel transmission

Existing transmission (non-Xcel)

Wetland feature (TetraTech field surveyed)

Wetland feature (TetraTech desktop surveyed)

Colorado Segmentation Stream

Access Point

Zone A

Zone AE

**NOTES:**

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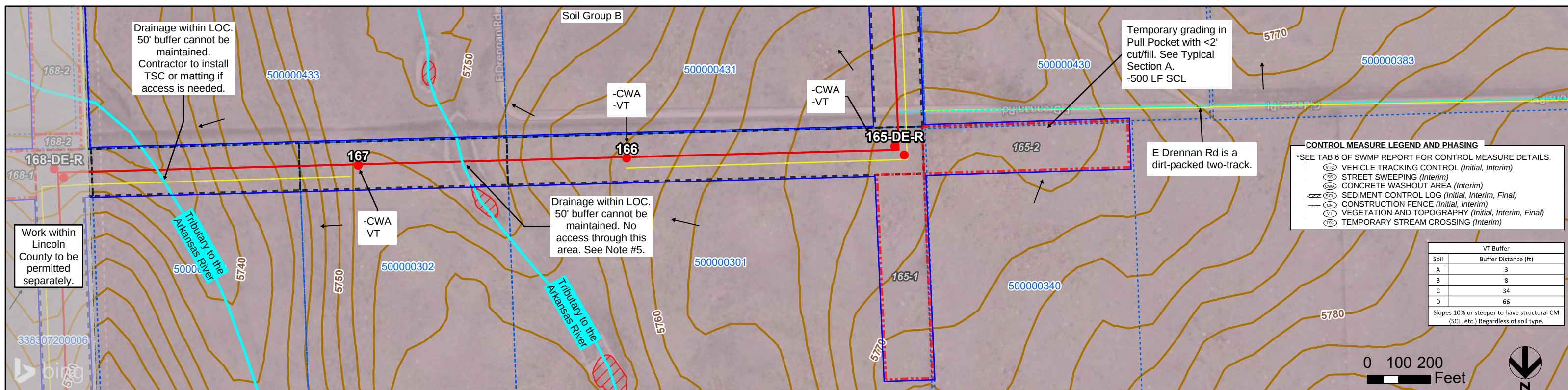
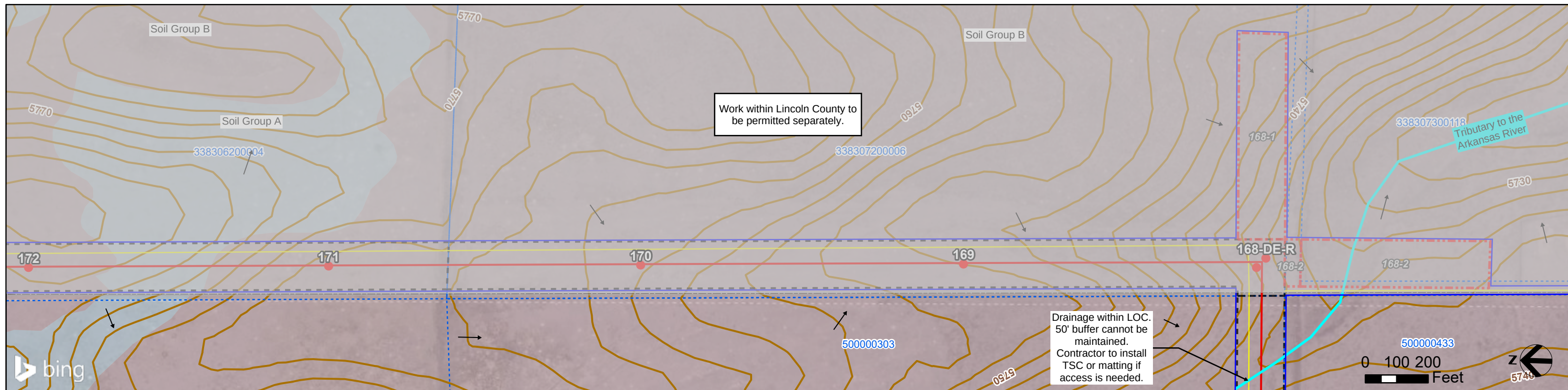




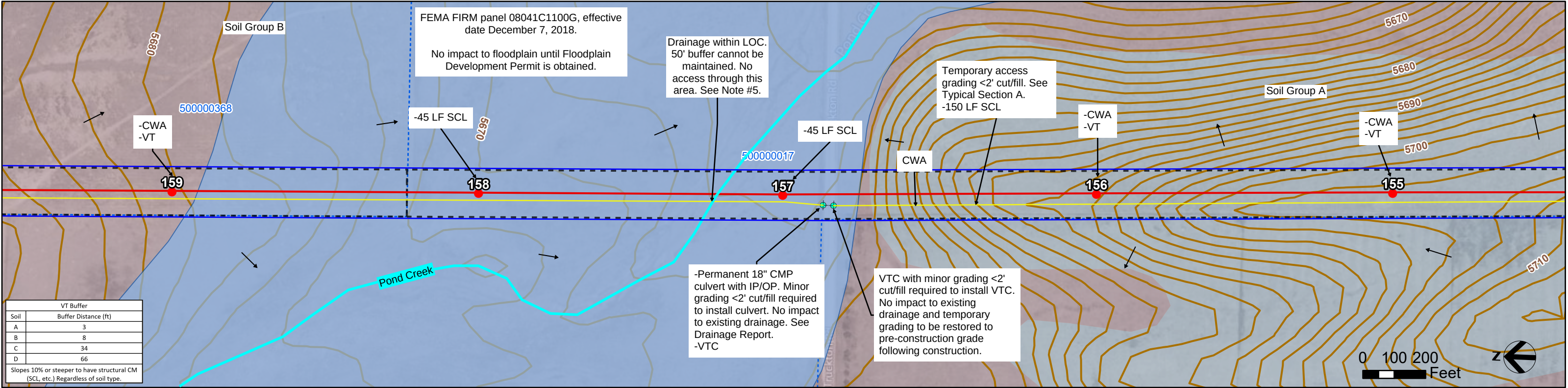
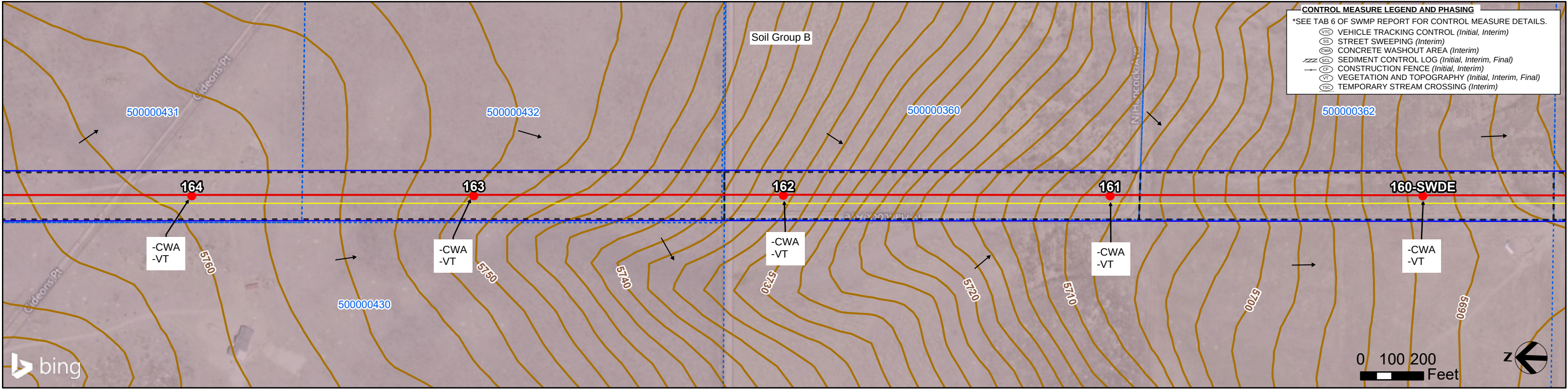






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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 23

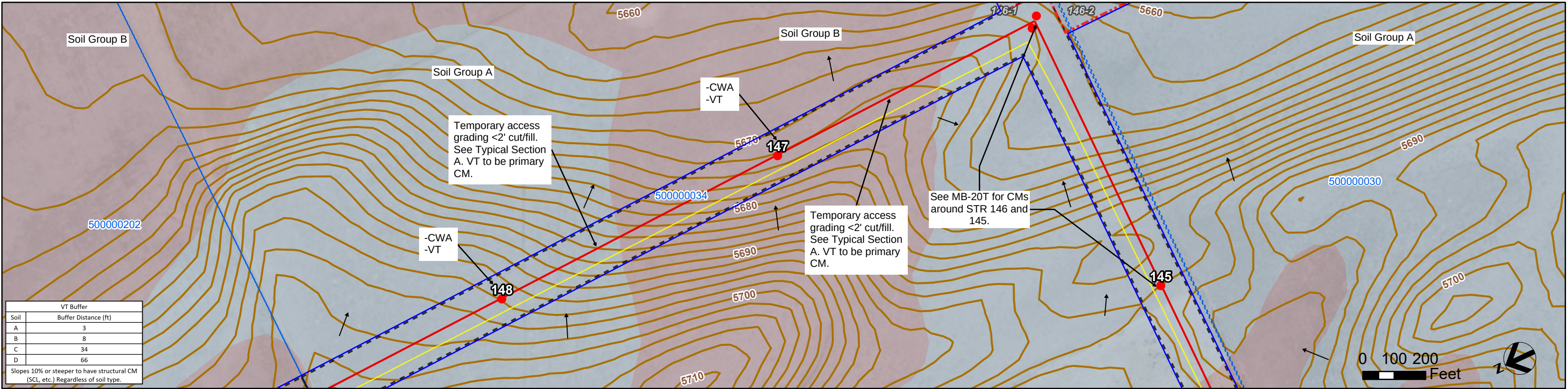
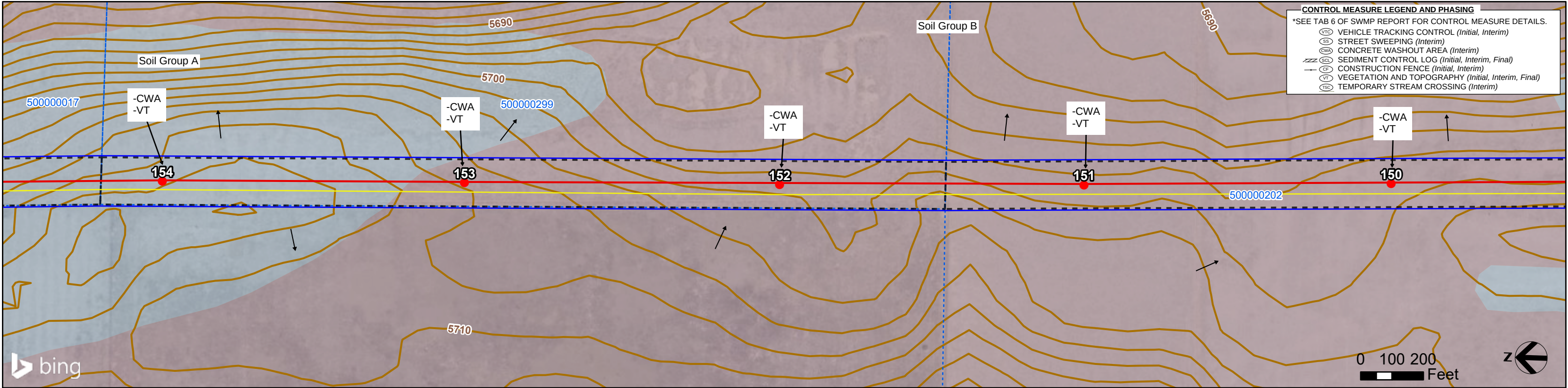
MB-18T, MB-18B

- Surface Flow
- 2' Contour (USGS)
- County Boundary
- Municipalities
- Parcel
- Centerline
- Access Road
- PSCo
- Easement/ROW
- Pull Pocket
- Laydown Yard
- Structure
- Hydrologic Soil Group
  - A
  - B
  - C
  - D
- Limits of Construction
- Buried gas utility
- Overhead distribution
- Underground distribution
- Existing Xcel transmission
- Existing transmission (non-Xcel)
- Wetland feature (TetraTech field surveyed)
- Wetland feature (TetraTech desktop surveyed)
- Colorado Segmentation Stream
- Access Point
- FEMA Flood Hazard
  - Zone A
  - Zone AE

**NOTES:**

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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 24

MB-19T, MB-19B

|                     |                                                |
|---------------------|------------------------------------------------|
| → Surface Flow      | □ Limits of Construction                       |
| — 2' Contour (USGS) | — Buried gas utility                           |
| ▬ County Boundary   | - - - Overhead distribution                    |
| ▨ Municipalities    | - - - Underground distribution                 |
| ▨ Parcel            | - - - Existing Xcel transmission               |
| — Centerline        | - - - Existing transmission (non-Xcel)         |
| — Access Road       | ▨ Wetland feature (TetraTech field surveyed)   |
| ▨ PSCo              | ▨ Wetland feature (TetraTech desktop surveyed) |
| ▨ Easement/ROW      | ▨ Colorado Segmentation Stream                 |
| ▨ Pull Pocket       | ● Access Point                                 |
| ▨ Laydown Yard      |                                                |
| ● Structure         |                                                |

**Hydrologic Soil Group**

|   |   |
|---|---|
| A | C |
| B | D |

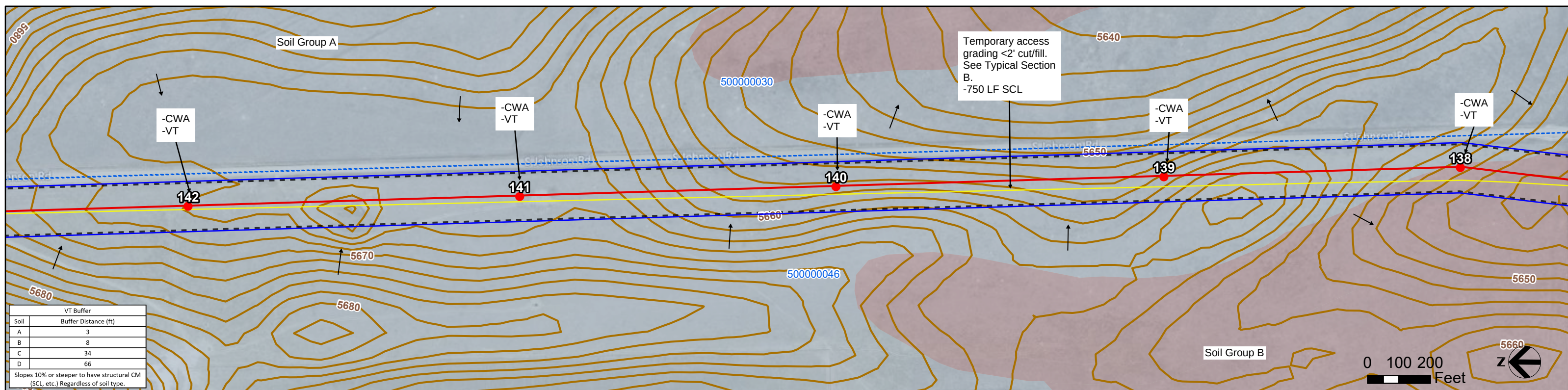
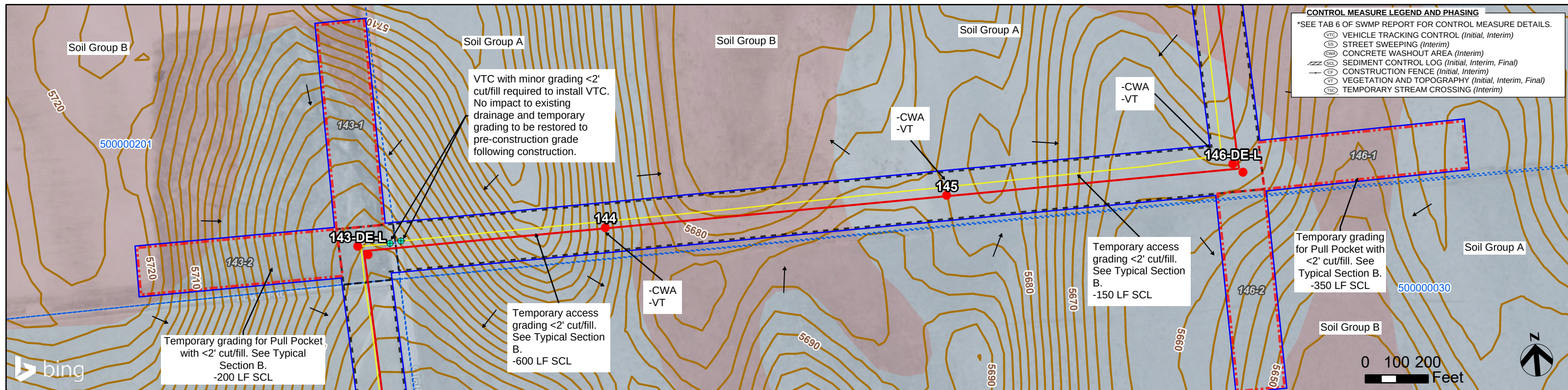
**FEMA Flood Hazard**

|         |
|---------|
| Zone A  |
| Zone AE |

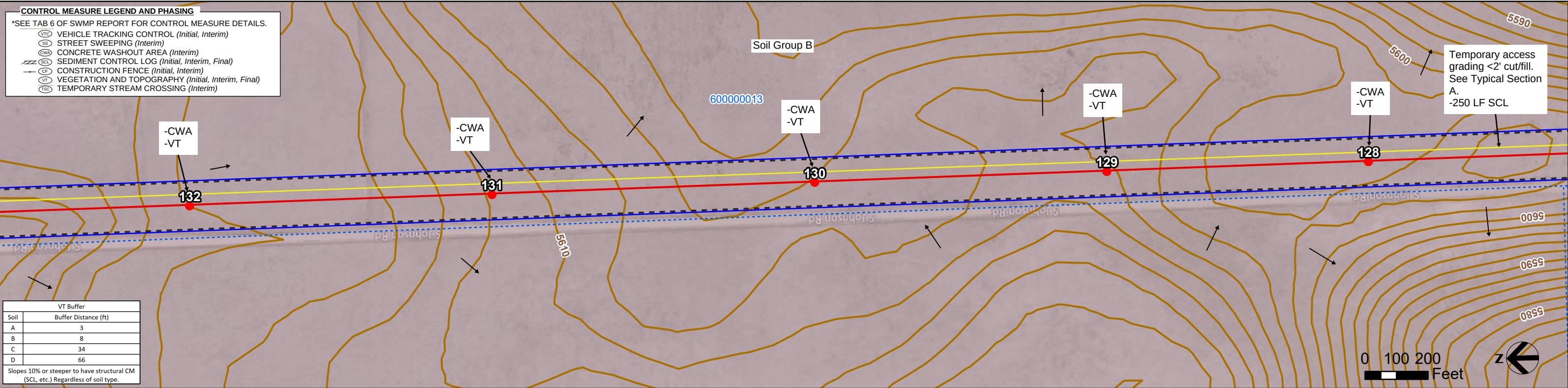
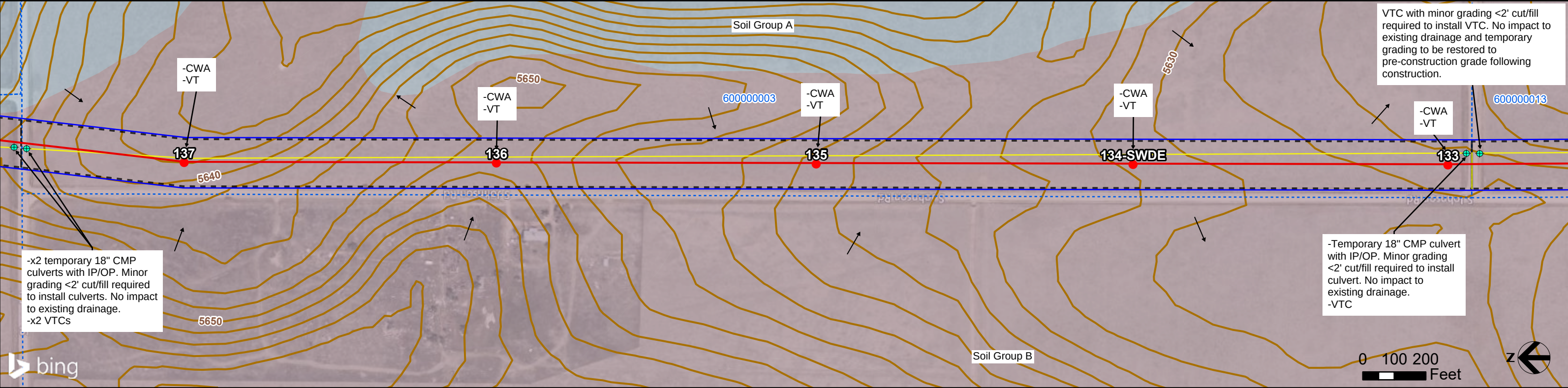
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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 26

MB-21T, MB-21B

Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

Limits of Construction

Buried gas utility

Overhead distribution

Underground distribution

Existing Xcel transmission

Existing transmission (non-Xcel)

Wetland feature (TetraTech field surveyed)

Wetland feature (TetraTech desktop surveyed)

Colorado Segmentation Stream

Access Point

**FEMA Flood Hazard**

Zone A

Zone AE

**NOTES:**

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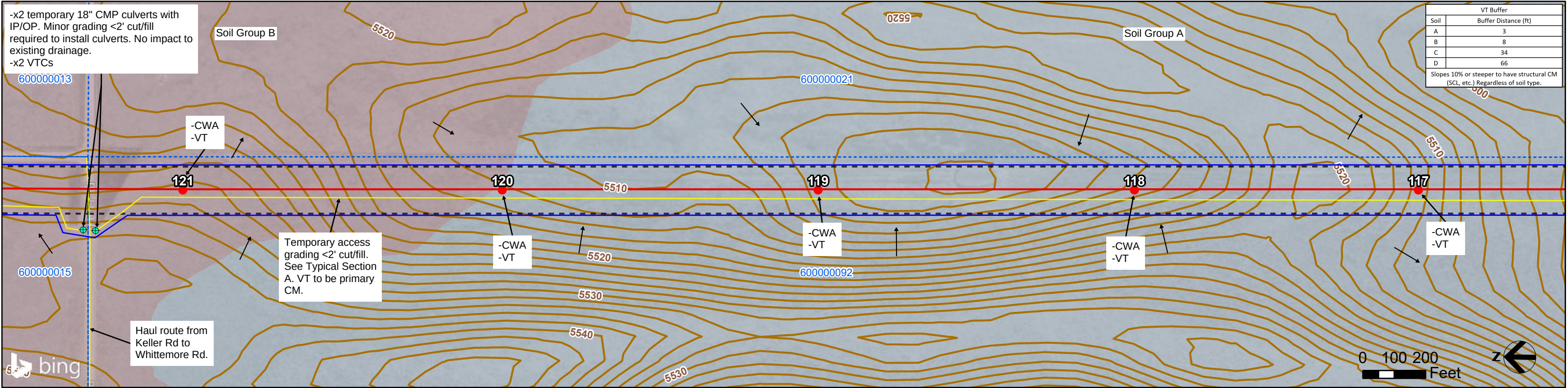
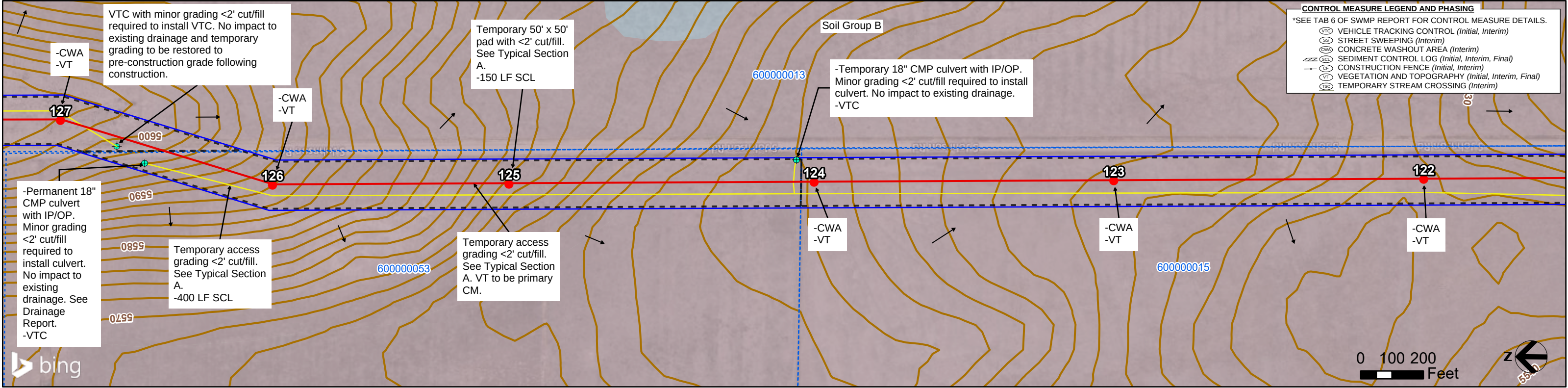
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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 27

MB-22T, MB-22B

→ Surface Flow

— 2' Contour (USGS)

▬ County Boundary

▬ Municipalities

▬ Parcel

— Centerline

— Access Road

▬ PSCo

▬ Easement/ROW

▬ Pull Pocket

▬ Laydown Yard

● Structure

**Hydrologic Soil Group**

A

B

C

D

▬ Limits of Construction

▬ Buried gas utility

▬ Overhead distribution

▬ Underground distribution

▬ Existing Xcel transmission

▬ Existing transmission (non-Xcel)

▬ Wetland feature (TetraTech field surveyed)

▬ Wetland feature (TetraTech desktop surveyed)

▬ Colorado Segmentation Stream

● Access Point

**FEMA Flood Hazard**

▬ Zone A

▬ Zone AE

**NOTES:**

1. Disturbance anticipated to be limited to drive and crush access in the ROW (assumed 20' wide centered on access route), access grading, work pad grading around the structure where shown, individual structure pole excavation (assume 25' radius around each pole), pull site grading, and minor grading where ROW meets existing roadways. Grading and disturbance not to extend outside of Xcel's ROW.

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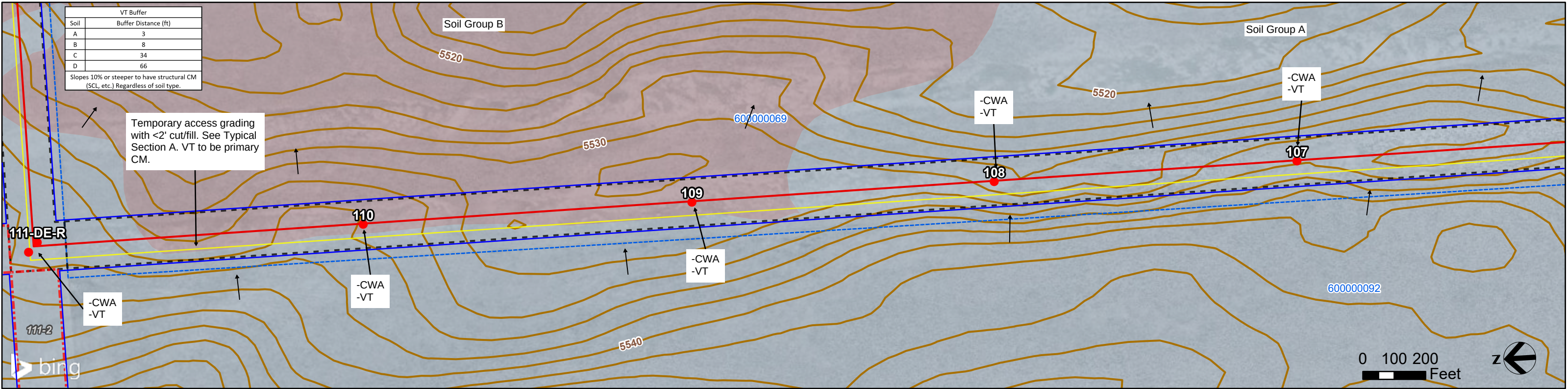
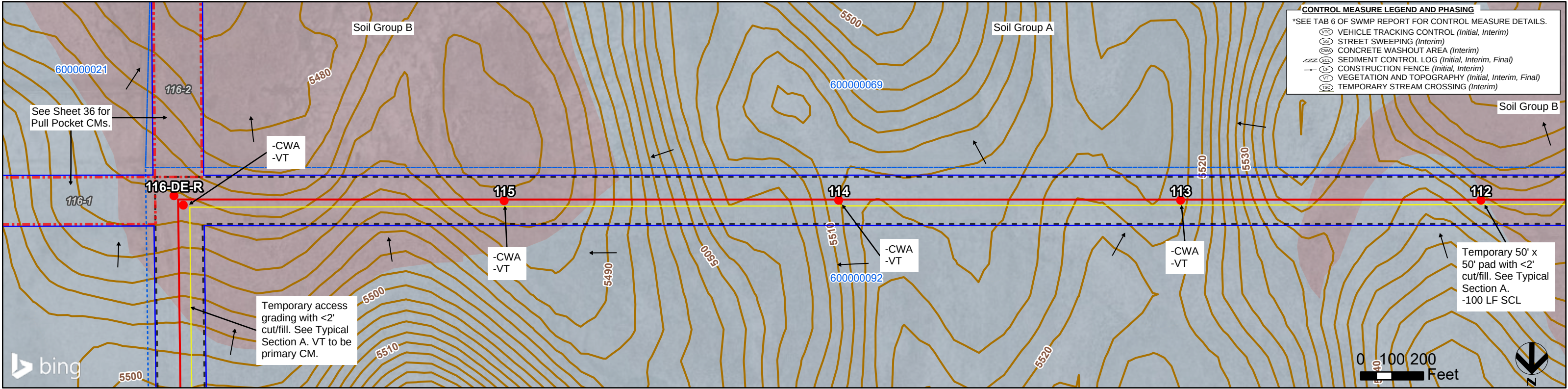
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| VT Buffer |                      |
|-----------|----------------------|
| Soil      | Buffer Distance (ft) |
| A         | 3                    |
| B         | 8                    |
| C         | 34                   |
| D         | 66                   |

Slopes 10% or steeper to have structural CM (SCL, etc.) Regardless of soil type.





**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 28

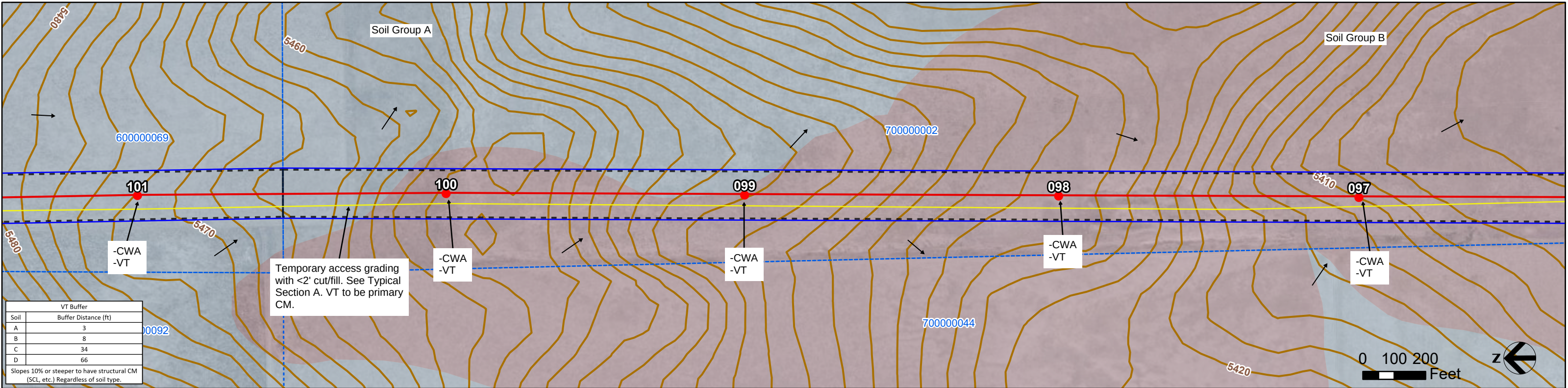
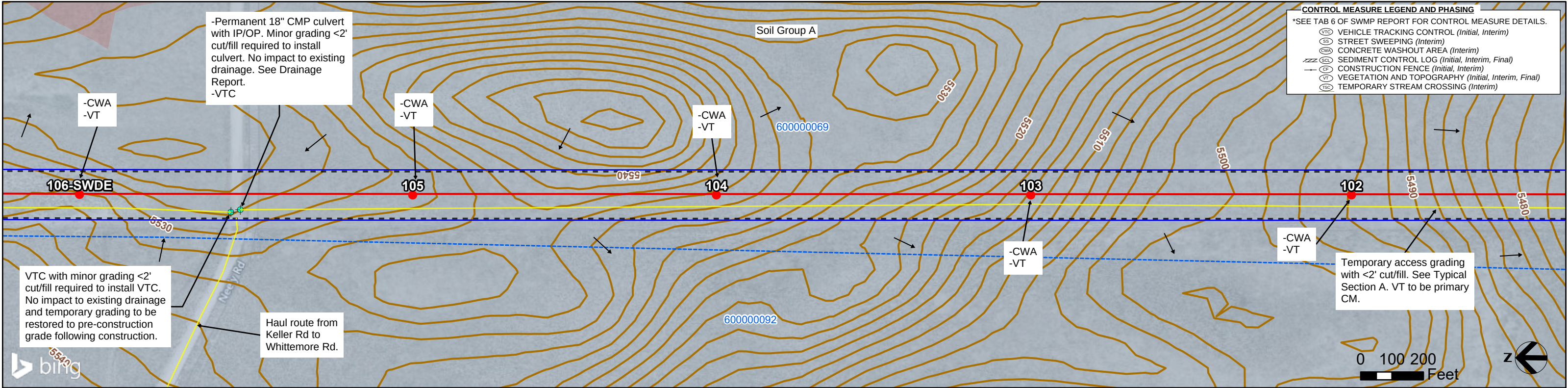
MB-23T, MB-23B

|                              |                                              |
|------------------------------|----------------------------------------------|
| Surface Flow                 | Limits of Construction                       |
| 2' Contour (USGS)            | Buried gas utility                           |
| County Boundary              | Overhead distribution                        |
| Municipalities               | Underground distribution                     |
| Parcel                       | Existing Xcel transmission                   |
| Centerline                   | Existing transmission (non-Xcel)             |
| Access Road                  | Wetland feature (TetraTech field surveyed)   |
| PSCo                         | Wetland feature (TetraTech desktop surveyed) |
| Easement/ROW                 | Colorado Segmentation Stream                 |
| Pull Pocket                  | Access Point                                 |
| Laydown Yard                 | FEMA Flood Hazard                            |
| Structure                    |                                              |
| <b>Hydrologic Soil Group</b> |                                              |
| A                            | C                                            |
| B                            | D                                            |
|                              | Zone A                                       |
|                              | Zone AE                                      |

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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 29

MB-24T, MB-24B

→ Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

→ Limits of Construction

→ Buried gas utility

→ Overhead distribution

→ Underground distribution

→ Existing Xcel transmission

→ Existing transmission (non-Xcel)

→ Wetland feature (TetraTech field surveyed)

→ Wetland feature (TetraTech desktop surveyed)

→ Colorado Segmentation Stream

→ Access Point

**FEMA Flood Hazard**

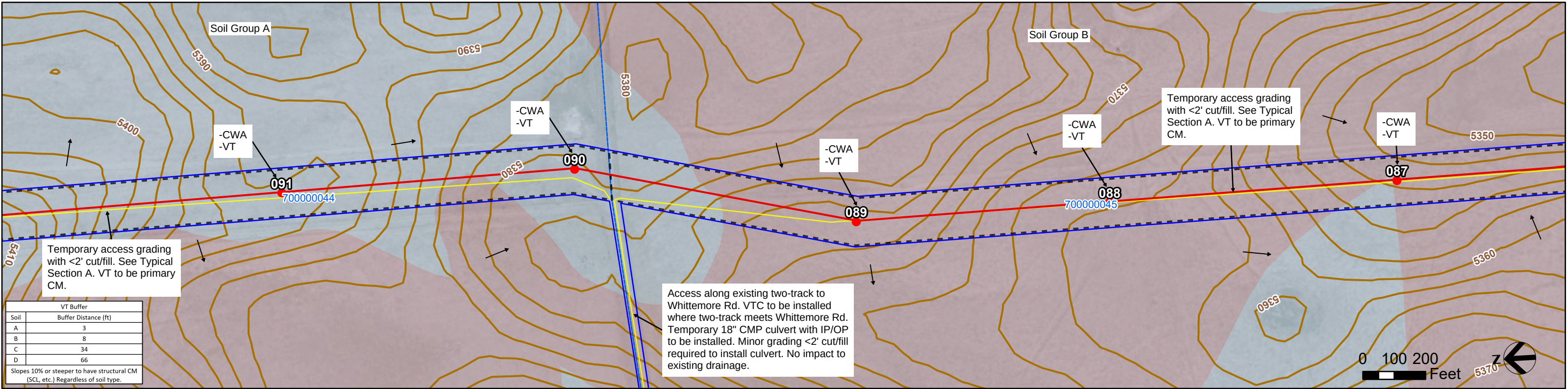
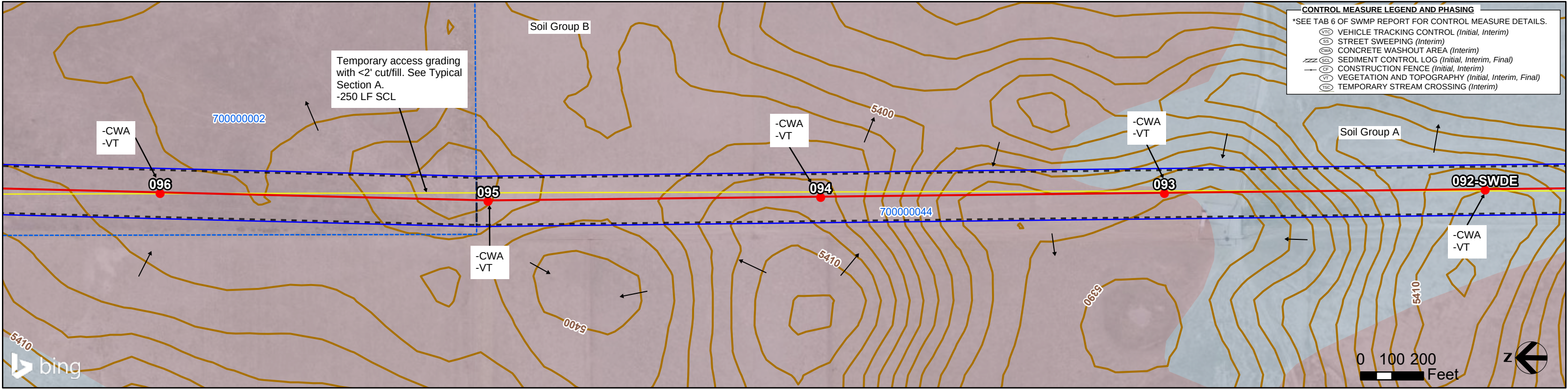
→ Zone A

→ Zone AE

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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 30

MB-25T, MB-25B

 Surface Flow

 2' Contour (USGS)

 County Boundary

 Municipalities

 Parcel

 Centerline

 Access Road

 PSCo

 Easement/ROW

 Pull Pocket

 Laydown Yard

 Structure

**Hydrologic Soil Group**

 A

 B

 C

 D

 Limits of Construction

 Buried gas utility

 Overhead distribution

 Underground distribution

 Existing Xcel transmission

 Existing transmission (non-Xcel)

 Wetland feature (TetraTech field surveyed)

 Wetland feature (TetraTech desktop surveyed)

 Colorado Segmentation Stream

 Access Point

**FEMA Flood Hazard**

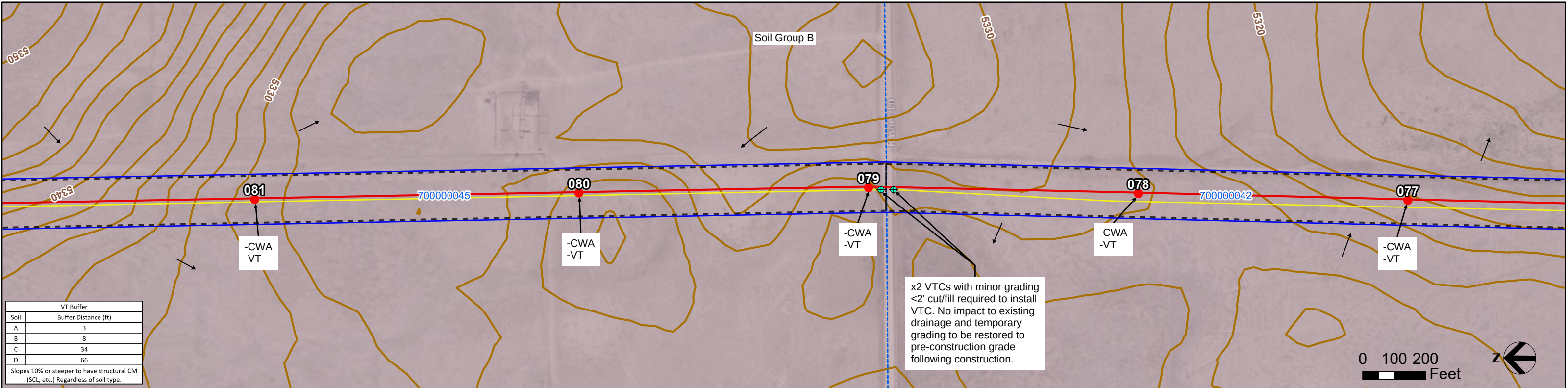
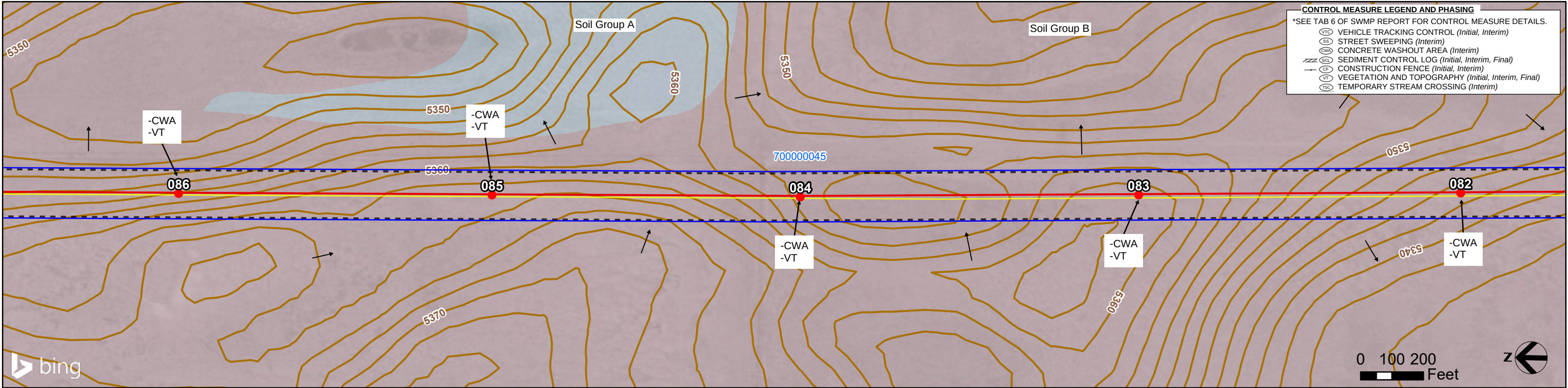
 Zone A

 Zone AE

**NOTES:**

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**XCEL TLIN: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 31

MB-26T, MB-26B

→ Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

▭ Limits of Construction

--- Buried gas utility

--- Overhead distribution

--- Underground distribution

--- Existing Xcel transmission

--- Existing transmission (non-Xcel)

▭ Wetland feature (TetraTech field surveyed)

▭ Wetland feature (TetraTech desktop surveyed)

▭ Colorado Segmentation Stream

● Access Point

**FEMA Flood Hazard**

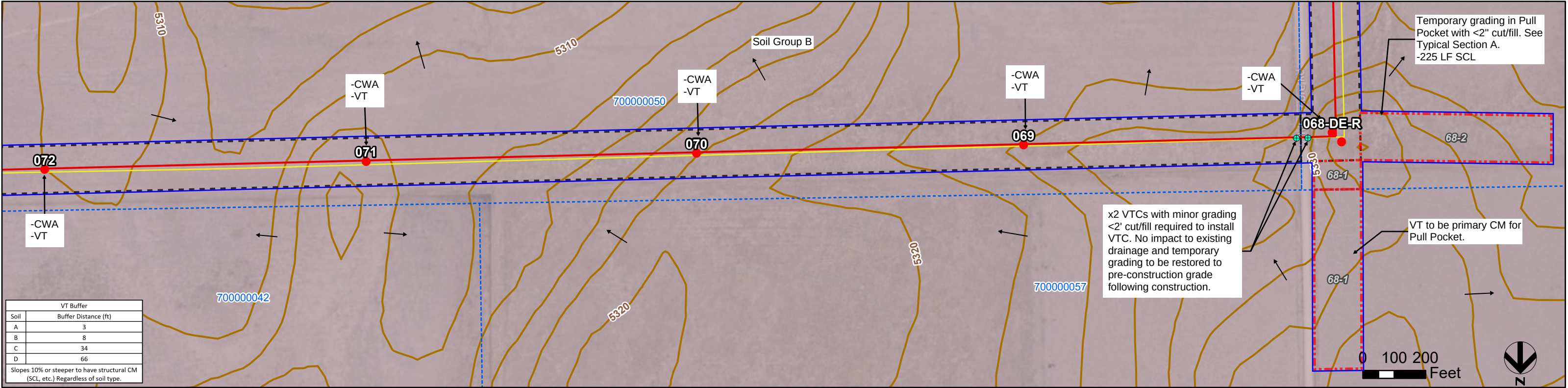
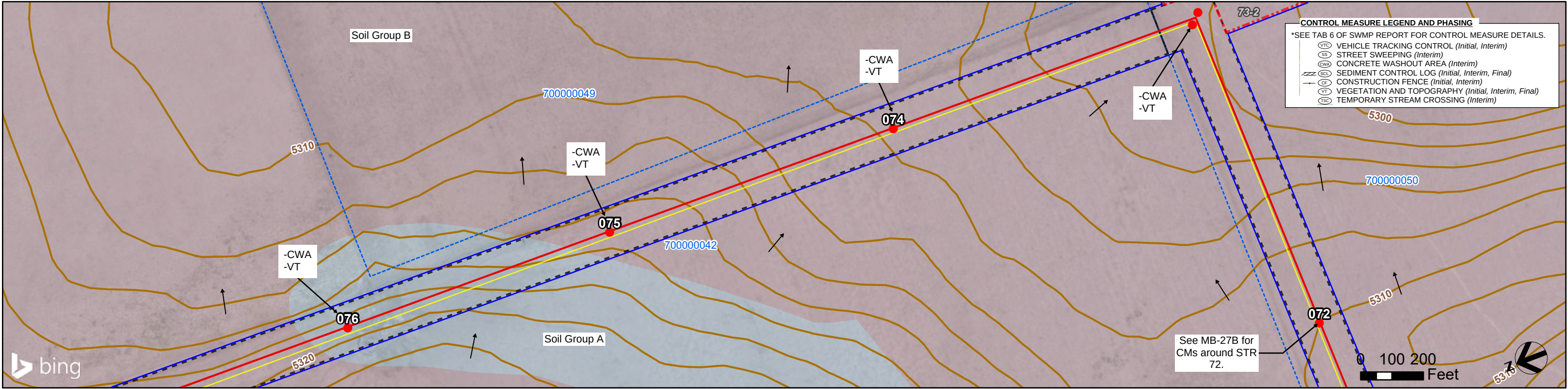
Zone A

Zone AE

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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 32

MB-27T, MB-27B

 Surface Flow

 2' Contour (USGS)

 County Boundary

 Municipalities

 Parcel

 Centerline

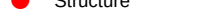
 Access Road

 PSCo

 Easement/ROW

 Pull Pocket

 Laydown Yard

 Structure

**Hydrologic Soil Group**

 A

 B

 C

 D

 Limits of Construction

 Buried gas utility

 Overhead distribution

 Underground distribution

 Existing Xcel transmission

 Existing transmission (non-Xcel)

 Wetland feature (TetraTech field surveyed)

 Wetland feature (TetraTech desktop surveyed)

 Colorado Segmentation Stream

 Access Point

**FEMA Flood Hazard**

 Zone A

 Zone AE

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4. Street sweep as necessary.

5. Named and unnamed drainages, steams, creeks, ditches, etc. within the LOC to maintain a 50' vegetative buffer where feasible. If a 50' vegetative buffer cannot be maintained, utilize sediment controls to prevent sediment transportation into waters. Avoid all transportation over waters unless infeasible. If infeasible, utilize matting or best management practices and contact Xcel Siting and Land Rights prior to drive-over.

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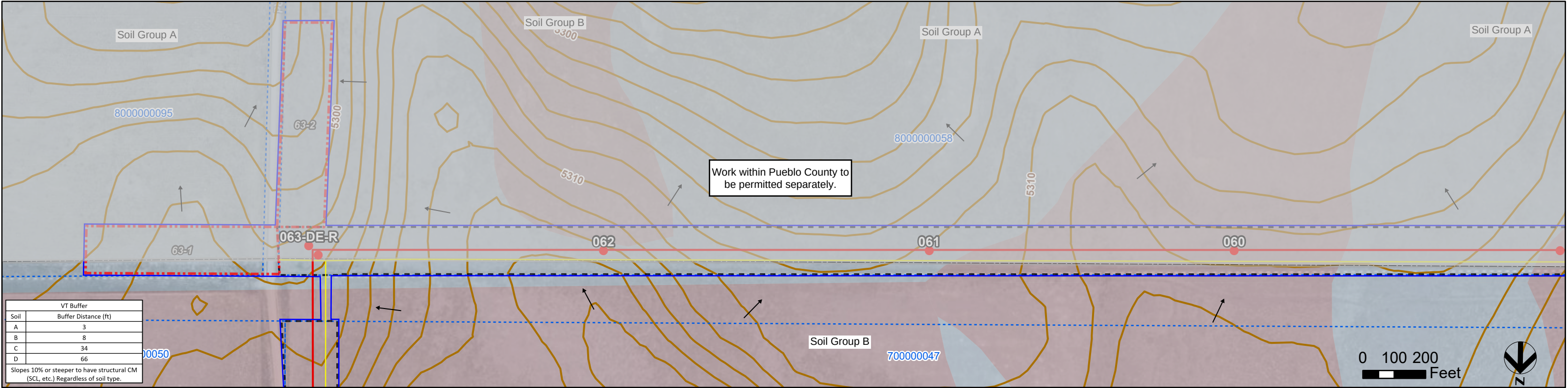
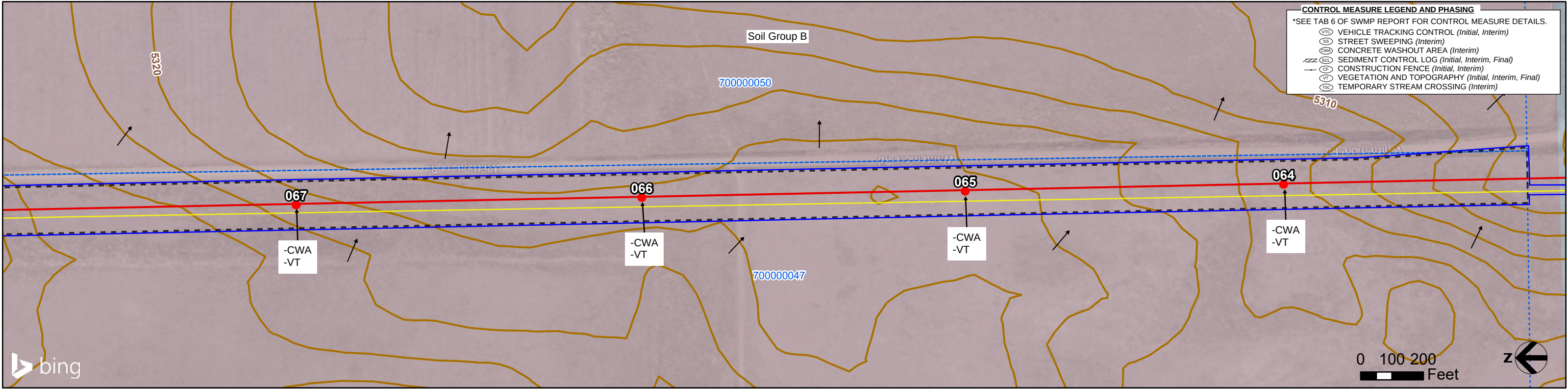
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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 33

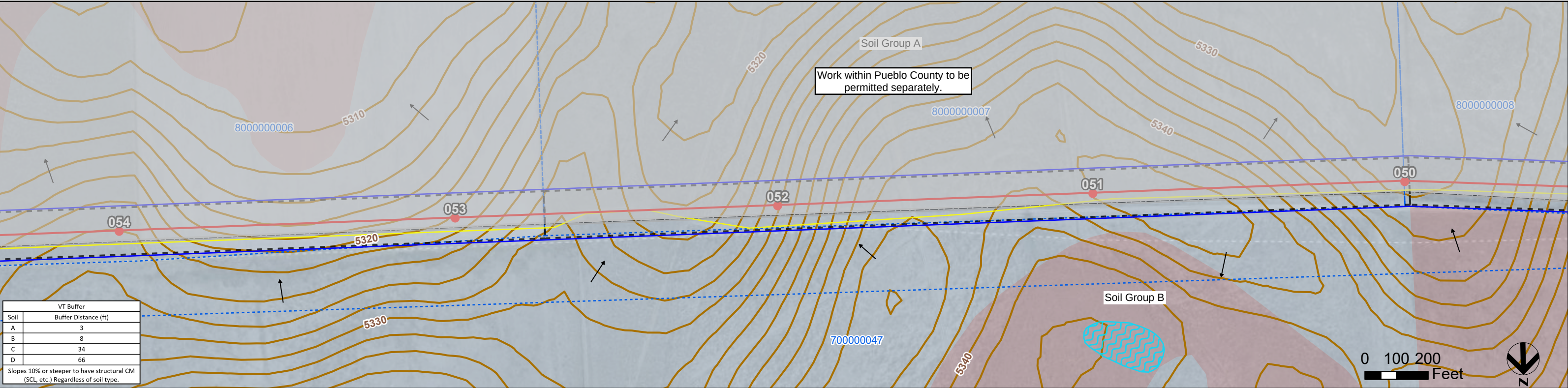
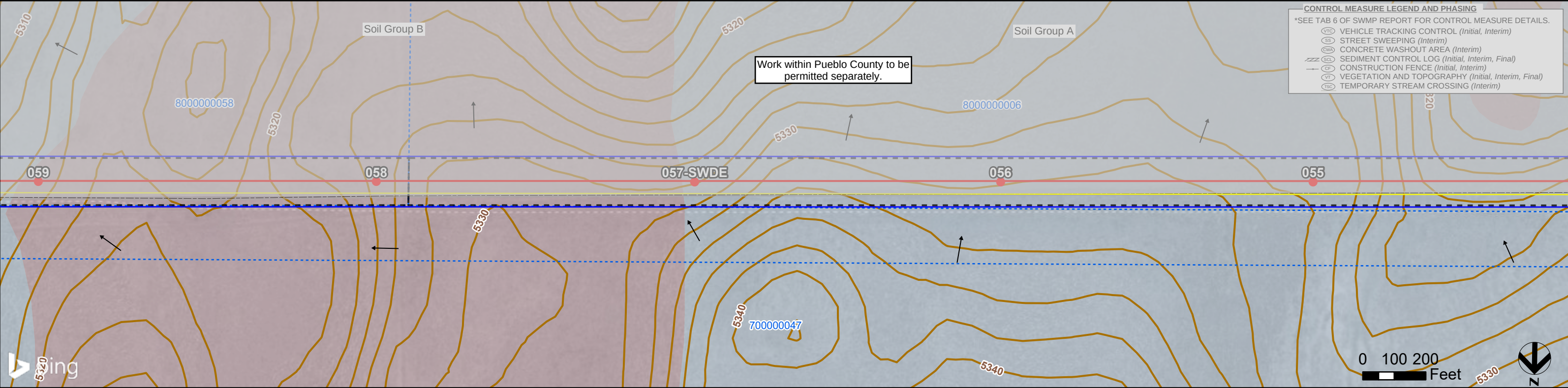
MB-28T, MB-28B

- Surface Flow
- 2' Contour (USGS)
- County Boundary
- Municipalities
- Parcel
- Centerline
- Access Road
- PSCo
- Easement/ROW
- Pull Pocket
- Laydown Yard
- Structure
- Hydrologic Soil Group
  - A
  - B
  - C
  - D
- Limits of Construction
- Buried gas utility
- Overhead distribution
- Underground distribution
- Existing Xcel transmission
- Existing transmission (non-Xcel)
- Wetland feature (TetraTech field surveyed)
- Wetland feature (TetraTech desktop surveyed)
- Colorado Segmentation Stream
- Access Point
- FEMA Flood Hazard
  - Zone A
  - Zone AE

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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 34

MB-29T, MB-29B

- Surface Flow
- 2' Contour (USGS)
- County Boundary
- Municipalities
- Parcel
- Centerline
- Access Road
- PSCo
- Easement/ROW
- Pull Pocket
- Laydown Yard
- Structure
- Hydrologic Soil Group
  - A
  - B
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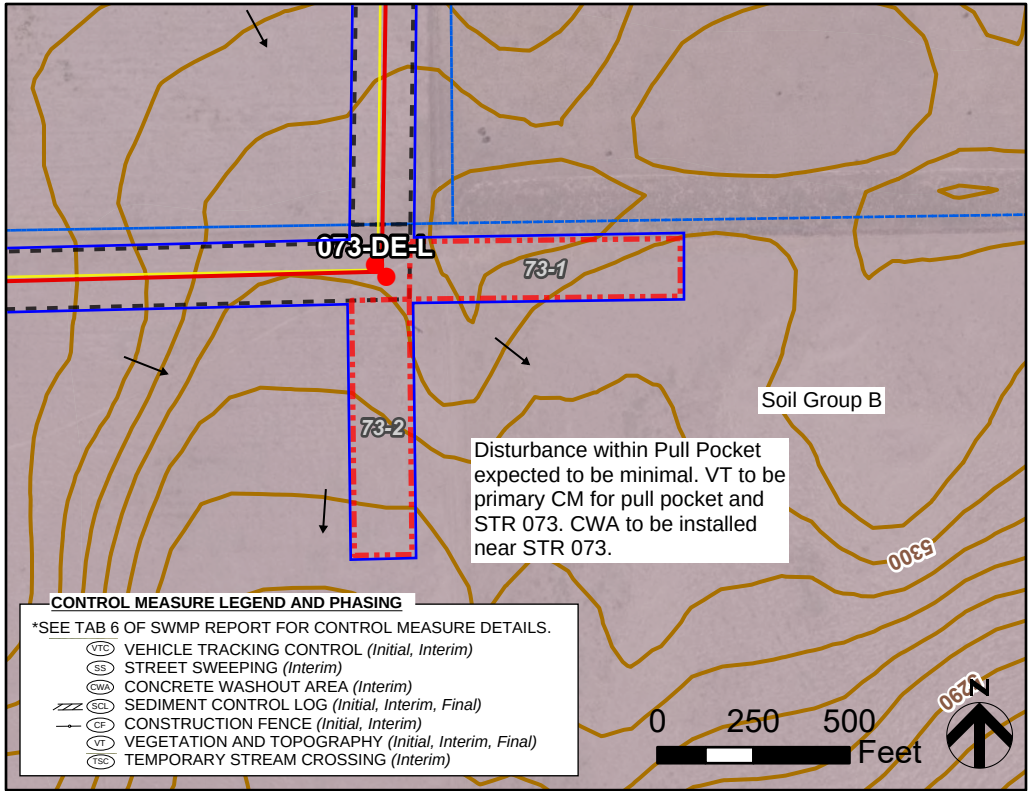
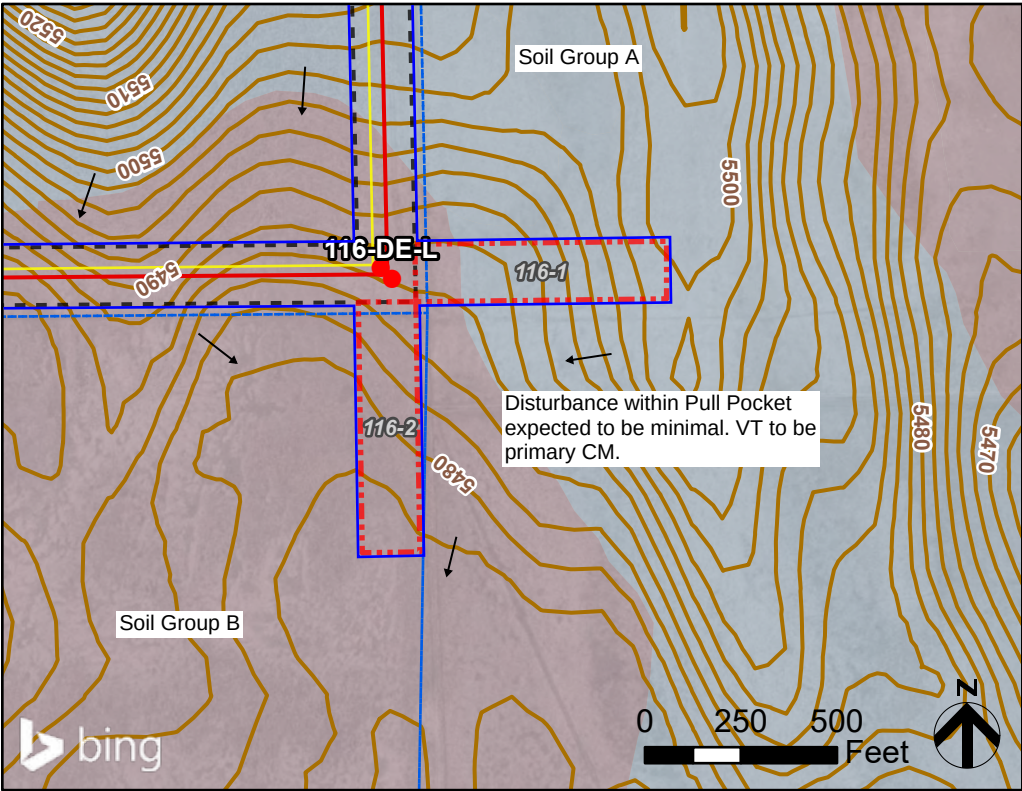
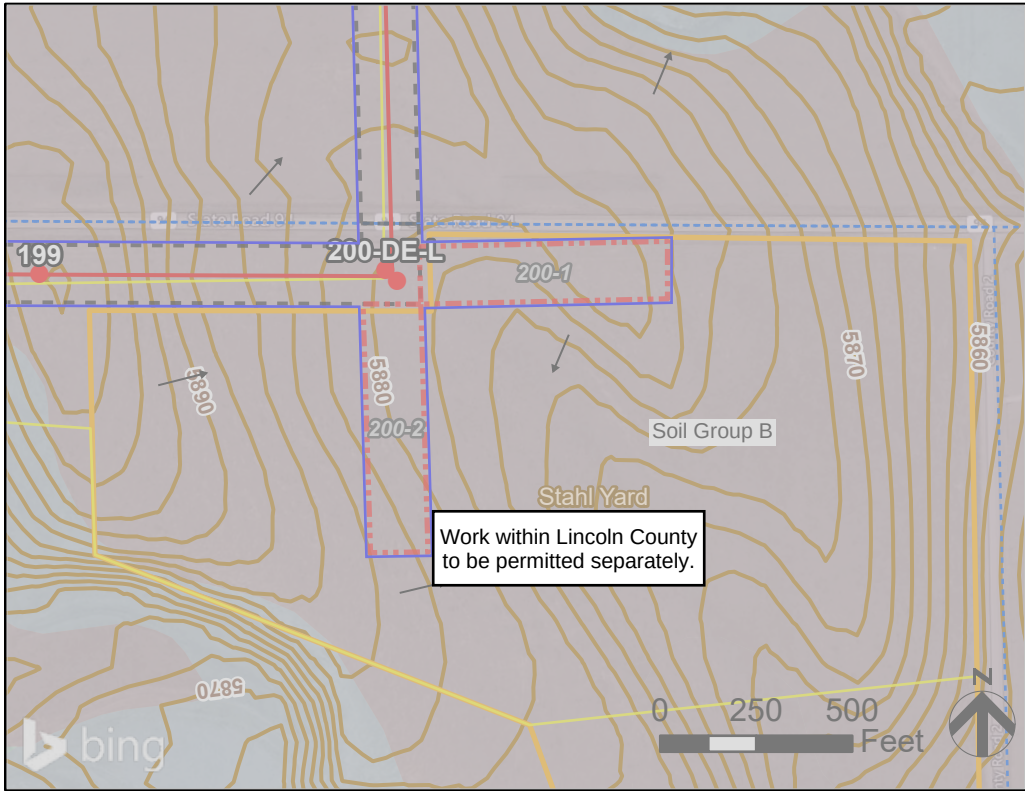
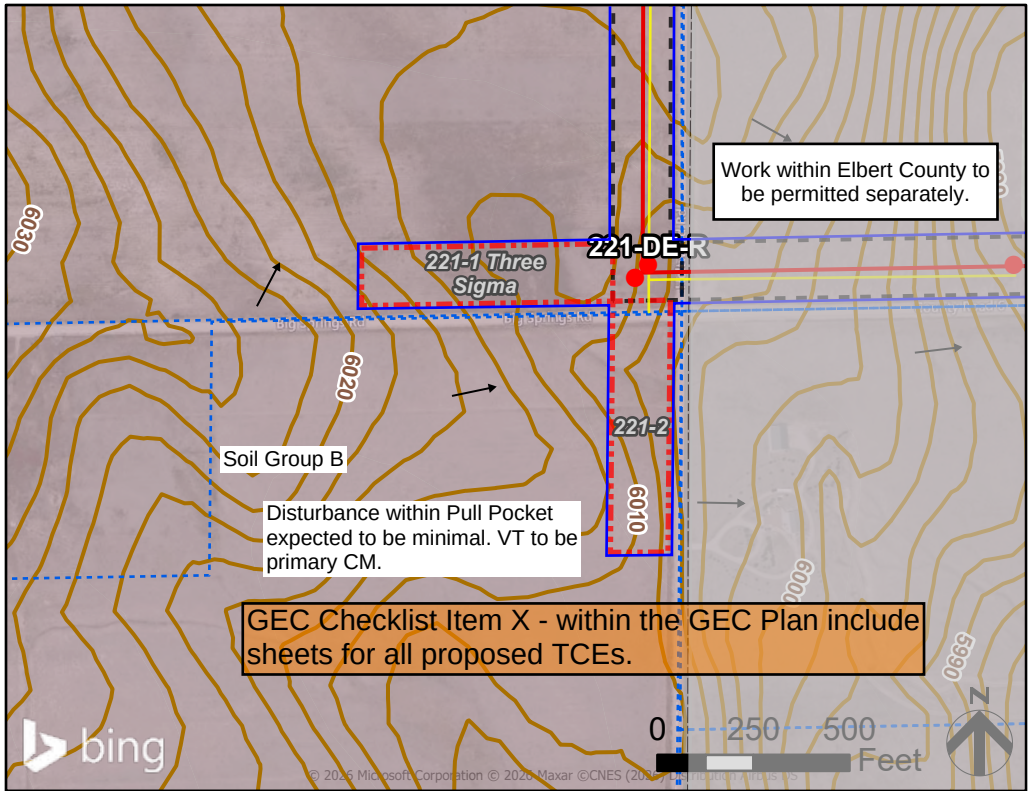
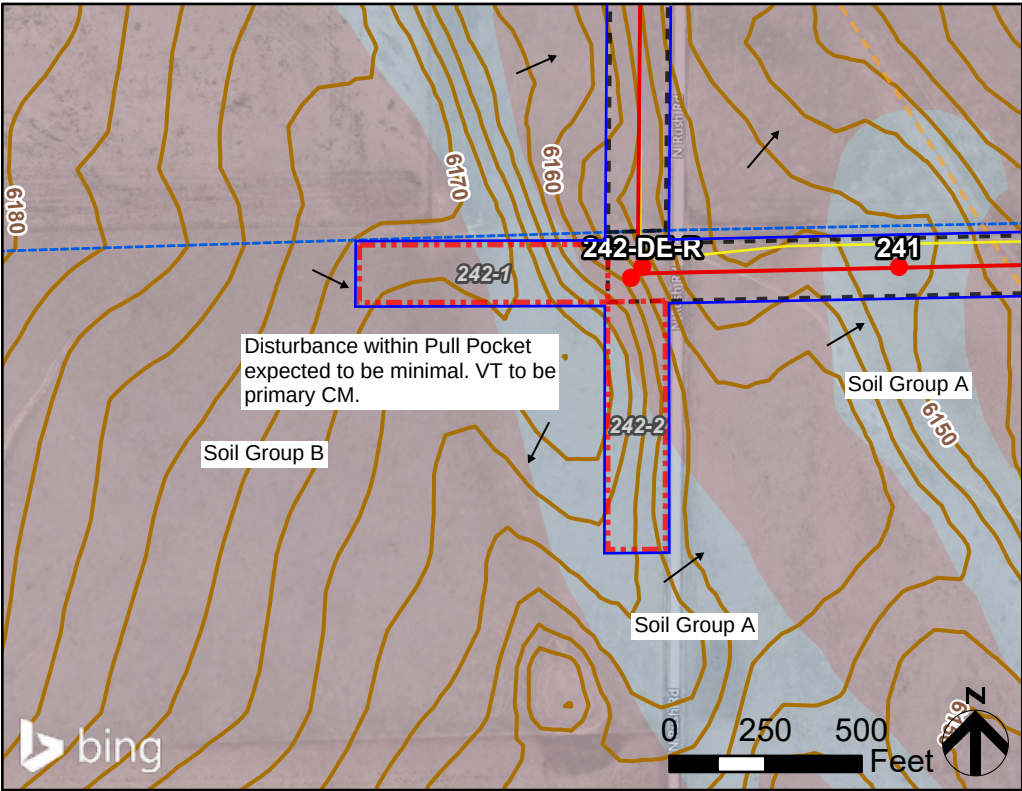
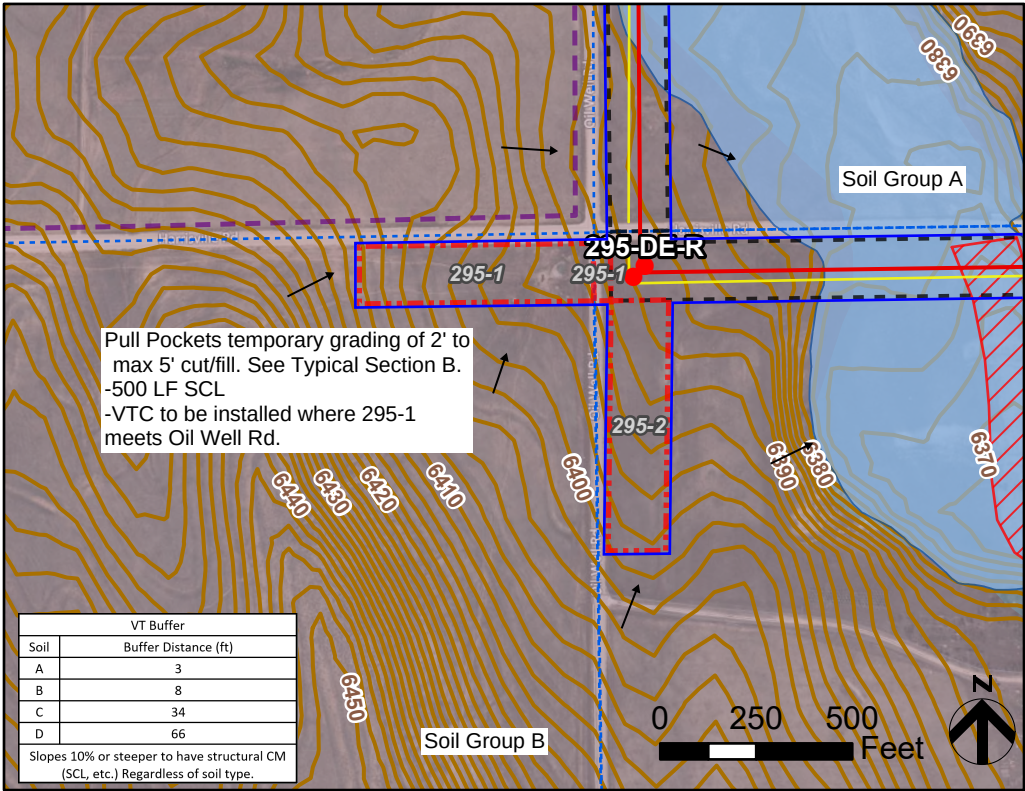
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**XCEL TLINE: PWAY SEG 5 EL PASO COUNTY BUILD GEC PLANS**

June 2026

SHEET 36

PULL SITES

Surface Flow

2' Contour (USGS)

County Boundary

Municipalities

Parcel

Centerline

Access Road

PSCo

Easement/ROW

Pull Pocket

Laydown Yard

Structure

**Hydrologic Soil Group**

A

B

C

D

Limits of Construction

Buried gas utility

Overhead distribution

Underground distribution

Existing Xcel transmission

Existing transmission (non-Xcel)

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Colorado Segmentation Stream

Access Point

**FEMA Flood Hazard**

Zone A

Zone AE

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Make this memo an attachment to the SWMP and then the actual details should go within the GEC Plan details sheets. But the details should be a part of the GEC planset with the border and title block, not just an attachment.

# Memo

Date: Wednesday, March 13, 2025

Project: Xcel Tline: PWAY Segment 5 El Paso County Build SWMP

To: Control MeasureDetails

From: Brian Brown, PE - HDR

Subject: Use of Vegetation & Topography (VT) instead of structural erosion Control Measures (CM)

This memo describes the specific conditions for which the installation of an erosion Control Measure (CM) is not recommended based on site conditions. Under certain conditions, not installing a CM may be the best approach to minimize sediment transport off site. This is based on the concept that shallow overland flow may pick-up and transport sediment that is then dropped out within a vegetative buffer depending on a variety of site conditions. Use of VT instead of a structural CM is dependent on the following factors:

- Rainfall – Rainfall intensity impacts the buffer distance. The rainfall rate across the site has been calculated to be calculated 1.19” to 1.25” in a 5-year, 30-minute storm. A 1.25” 5-year, 30-minute storm was utilized for model inputs. This rainfall depth is incorporated in the Table 1 distances.
- 80% sediment removal – structural CMs target 80% sediment removal. Actual removal rates vary but have been shown to be less than 80% in many studies. The 80% removal rate is one basis for the VT buffer distances reported in Table 1.
- **Disturbance area does not have concentrated flow** – This approach is based on sediment dropping out while suspended in an overland sheet flow condition. If there is concentrated flow prior to or due to construction, i.e. rill erosion across the work/disturbance area that continues down-gradient and off-site, then structural CMs are recommended.
- Low slope – local slope of the site impacts velocity, flow concentration, and other factors. Use VT should not be considered for slopes exceeding 10%.
- Soil Type – Soil type impacts likelihood of soil being transported in sheet flow. The larger the soil particles, i.e. sand, the harder to pick-up and transport. The smaller the particle, i.e. clay, the longer the transport distance. The NRCS predominant Hydrologic Soil Group (HSG) soil types for the project area are A and B. The hydrologic soil groups (HSG) are A – D and as follows:
  - A – sand or silty sand, High infiltration rate
  - B – sandy silt, moderately high infiltration rate
  - C – clayey silt, moderate to low infiltration rate



- D – clay, low infiltration rate
- Vegetation cover – The vegetation cover (surface roughness) was accounted for in the VT model runs and found to provide similar buffer distances, therefore the most conservative vegetation density is reflected in Table 1.
- Vegetation Buffer - The buffer distance measurement is along the flow direction, and measured from the limit of the work zone to the limit of the utility easement/ROW.  
**Vegetation buffer outside of the ROW may not be utilized for the required buffer distance.** Due to the project area, there is adequate area for sediment settling on-site.
- The use of this VT approach may be applied to linear and larger area disturbances that meet the parameters described in this memo.
- Table 1 results below include a 15% buffer beyond calculated model buffer distances.

Utilize Table 1 below for VT buffer distances. Buffer distances are an extrapolation of the ¾" and 1" rainfalls to a 1.25" rainfall.

| VT Buffer |                      |
|-----------|----------------------|
| Soil      | Buffer Distance (ft) |
| A         | 3                    |
| B         | 8                    |
| C         | 34                   |
| D         | 66                   |

#### **Maintenance:**

In the same manner that using existing conditions as a CM does not require installation of a CM, there is no maintenance of this CM. VT is either adequate or structural CMs should be installed.

#### **Inspection:**

Like structural CMs, the area down gradient of a VT CM should be walked and observed for the following which indicate that VT may not be adequate:

- signs of new rill erosion in work area or immediately down gradient of work area
- signs of sediment deposition well beyond the expected buffer distance or nearing area not controlled by Xcel property lease
- observations of work area or up gradient areas that are creating concentrated flow through and down gradient of the work area.
- Observe and discuss with contractor potential construction practices that could promote sheet flow and infiltration to minimize stormwater runoff from work area.

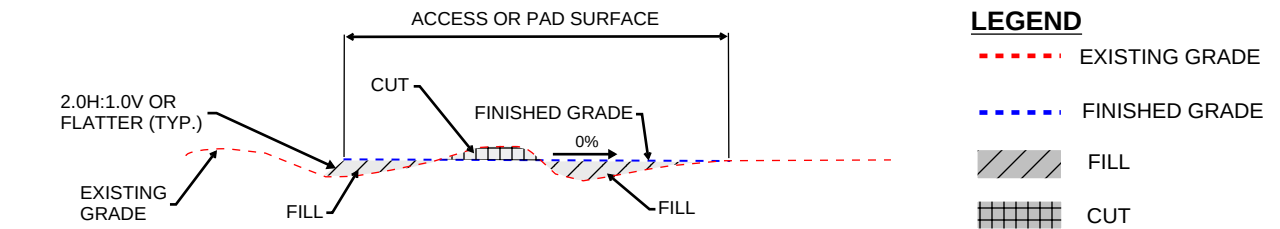
In the event that VT is inadequate to keep sediment on site at any local area, that local area must immediately have a structural down gradient CM installed, at a minimum. Sediment Control Log is the expected control measure. Site conditions will dictate actual CM to be used. Note: Sediment Control Logs cannot be used in across swales or drainageways.



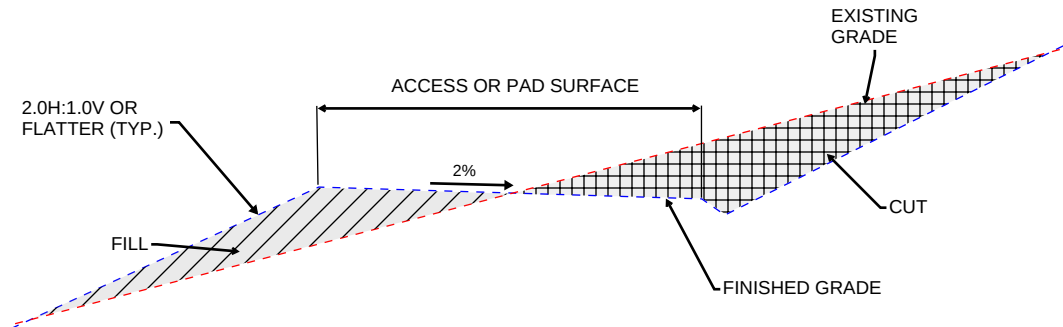
# **TYPICAL CROSS SECTIONS (N.T.S.) - PWAY SEGMENT 5 EL PASO COUNTY TLINE GEC**

## **GENERAL NOTES**

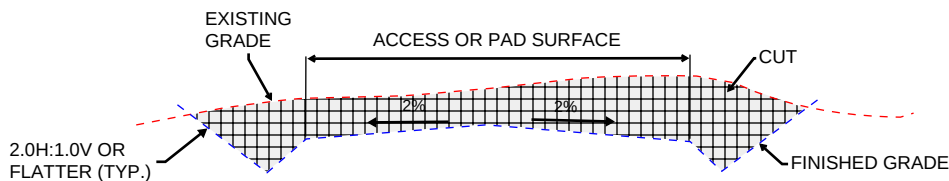
1. GRADING TO BE TEMPORARY UNLESS OTHERWISE NOTED AND COORDINATED WITH EL PASO COUNTY AND LANDOWNERS. GRADING AND ASSOCIATED DISTURBANCES NOT TO EXTEND BEYOND THE PSCo RIGHT-OF-WAY OR TEMPORARY EASEMENTS. TEMPORARY GRADED AREAS TO BE RESTORED TO MATCH PRE-CONSTRUCTION CONTOURS TO THE EXTENT PRACTICABLE UPON COMPLETION OF CONSTRUCTION.
2. CUT AND FILL SLOPES TO BE BALANCED ONSITE. DISTURBED SLOPES TO BE SURFACE ROUGHENED PRIOR TO TEMP STABILIZATION VIA SEED AND MULCH. VT OR SCL TO BE USED AS DOWNGRADIENT CM FOR DISTURBANCES. SCL TO BE INSTALLED WHERE VT BUFFER CANNOT BE MAINTAINED.
3. GRADING NOT TO CREATE LOW SPOTS, CONCENTRATED FLOW PATHS, OR ADVERSELY IMPACT EXISTING DRAINAGE PATTERNS, ADJACENT PROPERTIES, OR ROADWAYS.
4. WHERE TEMPORARY ACCESS OR EQUIPMENT CROSSINGS IMPACT EXISTING SWALES, DRAINAGEWAYS, OR OTHER DRAINAGE FEATURES, INSTALL AN APPROPRIATE TEMPORARY CROSSING CM TO MAINTAIN EXISTING DRAINAGE CONVEYANCE, MINIMIZE EROSION, AND PROTECT EXISTING GRADES DURING CONSTRUCTION. REMOVE TEMPORARY CROSSINGS UPON COMPLETION OF CONSTRUCTION AND RESTORE DISTURBED AREAS. TEMPORARY CROSSING CMs TO BE TEMPORARY STREAM CROSSING, FORD CROSSING, MATTING, ETC.
5. TEMPORARY ACCESS OR STAGING INSTALLED AT EXISTING GRADE WHERE FEASIBLE AND NOT TO IMPACT EXISTING SWALES, DRAINAGEWAYS, OR OTHER DRAINAGE FEATURES.



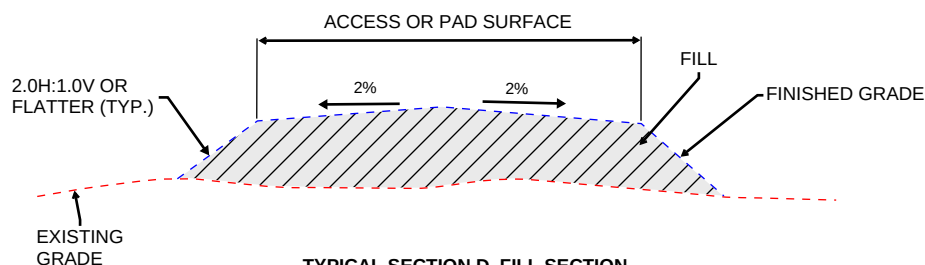
**TYPICAL SECTION A. EXISTING GRADE < 5% CROSS SLOPE**



**TYPICAL SECTION B. EXISTING GRADE = 5% - 60% CROSS SLOPE**



**TYPICAL SECTION C. CUT SECTION**



**TYPICAL SECTION D. FILL SECTION**



## Description

Where an actively flowing watercourse must be crossed regularly by construction vehicles, a temporary crossing should be provided. Three primary methods are available:

- Culvert crossing
- Stream ford
- Temporary bridge

Culvert crossings and fords are the most commonly used methods. Due to the expense associated with a temporary bridge, these are used primarily on long-term projects.



**Photograph TSC-1.** A temporary stream crossing using culverts.  
Photo courtesy of Tom Gore.

## Appropriate Uses

Construction vehicles shall be kept out of waterways to the maximum extent practicable. Use a temporary stream crossing when it is absolutely necessary to cross a stream on a construction site. Construct a temporary crossing even if the stream or drainageway is typically dry. Multiple stream crossings should be avoided to minimize environmental impacts.

A permit is required for placement of fill in a waterway under Section 404 of the Clean Water Act. The local office of the U.S. Army Corps of Engineers (USACE) should be contacted concerning the requirements for obtaining a 404 permit. In addition, a permit from the U.S. Fish and Wildlife Service (USFWS) may be needed if endangered species are of concern in the work area. Typically, the USFWS issues are addressed by a 404 permit, if one is required. The municipality of jurisdiction should also be consulted, and can provide assistance. Other permits to be obtained may include a floodplain development permit from the local jurisdiction.

## Design and Installation

Design details are provided for these types of stream crossings:

TSC-1. Culvert Crossing

TSC-2. Ford Crossing

TSC-3. Flume Crossing

| Temporary Stream Crossing |     |
|---------------------------|-----|
| Functions                 |     |
| Erosion Control           | Yes |
| Sediment Control          | Yes |
| Site/Material Management  | No  |



A culvert crossing should be sized appropriately with consideration for the duration of construction and seasonal variation of flows. The sizing methodology provided in the Temporary Diversion Methods Fact Sheet is also appropriate for determining the design flow for temporary stream crossings. Culvert sizing must account for the headwater and tailwater controls to properly size the culvert. For additional discussion on design of box culverts and pipes, see the *Major Drainage* chapter in Volume 1. The designer also needs to confirm that the riprap selected is appropriate for the conditions in the channel being crossed.

When a ford must be used, namely when a culvert is not practical or the best solution, the ford should be lined with at least a 12-inch thick layer of Type VL ( $D_{50} = 6$  inches) or Type L ( $D_{50} = 9$  inches) riprap with void spaces filled with 1-1/2 inch diameter rock. Ford crossings are recommended primarily for crossings of ephemeral (i.e. intermittently, briefly flowing) streams.

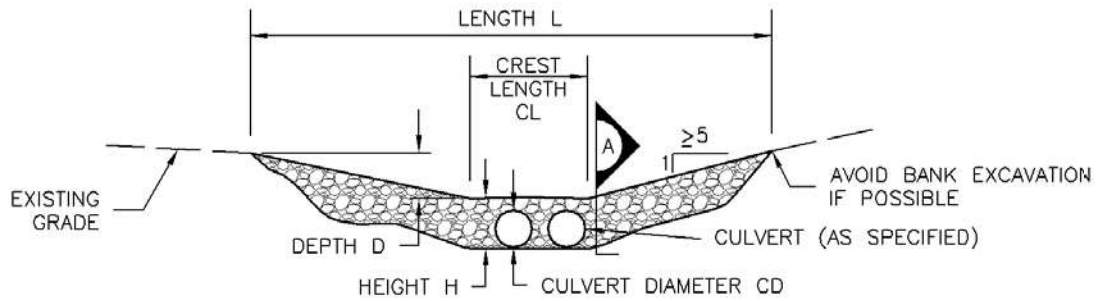
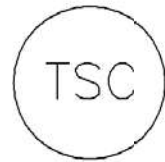
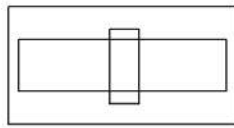
For a temporary bridge crossing, consult with a structural and/or geotechnical engineer for temporary bridge design or consider pre-fabricated alternatives.

## **Maintenance and Removal**

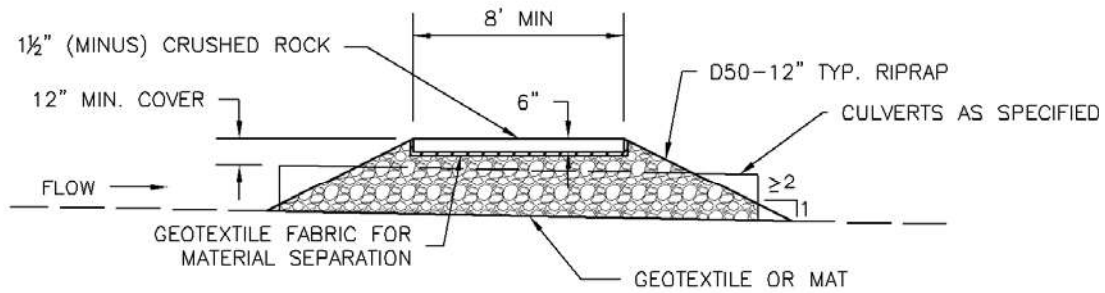
Inspect stream for bank erosion and in-stream degradation. If bank erosion is occurring, stabilize banks using erosion control practices such as erosion control blankets. If in-stream degradation is occurring, armor the culvert outlet(s) with riprap to dissipate energy. If sediment is accumulating upstream of the crossing, remove excess sediment as needed to maintain the functionality of the crossing.

Remove the temporary crossing when it is no longer needed for construction. Take care to minimize the amount of sediment lost into the stream upon removal. Once the crossing has been removed, stabilize the stream banks with seed and erosion control blankets.





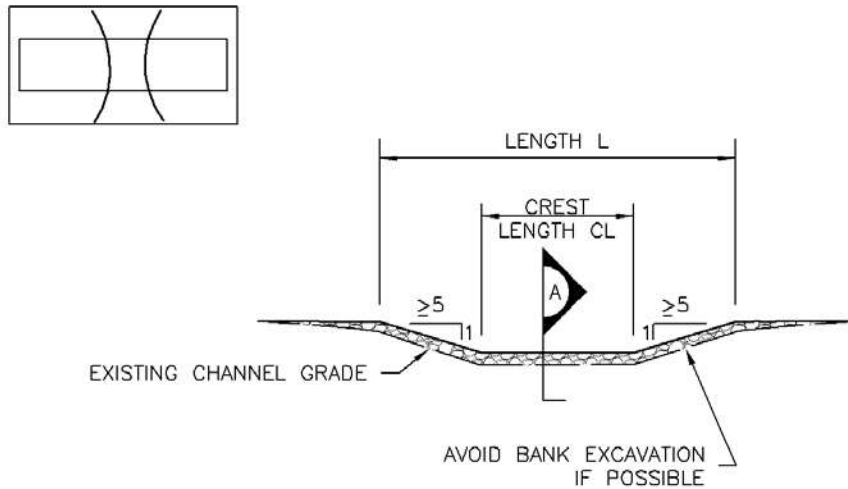
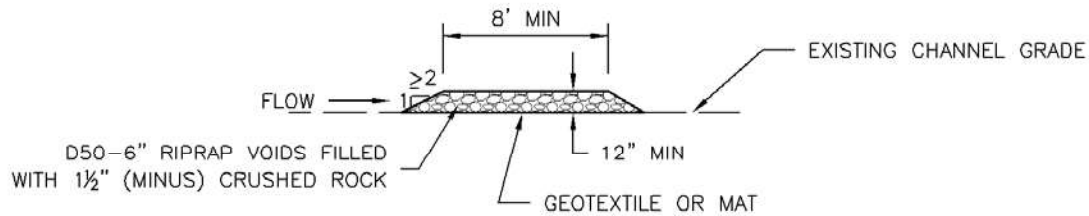
CULVERT CROSSING SECTION



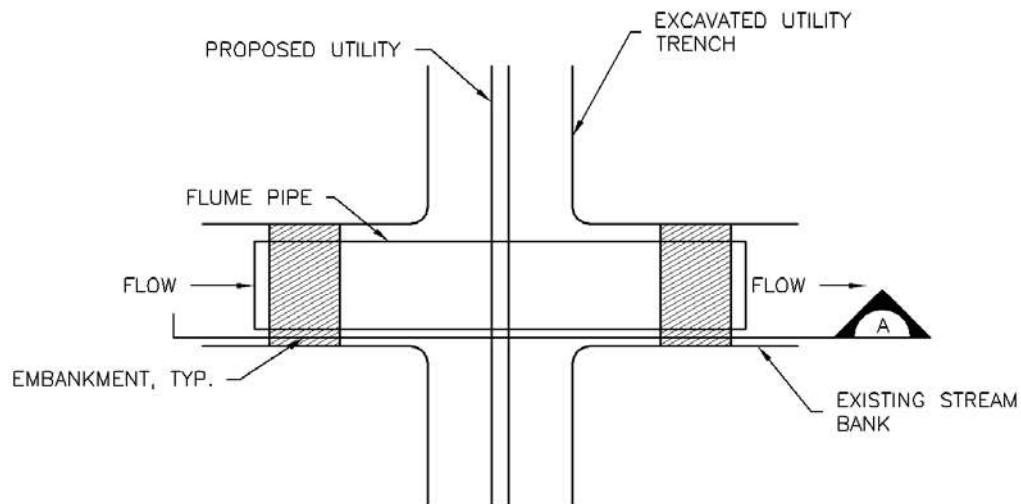
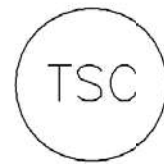
SECTION A

TSC-1. CULVERT CROSSING

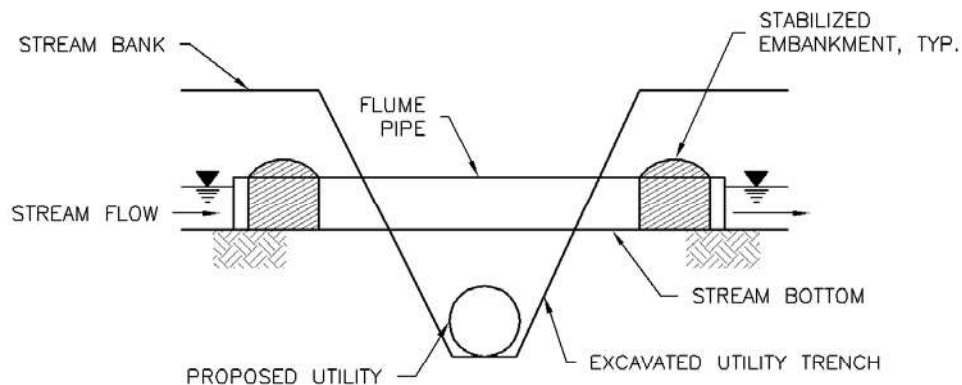


FORD CROSSING SECTIONSECTION ATSC-2. FORD CROSSING





FLUME CROSSING PLAN



SECTION A

## TSC-3. FLUME CROSSING



TEMPORARY STREAM CROSSING INSTALLATION NOTES

1. SEE PLAN VIEW FOR:
  - LOCATIONS OF TEMPORARY STREAM CROSSINGS.
  - STREAM CROSSING TYPE (FORD, CULVERT, OR FLUME).
  - FOR FORD CROSSING: LENGTH (L), CREST LENGTH (CL), AND DEPTH (D).
  - FOR CULVERT CROSSING: LENGTH (L), CREST LENGTH (CL), CROSSING HEIGHT (H), DEPTH (D), CULVERT DIAMETER (CD), AND NUMBER, TYPE AND CLASS OR GAUGE OF CULVERTS.
2. TEMPORARY STREAM CROSSING DIMENSIONS, D50, AND NUMBER OF CULVERTS INDICATED (FOR CULVERT CROSSING) SHALL BE CONSIDERED MINIMUM DIMENSIONS; ENGINEER MAY ELECT TO INSTALL LARGER FACILITIES. ANY DAMAGE TO STREAM CROSSING OR EXISTING STREAM CHANNEL DURING BASEFLOW OR FLOOD EVENTS SHALL BE PROMPTLY REPAIRED.
3. SEE MAJOR DRAINAGE CHAPTER FOR RIPRAP GRADATIONS.
4. WHERE FAILURE OF A STREAM CROSSING CAN RESULT IN SIGNIFICANT DAMAGE OR HARM IT MUST BE DESIGNED BY A STRUCTURAL ENGINEER.

TEMPORARY STREAM CROSSING MAINTENANCE NOTES

1. INSPECT BMPs EACH WORKDAY, AND MAINTAIN THEM IN EFFECTIVE OPERATING CONDITION. MAINTENANCE OF BMPs SHOULD BE PROACTIVE, NOT REACTIVE. INSPECT BMPs AS SOON AS POSSIBLE (AND ALWAYS WITHIN 24 HOURS) FOLLOWING A STORM THAT CAUSES SURFACE EROSION, AND PERFORM NECESSARY MAINTENANCE.
2. FREQUENT OBSERVATIONS AND MAINTENANCE ARE NECESSARY TO MAINTAIN BMPs IN EFFECTIVE OPERATING CONDITION. INSPECTIONS AND CORRECTIVE MEASURES SHOULD BE DOCUMENTED THOROUGHLY.
3. WHERE BMPs HAVE FAILED, REPAIR OR REPLACEMENT SHOULD BE INITIATED UPON DISCOVERY OF THE FAILURE.
4. REMOVE SEDIMENT ACCUMULATED UPSTREAM OF CROSSING AS NEEDED TO MAINTAIN THE FUNCTIONALITY OF THE CROSSING.
5. STREAM CROSSINGS ARE TO REMAIN IN PLACE UNTIL NO LONGER NEEDED AND SHALL BE REMOVED PRIOR TO THE END OF CONSTRUCTION.
6. WHEN STREAM CROSSINGS ARE REMOVED, THE DISTURBED AREA SHALL BE COVERED WITH TOPSOIL, SEEDED AND MULCHED AND COVERED WITH GEOTEXTILE OR OTHERWISE STABILIZED IN A MANNER APPROVED BY THE LOCAL JURISDICTION.

NOTE: MANY JURISDICTIONS HAVE BMP DETAILS THAT VARY FROM UDFCD STANDARD DETAILS. CONSULT WITH LOCAL JURISDICTIONS AS TO WHICH DETAIL SHOULD BE USED WHEN DIFFERENCES ARE NOTED.

(DETAIL ADAPTED FROM DOUGLAS COUNTY, COLORADO AND CITY OF AURORA, COLORADO (Vg. DSWC), NOT AVAILABLE IN AUTOCAD)



## **AGGREGATE DRAINAGE CROSSING**

### **DESCRIPTION**

A TEMPORARY ACCESS CONTROL MEASURE (CM) TO CREATE A STABILIZED SURFACE ACCROSS A DRAINAGE SWALE. AGGREGATE SWALE CROSSING FLOW LINE TO MATCH UP-GRADIENT AND DOWN-GRADIENT SWALE ELEVATIONS AND NOT IMPEDE ROADSIDE SWALE FLOW.

### **DESIGN AND INSTALLATION**

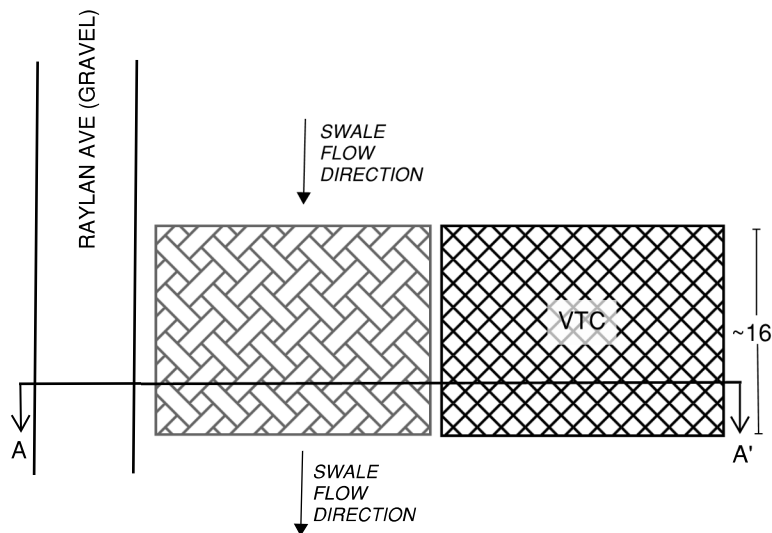
1. STRIP 9" OF TOPSOIL /SUBGRADE FROM SWALE AND STOCKPILE WITH DOWNGRADIENT CMs. SEGREGATE TOPSOIL FROM SUBGRADE.
2. INSTALL SEPARATION FABRIC ON EXPOSED SUBGRADE (BELOW AGGREGATE)..
3. INSTALL 9" THICK ROCK AGGREGATE (D50 = 6") IN A FIXED POSITION TO MATCH EXISTING SWALE GRADE.

### **MAINTENANCE:**

GENERALLY, AGGREGATE DRAINAGE CROSSING IS SELF-MAINTAINED. IF EXCESS SEDIMENT BUILDS UP, REMOVE FROM AGGREGATE AND DISPOSE OF PROPERLY.

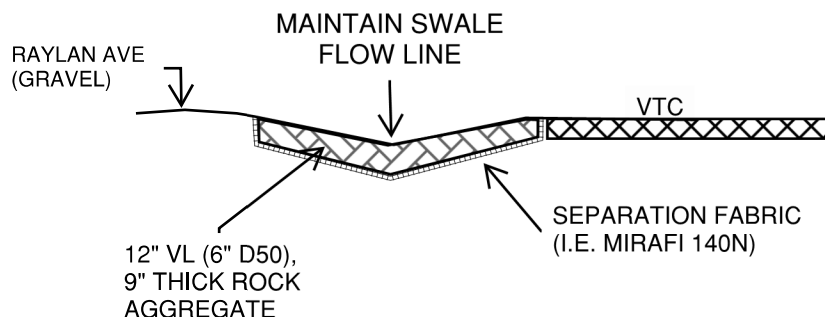
### **POST CONSTRUCTION:**

REMOVE AGGREGATE AND FABRIC FROM SWALE AND RESTORE SWALE TO PRE-EXISTING GRADE BY BACKFILLING WITH 4" OF STOCKPILED TOPSOIL FROM INTIAL EXCAVATION OF CROSSING.



### **PLAN VIEW**

NOT TO SCALE



### **CROSS SECTION A-A'**

NOT TO SCALE