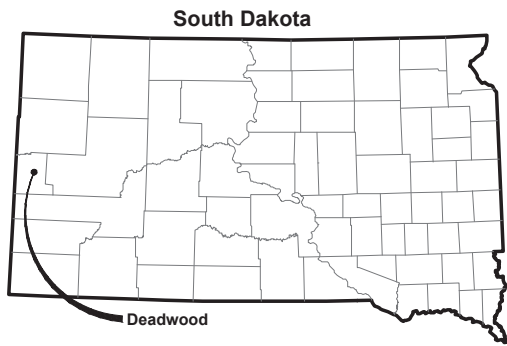


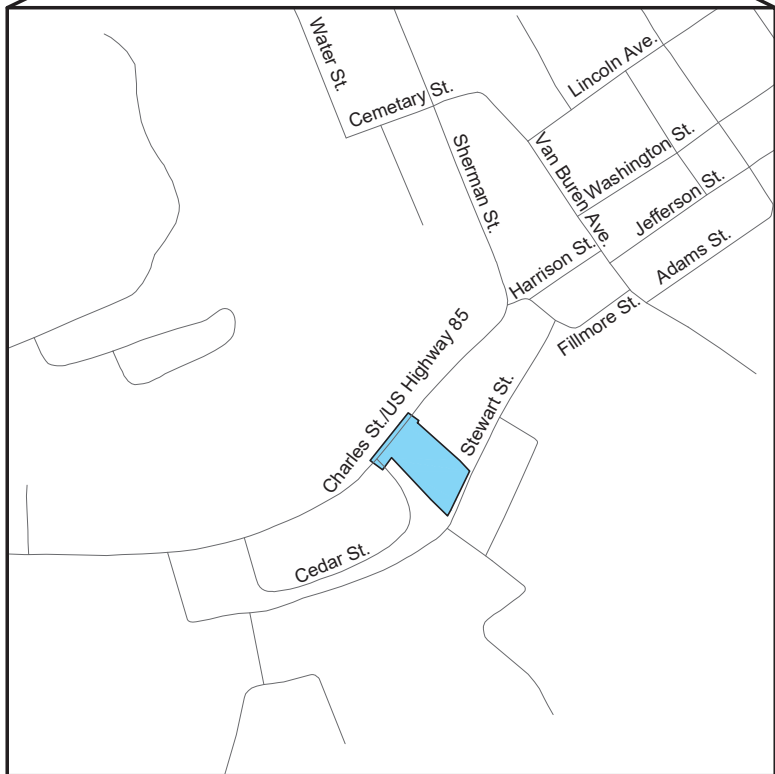
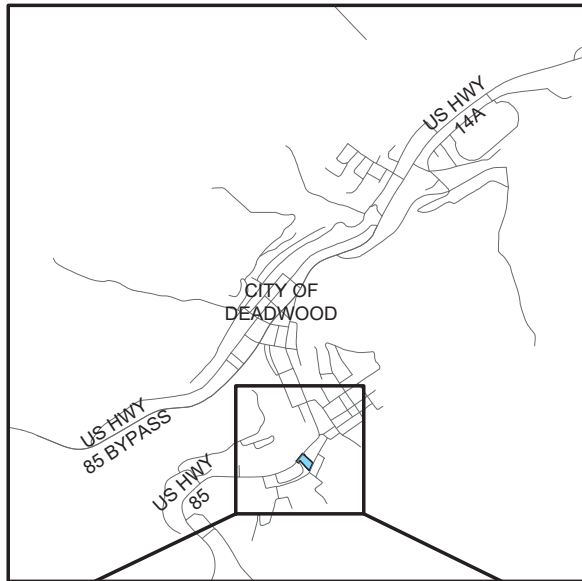


# Relocation of Historic Resources from Lower Main Street to Charles Street

## City of Deadwood

Lawrence County

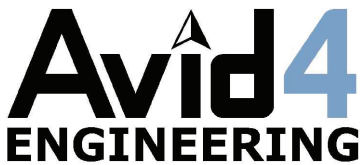
City of Deadwood, South Dakota



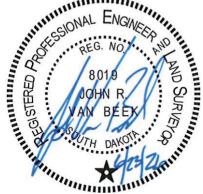
**Project Location Map** Not To Scale



Prepared By:



1805 Samco Road, Rapid City, SD 57702 · Phone: (605) 343-3311 · [www.Avid4eng.com](http://www.Avid4eng.com)



- Civil Engineering
- Water Resources
- Transportation
- Geospatial Solutions

### Index of Sheets

|       |                                |
|-------|--------------------------------|
| 1     | Title Sheet                    |
| 2-3   | General Notes                  |
| 4     | Traffic Control Notes          |
| 5     | Existing Conditions & Removals |
| 6     | Site Layout                    |
| 7     | Sanitary Sewer Profiles        |
| 8-12  | Rapid City Standard Details    |
| 13-17 | SDDOT Standard Plates          |



FULL SIZE PLOT 11X17 COLOR

P:\25-149\AUTOCAD\PLANSHEETS\25-149NOTES.DWG 6/23/2026

GROOVING FOR COLD APPLIED PAVEMENT MARKING

The Contractor will establish a positive means for the removal of the grinding and/or grooving residue. Residue from dry grooving will be vacuumed. Solid residue will be removed from the pavement surfaces before being blown by traffic action or wind. The Contractor will conduct this work to control and minimize airborne dust and similar debris that may become a hazard to motor vehicle operation or nuisance to property owners. Residue from wet grooving will not be permitted to flow across lanes being used by public traffic or into gutter or drainage facilities. Residue, whether in solid or slurry form, will be disposed of in a manner that will prevent it from reaching any waterway in a concentrated state. The cleaning of the residue for grooving will be to the satisfaction of the Engineer and may require more than one pass to adequately remove material.

INSTALLATION OF TEMPORARY EROSION CONTROL MEASURES

The Contractor shall not begin the removal of surfacing or topsoil within the applicable work area until all applicable temporary erosion control measures are placed. Temporary erosion control measures shall be installed as necessary as construction progresses.

APPROVED PRODUCTS

The Contractor shall use products available on the SDDOT approved products list.

INLET PROTECTION DEVICE (IPD)

Inlet protection devices shall be installed to temporarily prevent sediment-laden runoff from entering storm sewers and/or inlet protection devices shall be installed promptly after construction of inlets or paving is complete (typically within 48 hours). The type of inlet protection device to be used (sediment control wattles, silt fence, proprietary inlet protection devices, etc.) is differentiated on the drawings and shall be constructed at locations shown on the drawings. Refer to SDDOT Standard Plate 734.11 for details. Proprietary inlet protection devices shall be installed in accordance with manufacturer specifications.

During the course of construction heavy rainfall events may occur. The Contractor shall have personnel available during rain events to remove inlet protection if the inlet protection is causing flooding.

Inlet protection devices shall be removed from storm sewer inlets within paved street sections or parking lots during the winter months between December 1 and February 15. During the period when inlet protection has been removed, alternate sediment control methods for inlet protection must be employed if ground is not stabilized and frozen by winter conditions.

The Contractor shall remove sediment trapped by the inlet protection device when the surface of the sediment reaches one-half the height of the device. proprietary inlet protection devices should be maintained per the manufacturers recommendations.

Inlet protection devices shall be removed and properly disposed of when the drainage area for the inlet has reached final stabilization.

VEHICLE TRACKING CONTROL (VTC)

A location for the vehicle tracking control is not shown on these plans. The vehicle tracking pad shall be placed per Rapid City Standard Detail 18-10 in a location such that mud tracking and sediment flow will not enter the roadway or adjacent drainage areas. The vehicle tracking control shall be routinely inspected and the contractor shall repair or replace material as deemed necessary by the Engineer.

Granular material shall be placed in 6 inch maximum lifts.

Aggregate for granular material shall conform to the following gradation requirements:

| Sieve Size | Percent Passing |
|------------|-----------------|
| 3"         | 100%            |
| 2 ½"       | 90-100%         |
| 1 ½"       | 25-60%          |
| ¾"         | 0-10%           |
| ½"         | 0-5%            |

CONCRETE WASHOUT AREA (CWA)

Concrete washout area shall be provided for concrete trucks as necessary. Refer to City of Rapid City Detail 18-12 for details.

STREET SWEEPING

Vehicle tracking of sediment from the construction site shall be minimized. Street sweeping, as deemed necessary by the Engineer, shall be used if erosion and sediment control best management practices are not adequate to prevent sediment from being tracked onto the street.

The Contractor shall use a pickup broom having integral self-contained storage to clean the roadway.

SEDIMENT FILTER BAGS

Sediment filter bags can be used for perimeter control, inlet protection, check dams, etc. and shall be installed at locations as shown on the drawings and at locations determined by the Engineer during construction.

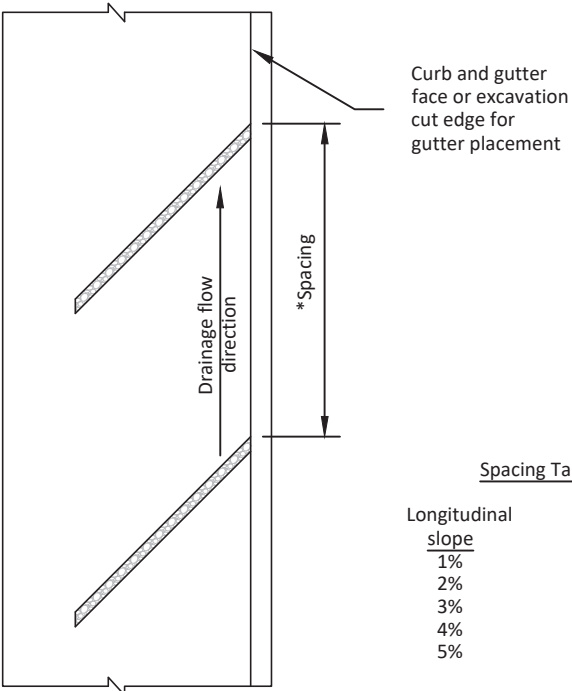
The sediment filter bags shall be the diameter and length shown on the drawings. The “sock” shall be the snake bag from the manufacturer listed below; or approved equal:

| Manufacturer                                       | Product Name |
|----------------------------------------------------|--------------|
| Sacramento Bag Manufacturing CO.                   | snake bag    |
| sacramento, ca                                     |              |
| PHONE: 1-800-287-2247                              |              |
| <a href="http://www.sacbag.com">www.sacbag.com</a> |              |

The fill material shall be clean 3/4 inch rock, clean 3/8 inch lime stone chips, clean 1/4 inch pea gravel, clean sand or material approved by Engineer.

The Contractor shall remove sediment trapped by the sediment filter bags when the surface of the sediment reaches one-half the height of the exposed gravel filter sock.

Sediment filter bags may be removed and reset as necessary as work progresses. The gravel filter socks removed and reset shall be in useable condition as determined by Owner representative.



- Notes:
- Sediment filter bags shall be filled with clean or washed aggregate 2" minus or smaller.
  - Sediment filter bags shall be 9" in diameter and shall be the "snake bag" from Sacramento Bag Manufacturing Company or approved equal.

SFB Gutter Check, Sediment Filter Bag NTS

Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH



| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

General Notes

Sheet No.  
3

FULL SIZE PLOT 11X17 COLOR

6/23/2026 P:\25-149\AUTOCAD\PLANSHEETS\25-149TRF\_LAYOUT.DWG

Traffic Control Plan

This conceptual traffic control plan is provided to illustrate the layout for lane closures in Highway 85. The lane closure shall only be setup for the duration necessary to complete the work in the roadway. Traffic control for shoulder closures shall be setup per the SDDOT Standard Plate 634.03.

Traffic Control - General Notes

The Contractor is require to maintain traffic control in accordance with the Plans and the latest revision of the Manual of Uniform Traffic Control Devices (MUTCD).

Flaggers, properly attired and preceded by proper symbol signs, will be required to safely maintain traffic and pedestrian movements to complete the work in Highway 85.

Two way traffic in Highway 85 shall be maintained when no work is taking place and a flagger is present. Temporary gravel shall be used to provide a smooth driving surface over working areas. All trenches in or adjacent to the road way shall be properly backfilled and compacted to provide a stabile driving surfacing. This may require multiple traffic control setups to complete this work.

The Contractor is required to have a person available 24 hours a day, 7 days a week to maintain traffic control devices. The name and telephone number of this person will be given to the Engineer prior to work commencing.

The Contractor or designated traffic control subcontractor shall make after dark inspecitons every one (1) week to ensure the adequacy, legibility, and reflectivity of each sign and device. A written summary of each inspection shall be given to the Engineer within 24 hours after completion of the inspection.

At no time during construction will a vertical drop-off of greater than 16-inches adjacent to the traveled way be left overnight. The Contractor may utilize embankment material or exisiting gravel cushion to ensure a 16-inch vertial drop-off is not exceeded. Vertical drop-offs greater than 16-inches will be shouldered to a 3:1 maximum slope.

Construction equipment and material will not be unloaded from lanes open to traffic. All equipment and vehicles entering and existing closed lanes of traffic shall display a flashing amber light visible from all directions a minimum distance of ¼ mile.

Parking of equipment during non-working hours shall be in locations that do not hinder the visibility of, or access to, adjacent properties.

Property owners adjacent to the construction sign locations shall be notified before the signs are installed. Construction signs that are to be installed shall not block the view of existing applicable traffic signs. Non-applicable signing will be covered or remove during periods of inactivity.

Public Information

The Contractor shall prepare a public service announcement (PSA) to be published not less than five (5) days prior to any phase change or any other major change that affects traffic flow. A copy of the PSA shall be given to the Engineer seven (7) days prior to the change. The Contractor shall be responsible to keep law enforcement, emergency services, and the traveling public notified of changes in project access.

The Contractor shall designate an employee whose responsibility is keeping the traveling public informed of the project progress and change in project access. The Contractor shall also designate an individual to be responsible for incident management. The same individual may serve both roles. An incident is an emergency road user occurrence or unplanned event that impedes the flow of traffic such as an accident, hazardous materials spill or similar event.

During the incident, the Contractor will be required to flag traffic, relocate signs and adjust traffic control devices as required to warn approaching motorists of the incident and resulting queued traffic.

The Contractor shall provide adequate personnel to accomplish the necessary traffic control work in the event of an incident.

Access

The Contractor shall maintain access to all adjacent properties at all times. The Contractor shall coordinate with property owners to ensure adequate access points and routes are communicated to the owners/occupants. The Contractor may need to explore opportunities to share access across adjacent properties to provide access on a temporary basis as work progresses.

Protection of Pedestrian Routes

Pedestrian routes within the project area shall be maintained by the Contractor during all phases of construction. Compacted gravel surfacing may be used to provide temporary detour routes.

Protection of pedestrian traffic from open excavations and other hazards in and around the construction site shall be in compliance with MUTCD, OSHA, and the Public Rights-of-Way Accessibility Guidelines.



Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH



| No. | Date | By | Revision | Description |
|-----|------|----|----------|-------------|
|     |      |    |          |             |
|     |      |    |          |             |
|     |      |    |          |             |
|     |      |    |          |             |

Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Traffic Control  
Layout

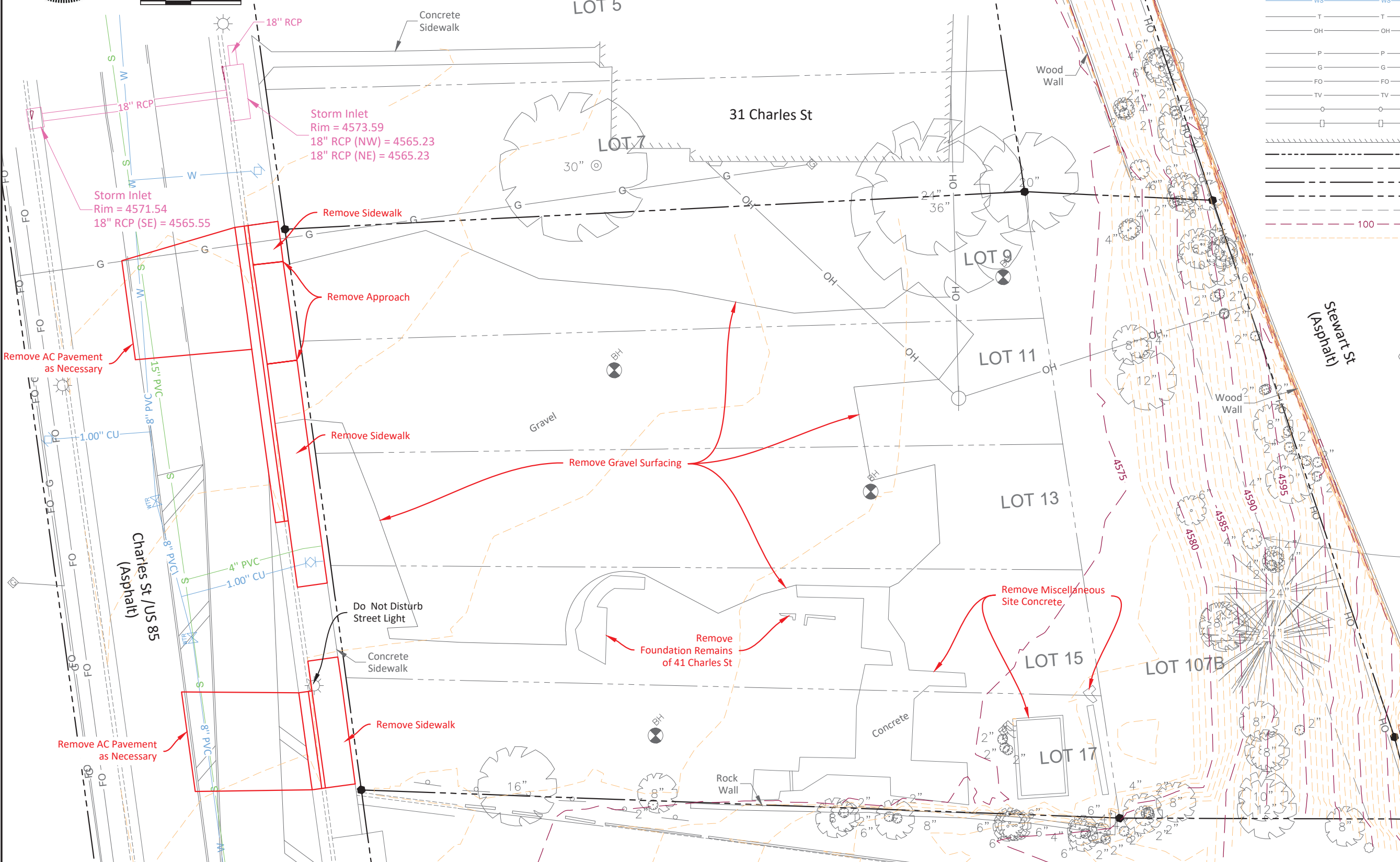
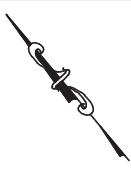
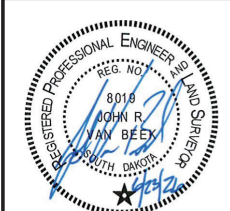
Sheet No.

4

FULL SIZE PLOT 11X17 COLOR

P:\25-149\AUTOCAD\PLANSHEETS\25-149EXCONDITIONS\_RMWL.DWG

6/23/2026



EXISTING LEGEND

- Existing Curb and Gutter
- Sanitary Sewer Line
- Water Line
- Water Service Line
- Telephone Line
- Overhead Lines (Power, Cable, Etc)
- Power Line
- Gas Line
- Fiberoptic Line
- Cable TV Line
- Chain Link Fence
- Wood Fence
- Building Line
- Property Line
- Section Line
- Quarter Line
- Sixteenth Line
- Easement Line
- Major Contour
- Minor Contour
- Borehole
- Cable TV or Telephone Riser
- Electrical Junction Box
- Fiber Optic Vault
- Black Hills Fiber
- Deciduous Tree
- Coniferous Tree
- Deciduous Hedge/Tree Line
- Coniferous Hedge/Tree Line
- Deciduous Bush
- Coniferous Bush
- Wetland Boundary
- Stump
- 2 Pole Sign
- 1 Pole Sign
- Post / Bollard
- Fire Hydrant
- Monitoring Well
- Curb Stop
- Irrigation Control Valve
- Gate Valve
- Water Manhole
- Storm Sewer Manhole
- Sanitary Sewer Manhole
- Clean Out
- Gas Meter
- Control Point
- Right-of-Way Marker
- Electrical Manhole
- Light Pole
- Guy Wire Anchor
- Power Pole
- Type "S" Inlet
- Type "B" Inlet
- Mailbox
- Delineator

FULL SIZE PLOT 11X17 COLOR

P:\25-149\AUTOCAD\PLANSHEETS\25-149SITE\_LAYOUT.DWG

6/23/2026

Grading Callouts

1. N = 218170.84  
E = 993938.29  
Elev = 4573.12

2. N = 218186.48  
E = 993949.98  
Elev = 4572.77

3. N = 218213.87  
E = 993970.50  
Elev = 4572.18  
TT

4. N = 218224.29  
E = 993978.29  
Elev = 4571.87  
BT

5. N = 218240.28  
E = 993990.30  
Elev = 4571.39  
BT

6. N = 218246.68  
E = 993995.10  
Elev = 4571.20  
TT

7. N = 218261.40  
E = 994006.06  
Elev = 4570.85

Surface Callout Acronyms

All grading callouts are to edge of pavement unless otherwise noted.

BT - Bottom of Taper  
TT - Top of Taper  
FF - Finished Floor\*

\*Finished Floor elevations are relatively 2' above the existing grade and may change with approval from the Engineer.

PROPOSED LEGEND

- Sanitary Sewer Cleanout
- Curb Stop
- Sanitary Sewer Service
- Water Service
- Proposed Property Line
- IPD Inlet Protection Device
- SFB Sediment Filter Bag

Striping

- Cold Applied Plastic Pavement Marking, 4" White
- Cold Applied Plastic Pavement Marking, 24" White
- High Build Waterborne Pavement Marking Paint, 4" Yellow
- Cold Applied Plastic Pavement Marking, 24" Yellow

Striping Note:

The Contractor shall verify the existing pavement marking spacing and length prior to removal and match the existing markings.

Surfacing

- 5" Asphalt Concrete Composite 6" Base Course
- 6" Reinforced PCC Pavement, on 4" Aggregate Base Course
- 4" Nonreinforced Sidewalk, on 2" Aggregate Base Course
- Buildings Moved By Owner
- Area to be Seeded, Sodded or Landscaped

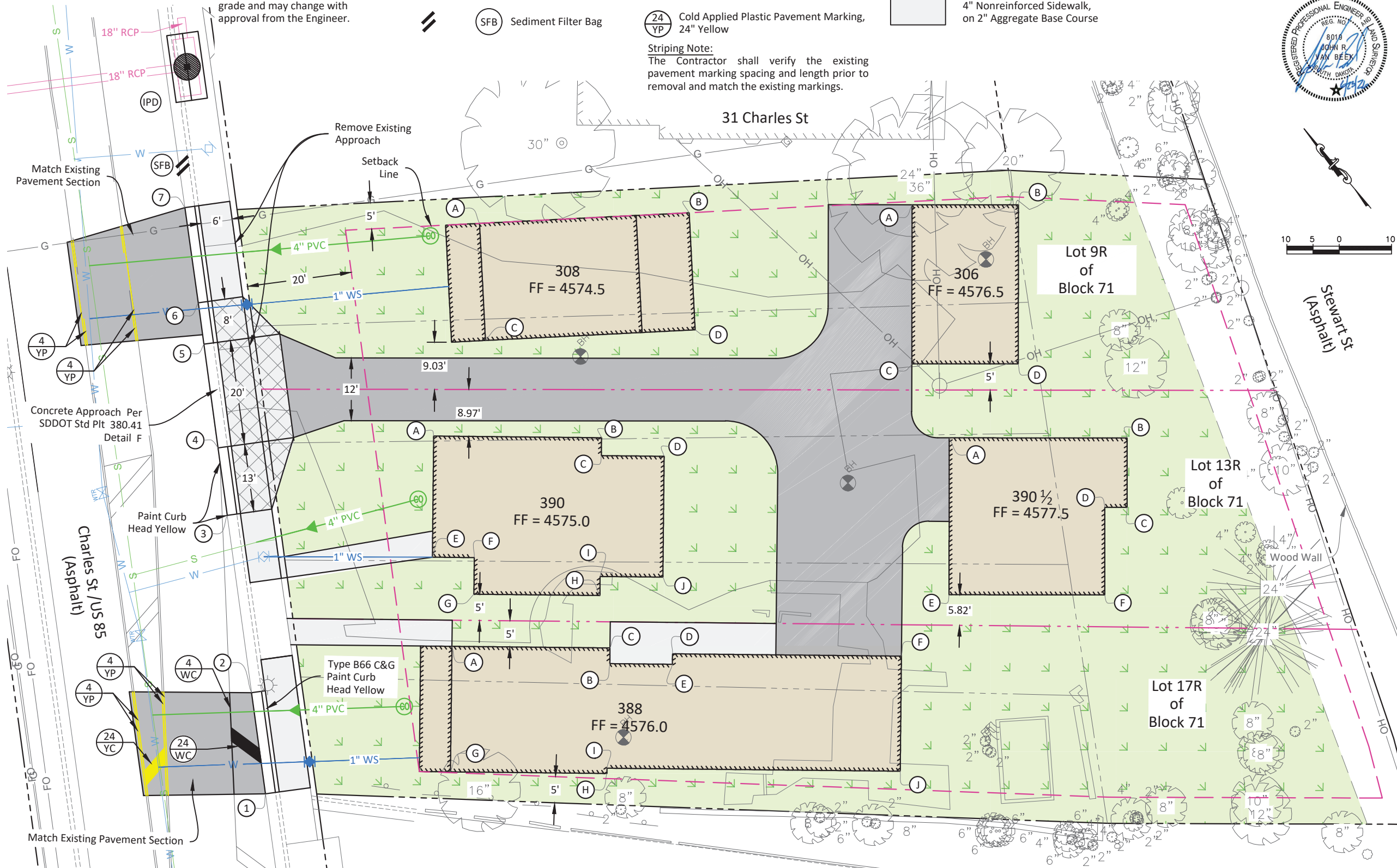
| Building Corner Locations |                                |
|---------------------------|--------------------------------|
|                           | 390                            |
| A.                        | N = 218196.94<br>E = 994009.21 |
| B.                        | N = 218174.16<br>E = 994031.81 |
| C.                        | N = 218171.75<br>E = 994029.38 |
| D.                        | N = 218163.24<br>E = 994037.83 |
| E.                        | N = 218180.62<br>E = 993992.77 |
| F.                        | N = 218174.94<br>E = 993998.41 |
| G.                        | N = 218170.01<br>E = 993993.44 |
| H.                        | N = 218152.92<br>E = 994010.40 |
| I.                        | N = 218155.48<br>E = 994012.99 |
| J.                        | N = 218146.97<br>E = 994021.44 |

| Building Corner Locations |                                |
|---------------------------|--------------------------------|
|                           | 388                            |
| A.                        | N = 218165.87<br>E = 993983.46 |
| B.                        | N = 218142.32<br>E = 994002.61 |
| C.                        | N = 218144.43<br>E = 994004.73 |
| D.                        | N = 218135.25<br>E = 994012.44 |
| E.                        | N = 218133.84<br>E = 994011.02 |
| F.                        | N = 218104.19<br>E = 994043.26 |
| G.                        | N = 218149.00<br>E = 993966.39 |
| H.                        | N = 218127.78<br>E = 993987.45 |
| I.                        | N = 218128.48<br>E = 993988.16 |
| J.                        | N = 218088.70<br>E = 994027.64 |

| Building Corner Locations |                                |
|---------------------------|--------------------------------|
|                           | 306                            |
| A.                        | N = 218164.16<br>E = 994105.32 |
| B.                        | N = 218149.86<br>E = 994119.78 |
| C.                        | N = 218142.56<br>E = 994083.94 |
| D.                        | N = 218128.25<br>E = 994098.39 |

| Building Corner Locations |                                |
|---------------------------|--------------------------------|
|                           | 390 1/2                        |
| A.                        | N = 218127.47<br>E = 994079.08 |
| B.                        | N = 218103.55<br>E = 994103.24 |
| C.                        | N = 218094.13<br>E = 994093.92 |
| D.                        | N = 218097.12<br>E = 994090.90 |
| E.                        | N = 218106.15<br>E = 994057.98 |
| F.                        | N = 218085.22<br>E = 994079.12 |

| Building Corner Locations |                                |
|---------------------------|--------------------------------|
|                           | 308                            |
| A.                        | N = 218219.69<br>E = 994044.01 |
| B.                        | N = 218192.99<br>E = 994073.95 |
| C.                        | N = 218202.98<br>E = 994029.10 |
| D.                        | N = 218176.27<br>E = 994059.04 |



Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH



| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

Optima, LLC

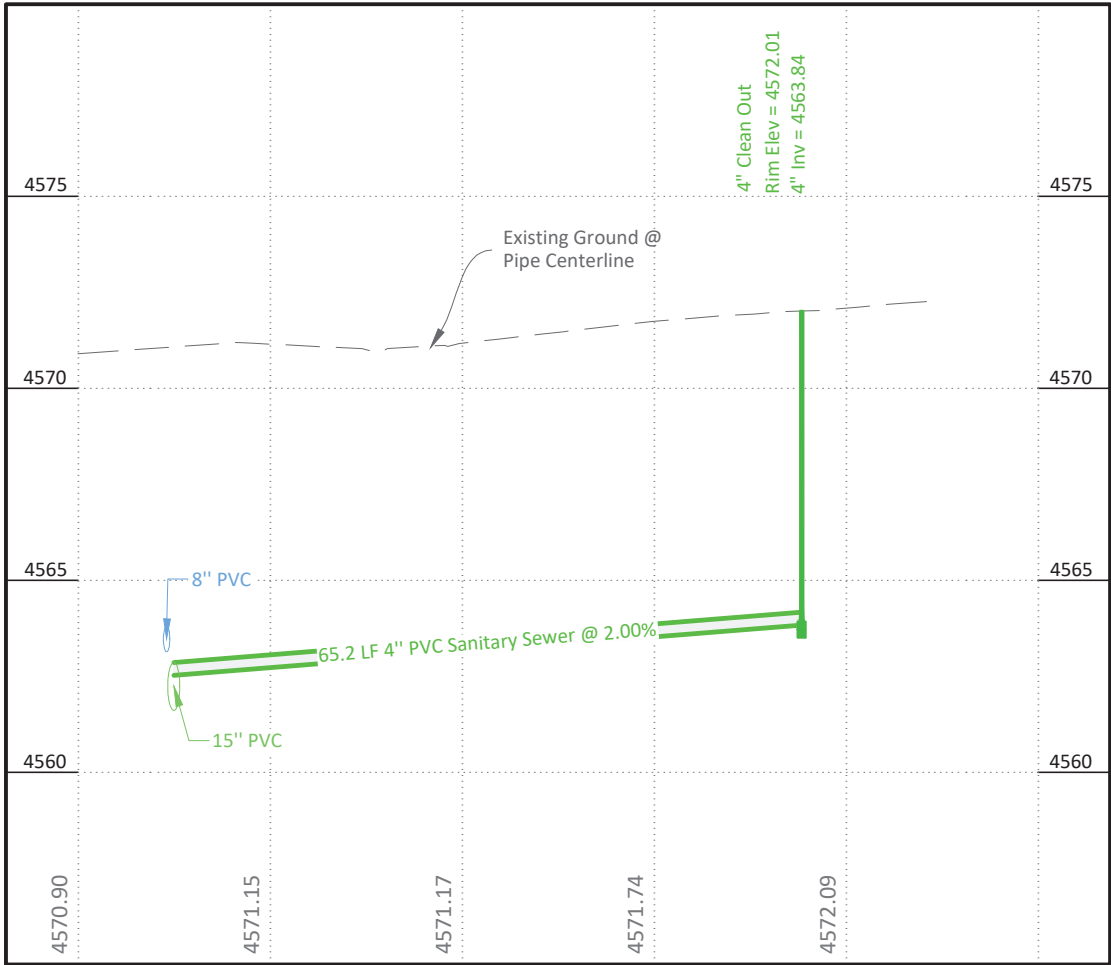
Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Site Layout

Sheet No.

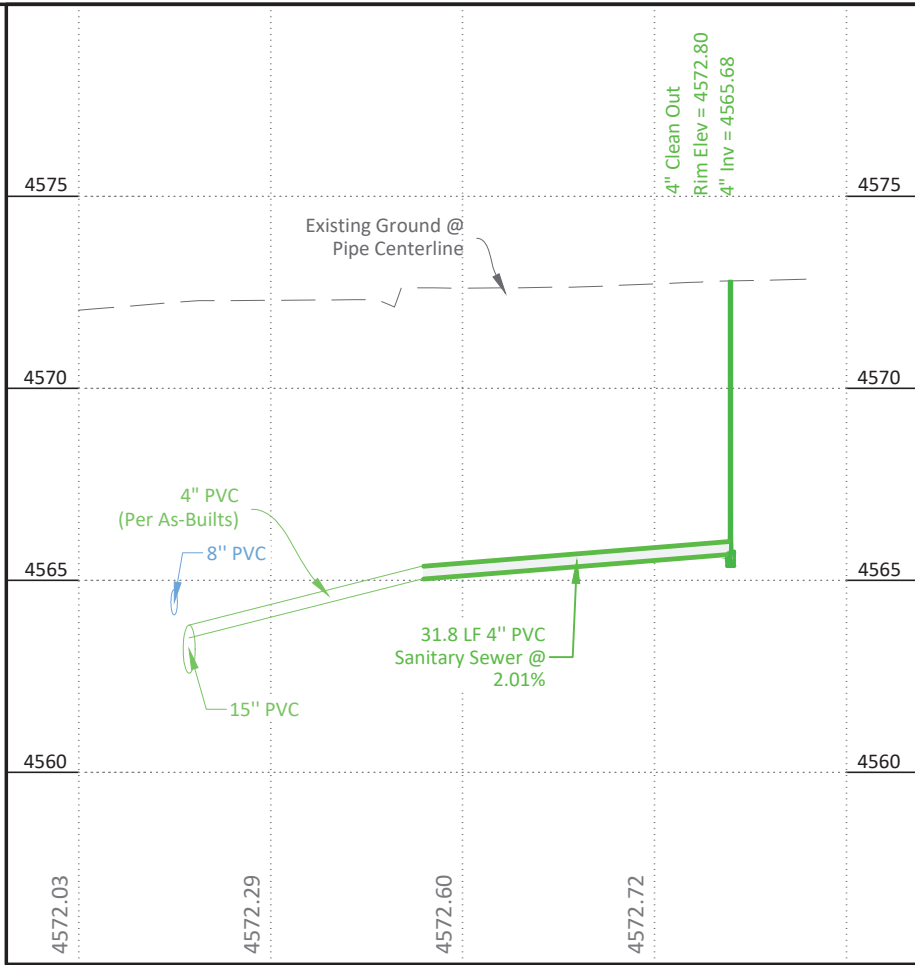
6

FULL SIZE PLOT 11X17 COLOR



Lot 9R Sanitary Service Profile

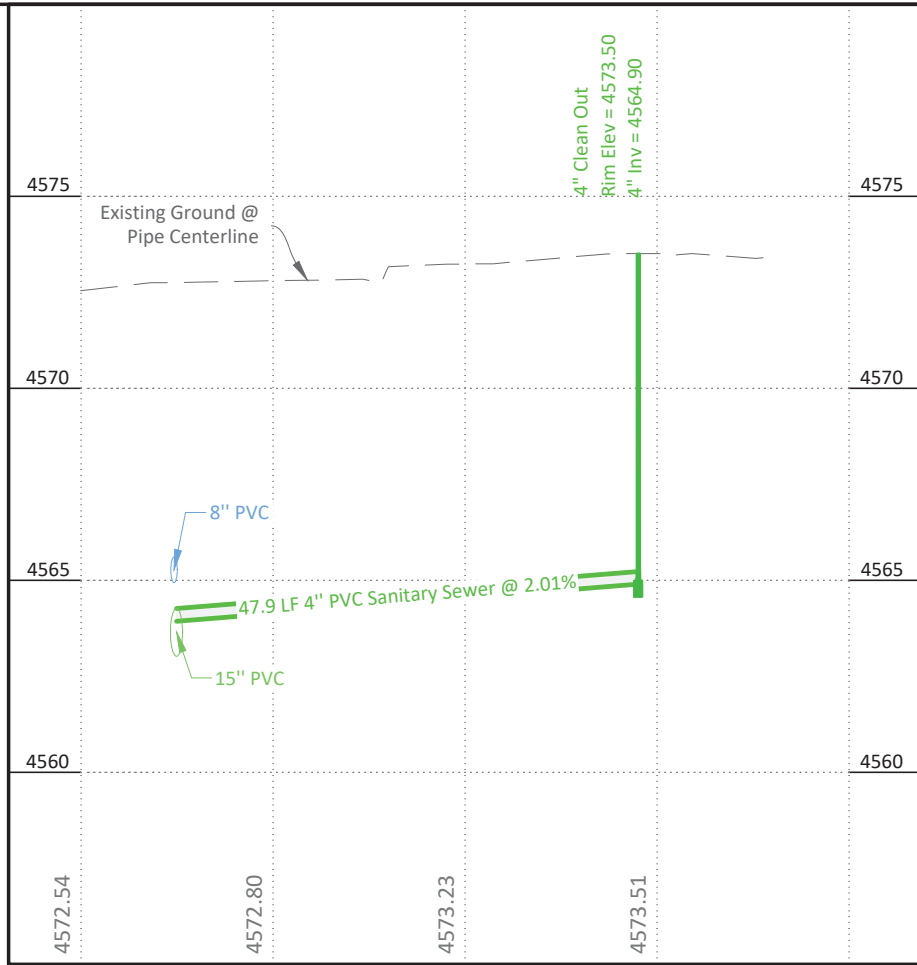
N.T.S. 1/7



Lot 13R Sanitary Service Profile

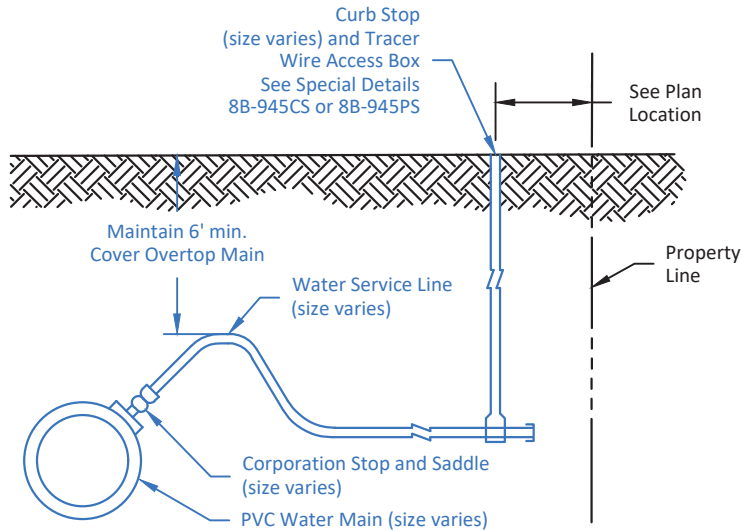
N.T.S. 2/7

Contractor shall verify the location and elevation of the existing 4" PVC service and notify the Engineer prior to construction of the service for Lot 13R.



Lot 17R Sanitary Service Profile

N.T.S. 3/7



Typical Water Service Detail

N.T.S. 4/7

Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH



| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

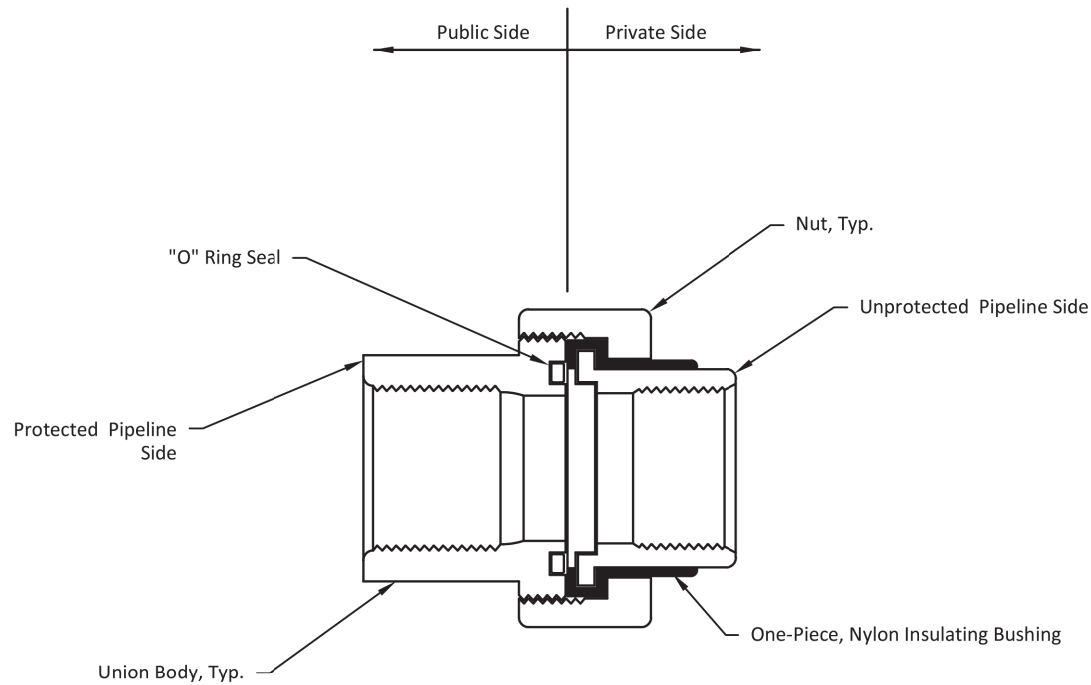
Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Sanitary Sewer Profiles

Sheet No.

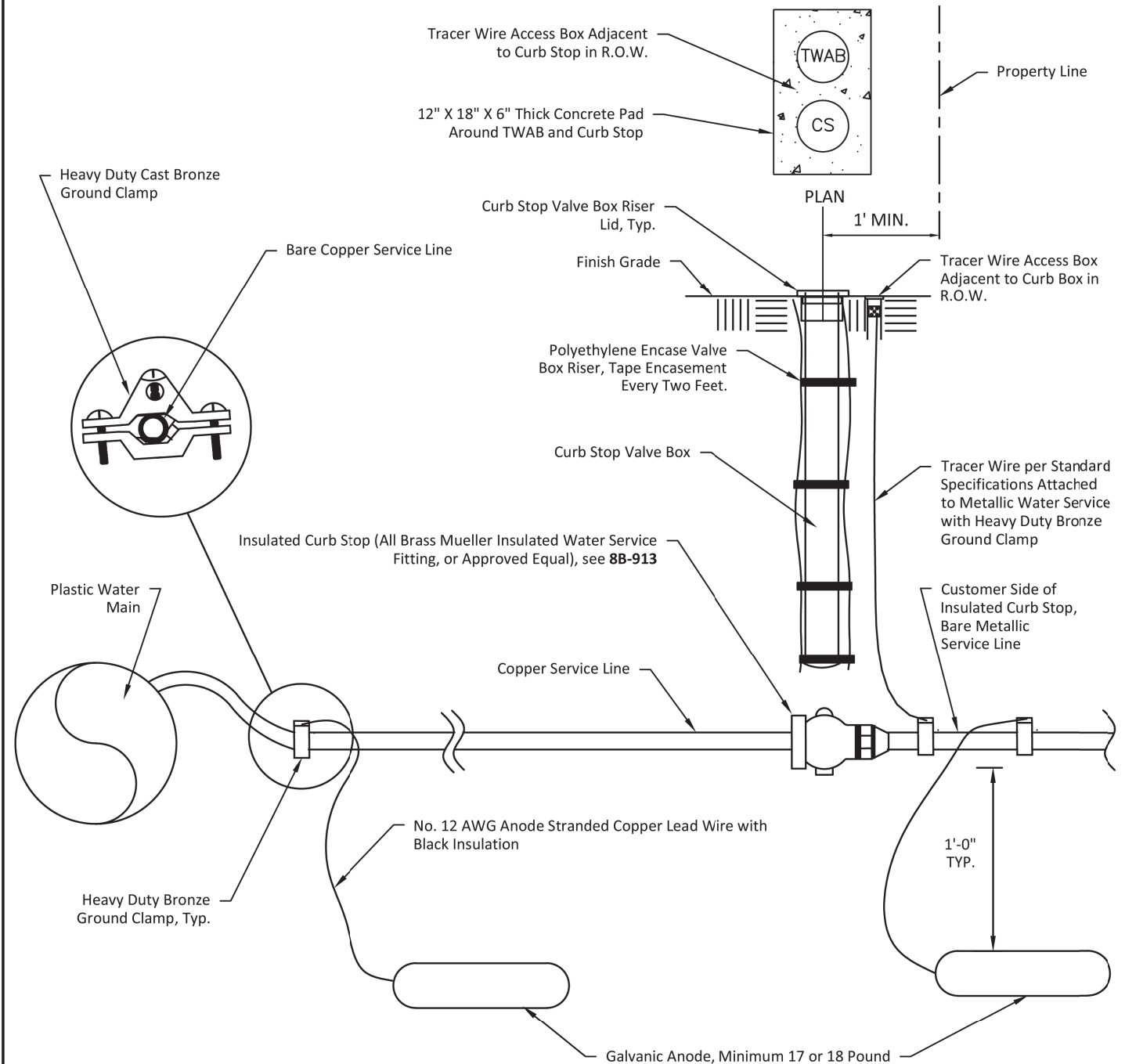
7



- Notes:**
1. "O" ring type insulating union shown. Other types (brass insulated curb ball valves, straight couplings, corporation ball valves, meter couplings, etc.) similar.
  2. Insulating O-ring and nylon insulator bushing shall be molded and bonded to the union body by manufacturer.
  3. Abovegrade iron pipe shall have galvanized or coated steel bodies. Unions in buried or corrosive areas shall be coated.
  4. Copper service line insulators shall have brass union body with insulators formed and molded into brass body, Mueller or approved equal.
  5. Stainless steel line insulators shall have stainless steel body with insulators formed and molded into stainless steel fitting body.

N.T.S.

|                                                       |  |                         |  |
|-------------------------------------------------------|--|-------------------------|--|
| CITY OF RAPID CITY                                    |  | PUBLIC WORKS DEPARTMENT |  |
| INSULATING UNIONS AND/OR<br>COPPER SERVICE INSULATORS |  | DATE: 8-19-22           |  |
|                                                       |  | Sec. - Sht.<br>8B-913   |  |



- Notes:**
1. Install galvanic anodes to copper service line on both sides of insulated curb stop with a minimum of one on water main side and one on customer side.
  2. Install insulated curb stop to existing copper service line at customer service connection as shown on the drawings and specified in section 8B.

N.T.S.

|                                                                      |  |                         |  |
|----------------------------------------------------------------------|--|-------------------------|--|
| CITY OF RAPID CITY                                                   |  | PUBLIC WORKS DEPARTMENT |  |
| INSULATOR AND WIRE CONNECTIONS<br>TO CUSTOMER METALLIC SERVICE LINES |  | DATE: 8-19-22           |  |
|                                                                      |  | Sec. - Sht.<br>8B-945CS |  |

Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH

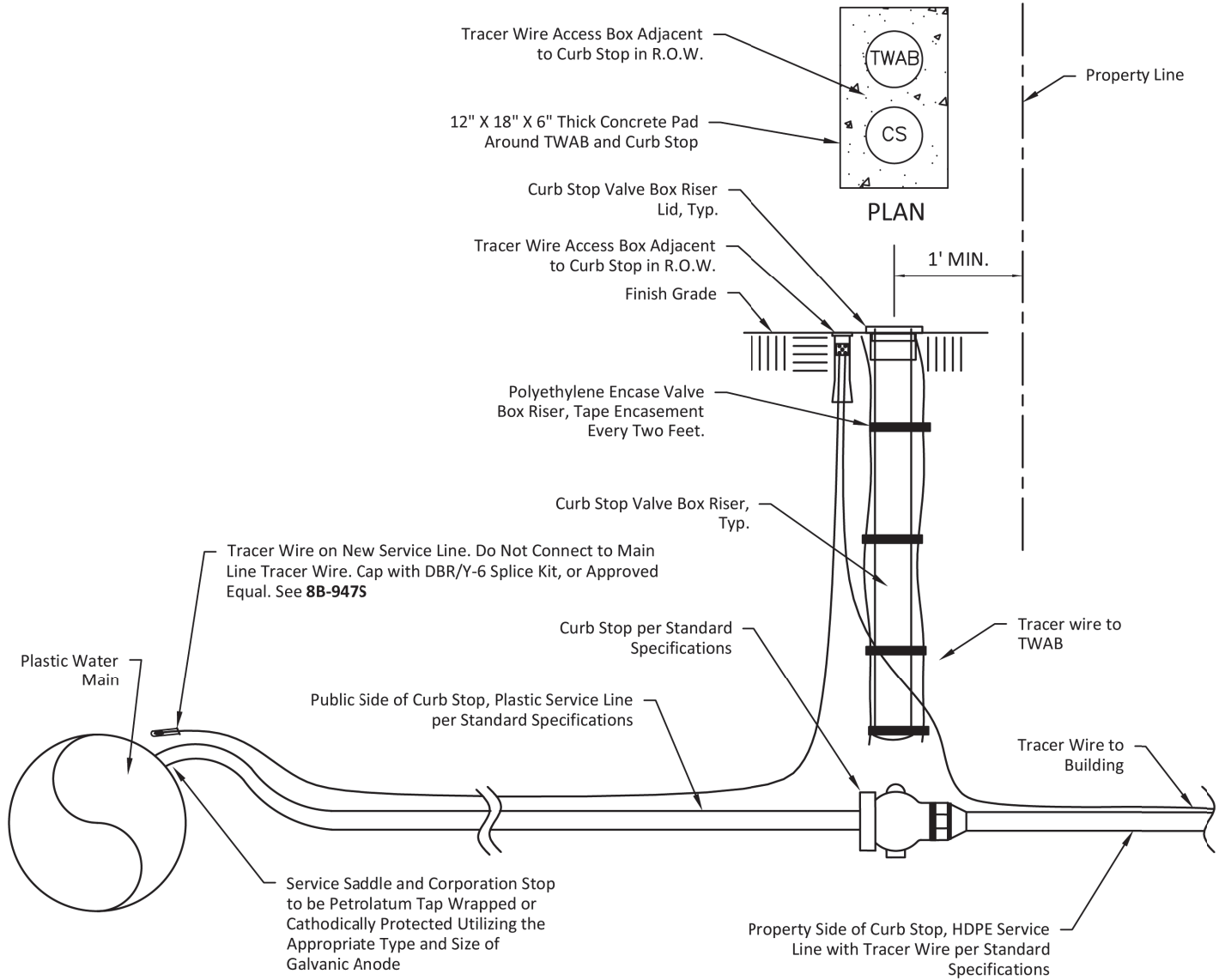


| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

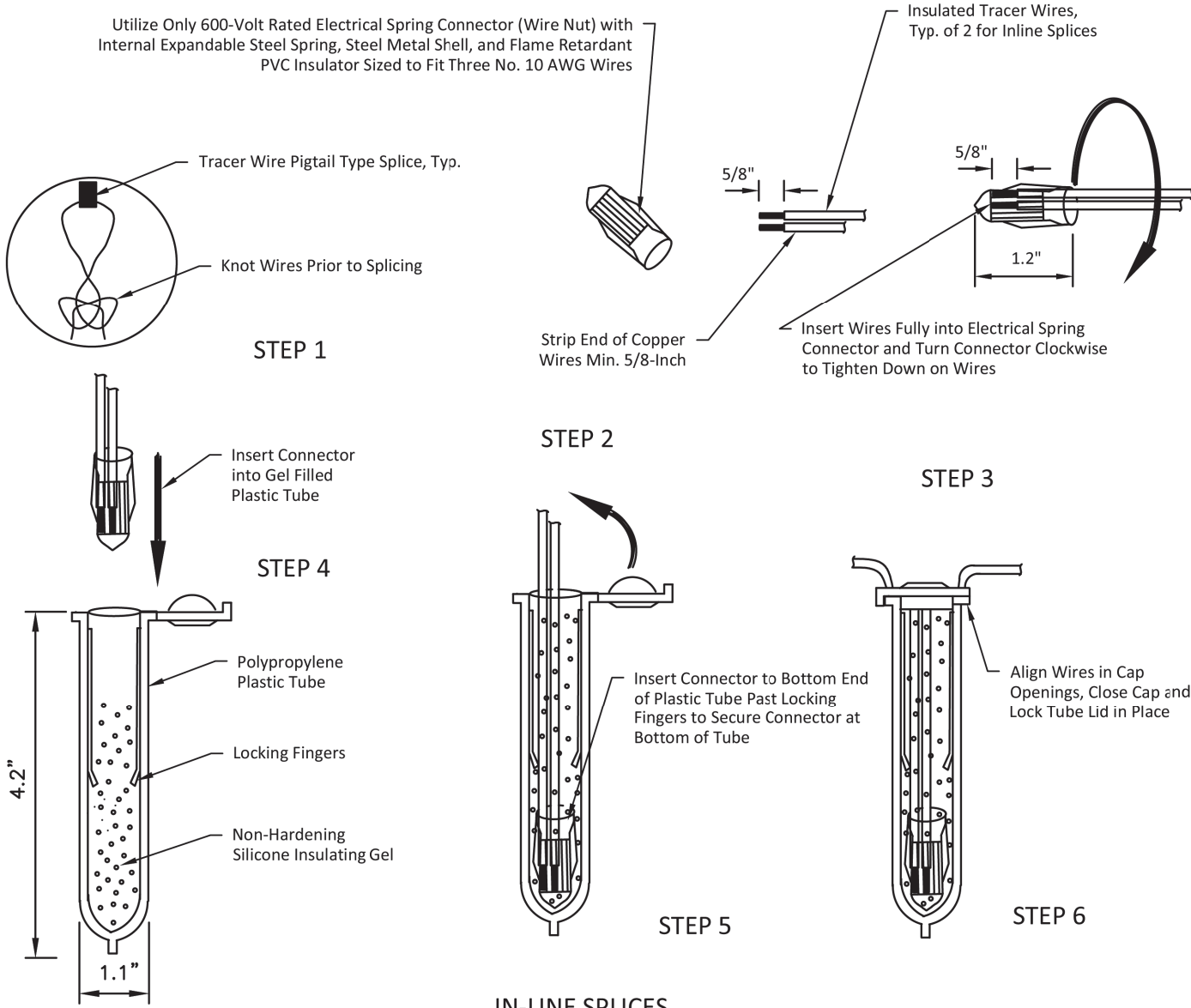
Rapid City  
Standard Details



- Notes:**
- 1. Install tracer wire access box in a protected location at row line adjacent to curb stop box so as to not interfere with operation of curb stop. Terminate tracer wire in access box with min. 18" slack.
  - 2. Terminate tracer wire with an insulated splice kit and securely fastened to the plastic service line with tape as near as possible to the building foundation.
  - 3. This tracer wire installation detail shall be used on plastic service lines for residential or commercial services.

N.T.S.

|                                               |  |                         |  |
|-----------------------------------------------|--|-------------------------|--|
| CITY OF RAPID CITY                            |  | PUBLIC WORKS DEPARTMENT |  |
| TRACER WIRE FOR CUSTOMER PLASTIC SERVICE LINE |  | DATE: 8-19-22           |  |
|                                               |  | Sec. - Sht. 8B-945PS    |  |



- Notes:**
- 1. Allowed for tracer wire type splices only. Tracer wire only required for non-metallic pipe type installations. Knot wires prior to making splice to minimize stress on splice.
  - 2. For copper wire splices only. Strip wires and make wire splice connection with electrical spring (wire nut) type connectors. Insert the connector into the gel filled tube to the end past the locking fingers to hold the connector securely in place, align wires and then shut and lock the insulator tube top lid cover into place. Complete splices and insulate in accordance with connector manufacturer's recommendations.
  - 3. Complete all splices only in the presence of the engineer.
  - 4. In-line splice locations shall be documented by the contractor in the red-line, as-constructed plans by station/offset or survey coordinates consistent with project horizontal datum. Location provided shall be within 0.5 feet of true location.

N.T.S.

|                     |  |                         |  |
|---------------------|--|-------------------------|--|
| CITY OF RAPID CITY  |  | PUBLIC WORKS DEPARTMENT |  |
| TRACER WIRE SPLICES |  | DATE: 8-19-22           |  |
|                     |  | Sec. - Sht. 8B-947S     |  |

Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH

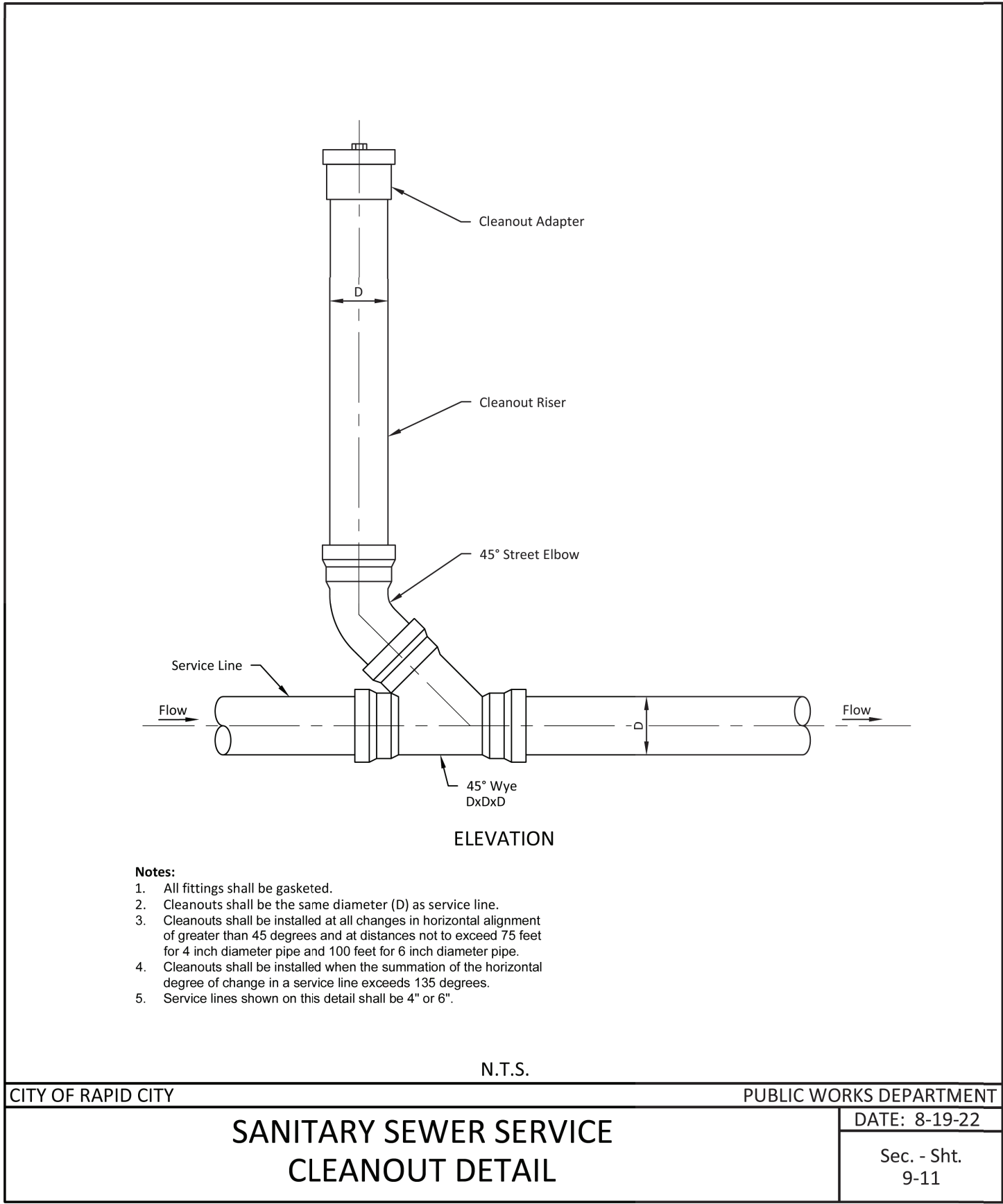
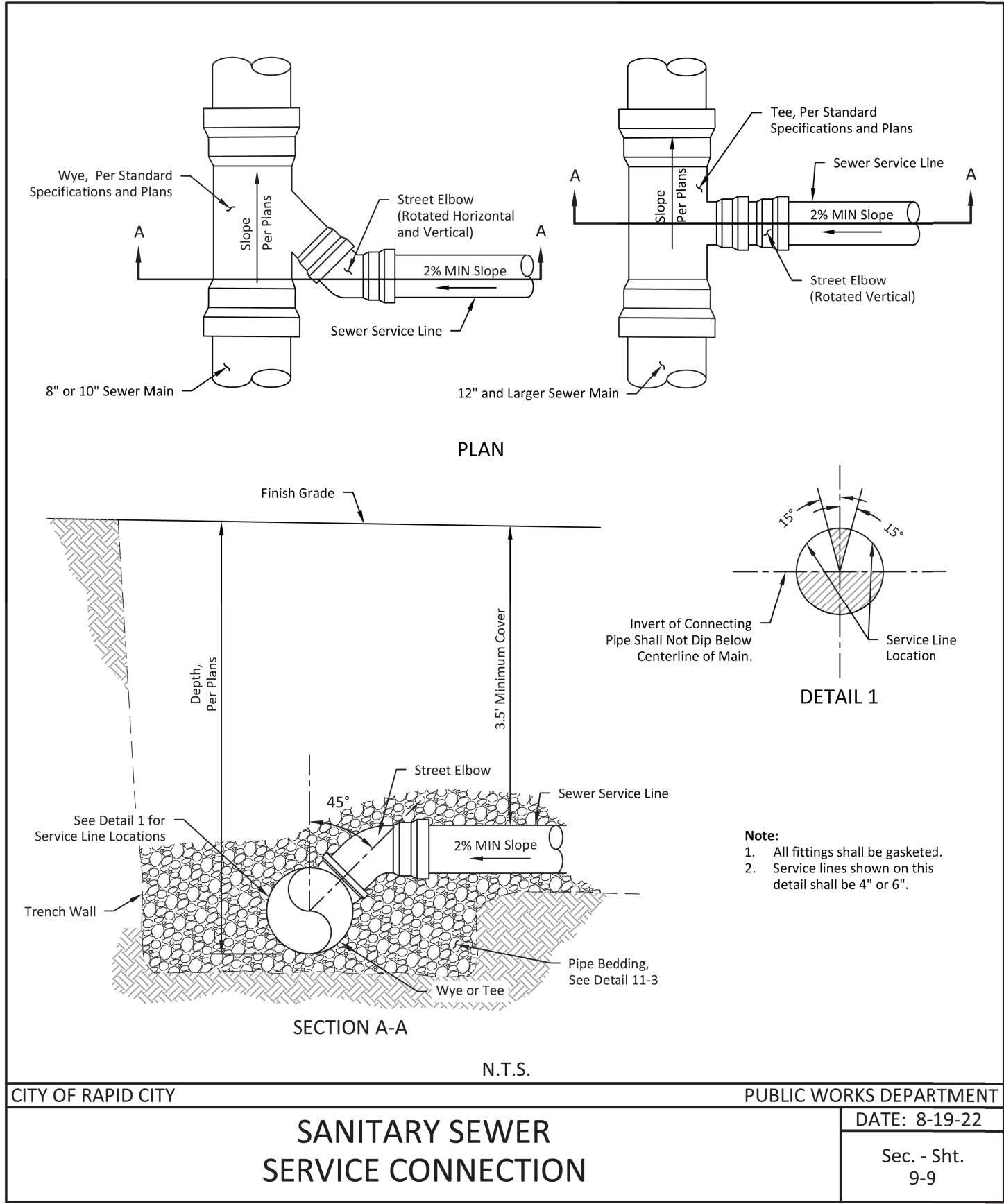


| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

Optima, LLC

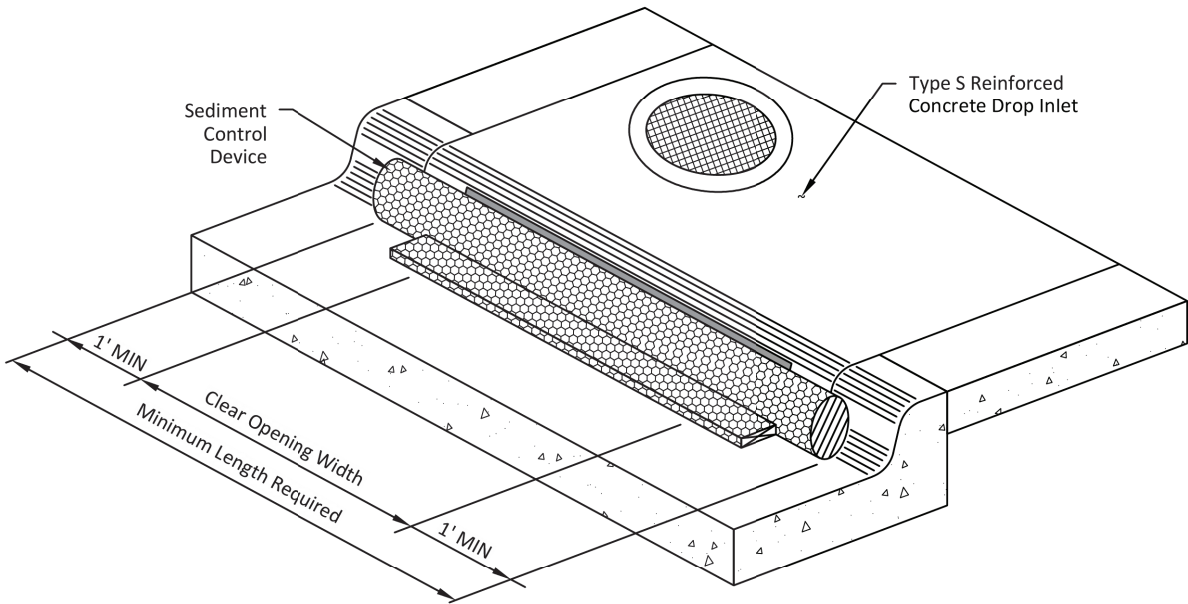
Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Rapid City  
Standard Details





Inlet Protection Device



ISOMETRIC VIEW

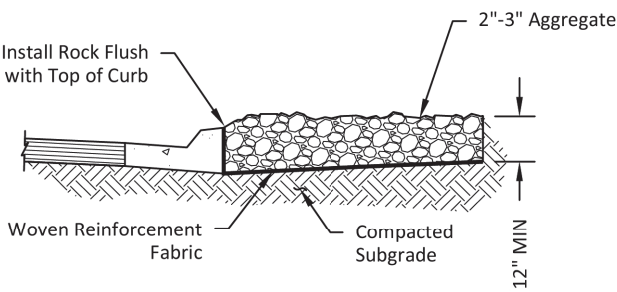
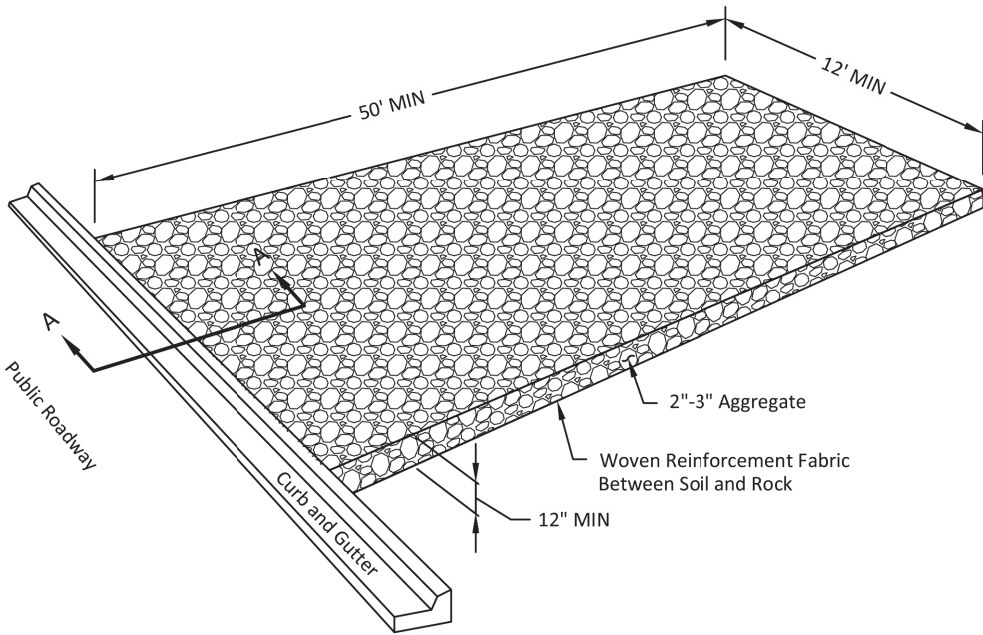
- Notes:**
- 1. The type of sediment control device shown is for illustrative purposes only.
  - 2. The type of sediment control device used shall be one of the types as specified in the plans.
  - 3. The sediment control device shall be placed at the drop inlets according to the manufactures' installation instructions.
  - 4. The sediment control device shall be secured so that it remains in the inlet opening.
  - 5. The sediment control at inlet for Type S reinforced concrete drop inlet shall be placed at locations stated in the plans or at locations determined by the Engineer.
  - 6. The Contractor will maintain the sediment control device by removing the device, removing accumulated sediment, and resetting the device. The removed sediment will be placed at a location away from the drop inlet where the sediment will not be washed back into the drop inlet or other storm sewer system.

N.T.S.

|                                    |                         |
|------------------------------------|-------------------------|
| CITY OF RAPID CITY                 | PUBLIC WORKS DEPARTMENT |
| SEDIMENT CONTROL FOR TYPE S INLETS |                         |
| DATE: 8-19-22                      |                         |
| Sec. - Sht. 18-7                   |                         |



Vehicle Tracking Control



SECTION A-A

- Notes:**
- 1. All rock to be removed upon completion of construction.
  - 2. Sediment control measures shall be maintained at all times.
  - 3. Public roadway to be kept clean and free of mud, dirt and debris at all times.
  - 4. Woven reinforcement fabric shall comply with Section 18, per Standard Specifications.
  - 5. 2'-3" Aggregate shall be per Standard Specifications, Section 18.

N.T.S.

|                            |                         |
|----------------------------|-------------------------|
| CITY OF RAPID CITY         | PUBLIC WORKS DEPARTMENT |
| ROCK CONSTRUCTION ENTRANCE |                         |
| DATE: 8-19-22              |                         |
| Sec. - Sht. 18-10          |                         |

Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH

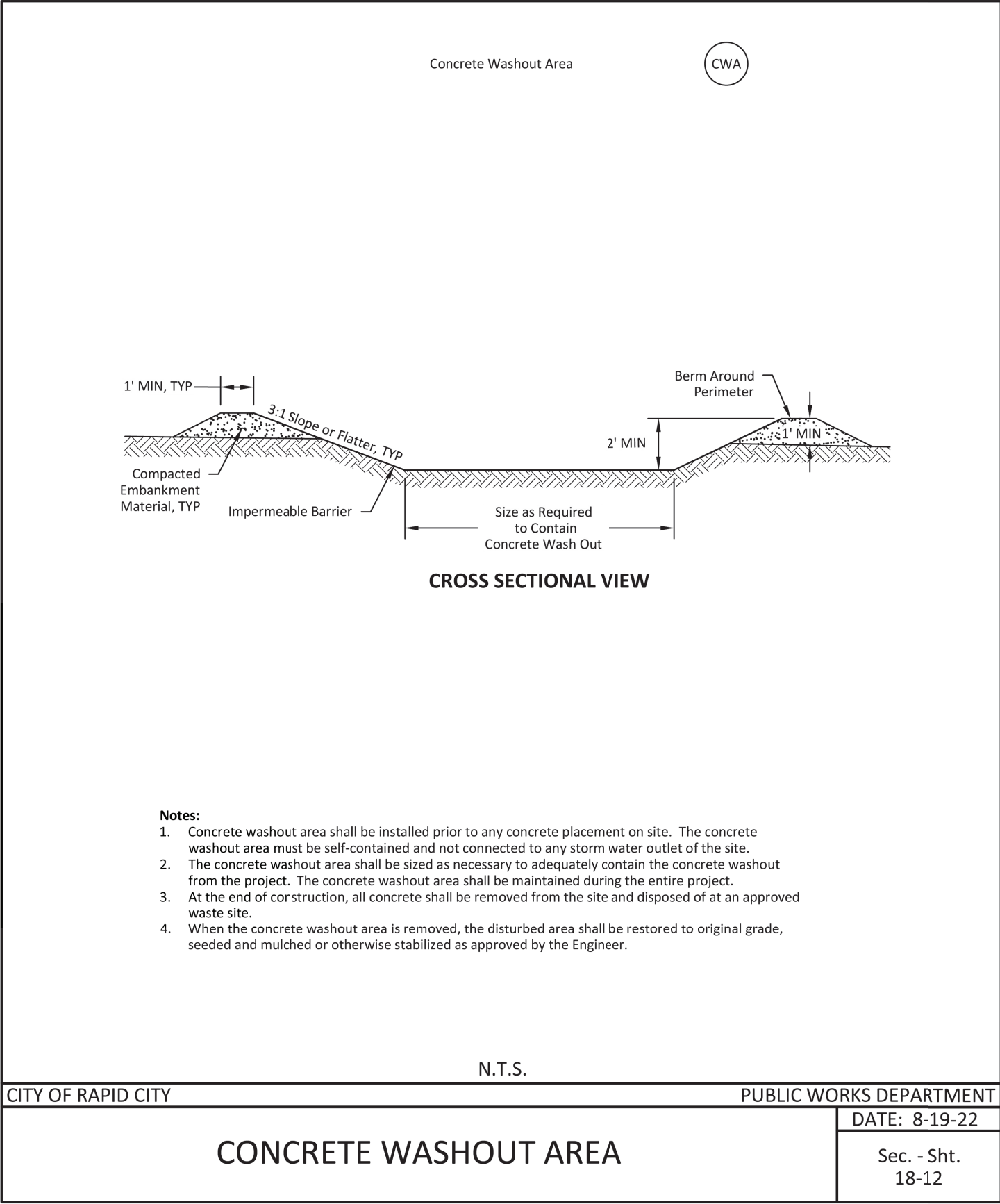


| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Rapid City  
Standard Details



Consulting Firm:  
Consultant Project No: J25-149  
Designed By: JRV  
Drawn By: IMM, BDH



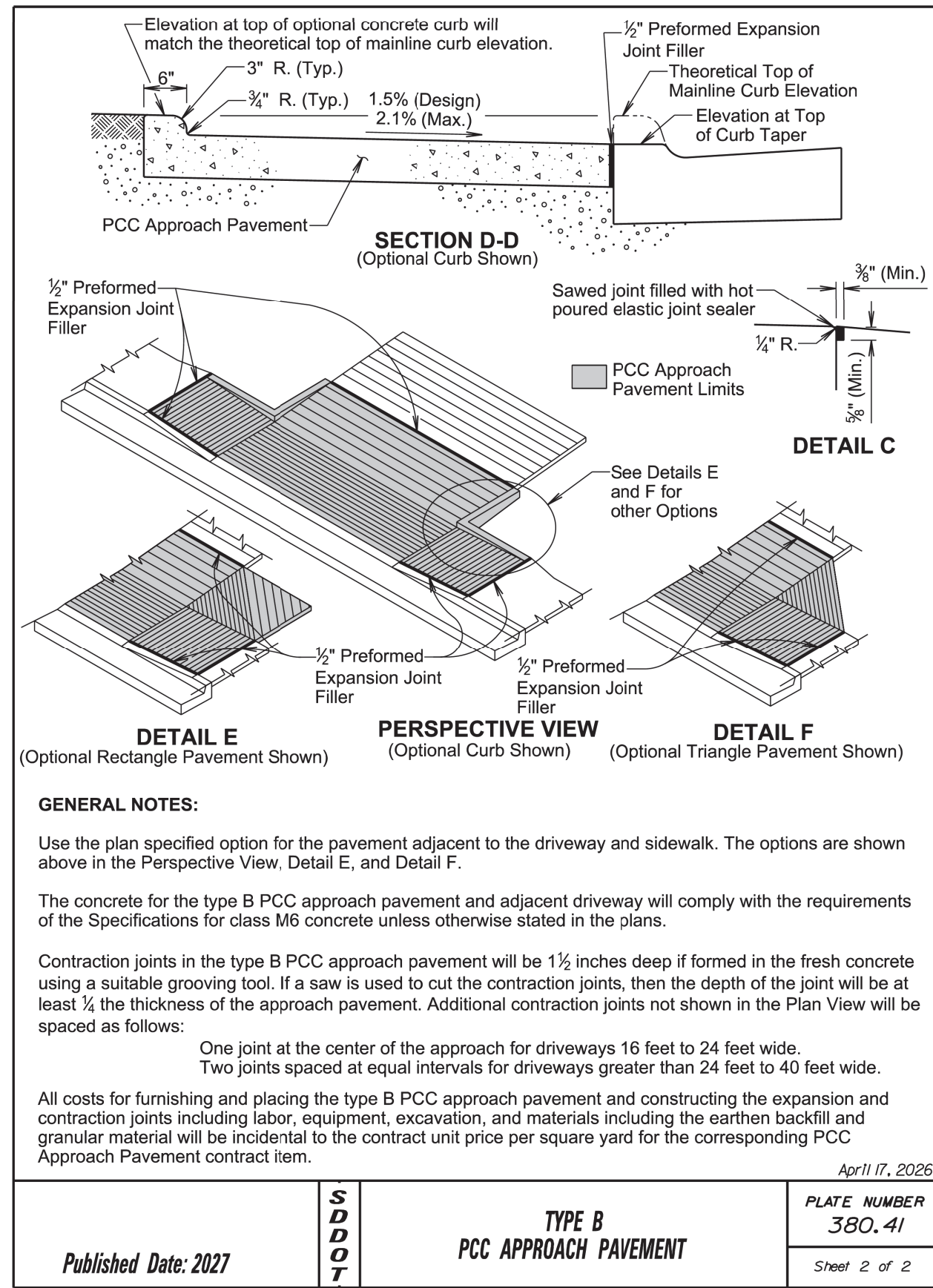
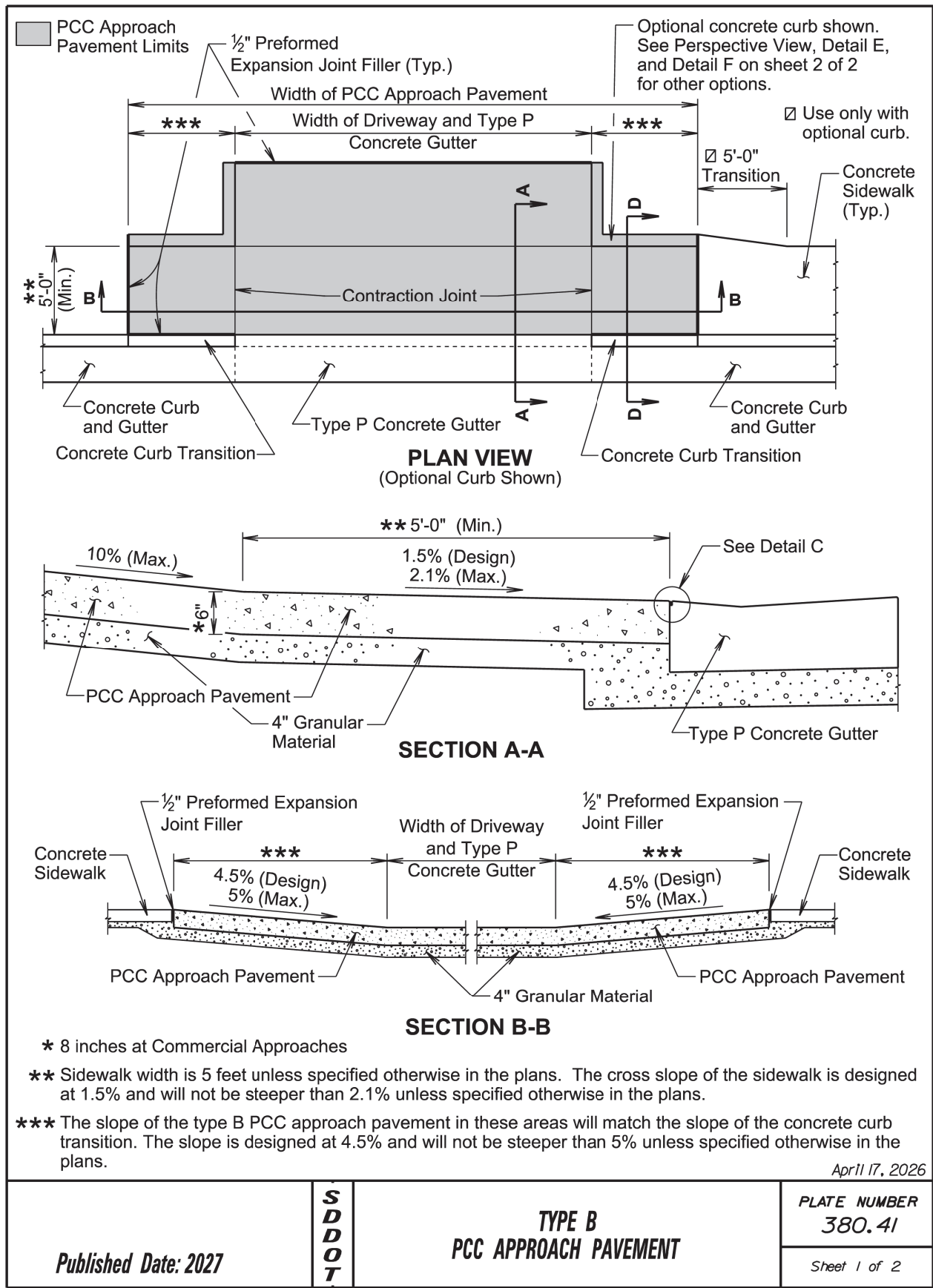
| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |

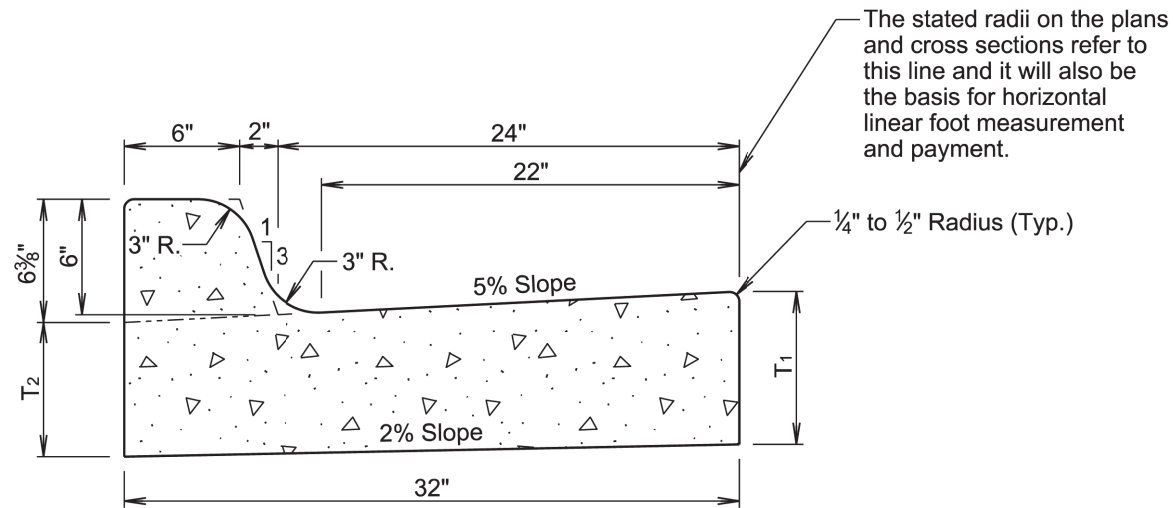
Optima, LLC

Relocation of Historic Resources  
from Lower Main Street to Charles Street  
Deadwood, South Dakota

Rapid City  
Standard Details

Sheet No.





| TYPE B CONCRETE CURB AND GUTTER |                            |                            |                            |                            |
|---------------------------------|----------------------------|----------------------------|----------------------------|----------------------------|
| Type                            | T <sub>1</sub><br>(Inches) | T <sub>2</sub><br>(Inches) | Cu. Yd.<br>Per<br>Lin. Ft. | Lin. Ft.<br>Per<br>Cu. Yd. |
| B66                             | 6                          | 5 1/16                     | 0.057                      | 17.7                       |
| B67                             | 7                          | 6 1/16                     | 0.065                      | 15.4                       |
| B68                             | 8                          | 7 1/16                     | 0.073                      | 13.7                       |
| B68.5                           | 8.5                        | 7 9/16                     | 0.077                      | 13.0                       |
| B69                             | 9                          | 8 1/16                     | 0.081                      | 12.3                       |
| B69.5                           | 9.5                        | 8 9/16                     | 0.085                      | 11.7                       |
| B610                            | 10                         | 9 1/16                     | 0.090                      | 11.2                       |
| B610.5                          | 10.5                       | 9 9/16                     | 0.094                      | 10.7                       |
| B611                            | 11                         | 10 1/16                    | 0.098                      | 10.2                       |
| B611.5                          | 11.5                       | 10 9/16                    | 0.102                      | 9.8                        |
| B612                            | 12                         | 11 1/16                    | 0.106                      | 9.4                        |

GENERAL NOTES:

When concrete curb and gutter longitudinally adjoins new concrete pavement, the method of attachment will be by one of the methods shown on standard plate 380.21.

See standard plate 650.90 for expansion and contraction joints in the curb and gutter.

January 22, 2023

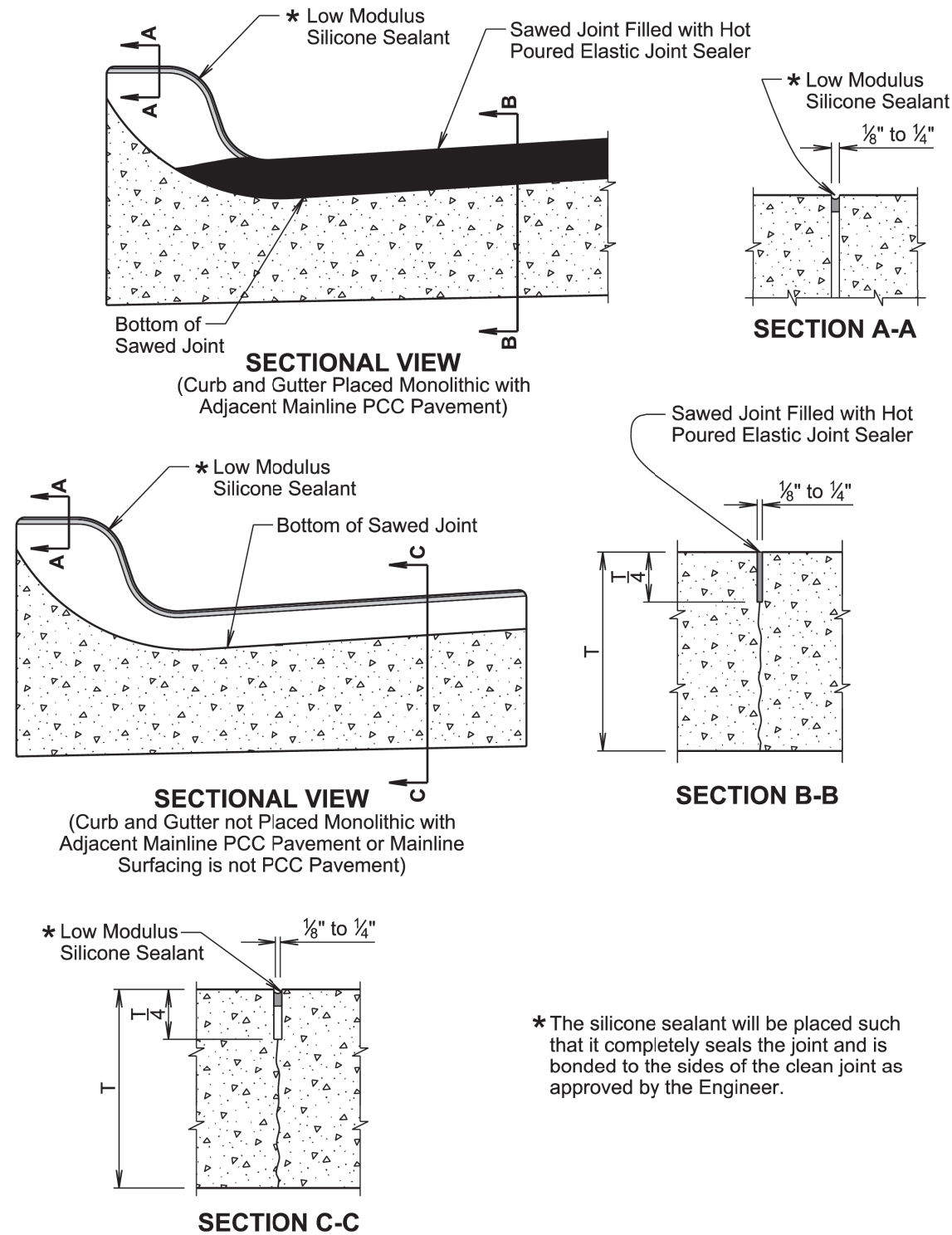
Published Date: 2027

S  
D  
D  
O  
T

TYPE B CONCRETE CURB AND GUTTER

PLATE NUMBER  
650.01

Sheet 1 of 1



December 23, 2019

Published Date: 2027

S  
D  
D  
O  
T

JOINTS IN CONCRETE CURB AND GUTTER

PLATE NUMBER  
650.90

Sheet 1 of 2

| Posted Speed Prior to Work (M.P.H.) | Spacing of Advance Warning Signs (Feet) (A) | Taper Length (Feet) (L) | Spacing of Channelizing Devices (Feet) (G) |
|-------------------------------------|---------------------------------------------|-------------------------|--------------------------------------------|
| 0 - 30                              | 200                                         | 180                     | 25                                         |
| 35 - 40                             | 350                                         | 320                     | 25                                         |
| 45                                  | 500                                         | 600                     | 25                                         |
| 50                                  | 500                                         | 600                     | 50                                         |
| 55                                  | 750                                         | 660                     | 50                                         |
| 60 - 65                             | 1000                                        | 780                     | 50                                         |

Channelizing Device

END ROAD WORK G20-2

The channelizing devices will be drums or 42" cones if traffic control must remain overnight.

For short duration operations (1 hour or less) all channelizing devices may be eliminated if a vehicle with an activated flashing or revolving yellow light is used.

Worker signs (W21-1 or W21-1a) may be used instead of SHOULDER WORK signs.

A SHOULDER WORK sign should be placed on the left side of a divided or one-way roadway only if the left shoulder is affected.

The SHOULDER WORK sign on an intersecting roadway is not required if drivers emerging from that roadway will encounter another advance warning sign before they reach a work activity area.

WORK SPACE

Published Date: 2027

SDDOT

WORK ON SHOULDERS

PLATE NUMBER 634.03

Sheet 1 of 1

January 22, 2021

| Posted Speed Prior to Work (M.P.H.) | Spacing of Advance Warning Signs (Feet) (A) | Spacing of Channelizing Devices (Feet) (G) |
|-------------------------------------|---------------------------------------------|--------------------------------------------|
| 0 - 30                              | 200                                         | 25                                         |
| 35 - 40                             | 350                                         | 25                                         |
| 45                                  | 500                                         | 25                                         |
| 50                                  | 500                                         | 50                                         |
| 55                                  | 750                                         | 50                                         |
| 60 - 65                             | 1000                                        | 50                                         |

Flagger

Channelizing Device

For low-volume traffic situations with short work zones on straight roadways where the flagger is visible to road users approaching from both directions, a single flagger may be used.

The ROAD WORK AHEAD and the END ROAD WORK signs may be omitted for short duration operations (1 hour or less).

For tack and/or flush seal operations, when flaggers are not being used, the FRESH OIL sign (W21-2) will be displayed in advance of the liquid asphalt areas.

Flashing warning lights and/or flags may be used to call attention to the advance warning signs.

The channelizing devices will be drums or 42" cones.

Channelizing devices are not required along the centerline adjacent to work area when pilot cars are utilized for escorting traffic through the work area.

Channelizing devices and flaggers will be used at intersecting roads to control intersecting road traffic as required.

The buffer space should be extended so that the two-way traffic taper is placed before a horizontal or vertical curve to provide adequate sight distance for the flagger and queue of stopped vehicles.

The length of A may be adjusted to fit field conditions.

Warning sign sequence in opposite direction same as below.

Published Date: 2027

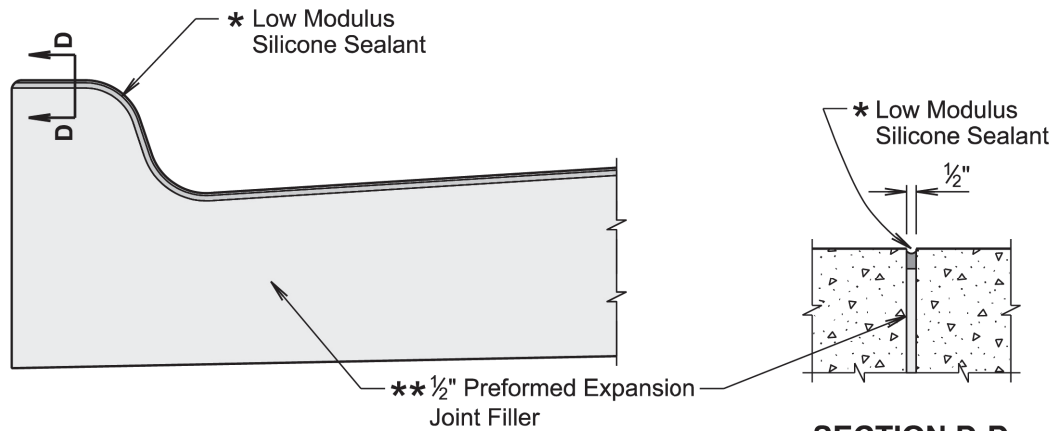
SDDOT

LANE CLOSURE WITH FLAGGER PROVIDED

PLATE NUMBER 634.23

Sheet 1 of 1

January 22, 2021



**SECTIONAL VIEW**  
(Curb and Gutter at 1/2" Preformed Expansion Joint Filler Location)

**SECTION D-D**

\* The silicone sealant will be placed such that it completely seals the joint and is bonded to the sides of the clean joint as approved by the Engineer.

**GENERAL NOTES:**

For illustrative reason, only the type B curb and gutter is shown.

\*\*\* A 1/2-inch preformed expansion joint filler will be placed transversely in the curb and gutter at the following locations:

At each junction between the radius return of curb and gutter, and curb and gutter which is parallel to the project centerline.

At each junction between new curb and gutter and existing curb and gutter.

Transverse contraction joints will be constructed at 10 foot intervals in the concrete curb and gutter except when the concrete curb and gutter is constructed adjacent to mainline PCC pavement. When concrete curb and gutter is constructed adjacent to mainline PCC pavement, a transverse contraction joint will be constructed in the concrete curb and gutter at each mainline PCC pavement transverse contraction joint location.

When concrete curb and gutter is not placed monolithically with the mainline PCC pavement or when the adjacent mainline surfacing is not PCC concrete, the transverse contraction joints in the concrete curb and gutter will be 1 1/2 inches deep if formed in the fresh concrete using a suitable grooving tool. If a saw is used to cut the contraction joints, then the depth of the joint will be at least 1/4 the thickness of the concrete and the joint will be sealed in accordance with the details shown above.

December 23, 2019

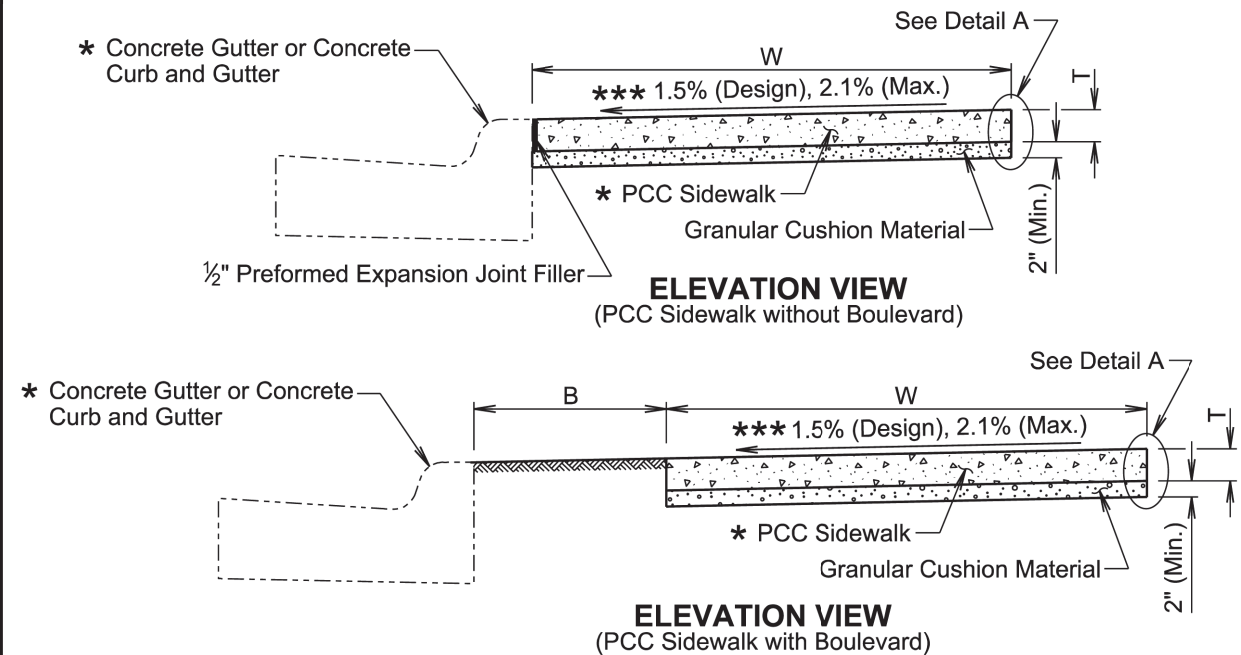
Published Date: 2027

S  
D  
D  
O  
T

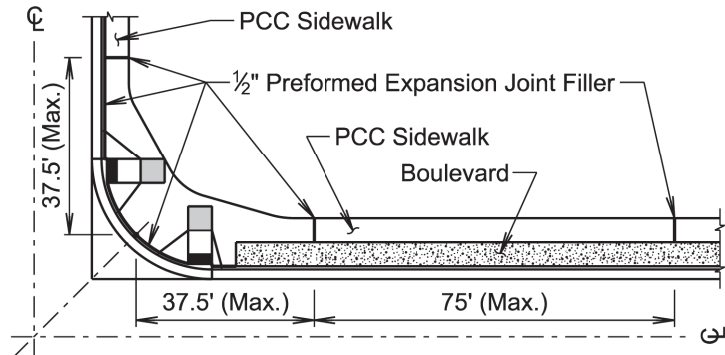
JOINTS IN CONCRETE CURB AND GUTTER

PLATE NUMBER  
650.90

Sheet 2 of 2



- B Width of boulevard as specified in the plans.
- T Thickness of PCC sidewalk as specified in the plans.
- W Width of PCC sidewalk as specified in the plans.
- \* Type as specified in the plans.



**GENERAL NOTES:**

The PCC sidewalk will be constructed in accordance with Section 651 of the Specifications.

\*\*\* The cross slope of the sidewalk is designed at 1.5% and the maximum slope allowed is 2.1% unless specified otherwise in the plans.

The maximum length between expansion joints in the PCC sidewalk is 75 feet.

PCC sidewalk placed adjacent to intersection of roadways will have an expansion joint placed transversely a maximum of 37.5 feet from the intersection. See Plan View.

An expansion joint in the PCC sidewalk will consist of a 1/2 -inch thick preformed expansion joint filler material placed full depth and width of the PCC sidewalk.

\*\* Large areas of PCC pavement adjacent to the PCC sidewalk may require a different joint treatment than shown in the detail. If a different joint detail is necessary, plans will contain the joint detail and the Contractor will construct the joint treatment in accordance with the plans.

April 8, 2025

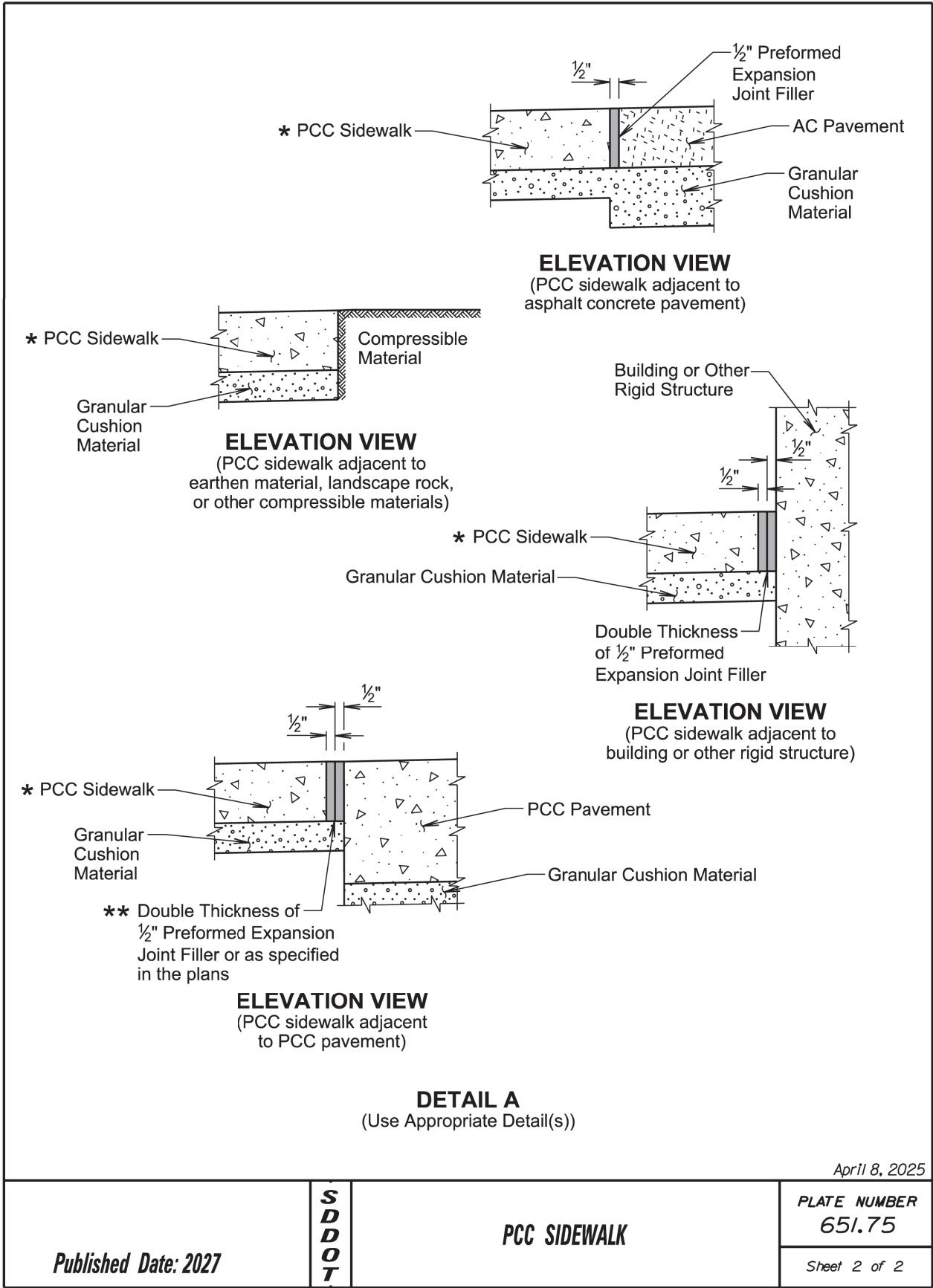
Published Date: 2027

S  
D  
D  
O  
T

PCC SIDEWALK

PLATE NUMBER  
651.75

Sheet 1 of 2



| No. | Date | By | Revision Description |
|-----|------|----|----------------------|
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |
|     |      |    |                      |