



November 5, 2025

Dear PUC Secretary's Bureau,

This eFile update for **Docket No. A-2022-3036865** is final plan excerpts for recording SR 2045 Pittsburgh-McKeesport Boulevard bridge replacement over Union Railroad as part of the Mon-Fayette Expressway project by the Pennsylvania Turnpike Commission, transmitted on their behalf.

Sincerely,  
HDR

A handwritten signature in blue ink that reads "John E. Kennelly".

John E. Kennelly, P.E.  
*Project Manager*

# COMMONWEALTH OF PENNSYLVANIA



## PENNSYLVANIA TURNPIKE COMMISSION

DRAWINGS FOR  
**CONTRACT NO. M-052.50X002-3-03**  
**FOR CONSTRUCTION**  
**OF THE**  
**MON/FAYETTE EXPRESSWAY**

**SR 0043, SECTION 53B1A**  
**BETWEEN MP M-55.40 AND MP M-58.06**  
**IN**  
**ALLEGHENY COUNTY**

DESIGN DESIGNATION

SR 0043  
 SECTION 53B1A

HIGHWAY CLASSIFICATION	- URBAN LIMITED ACCESS FREEWAY
DESIGN SPEED	- 60 MPH
PAVEMENT WIDTH	- 2-12' LANES (EACH DIRECTION) 26' PAVEMENT
MEDIAN WIDTH	- 26'-0"
SHOULDER WIDTH INSIDE	- 12'-0" PAVED
SHOULDER WIDTH OUTSIDE	- 12'-0" EFFECTIVE (10'-0" PAVED)
CURRENT ADT	- 14,300 (2025) NB - 16,300 (2025) SB
DESIGN YEAR ADT	- 24,000 (2045) NB - 26,700 (2045) SB
DHV	- 1,945 NB - 2,210 SB
D	- 53%
T	- 9.5%

SR 2045 PITTSBURGH-McKEESPORT BLVD/CR 5103 RICHLAND AVE  
 SECTION A11

HIGHWAY CLASSIFICATION	- URBAN PRINCIPAL ARTERIAL
DESIGN SPEED	- 40 MPH
PAVEMENT WIDTH	- 3 TO 4 -12' LANES 36'-48' PAVEMENT
MEDIAN WIDTH	- N/A
SHOULDER WIDTH	- 2'-0" CURB/GUTTER LT (MIN) - 8' LT/RT
CURRENT ADT	- 9,600 (2025) NB - 11,500 (2025) SB
DESIGN YEAR ADT	- 12,400 (2045) NB - 15,100 (2045) SB
DHV	- 1,525 NB - 1,215 SB
D	- 55%
T	- 4.1% (NB/SB AVG.)



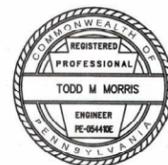
DISTRICT	COUNTY	TOWNSHIP / BOROUGH	SECTION	SHEETS
1	ALLEGHENY	WEST MIFFLIN BOROUGH	53B1A	503
	ALLEGHENY	DRAVOSBURG BOROUGH	53B1A	

SR 0043

ESTABLISHED AS A LIMITED ACCESS HIGHWAY FROM STATION 1893+15.00 TO STATION 1929+93.13  
 STATE ROUTE 0043, SECTION 53B1A  
 APPROVED BY PENNSYLVANIA TURNPIKE COMMISSION ON \_\_\_\_\_, 202

ESTABLISHED AS A LIMITED ACCESS HIGHWAY FROM STA 1775+86.00 TO STA 1893+15.00 BY PLAN OF STATE ROUTE 0043, SECTION 53A2 R/W  
 APPROVED BY PENNSYLVANIA TURNPIKE COMMISSION ON \_\_\_\_\_, 202

WBS NO. M-052.50X002-3-03
NETWORK NUMBER: 7008401
FILE NAME: 1601RDti.dgn
DRAWING TYPE: 1A
STRUCTURE NUMBER:



PREPARED BY:

PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

*Todd M. Morris*

9/30/2025

DATE

APPROVED:

\_\_\_\_\_ DATE

CHIEF ENGINEER, PENNSYLVANIA TURNPIKE COMMISSION

RECOMMENDED:

\_\_\_\_\_ DATE

SECRETARY TREASURER, PENNSYLVANIA TURNPIKE COMMISSION

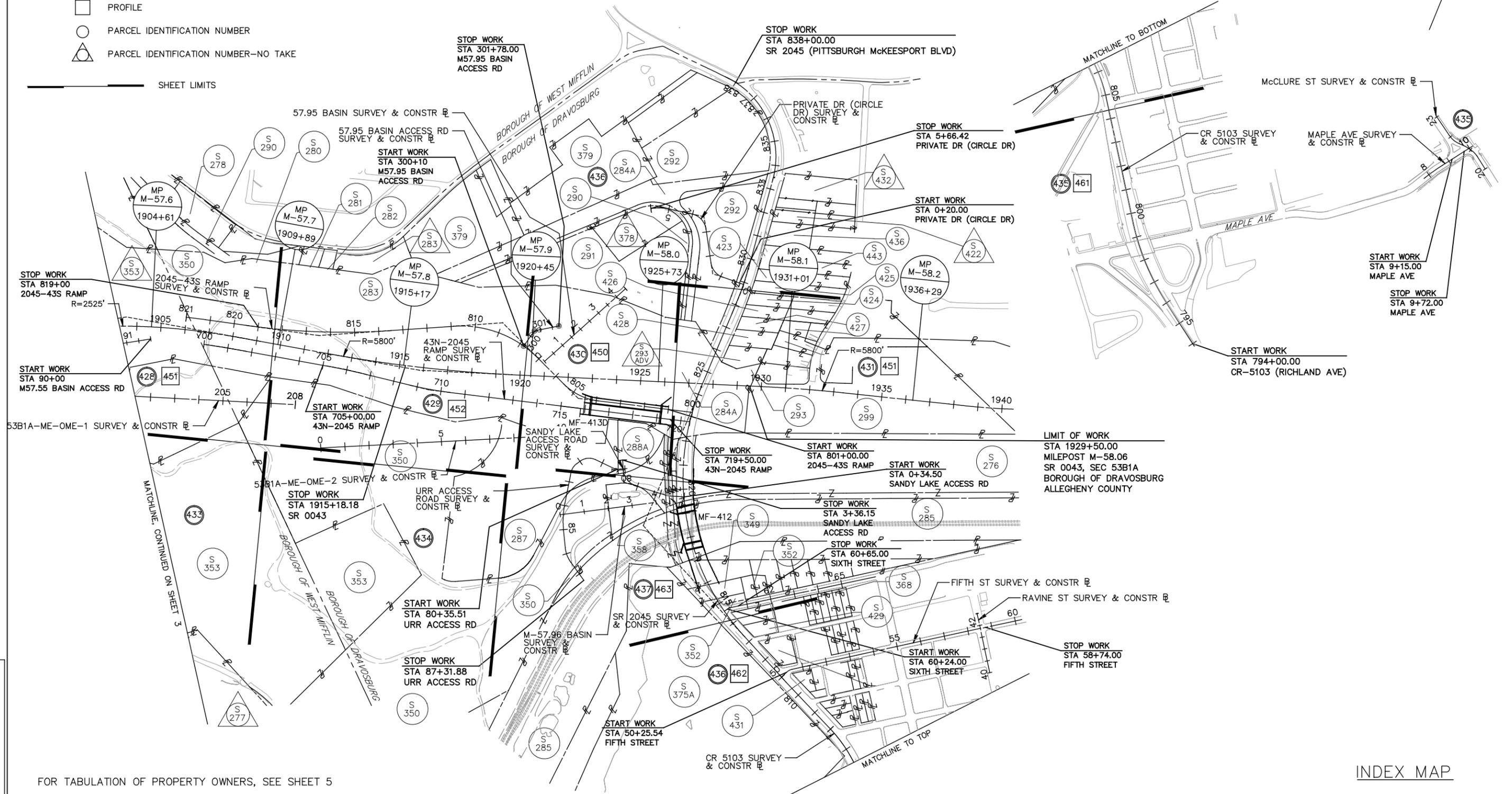
CHIEF ENGINEER  
 PENNSYLVANIA TURNPIKE  
 COMMISSION

COMMISSION APPROVAL

**LEGEND**

- PLAN
- PROFILE
- PARCEL IDENTIFICATION NUMBER
- △ PARCEL IDENTIFICATION NUMBER—NO TAKE

SHEET LIMITS

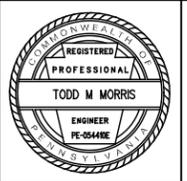


**LIMIT OF WORK**  
 STA 1929+50.00  
 MILEPOST M-58.06  
 SR 0043, SEC 53B1A  
 BOROUGH OF DRAVOSBURG  
 ALLEGHENY COUNTY

FOR TABULATION OF PROPERTY OWNERS, SEE SHEET 5

**INDEX MAP**

PENNONI ASSOCIATES, INC.  
 FILE NAME: ...CONSTR\_53B1A\601RDID05.dgn  
 PEN TABLE: PENNONI-PTC-3-COLOR.TBL  
 PLOT DRIVER: PENNONI-PTC-FULL-PDF.PLOTDRG  
 USER: TMM  
 DATE: 11/24/2023 @ 11:34:31 AM



**PREPARED BY:**  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220  
**PREPARED FOR:**  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION

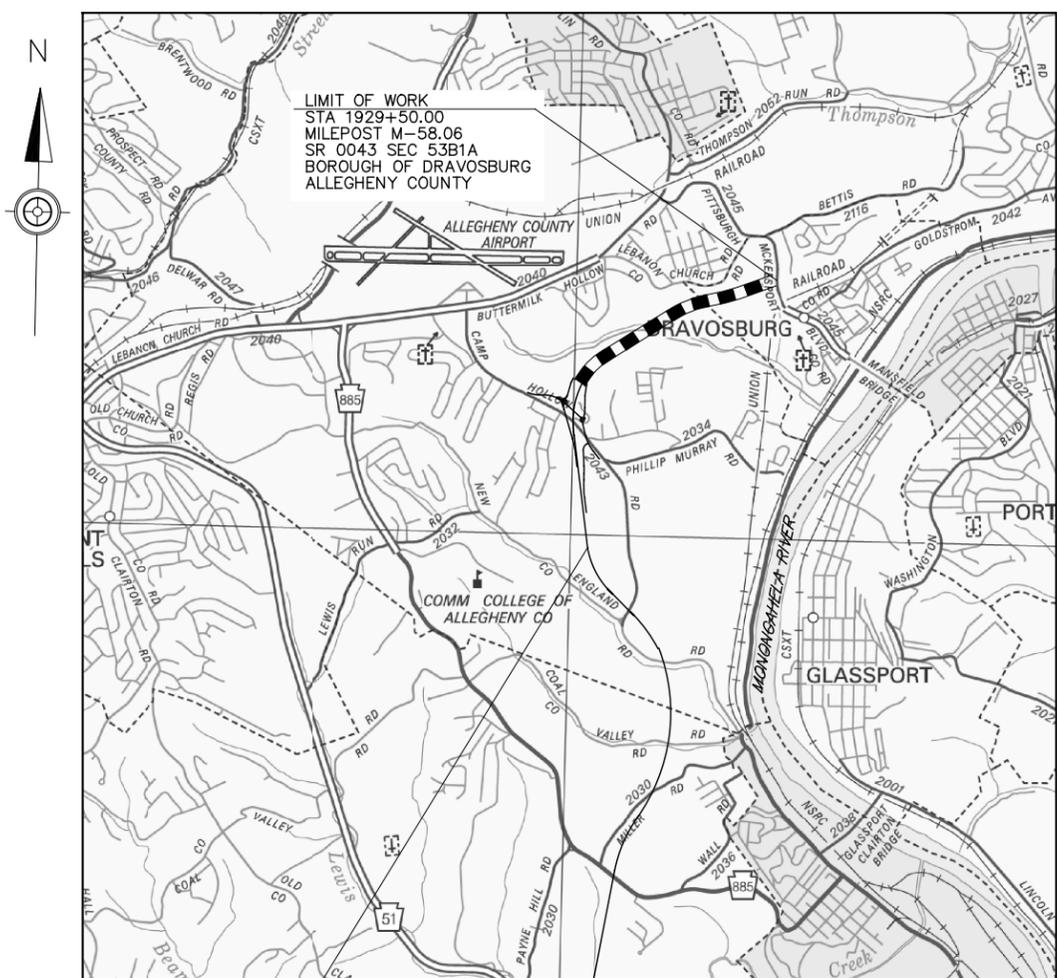


NO.	REVISIONS	DATE	APPR.

WBS NO.  
**M-052.50X002-3-03**  
 NETWORK NUMBER: 7008401  
 FILE NAME: 1601RDID05.dgn  
 DRAWING TYPE: 1A  
 STRUCTURE NUMBER:  
 SCALE: 0 200 400

**MON/FAYETTE EXPRESSWAY**  
**SECTION 53B1A**  
**STATE ROUTE 0043**  
 DISTRICT: 1 COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: WEST MIFFLIN & DRAVOSBURG

**INDEX MAP**  
 DRAWING: 3 OF 4  
 SHEET: 4 OF 503



LIMIT OF WORK  
 STA 1780+00.00  
 MILEPOST M-55.40  
 SR 0043 SEC 53B1A  
 WEST MIFFLIN BOROUGH  
 ALLEGHENY COUNTY

**LOCATION MAP**



**LEGEND**  

 PROJECT  
 STATE HIGHWAY  
 LOCAL ROAD

**LIST OF EQUALITIES**

SR 0043  
 STA 1841+36.09 BK =  
 STA 1850+00.00 AHD

**MILEPOST LISTINGS**

MILEPOST 55.40 = STA 1780+00.00 LIMIT OF WORK  
 MILEPOST 56 = STA 1881+49  
 MILEPOST 57 = STA 1872+93  
 MILEPOST 58 = STA 1925+73  
 MILEPOST 58.06 = STA 1929+50.00 LIMIT OF WORK

**TABULATION OF OVERALL LENGTH**

SR 0043  
 STA 1780+00.00 TO STA 1841+36.09 BK = 6,136.09 FEET  
 STA 1850+00.00 AHD TO STA 1929+50.00 = 7,950.00 FEET  
 14,086.09 FEET = 2.668 MILES

**TABULATION OF CONSTRUCTION LENGTH**

SR 0043  
 STA 1781+00.00 TO STA 1841+36.09 BK = 6,036.09 FEET  
 STA 1850+00.00 AHD TO STA 1925+90.00 = 7,590.00 FEET  
 13,626.09 FEET = 2.581 MILES

CR-5103 (RICHLAND AVE)/SR 2045-A11  
 STA 794+00.00 TO STA 838+00.00 = 4,400 FEET = 0.833 MILES

**TABULATION OF SEGMENT EQUALITIES**

SEGMENT 0030/OFFSET 0000 = STATION 811+26.39  
 SEGMENT 0040/OFFSET 0000 = STATION 822+77.85/  
 SR 2045 (RICHLAND AVE/PITTSBURGH-MCKEESPORT BLVD) SECTION A11  
 SEGMENT 0040/OFFSET 1739 = STATION 838+00.00

**TABULATION OF COUNTY SLD EQUALITIES**

CR-5103 (RICHLAND AVENUE)  
 START WORK STATION 794+00.00  
 END OF CR/BEGIN SR STA 811+26.39 = SLD STATION 811+26.39

**RECORD OF EXISTING ROAD TYPES**

CR-5103 (RICHLAND AVENUE)  
 CONSTRUCTION LIMITS 795+57.50 TO 811+26.39

1.5" ASPHALT WEARING COURSE  
 2.5" ASPHALT BINDER COURSE  
 8" ASPHALT BASE COURSE  
 6" GRANULATED SLAG SUBBASE

SR 2045-A11 (PITTSBURGH MCKEESPORT BOULEVARD)  
 CONSTRUCTION LIMITS 811+26.39 TO 832+00.00

1.5" ASPHALT WEARING COURSE  
 2.5" ASPHALT BINDER COURSE  
 6" ASPHALT BASE COURSE  
 1.5" ASPHALT WEARING COURSE  
 2" ASPHALT BINDER COURSE  
 6" PLAIN CEMENT CONCRETE BASE COURSE  
 6" GRANULATED SLAG SUBBASE

NOTE: THE DEPTHS OF MATERIAL SHOWN ARE FOR DESIGN PURPOSE ONLY. ANY RISK OF UNANTICIPATED COST ASSOCIATED WITH DIFFERENCES BETWEEN THE LISTED DEPTHS AND THE ACTUAL DEPTHS SHALL BE ACCEPTED BY THE CONTRACTOR.

**EARTHWORK SUMMARY ENTIRE PROJECT**

THE INFORMATION ON ESTIMATED AMOUNTS OF EARTHWORK HAS BEEN USED IN THE PRELIMINARY ESTIMATE. DO NOT USE AS A WAIVER OF ANY PROVISIONS OF THE SPECIFICATIONS AND CONTRACTS.

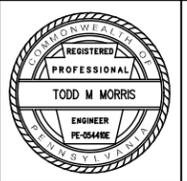
TYPE	CUBIC YARDS OF EXCAVATION						CUBIC YARDS OF UNSUITABLE MATERIAL	CUBIC YARDS OF COMPLETED EMBANKMENT	CUBIC YARDS OF ROCK EMBANKMENT			CUBIC YARDS OF SELECTED BORROW EXC. ROCK,			CUBIC YARDS OF COMMON (OR FOREIGN) BORROW EXCAVATION	CUBIC YARDS OF AVAILABLE TOPSOIL STOCKPILED AND PLACED	CUBIC YARDS OF TOPSOIL FURNISHED AND PLACED	CUBIC YARDS OF CAPACITY AVAILABLE IN OPTIONAL MODIFIED EMBANKMENTS	CUBIC YARDS OF WASTE		
	CLASS 1	CLASS 1A	CLASS 1B	CLASS 2	CLASS 3	CLASS 4			TYPE A	TYPE B	TYPE C	TYPE A	TYPE B	TYPE C							
PAY ITEMS	1,485,401 (1)	58,558	4	5,178	150	3,591								269,220			0	31,863	14,442		
INCIDENTAL	38,203 (2)			14,798	30,654 (3)	16,199 (4)				269,220				115,435 (7)							
AVAILABLE FROM EXCAVATION										0				115,435 (8)							
FOR INFORMATION ONLY							58,558 (5)	1,501,235 (6)												78,310	54,311 (9)
TOTAL	1,523,604	58,558	4	19,976	30,804	19,790	58,558	1,501,235						269,220				31,863	14,442	78,310	54,311

NOTES:

- INCLUDES 593,423 CY OF ROCK EXCAVATION.
- INCLUDES 20,045 CY INCIDENTAL FOR DRAINAGE PIPES AND STRUCTURES.
- INCLUDES 18,158 CY INCIDENTAL FOR BASINS AND CONVERSIONS.
- INCLUDES 9,706 CY CLASS 3 EXCAVATION PART OF 4120-0001 LUMP SUM STRUCTURE ITEM.  
 INCLUDES 9,237 CY CLASS 3 EXCAVATION PART OF 4120-0002 LUMP SUM STRUCTURE ITEM.  
 INCLUDES 7,449 CY CLASS 3 EXCAVATION PART OF 4120-0003 LUMP SUM STRUCTURE ITEM.  
 INCLUDES 4,262 CY CLASS 3 EXCAVATION PART OF 4120-0005 LUMP SUM STRUCTURE ITEM.
- INCLUDES INCIDENTAL DRAINAGE EXCAVATION (SECTIONS 601, 604, 605, 610, 615, AND 616).
- UNSUITABLE MATERIAL IS NOT SUITABLE FOR USE IN COMPLETED EMBANKMENT.
- INCLUDES ALL REQUIRED ROADWAY EMBANKMENT MATERIALS.
- REQUIRED ROCK FOR PROJECT AVAILABLE FROM EXCAVATION.
- ROCK AND SOIL VOLUMES HAVE BEEN ADJUSTED FOR SHRINK/SWELL BASED ON THE FACTORS SHOWN ABOVE. REFER TO THE MODIFIED TYPE C ROCK SPECIFICATION FOR ADDITIONAL INFORMATION.
- WASTE MATERIAL INCLUDES SUITABLE AND UNSUITABLE MATERIAL IN EXCESS OF WHAT IS NEEDED TO COMPLETE THE REQUIRED EMBANKMENT FOR THE PROJECT. WASTE MATERIAL SHALL BE PLACED IN ON-SITE OME AREAS.

SHRINK FACTOR - 0.95  
 SWELL FACTOR - 1.12

PENNONI ASSOCIATES INC.  
 FILE NAME: ...  
 PEN TABLE: PENNONI-PC-16  
 PLOT DRIVER: PENNONI-FIT-PC-FULL-PDF-PLT.CFG  
 USER NAME: BRUGER



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220  
 PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.
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WBS NO.  
**M-052.50X002-3-03**  
 NETWORK NUMBER: 7008401  
 FILE NAME: 1601RDIm.dgn  
 DRAWING TYPE: 1A  
 STRUCTURE NUMBER:  
 SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

DISTRICT: 1 COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: WEST MIFFLIN & DRAVOSBURG

**ROADWAY  
 LOCATION MAP**

DRAWING: 1 OF 1  
 SHEET: 6 OF 503



PEOPLES NATURAL GAS COMPANY  
 SR 2045  
 STA 820+76 LT/RT  
 CROSSING  
 UNDERGROUND 20" STEEL GAS LINE  
 STA 822+10 LT/RT  
 CROSSING  
 UNDERGROUND 16" GAS LINE  
 STA 822+36 TO 831+73  
 8" PLASTIC GAS LINE  
 STA 822+50 TO 833+50 RT  
 UNDERGROUND 2" PE GAS LINE  
 STA 822+29 TO 823+50 LT  
 UNDERGROUND 16" STEEL GAS LINE  
 SR0043  
 STA 1906+70 TO 1925+25 LT/RT  
 8" PLASTIC GAS LINE  
 SA 1909+70 TO 1929+45

PENNSYLVANIA AMERICAN WATER COMPANY  
 SR 2045  
 STA 819+70 TO 825+00 RT  
 UNDERGROUND 12" DI WATER LINE  
 STA 825+00 TO 833+50 RT  
 UNDERGROUND 16" DI WATER LINE  
 STA 810+80 TO 833+50 RT  
 UNDERGROUND 8" ABANDONED WATER LINE  
 STA 819+70 TO 833+50 LT  
 UNDERGROUND 12" ABANDONED WATER LINE

PENNSYLVANIA AMERICAN WATER (SEWER)  
 SR 2045  
 STA 819+75 TO 829+00, RT  
 8" UNDERGROUND SEWER LINE

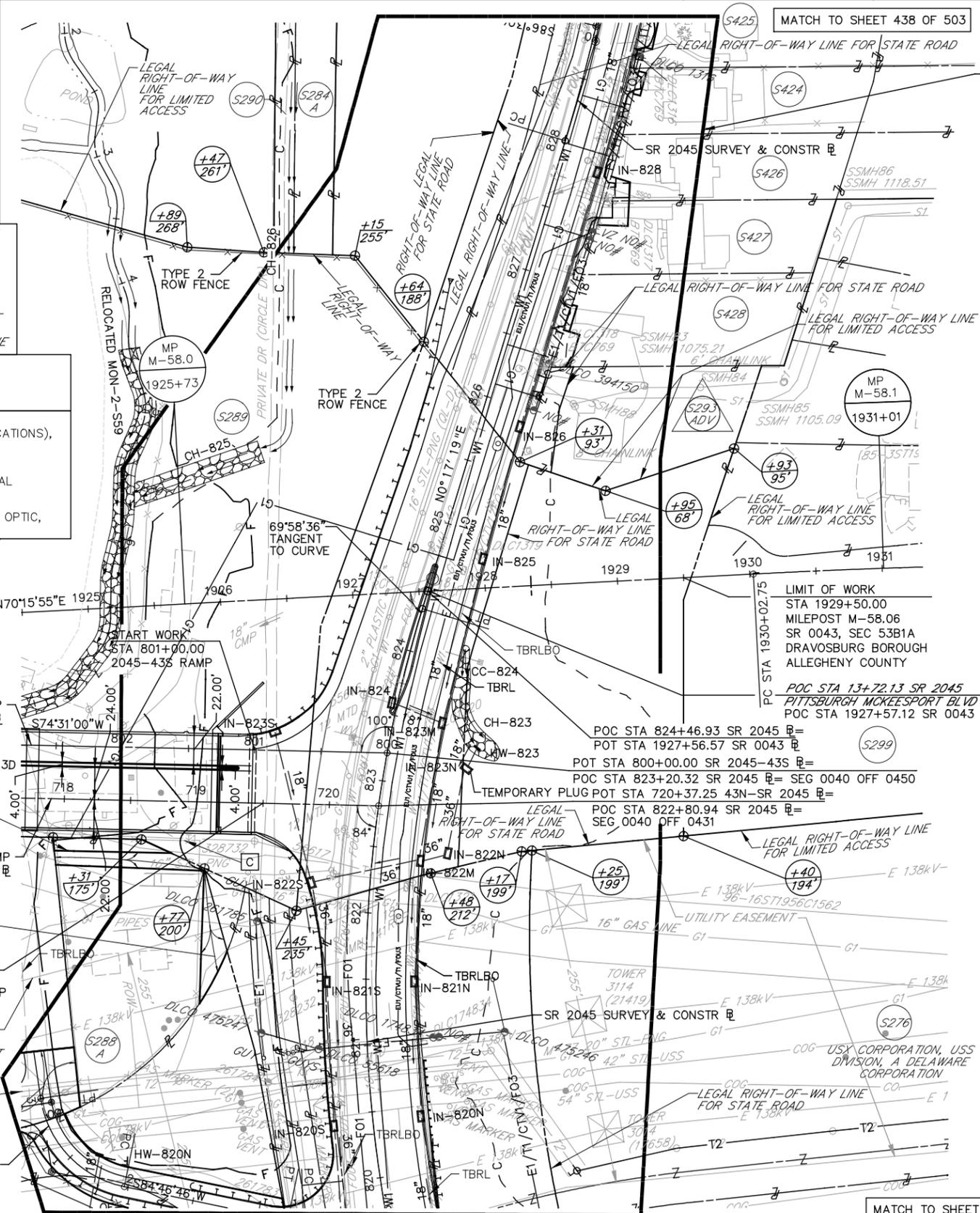
DUQUESNE LIGHT COMPANY (DISTRIBUTION),  
 DUQUESNE LIGHT COMPANY (TELECOMMUNICATIONS),  
 COMCAST, CROWN CASTLE  
 SR 2045  
 STA 810+15 TO 821+00 RT  
 OVERHEAD ELECTRIC, FIBER OPTIC, CO-AXIAL  
 CABLE & COPPER  
 STA 821+00 TO 828+78 RT  
 UNDERGROUND/OVERHEAD ELECTRIC, FIBER OPTIC,  
 CO-AXIAL CABLE & COPPER

MATCH TO SHEET 430 OF 503

2045-43S RAMP  
 SURVEY & CONSTR E  
 PI STA 04+70.99  
 $\Delta = 13'30"22"$  (RT)  
 $T = 5.92'$   
 $L = 11.79'$   
 $R = 50.00'$   
 $E = 0.35'$   
 PC STA 04+65.06  
 PT STA 04+76.85

SANDY LAKE ACCESS RD  
 SURVEY & CONSTR E  
 PI STA 2+58.80  
 $\Delta = 69'54"28"$  (RT)  
 $T = 55.92'$   
 $L = 97.61'$   
 $R = 80.00'$   
 $E = 17.61'$   
 PC STA 2+02.88  
 PT STA 3+00.49

TEMPORARY  
 CONSTRUCTION  
 EASEMENT  
 STOP WORK  
 STA 719+50.00  
 43N-2045 RAMP



MATCH TO SHEET 438 OF 503

SEE SPECIAL ROADWAY DETAILS SR 2045 PITTSBURGH MCKEESPORT BLVD SHEETS 441 AND 442

SR 0043 SURVEY & CONSTR E  
 PI STA 1931+71.17  
 $\Delta = 3'19'36"$  (RT)  
 $T = 168.42'$   
 $L = 336.75'$   
 $R = 5800.00'$   
 $E = 2.44'$   
 $SE = 2.8\%$   
 PC STA 1930+02.75  
 PT STA 1933+39.50

SR 2045 LEGAL RIGHT-OF-WAY E  
 PI STA 17+68.34  
 $\Delta = 8'12'30"$  LT  
 $T = 163.74'$   
 $L = 326.93'$   
 $R = 2282.00'$   
 $E = 5.87'$   
 PC STA 16+04.60  
 PT STA 19+31.53

SR 2045 LEGAL RIGHT-OF-WAY E  
 PI STA 11+90.33  
 $\Delta = 24'48'32"$  RT  
 $T = 197.95'$   
 $L = 389.70'$   
 $R = 900.00'$   
 $E = 21.51'$   
 PC STA 9+92.39  
 PT STA 13+82.08

SR 2045 SURVEY & CONSTR E  
 PI STA 819+48.81  
 $\Delta = 65'10'40"$  (RT)  
 $T = 621.36'$   
 $L = 1105.72'$   
 $R = 972.00'$   
 $E = 181.63'$   
 $SE = 5.0\%$   
 PC STA 813+27.46  
 PT STA 824+33.17

PROPOSED STRUCTURE DATA, MF-413D  
 2-SPAN STEEL PLATE 9-GIRDER  
 SPAN: 145', 145'  
 VERTICAL CLEARANCE:  
 REQUIRED: N/A  
 ACTUAL: N/A  
 SKEW: 90°, RADIUS: N/A

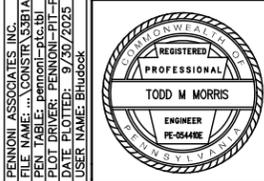
US STEEL  
 SR 0043  
 STA 1920+75 TO 1928+45 RT  
 OVERHEAD TELECOMMUNICATION LINES  
 SR 2045  
 STA 820+50 LT/RT  
 CROSSING  
 54" COKE OVEN GAS LINE  
 STA 820+65 LT/RT  
 CROSSING  
 42" COKE OVEN GAS LINE

DUQUESNE LIGHT COMPANY (TRANSMISSION)  
 SR 2045  
 STA 819+95 LT/RT  
 STA 820+82 LT/RT  
 STA 821+68 LT/RT  
 OVERHEAD ELECTRIC 138 kv

VERIZON  
 SR 2045  
 STA 816+50 TO 821+85 LT  
 OVERHEAD AND UNDERGROUND FIBER OPTIC  
 STA 821+85 TO 833+50 LT  
 UNDERGROUND FIBER OPTIC

- PROPERTY OWNERS
- S284 A PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY BLANCHE S. PAUL, WIDOW
  - S288 A EQUITABLE GAS COMPANY
  - S289 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY MARTIN MEDIA
  - S290 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY GLENWOOD & DRAVOSEBURG ELECTRIC STREET RAILWAY COMPANY
  - S293 ADV PENNSYLVANIA AMERICAN WATER COMPANY
  - S295 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY LAWRENCE G. HOLTZMAN
  - S299 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY RONALD ANGERMAN AND GERALD ANGERMAN
  - S424 FREDERICK A. SCHAFER, JR.
  - S425 ANTHONY AND KATHY PALMER, HUSBAND AND WIFE
  - S426 DANIEL S. WINTERS
  - S427 RICHARD VON RENNER
  - S428 JOHN J. ULAKOVIC AND NANCY L. ULAKOVIC, HIS WIFE

FOR PROFILE OF SANDY LAKE ACCESS RD, SEE SHEET 465  
 FOR PROFILE OF 2045-43S RAMP, SEE SHEET 457  
 FOR PROFILE OF 43N-2045 RAMP, SEE SHEET 456  
 FOR PROFILE OF SR 0043, SEE SHEET 452 AND 453  
 FOR PROFILE OF SR 2045, SEE SHEET 460



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220  
 PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
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 NETWORK NUMBER: 7008401  
 FILE NAME: 1601RDp197.dgn  
 DRAWING TYPE: 1A  
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 SCALE: 0 50 100

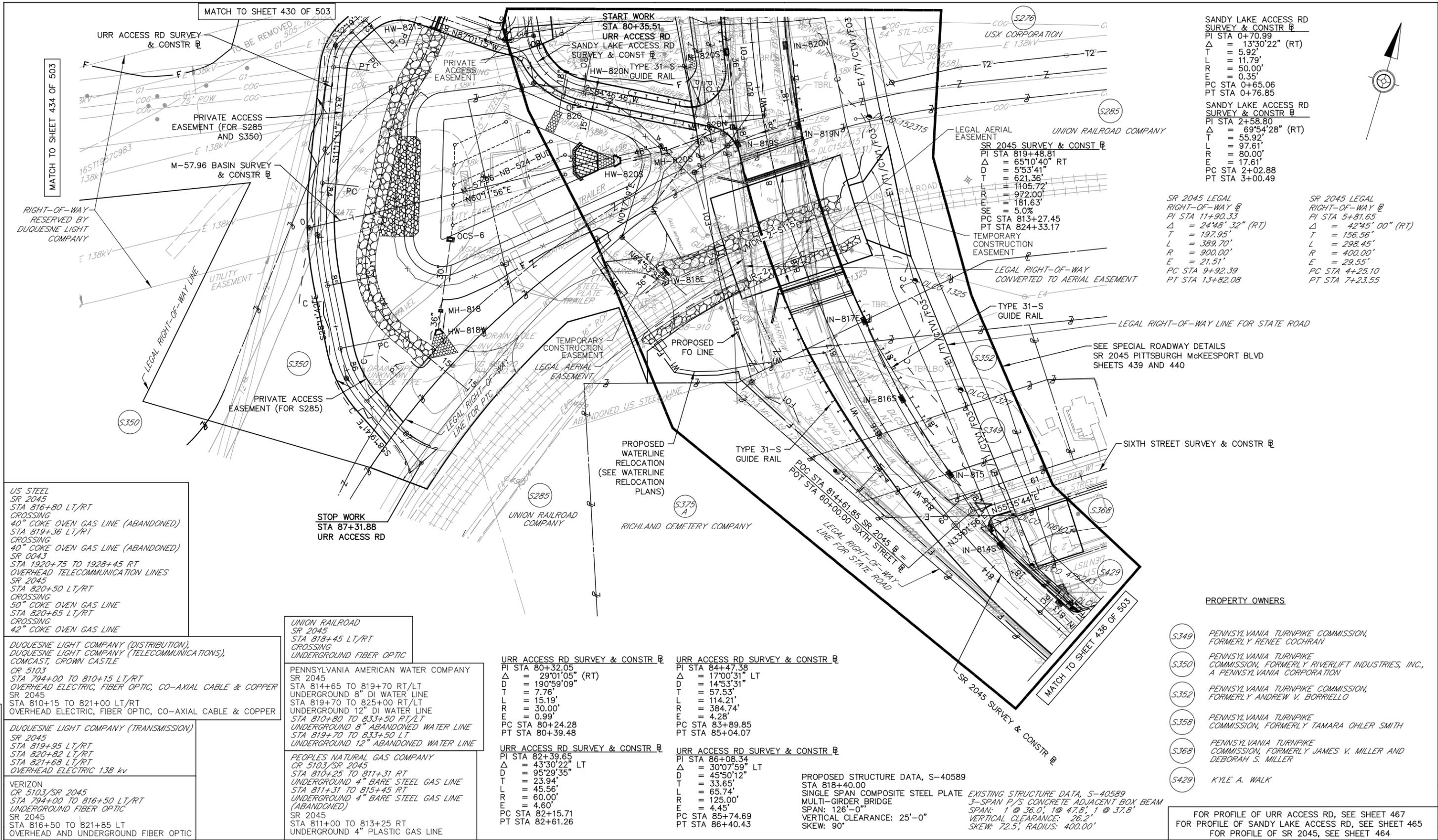
**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

**SR 0043 PLAN  
 STA 1924+50.00 TO STA 1935+50.00**

DISTRICT: 1 COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: WEST MIFFLIN

DRAWING: 12 OF 19  
 SHEET: 431 OF 503

PENNONI ASSOCIATES, INC.  
 FILE NAME: ...CONSTR...S...A...G...R...D...P...1...9...7...D...GN  
 PEN TABLE: PENNONI-197.dgn  
 PLOT DRIVER: PENNONI-197-PC-FULL-PDF.PLOT66  
 USER: TMM  
 DATE: 12/29/2023 @ 12:55:56 PM



**SANDY LAKE ACCESS RD SURVEY & CONSTR**

PI STA 0+70.99  
 $\Delta = 13'30'22''$  (RT)  
 T = 5.92'  
 L = 11.79'  
 R = 50.00'  
 E = 0.35'  
 PC STA 0+65.06  
 PT STA 0+76.85

**SANDY LAKE ACCESS RD SURVEY & CONSTR**

PI STA 2+58.80  
 $\Delta = 69'54'28''$  (RT)  
 T = 55.92'  
 L = 97.61'  
 R = 80.00'  
 E = 17.61'  
 PC STA 2+02.88  
 PT STA 3+00.49

**SR 2045 LEGAL RIGHT-OF-WAY**

PI STA 11+90.33  
 $\Delta = 24'48'32''$  (RT)  
 T = 197.95'  
 L = 389.70'  
 R = 900.00'  
 E = 21.51'  
 PC STA 9+92.39  
 PT STA 13+82.08

**SR 2045 LEGAL RIGHT-OF-WAY**

PI STA 5+81.65  
 $\Delta = 42'45'00''$  (RT)  
 T = 156.56'  
 L = 298.45'  
 R = 400.00'  
 E = 29.55'  
 PC STA 4+25.10  
 PT STA 7+23.55

**US STEEL**  
 SR 2045  
 STA 816+80 LT/RT CROSSING  
 40" COKE OVEN GAS LINE (ABANDONED)  
 STA 819+36 LT/RT CROSSING  
 40" COKE OVEN GAS LINE (ABANDONED)  
 SR 0043  
 STA 1920+75 TO 1928+45 RT OVERHEAD TELECOMMUNICATION LINES  
 SR 2045  
 STA 820+50 LT/RT CROSSING  
 50" COKE OVEN GAS LINE  
 STA 820+65 LT/RT CROSSING  
 42" COKE OVEN GAS LINE

**DUQUESNE LIGHT COMPANY (DISTRIBUTION), DUQUESNE LIGHT COMPANY (TELECOMMUNICATIONS), COMCAST, CROWN CASTLE**  
 CR 5103  
 STA 794+00 TO 810+15 LT/RT OVERHEAD ELECTRIC, FIBER OPTIC, CO-AXIAL CABLE & COPPER  
 SR 2045  
 STA 810+15 TO 821+00 LT/RT OVERHEAD ELECTRIC, FIBER OPTIC, CO-AXIAL CABLE & COPPER

**DUQUESNE LIGHT COMPANY (TRANSMISSION)**  
 SR 2045  
 STA 819+95 LT/RT  
 STA 820+82 LT/RT  
 STA 821+68 LT/RT  
 OVERHEAD ELECTRIC 138 kv

**VERIZON**  
 CR 5103/SR 2045  
 STA 794+00 TO 816+50 LT/RT UNDERGROUND FIBER OPTIC  
 SR 2045  
 STA 816+50 TO 821+85 LT UNDERGROUND AND UNDERGROUND FIBER OPTIC

**UNION RAILROAD**  
 SR 2045  
 STA 818+45 LT/RT CROSSING  
 UNDERGROUND FIBER OPTIC

**PENNSYLVANIA AMERICAN WATER COMPANY**  
 SR 2045  
 STA 814+65 TO 819+70 RT/LT UNDERGROUND 8" DI WATER LINE  
 STA 819+70 TO 825+00 RT/LT UNDERGROUND 12" DI WATER LINE  
 STA 810+80 TO 833+50 RT/LT UNDERGROUND 8" ABANDONED WATER LINE  
 STA 819+70 TO 833+50 LT UNDERGROUND 12" ABANDONED WATER LINE

**PEOPLES NATURAL GAS COMPANY**  
 CR 5103/SR 2045  
 STA 810+25 TO 811+31 RT UNDERGROUND 4" BARE STEEL GAS LINE  
 STA 811+31 TO 815+45 RT UNDERGROUND 4" BARE STEEL GAS LINE (ABANDONED)  
 SR 2045  
 STA 811+00 TO 813+25 RT UNDERGROUND 4" PLASTIC GAS LINE

**URR ACCESS RD SURVEY & CONSTR**

PI STA 80+32.05  
 $\Delta = 29'01'05''$  (RT)  
 D = 190'59'09"  
 T = 7.76'  
 L = 15.19'  
 R = 30.00'  
 E = 0.99'  
 PC STA 80+24.28  
 PT STA 80+39.48

**URR ACCESS RD SURVEY & CONSTR**

PI STA 84+47.38  
 $\Delta = 17'00'31''$  LT  
 D = 14'53'31"  
 T = 57.53'  
 L = 114.21'  
 R = 384.74'  
 E = 4.28'  
 PC STA 83+89.85  
 PT STA 85+04.07

**URR ACCESS RD SURVEY & CONSTR**

PI STA 82+39.65  
 $\Delta = 43'30'22''$  LT  
 D = 95'29'35"  
 T = 23.94'  
 L = 45.56'  
 R = 60.00'  
 E = 4.60'  
 PC STA 82+15.71  
 PT STA 82+61.26

**URR ACCESS RD SURVEY & CONSTR**

PI STA 86+08.34  
 $\Delta = 30'07'59''$  LT  
 D = 45'50'12"  
 T = 33.65'  
 L = 65.74'  
 R = 125.00'  
 E = 4.45'  
 PC STA 85+74.69  
 PT STA 86+40.43

**PROPOSED STRUCTURE DATA, S-40589**  
 STA 818+40.00  
 SINGLE SPAN COMPOSITE STEEL PLATE MULTI-GIRDER BRIDGE  
 SPAN: 126'-0"  
 VERTICAL CLEARANCE: 25'-0"  
 SKEW: 90°

**EXISTING STRUCTURE DATA, S-40589**  
 3-SPAN P/S CONCRETE ADJACENT BOX BEAM  
 SPAN: 1 @ 36.0', 1 @ 47.8', 1 @ 37.8'  
 VERTICAL CLEARANCE: 26.2'  
 SKEW: 72.5', RADIUS: 400.00'

- PROPERTY OWNERS**
- S349 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY RENEE COCHRAN
  - S350 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY RIVERLIFT INDUSTRIES, INC., A PENNSYLVANIA CORPORATION
  - S352 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY ANDREW V. BORRIELLO
  - S358 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY TAMARA OHLER SMITH
  - S368 PENNSYLVANIA TURNPIKE COMMISSION, FORMERLY JAMES V. MILLER AND DEBORAH S. MILLER
  - S429 KYLE A. WALK

FOR PROFILE OF URR ACCESS RD, SEE SHEET 467  
 FOR PROFILE OF SANDY LAKE ACCESS RD, SEE SHEET 465  
 FOR PROFILE OF SR 2045, SEE SHEET 464

	PREPARED BY: <b>PENNONI</b> FOSTER PLAZA 6 681 ANDERSEN DRIVE, SUITE 305 PITTSBURGH, PA 15220 PREPARED FOR: <b>THE PENNSYLVANIA TURNPIKE COMMISSION</b>		WBS NO. <b>M-052.50X002-3-03</b> NETWORK NUMBER: 7008401 FILE NAME: 1601RDp105.dgn DRAWING TYPE: 1A STRUCTURE NUMBER: 0 50 100	<b>MON/FAYETTE EXPRESSWAY</b> <b>SECTION 53B1A</b> <b>STATE ROUTE 0043</b>	<b>SR 2045 PLAN</b> <b>STA 813+50.00 TO STA 820+50.00</b>
	DISTRICT: 1 COUNTY: ALLEGHENY TOWNSHIP / BOROUGH: WEST MIFFLIN & DRAVOSBURG		DRAWING: 18 OF 19 SHEET: 437 OF 503		

PENNONI ASSOCIATES INC.  
 FILE NAME: ...CONSTR...S3B1A1601RDp105.dgn  
 PEN TABLE: PENNONI-PTC-3-COLOR.TBL  
 PLOT DRIVER: PENNONI-MNR-PTC-TOLL-PPF.PLTGFG  
 USER: TMM  
 DATE: 12/29/2023 @ 11:41:46 AM  
 USER NAME: BRUNGA





**GENERAL NOTES:**

**1. DESIGN SPECIFICATIONS:**

- AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS, 8TH EDITION, 2017 AND AS SUPPLEMENTED BY DESIGN MANUAL, PART 4, DECEMBER 2019 INCLUDING LATEST REVISIONS.
- LIVE LOAD DISTRIBUTION TO BEAMS IS BASED UPON DM-4 DISTRIBUTION FACTOR METHOD.
- DESIGN IS IN ACCORDANCE WITH THE LRFD METHOD.

**2. DESIGN LIVE LOADS:**

- PHL-93, P-82, AND P2016-13.
- FATIGUE DESIGN IS BASED ON THE FOLLOWING:  
STEEL STRUCTURES: ADTT = 1059 (2045) (ONE DIRECTIONAL)

**3. DESIGN DEAD LOADS:**

- INCLUDES A SURFACE AREA DENSITY OF 0.030 KSF FOR FUTURE WEARING SURFACE ON THE DECK SLAB.
- INCLUDES A SURFACE AREA DENSITY OF 0.015 KSF FOR PERMANENT METAL DECK FORMS WHICH TAKES INTO ACCOUNT THE WEIGHT OF THE FORM, PLUS THE WEIGHT OF THE CONCRETE IN THE VALLEY OF THE FORMS.
- DEAD LOAD INCLUDES 0.125 KIP/FT COMPOSITE LOAD IN EXTERIOR BAY 8 FOR FUTURE UTILITIES.

4. PROVIDE MATERIALS AND PERFORM WORK IN ACCORDANCE WITH SPECIFICATIONS PUBLICATION 408/2020-8, INCLUDING CURRENT SUPPLEMENTS AND CONTRACT SPECIAL PROVISIONS.

5. PROVIDE 2 INCH CONCRETE COVER ON REINFORCEMENT BARS, EXCEPT AS NOTED.

6. USE CLASS AAAP CEMENT CONCRETE IN DECK SLABS, HAUNCHES, AND END DIAPHRAGMS.

7. USE CLASS AA CEMENT CONCRETE IN BACKWALLS, CHEEKWALLS, TYPE 1 APPROACH SLABS, AND SLEEPER SLABS.

8. USE CLASS AA CEMENT CONCRETE, EXCEPT USE NO. 8 COARSE AGGREGATE IN BARRIERS.

9. USE CLASS A CEMENT CONCRETE IN ABUTMENTS BELOW BEAM SEAT, WINGWALLS, AND FOOTINGS.

10. A HIGHER CLASS CONCRETE MAY BE SUBSTITUTED FOR A LOWER CLASS CONCRETE AT NO ADDITIONAL COST TO THE COMMISSION.

11. PROVIDE GRADE 60 REINFORCING STEEL BARS THAT MEET THE REQUIREMENTS OF ASTM A 615/A 615M, A 996/A 996M, OR A 706/A 706M. DO NOT WELD GRADE 60 REINFORCING STEEL BARS UNLESS SPECIFIED. GRADE 40 REINFORCING STEEL BARS MAY BE SUBSTITUTED WITH A PROPORTIONAL INCREASE IN CROSS-SECTIONAL AREA, IF APPROVED BY THE REPRESENTATIVE. DO NOT USE RAIL STEEL A 996/A 996M REINFORCEMENT BARS IN BRIDGE PIERS, ABUTMENTS, SHEAR BLOCKS, BEAMS, FOOTINGS, PILES, BARRIERS, OR WHERE BENDING OR WELDING OF THE REINFORCEMENT BARS IS INDICATED.

12. ALL REINFORCEMENT BARS ARE TO BE EPOXY-COATED.

13. WELDING OF REINFORCEMENT BARS DURING FABRICATION OR CONSTRUCTION IS NOT PERMITTED UNLESS SPECIFIED.

14. GALVANIZED REINFORCEMENT BARS MAY BE SUBSTITUTED FOR EPOXY-COATED REINFORCEMENT BARS AT NO ADDITIONAL COST TO THE COMMISSION.

15. RAKE-FINISH ALL HORIZONTAL CONSTRUCTION JOINTS, EXCEPT AS INDICATED.

16. SOIL CLASSIFICATION SITE CLASS IS NOT CLASS E.

17. CONSTRUCT DECK SLAB TRANSVERSE CONSTRUCTION JOINTS PARALLEL TO BRIDGE CENTERLINE OF BEARINGS.

18. PLACE CHEEKWALL & BACKWALL AFTER BEAMS ARE SET IN POSITION.

19. CHAMFER EXPOSED CONCRETE EDGES 3/4 IN x 3/4 IN, EXCEPT AS NOTED.

20. ALL DIMENSIONS SHOWN ARE HORIZONTAL, EXCEPT AS NOTED.

21. USE PERMANENT METAL FORMS TO CONSTRUCT THE INTERIOR PORTIONS OF THE DECK SLAB.

22. DECK SLAB THICKNESS INCLUDES A 1/2 INCH INTEGRAL WEARING SURFACE.

23. SUPERSTRUCTURE DIMENSIONS SHOWN ARE FOR A NORMAL TEMPERATURE OF 68 DEGREES FAHRENHEIT.

24. PROVIDE MINIMUM EMBEDMENT AND SPLICE LENGTHS IN ACCORDANCE WITH STANDARD DRAWING BC-736M, UNLESS OTHERWISE INDICATED.

25. PREPARE BEARING AREAS AS SPECIFIED IN PUBLICATION 408, SECTION 1001.3(k)9.

26. FUTURE JACKING FOR BEARING REPLACEMENT OR BEARING RESET CAN BE ACCOMMODATED WITH JACKS SUPPORTED BY ABUTMENT BEAM SEATS AT LOCATIONS OF JACKING STIFFENERS.

27. APPLY PROTECTIVE COATING FOR REINFORCED CONCRETE SURFACES (PENETRATING SEALER) TO THE ENTIRE BRIDGE DECK AND INSIDE AND TOP OF CURBS, BARRIERS, AND APPROACH SLABS AS SPECIFIED IN SECTION 1001.3(t).

28. EXISTING BRIDGE IS POSTED FOR A WEIGHT RESTRICTION OF 22 TONS EXCEPT COMBINATIONS 27 TONS. SEE PUBLICATION 408, SECTION 105.17 FOR CONSTRUCTION LOADING LIMITS.

**29. UTILITY NOTES:**

- COORDINATE, LOCATE, AND CONDUCT ALL WORK RELATED TO PUBLIC AND PRIVATE UTILITIES IN ACCORDANCE WITH PUBLICATION 408/2020, SECTIONS 105.06 AND 107.12.

30. THE FOLLOWING LEGEND APPLIES TO ALL DRAWINGS:

- BFE = BOTTOM OF FOOTING ELEVATION
- BOT = BOTTOM
- BRG = BEARING
- SPA = SPACE
- WP = WORK POINT
- PG = PROFILE GRADE
- EF = EACH FACE
- FF = FRONT FACE
- RF = REAR FACE
- CLR = CLEAR
- CONSTR = CONSTRUCTION

**31. FOUNDATION NOTES:**

- THE CONTRACTOR IS RESPONSIBLE FOR THE STABILITY OF ALL EXCAVATED SLOPES. DIRECT SURFACE RUNOFF AWAY FROM THE EXCAVATION AND PROVIDE SUFFICIENT DEWATERING SO THAT THE EXCAVATIONS ARE DRY ENOUGH TO BE INSPECTED BY THE COMMISSION'S REPRESENTATIVE.

- USE SULFATE CORROSION RESISTANT CEMENT CONCRETE AND EPOXY-COATED REINFORCEMENT FOR ALL SUBSTRUCTURES.

- PROVIDE ADEQUATE DRAINAGE BEHIND THE ABUTMENTS TO REDUCE THE BUILD-UP OF ANY HYDROSTATIC PRESSURE.

- BLASTING SHALL NOT BE USED AS A METHOD OF EXCAVATION FOR FOOTING CONSTRUCTION.

- DESIGN AND CONSTRUCT TEMPORARY SHORING/EXCAVATION IN ACCORDANCE WITH SPECIAL PROVISION TEMPORARY SHORING AND OSHA REQUIREMENTS. COORDINATE DESIGN OF TEMPORARY SHORING THAT FALLS WITHIN THE RIGHT-OF-WAY OF THE RAILROAD AREA WITH UNION RAILROAD.

- FOR MICROPILE NOTES AND ADDITIONAL ABUTMENT NOTES, SEE SHEET 17.

**32. FABRICATED STRUCTURAL STEEL NOTES:**

- PROVIDE STRUCTURAL STEEL CONFORMING TO AASHTO M 270/ M 270M, GRADE 50W (ASTM A 709/ A 709M, GRADE 50W) DESIGNATION, EXCEPT WHEN NOTED OTHERWISE.

- PAINT ALL GIRDERS AND STRUCTURAL STEEL FOR A LENGTH OF 8'-3" FROM ABUTMENT 2 GIRDER ENDS IN ACCORDANCE WITH SECTION 1060 AND THE SPECIAL PROVISIONS. THE COLOR OF THE FINISH COAT WILL BE REDDISH BROWN MATCHING FEDERAL STANDARD 595C COLOR NO.10075. PAINT IS INCIDENTAL TO FABRICATED STRUCTURAL STEEL.

- IF GIRDERS CANNOT BE SHIPPED IN THE LENGTHS SHOWN ON THE PLANS, ADDITIONAL FIELD SPLICE(S) WILL BE PERMITTED AT THE REQUEST OF THE CONTRACTOR, BUT NO COMPENSATION WILL BE ALLOWED FOR THE SPLICES.

- IF THE GIRDERS CAN BE FABRICATED IN LENGTHS LONGER THAN THE SECTIONS SHOWN ON THE PLANS BY ELIMINATING THE FIELD SPLICE, FIELD SPLICE MAY BE OMITTED AT THE REQUEST OF THE CONTRACTOR. THE CONTRACTOR ASSUMES FULL RESPONSIBILITY FOR SECURING A HAULING PERMIT. APPROVAL FOR ELIMINATION OF A FIELD SPLICE AT THE SHOP DRAWING STAGE DOES NOT OBLIGATE THE COMMISSION TO ISSUE A HAULING PERMIT.

- DO NOT USE FORM SUPPORT SYSTEMS THAT WILL CAUSE UNACCEPTABLE OVERSTRESS OR DEFORMATION TO PERMANENT BRIDGE MEMBERS.

- ALL FASTENERS ARE 7/8" DIA ASTM F3125 GRADE A325 TYPE 3. THREADS TO BE EXCLUDED FROM THE SHEAR PLANE.

- REAM SUBDRILLED OR SUBPUNCHED HOLES FOR FIELD SPLICES IN THE FABRICATION SHOP.

- DO NOT MAKE WELDS BY MANUAL SHIELDED METAL ARC PROCESS FOR PRIMARY GIRDER WELDS, SUCH AS FLANGE-TO-WEB WELDS OR FOR SHOP SPLICES OF WEBS AND FLANGES.

- PROVIDE WELDED STUD SHEAR CONNECTORS MANUFACTURED FROM STEEL CONFORMING TO ASTM A108.

- SET ANCHOR BOLTS TO TEMPLATE OR IN PREFORMED HOLES. DO NOT DRILL UNLESS SPECIFICALLY INDICATED ON PLANS. FILL THE PREFORMED HOLES WITH NON-SHRINK GROUT. FILL THE CLEARANCE BETWEEN ANCHOR BOLTS AND HOLES IN MASONRY PLATES WITH APPROVED NON-HARDENING CAULKING COMPOUND CONFORMING TO SECTION 705.7.

- PERFORM CHARPY V-NOTCH (CVN) TESTS AS SPECIFIED AS PER PUBLICATION 408, SECTION 1105.02(a)5.

- DO NOT PLACE ANY DECK CONCRETE, SIP FORMS, OR DECK REINFORCEMENT BARS UNTIL ALL STRUCTURAL STEEL IS IN PLACE AND FULLY CONNECTED.

- THE STEEL SUPERSTRUCTURE SHALL BE DETAILED AND FABRICATED FOR STEEL DEAD LOAD FIT.

**33. FIELD WELDING NOTES:**

- WELDING SPECIFICATIONS: AASHTO/AWS D1.5M/D1.5 BRIDGE WELDING CODE (2015) CONSISTENT WITH PUBLICATION 408 SECTION 1105.03(M) AND THE CONTRACT SPECIAL PROVISIONS. DO NOT FIELD WELD ON ANY PART OF THE BRIDGE, EXCEPT WHERE SHOWN ON THE DRAWINGS, WITHOUT PRIOR APPROVAL OF THE REPRESENTATIVE.

- MAKE TACK WELDS WITH THE SAME TYPE OF ELECTRODE AND INCORPORATE IN THE FINAL WELD. NO OTHER TACK WELDING WILL BE PERMITTED.

- DO NOT WELD WHEN SURFACES TO BE WELDED ARE MOIST OR EXPOSED TO RAIN, SNOW, OR WIND, OR WHEN WELDERS ARE EXPOSED TO INCLEMENT CONDITIONS THAT WILL ADVERSELY AFFECT THE QUALITY OF THE WORK.

- DO NOT WELD OR BURN WHEN THE TEMPERATURE IS BELOW 0°F. PREHEAT AND MAINTAIN THE TEMPERATURE OF THE METAL TO AT LEAST 70°F WHEN THE TEMPERATURE OF THE METAL IS BETWEEN 0°F AND 32°F DURING WELDING AND BURNING.

- PREHEAT THE STEEL TO THE SPECIFIED MINIMUM TEMPERATURE FOR A DISTANCE EQUAL TO THE THICKNESS OF THE PART BEING WELDED, BUT NOT LESS THAN 3" IN ALL DIRECTIONS FROM THE POINT OF WELDING.

- REMOVE BY APPLICATION OF HEAT, ANY MOISTURE PRESENT AT POINT OF WELD. PROVIDE WINDBREAKS FOR PROTECTION, FROM DIRECT WIND.

- PRIOR TO PLACING WELD, THOROUGHLY CLEAN ALL PORTIONS OF NEW AN EXISTING SURFACES TO RECEIVE WELDS OF ALL FOREIGN MATTER, INCLUDING PAINT FILM, FOR A DISTANCE OF 2" FROM EACH SIDE OF THE OUTSIDE LINE OF THE WELD.

- TEST COMPLETED WELDS USING VISUAL AND NON-DESTRUCTIVE METHODS IN ACCORDANCE WITH AASHTO/AWS D1.5M/D1.5 BRIDGE WELDING CODE CHAPTER 6.

**34. EXISTING BRIDGE PLANS:**

- DO NOT CONSIDER ANY OF THE DATA ON THE EXISTING STRUCTURE SUPPLIED IN THE ORIGINAL DESIGN DRAWINGS OR MADE AVAILABLE TO YOU BY THE TURNPIKE COMMISSION OR ITS AUTHORIZED AGENTS AS POSITIVE REPRESENTATIONS OF ANY OF THE CONDITIONS THAT YOU WILL ENCOUNTER IN THE FIELD. THIS DATA IS NOT TO BE CONSIDERED A BASIS FOR COMPUTATION OF THE UNIT PRICES USED FOR BIDDING PURPOSES. THE BIDDER IS NOT TO RELY ON THIS INFORMATION, BUT IS TO ASSUME THE POSSIBILITY THAT CONDITIONS AFFECTING THE COST AND/OR QUANTITIES OF WORK TO BE PERFORMED MAY DIFFER FROM THOSE INDICATED.

**REFERENCE DRAWINGS — EXISTING BRIDGE**

STRUCTURE NO.	DRAWING NO.	TITLE
COUNTY OF ALLEGHENY BRIDGE NO.1 UNION RAILROAD APRIL 1956	22535	GENERAL PLAN AND ELEVATION
	22536	CONTOUR PLAN AND GENERAL NOTES
	22537	FOUNDATION PLAN AND DETAILS NORTH ABUTMENT
	22538	DETAILS OF SOUTH ABUTMENT AND PEDESTALS
	22539	PRECAST CONCRETE BEAM DETAILS
	22540	PIERS NO 1 AND NO 2
	22541	HANDRAIL

PROVIDED FOR INFORMATION ONLY.

**SEQUENCE OF BRIDGE CONSTRUCTION:**

1. PLACE TEMPORARY STRUCTURE MOUNTED BARRIER FOR STAGE 1, SEE TRAFFIC CONTROL PLAN. INSTALL EROSION AND SEDIMENT CONTROLS.
2. INSTALL TEMPORARY SHORING.
3. REMOVE PORTION OF EXISTING STRUCTURE THAT INTERFERES WITH NEW STAGE 1 CONSTRUCTION. ANTICIPATED REMOVAL INCLUDES THE THREE-SPAN PORTION OF ORIGINAL WIDENED STRUCTURE, INCLUDING SIDEWALK, ADJACENT BOX BEAMS, ABUTMENT 1, PIER BENTS AND ABUTMENT 2. RETAIN ORIGINAL STRUCTURE NORTHEAST AND SOUTHEAST U-WINGS. REMOVE ADJACENT TROLLEY BRIDGE SUPERSTRUCTURE.
4. CONSTRUCT NEW SUBSTRUCTURE AND SUPERSTRUCTURE WITHIN STAGE 1 LIMITS.
5. PLACE TEMPORARY STRUCTURE MOUNTED BARRIER FOR STAGE 2.
6. MODIFY TEMPORARY SHORING FOR STAGE 2 WORK.
7. REMOVE REMAINING PORTIONS OF EXISTING STRUCTURE.
8. CONSTRUCT NEW SUBSTRUCTURE AND SUPERSTRUCTURE WITHIN STAGE 2 LIMITS.

PENNONI ASSOCIATES, INC.  
 FILE NAME: ...FINAL DESIGN\1601STgn02.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTG  
 DATE PLOTTED: 9/17/2025 @ 11:56:12 AM  
 USER NAME: aburda@pennoni.com

DES: ALB	DWG: EF	CKD: ALB					BMS. NO. 02 2045 0030 0841	BRKEY NO. 1559
					<b>WBS NO.</b> M-052.50X002-3-03 NETWORK NUMBER: 7008401 FILE NAME: 1601STgn02 DRAWING TYPE: 2G STRUCTURE NUMBER: S-40589 (MF-412)		<b>MON/FAYETTE EXPRESSWAY</b> SECTION 53B1A STATE ROUTE 0043	
PREPARED BY: PENNONI FOSTER PLAZA 6 681 ANDERSEN DRIVE, SUITE 305 PITTSBURGH, PA 15220							<b>S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)</b> OVER UNION RAILROAD STA. 818+40.00 SINGLE SPAN COMPOSITE STEEL PLATE MULTI-GIRDER BRIDGE GENERAL NOTES	
PREPARED FOR: THE PENNSYLVANIA TURNPIKE COMMISSION							DISTRICT: 1      COUNTY: ALLEGHENY TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH	
			NO.      REVISIONS      DATE      APPR.		SCALE: AS NOTED		DRAWING: OF SHEET: 2 OF 66	

BRIDGE LOAD RATINGS WITH FUTURE WEARING SURFACE								
ADTT = 1059 (YEAR 2045) (ONE-DIRECTIONAL)								
COMPOSITE STEEL WELDED PLATE GIRDER								
LIVE LOAD RATINGS		H20	HS-20	ML-80	TK-527	PHL-93	P-82	P2016-13
INVENTORY RATING (I.R.)	DISTRIBUTION FACTOR	0.867	0.867	0.867	0.867	0.867	—	—
	LOCATION	1.00 L	—	—				
	LIMIT STATE	STR-I	STR-I	STR-I	STR-I	STR-I	—	—
	RATING FACTOR	2.42 (S)	2.41 (S)	2.25 (S)	2.12 (S)	1.66 (S)	—	—
	RATING (TONS)	48.4	86.9	82.4	84.9	—	—	—
OPERATING RATING (O.R.)	DISTRIBUTION FACTOR	0.867	0.867	0.867	0.867	0.867	0.867	0.867
	LOCATION	1.00 L						
	LIMIT STATE	STR-II	STR-II	STR-II	STR-II	STR-IA	STR-II	STR-II
	RATING FACTOR	3.14 (S)	3.13 (S)	2.92 (S)	2.75 (S)	2.15 (S)	1.39 (S)	1.08 (S)
	RATING (TONS)	62.8	112.7	106.8	110.0	—	141.5	178.6

MAXIMUM FACTORED MOMENT CAPACITY (KIP-FT): 15475.27 k-ft @ 0.0L  
 MAXIMUM FACTORED SHEAR RESISTANCE (KIPS): 1196.25 k @ 0.0L

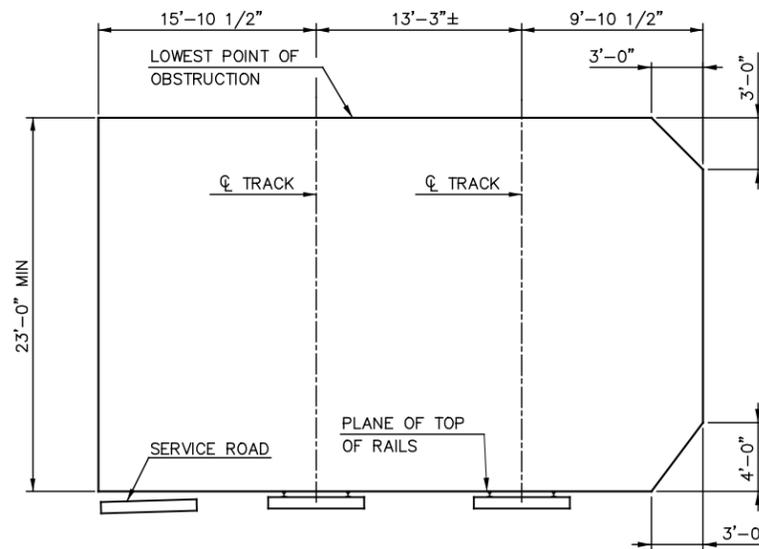
BRIDGE LOAD RATINGS WITHOUT FUTURE WEARING SURFACE								
ADTT = 1059 (YEAR 2045) (ONE-DIRECTIONAL)								
COMPOSITE STEEL WELDED PLATE GIRDER								
LIVE LOAD RATINGS		H20	HS-20	ML-80	TK-527	PHL-93	P-82	P2016-13
INVENTORY RATING (I.R.)	DISTRIBUTION FACTOR	0.867	0.867	0.867	0.867	0.867	—	—
	LOCATION	1.00 L	—	—				
	LIMIT STATE	STR-I	STR-I	STR-I	STR-I	STR-I	—	—
	RATING FACTOR	2.59 (S)	2.58 (S)	2.40 (S)	2.27 (S)	1.77 (S)	—	—
	RATING (TONS)	51.7	92.8	88.0	90.6	—	—	—
OPERATING RATING (O.R.)	DISTRIBUTION FACTOR	0.867	0.867	0.867	0.867	0.867	0.867	0.867
	LOCATION	1.00 L						
	LIMIT STATE	STR-II	STR-II	STR-II	STR-II	STR-IA	STR-II	STR-II
	RATING FACTOR	3.35 (S)	3.34 (S)	3.11 (S)	2.94 (S)	2.29 (S)	1.48 (S)	1.16 (S)
	RATING (TONS)	67.0	120.3	114.1	117.5	—	151.1	190.8

MAXIMUM FACTORED MOMENT CAPACITY (KIP-FT): 15475.27 k-ft @ 0.0L  
 MAXIMUM FACTORED SHEAR RESISTANCE (KIPS): 1196.25 k @ 0.0L

**RATING NOTES:**

- DATA IS TAKEN FROM PENNDOT'S LRFD STEEL GIRDER DESIGN AND RATING OUTPUT (VERSION 2.9.0.0)
- M - DENOTES THAT MOMENT CONTROLS THE RATING FACTOR.
- S - DENOTES THAT SHEAR CONTROLS THE RATING FACTOR.
- THE FIRST INTERIOR BEAM 8 CONTROLS THE RATINGS.
- SERV - DENOTES SERVICE LIMIT STATE.
- STR - DENOTES STRENGTH LIMIT STATE.
- THE GIVEN DISTRIBUTION FACTOR IS THE VEHICULAR LOAD DISTRIBUTION FACTOR USED TO PRODUCE THE GIVEN RATING.
- ML = PENNSYLVANIA MAX LEGAL LOAD (ML-80), P-82 = PENNSYLVANIA PERMIT LOAD, P2016-13 = PENNSYLVANIA PERMIT LOAD.
- Fy = 50,000 PSI.
- SINGLE SPAN BRIDGE, SPAN LENGTH, L = 126'-7 3/16" @ BEARING TO @ BEARING, MEASURED ALONG PROFILE GRADE (+9.73%).

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1	GENERAL PLAN AND ELEVATION	33	WINGWALL C ELEVATION AND SECTION
2	GENERAL NOTES	34	WINGWALL D ELEVATION AND SECTION
3	LOAD RATINGS AND INDEX OF DRAWINGS	35	ABUTMENT 1 FOOTING REINFORCEMENT BAR SCHEDULE
4	QUANTITIES		ABUTMENT 1 REINFORCEMENT BAR SCHEDULE
5	QUANTITIES	36	CONSTRUCTION STAGING - SHEET 1 OF 2
6	CONSTRUCTION STAGING - SHEET 2 OF 2		ABUTMENT 2 FOOTING REINFORCEMENT BAR SCHEDULE
7	STAKE-OUT PLAN	37	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 1 OF 6
8	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 2 OF 6		FRAMING PLAN
9	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 3 OF 6	40	GIRDER ELEVATION
10	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 4 OF 6		GIRDER SPlice DETAILS
11	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 5 OF 6	42	GIRDER SECTION PROPERTIES AND CAMBER ORDINATES
12	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 6 OF 6		SHEAR AND REACTIONS TABLES
13	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 1 OF 6	44	MOMENT TABLES
14	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 2 OF 6		ABUTMENT 1 DIAPHRAGM AND DECK DETAILS
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16	CONCEPTUAL ABUTMENT ACCESS PLAN SHEET 4 OF 6		STEEL DIAPHRAGM AND JACKING DETAILS
17	EXCAVATION DETAILS	48	BEARING DETAILS
18	ROCK PLACEMENT AND DRAINAGE DETAILS		DECK PLAN
19	MICROPILE DETAILS	50	TYPICAL DECK SECTION
20	ABUTMENT 1 PILE LAYOUT PLAN		DECK REINFORCEMENT BAR SCHEDULE
21	ABUTMENT 1 FOOTING PLAN BOTTOM MAT REINFORCEMENT	52	TABLE OF DECK ELEVATIONS
22	ABUTMENT 1 FOOTING PLAN TOP MAT REINFORCEMENT		ABUTMENT 1 APPROACH SLAB PLAN
23	ABUTMENT 1 PLAN	54	APPROACH SLAB DETAILS 1
24	ABUTMENT 1 ELEVATION		ABUTMENT 2 APPROACH SLAB PLAN
25	ABUTMENT 1 SECTIONS	56	APPROACH SLAB DETAILS 2
26	WINGWALL A ELEVATION AND SECTION		APPROACH SLAB DETAILS 3
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28	ABUTMENT 2 PILE LAYOUT PLAN		ABUTMENT 2 APPROACH SLAB REINFORCEMENT BAR SCHEDULE
29	ABUTMENT 2 FOOTING PLAN BOTTOM MAT REINFORCEMENT	60	STRUCTURE BORINGS
30	ABUTMENT 2 FOOTING PLAN TOP MAT REINFORCEMENT		STRUCTURE BORINGS
31	ABUTMENT 2 PLAN	62	STRUCTURE BORINGS
32	ABUTMENT 2 ELEVATION		STRUCTURE BORINGS
33	ABUTMENT 2 SECTIONS - SHEET 1 OF 2	64	STRUCTURE BORINGS
34	ABUTMENT 2 SECTIONS - SHEET 2 OF 2		STRUCTURE BORINGS



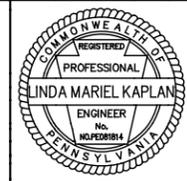
**RAILROAD CLEARANCE ENVELOPE**  
NOT TO SCALE

**RAILROAD CLEARANCE ENVELOPE DATA:**

- 23'-0" MIN VERTICAL CLEARANCE REQUIRED PER AREMA.
- 25'-0" MIN VERTICAL CLEARANCE PROVIDED.
- 15'-10 1/2" HORIZONTAL CLEARANCE BASED ON:  
 9'-0" MINIMUM RAILWAY CLEARANCE (AREMA)  
 10 1/2" INCREASE FOR CURVED TRACK CLEARANCE ON 7 DEGREE CURVE (AREMA)  
 6'-0" INCREASE FOR SERVICE ROAD (URR)

PENNONI ASSOCIATES, INC.  
 FILE NAME: \\...FINAL DESIGN\1601STdt03.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRG  
 DATE PLOTTED: 9/17/2025 @ 11:56:32 AM  
 USER NAME: aburdaugh

DES: ALB DWG: EF CKD: LMK



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: 1601STdt03

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

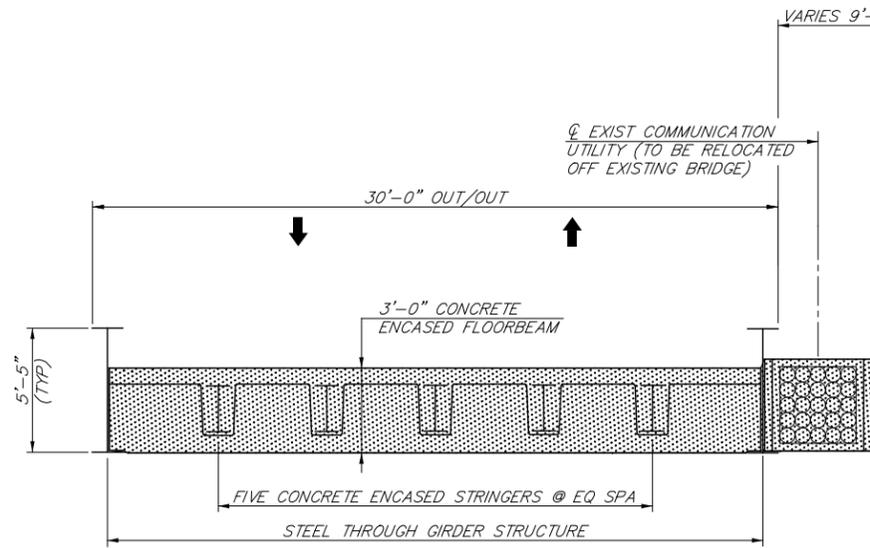
BMS. NO. 02 2045 0030 0841 BRKEY NO. 1559

**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

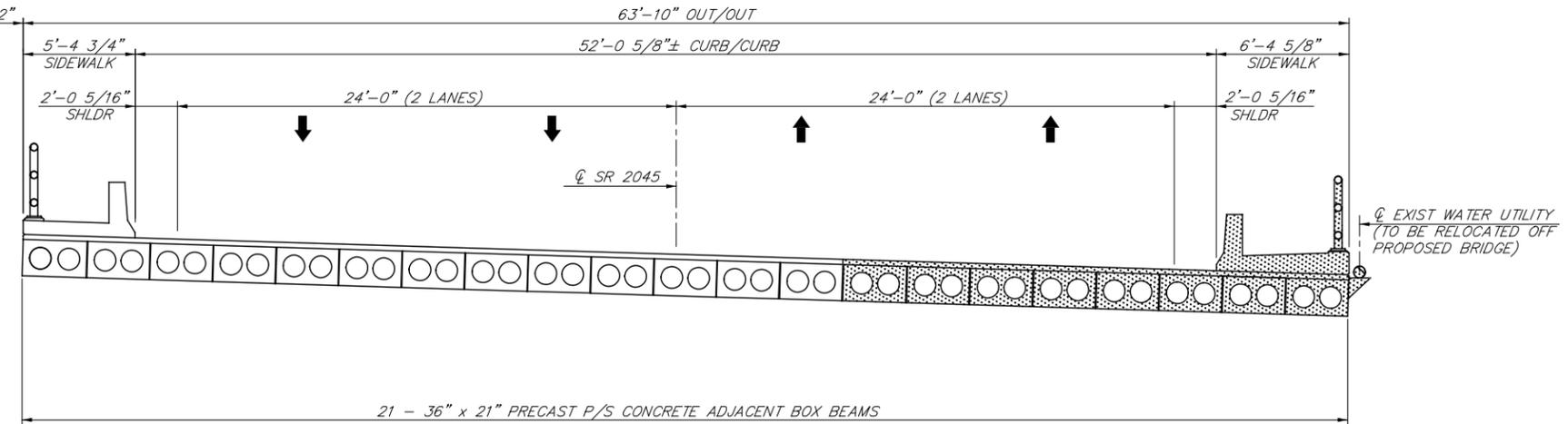
DISTRICT: 1 COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)  
 OVER UNION RAILROAD STA. 818+40.00  
 SINGLE SPAN COMPOSITE STEEL PLATE  
 MULTI-GIRDER BRIDGE  
 LOAD RATINGS AND INDEX OF DRAWINGS**

DRAWING: OF  
 SHEET: 3 OF 66



TYPICAL SECTION - ADJACENT TROLLEY BRIDGE



TYPICAL SECTION - SR 2045 STRUCTURE

TYPICAL SECTION - EXISTING STRUCTURES

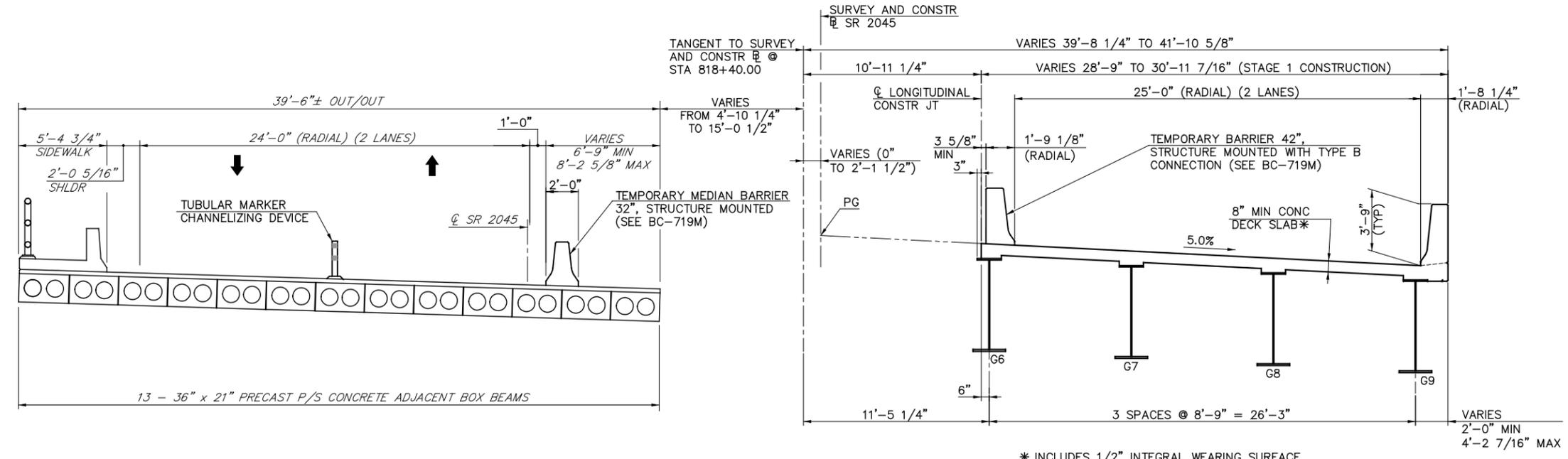


LEGEND

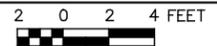
DENOTES REMOVAL OF EXISTING STRUCTURE - STAGE 1

NOTES:

- REFER TO THE TRAFFIC CONTROL PLAN FOR OVERALL SEQUENCE OF CONSTRUCTION.
- FOR TEMPORARY MEDIAN BARRIER 32", STRUCTURE MOUNTED DETAILS, SEE PENNDOT STANDARD DRAWING BC-719M.

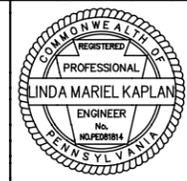


STAGE 1 CONSTRUCTION



PENNONI ASSOCIATES, INC.  
 FILE NAME: \\PENNONI\PROJECTS\1601STdt06.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDR  
 DATE PLOTTED: 9/17/2025 @ 11:56:51 AM  
 USER NAME: aburda@pen

DES: DFG DWG: ASA CKD: DFG



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: 1601STdt06

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

DISTRICT: 1 COUNTY: ALLEGHENY

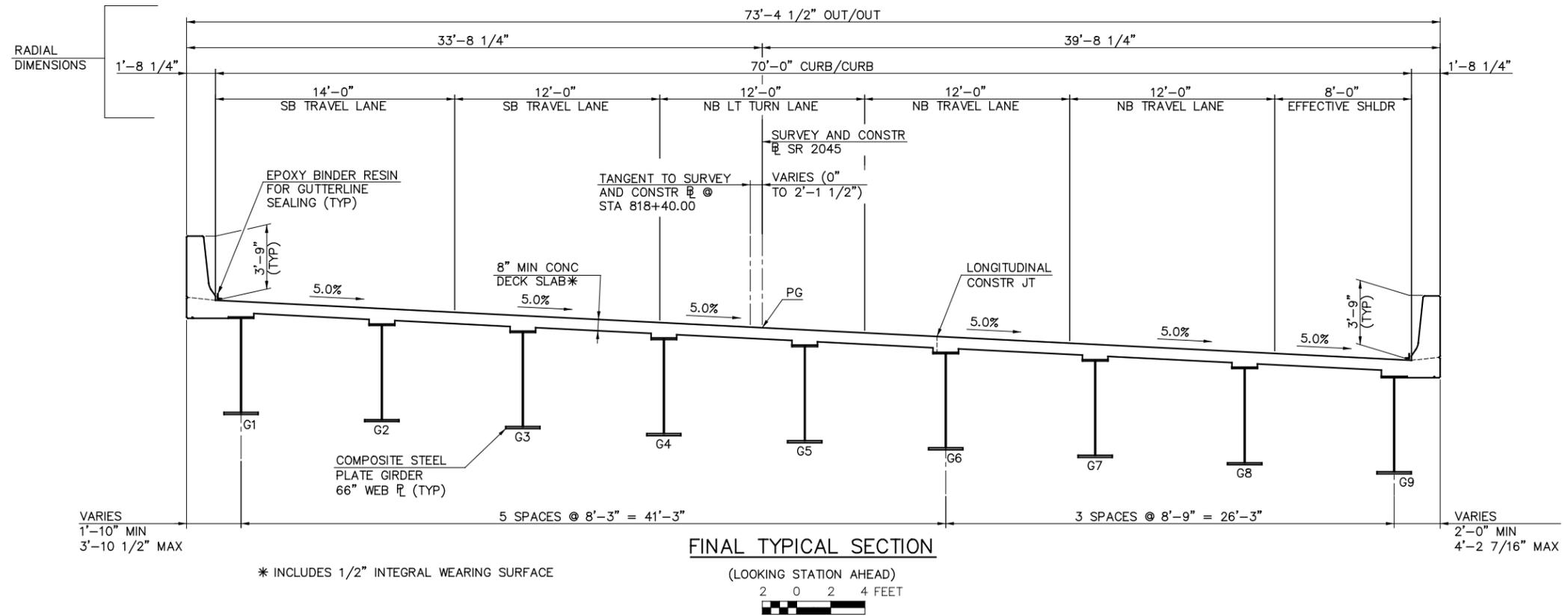
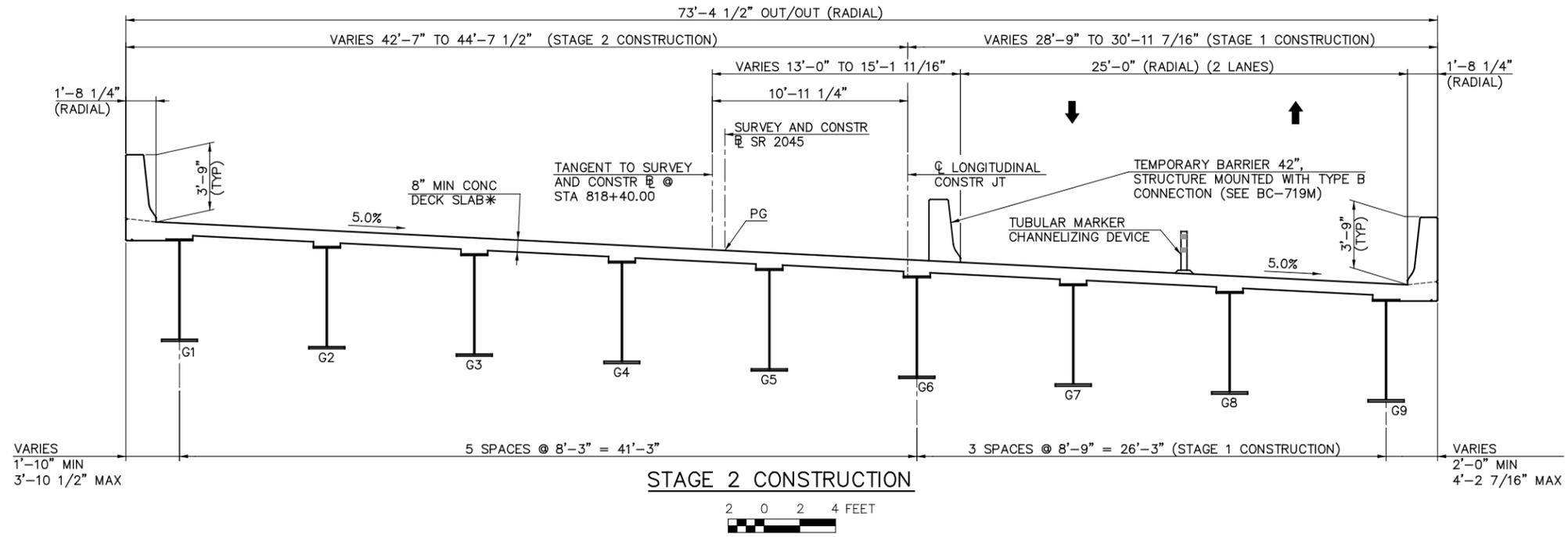
TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

BMS. NO. 02 2045 0030 0841 BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)  
 OVER UNION RAILROAD STA. 818+40.00  
 SINGLE SPAN COMPOSITE STEEL PLATE  
 MULTI-GIRDER BRIDGE  
 CONSTRUCTION STAGING - SHEET 1 OF 2**

DRAWING: OF

SHEET: 6 OF 66

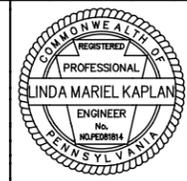


**NOTES:**

- REFER TO THE TRAFFIC CONTROL PLAN FOR OVERALL SEQUENCE OF CONSTRUCTION.
- FOR TEMPORARY MEDIAN BARRIER 32", STRUCTURE MOUNTED DETAILS, SEE BC-719M.

PENNONI ASSOCIATES, INC.  
 FILE NAME: \\PENNONI\DESIGN\1601STdt07.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRG  
 DATE PLOTTED: 9/17/2025 @ 11:57:10 AM  
 USER NAME: aburda@pen

DES: DFG DWG: EF CKD: ALB



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: 1601STdt07

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

DISTRICT: 1 COUNTY: ALLEGHENY

TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

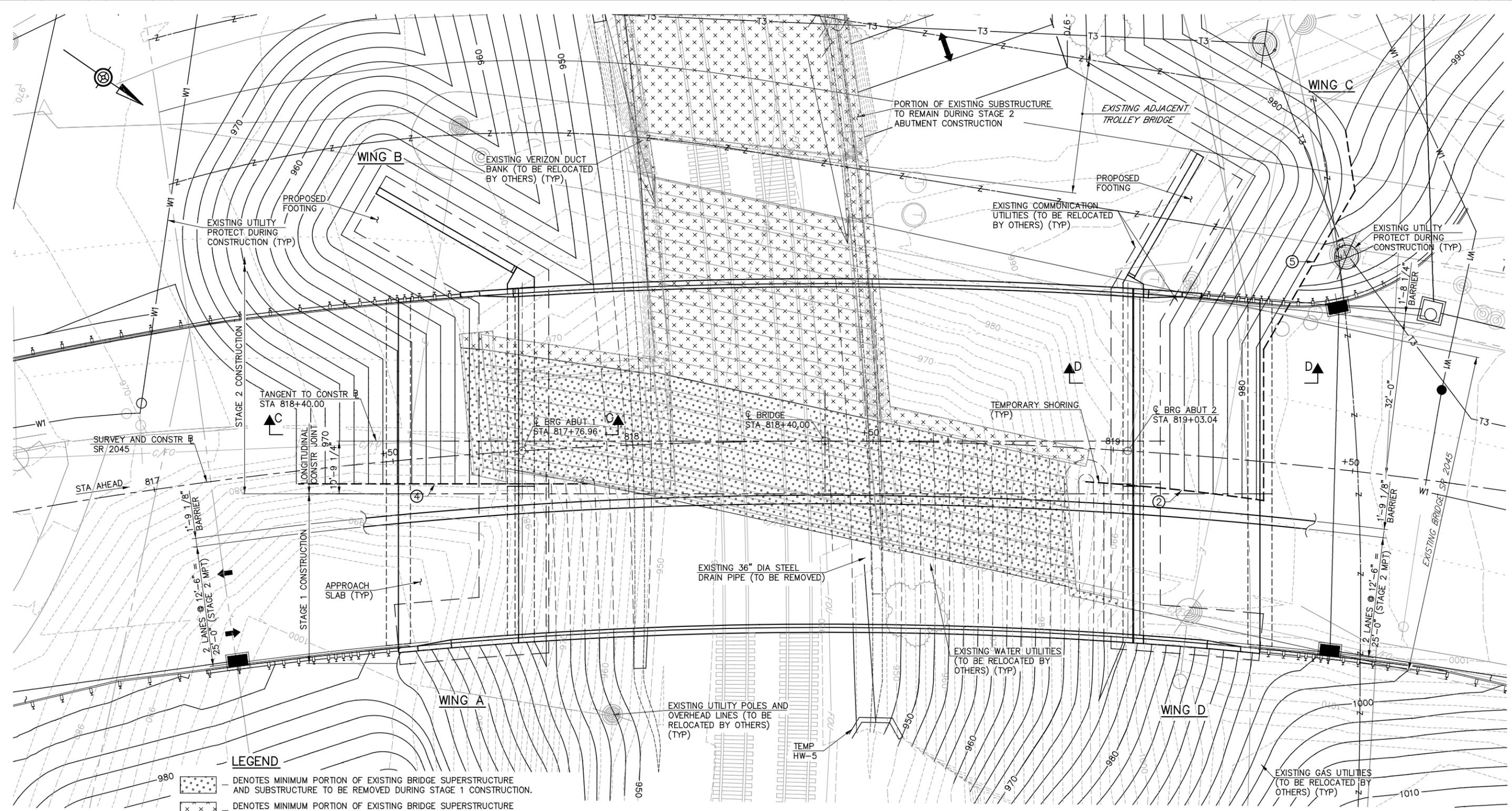
BMS. NO. 02 2045 0030 0841 BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)  
 OVER UNION RAILROAD STA. 818+40.00  
 SINGLE SPAN COMPOSITE STEEL PLATE  
 MULTI-GIRDER BRIDGE  
 CONSTRUCTION STAGING - SHEET 2 OF 2**

DRAWING: OF

SHEET: 7 OF 66

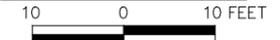




**LEGEND**

- DENOTES MINIMUM PORTION OF EXISTING BRIDGE SUPERSTRUCTURE AND SUBSTRUCTURE TO BE REMOVED DURING STAGE 1 CONSTRUCTION.
- DENOTES MINIMUM PORTION OF EXISTING BRIDGE SUPERSTRUCTURE AND SUBSTRUCTURE TO BE REMOVED DURING STAGE 2 CONSTRUCTION.
- GENERAL LOCATION OF TEMPORARY SHORING DURING STAGE 2 CONSTRUCTION. ACTUAL LENGTH AND LOCATION MAY VARY BASED UPON CONTRACTOR DESIGN.
- TEMPORARY SHORING LINE #. MODIFY STAGE 1 SHORING FOR USE IN STAGE 2 AS NEEDED.
- DENOTES ABUTMENT ACCESS ROAD.

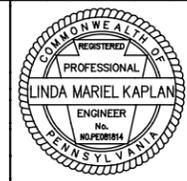
**PLAN - STAGE 2**



*FOR INFORMATION ONLY*

PENNONI ASSOCIATES, INC.  
 FILE NAME: ...FINAL DESIGN 1601STd110.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRG  
 DATE PLOTTED: 9/26/2025 @ 9:43:45 AM  
 USER NAME: aburdaugh

DES: DFG DWG: ALB CKD: DFG



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220  
  
 PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



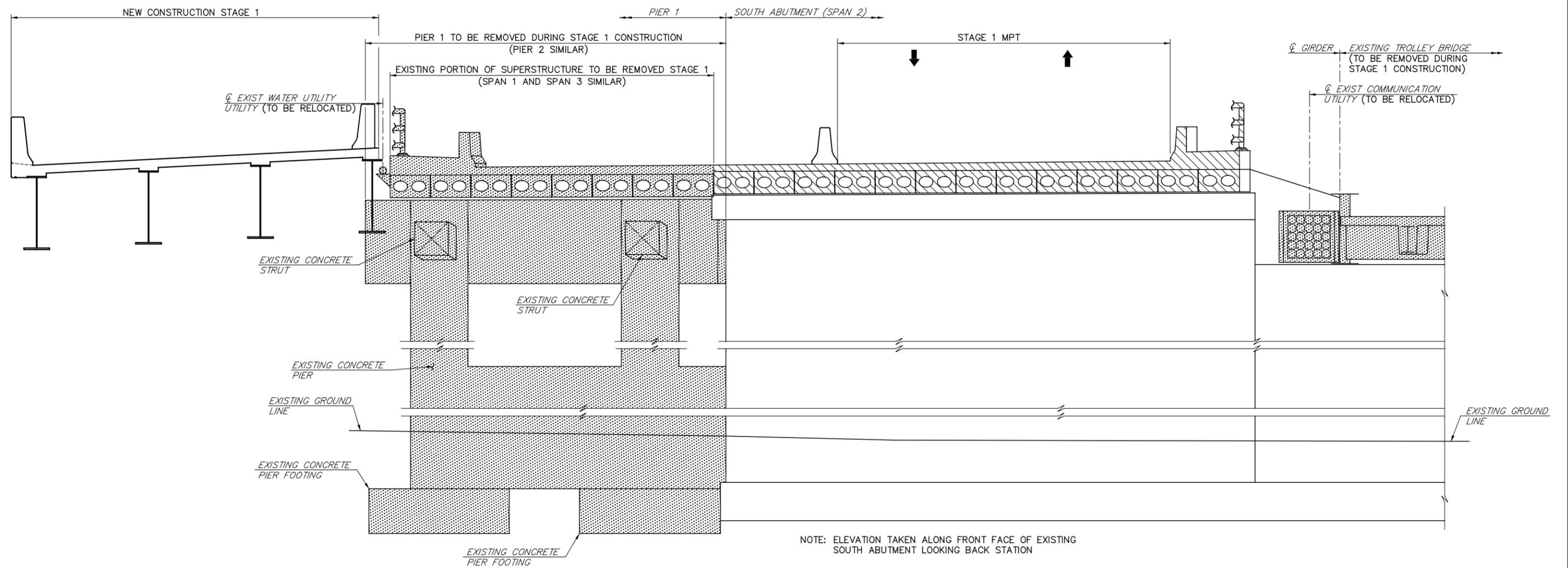
NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03  
 NETWORK NUMBER: 7008401  
 FILE NAME: 1601STd110  
 DRAWING TYPE: 2G  
 STRUCTURE NUMBER: S-40589 (MF-412)  
  
 SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY**  
**SECTION 53B1A**  
**STATE ROUTE 0043**  
  
 DISTRICT: 1 COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

BMS. NO. 02 2045 0030 0841 BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)**  
**OVER UNION RAILROAD STA. 818+40.00**  
**SINGLE SPAN COMPOSITE STEEL**  
**PLATE MULTI-GIRDER BRIDGE**  
**CONCEPTUAL ABUTMENT ACCESS PLAN**  
**SHEET 2 OF 6**  
  
 DRAWING: OF  
 SHEET: 10 OF 66



DATUM 936.00

**LEGEND**

-  TEMPORARY BARRIER 42",  
STRUCTURE MOUNTED
-  TEMPORARY MEDIAN BARRIER 32",  
STRUCTURE MOUNTED

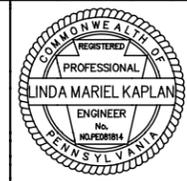
**ELEVATION – SOUTH ABUTMENT AND PIER 1  
REMOVAL LIMITS FOR PIER 1 STAGE 1  
(PIER 2 STAGE 1 SIMILAR)**

2 0 2 4 FEET

*FOR INFORMATION ONLY*

PENNONI ASSOCIATES, INC.  
 FILE NAME: \\FINAL DESIGN\1601STdt13.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRIVER  
 DATE PLOTTED: 9/17/2025 @ 11:58:51 AM  
 USER NAME: abuter@adg

DES: DFG | DWG: ASA | CKD: JDS



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: 1601STdt13

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

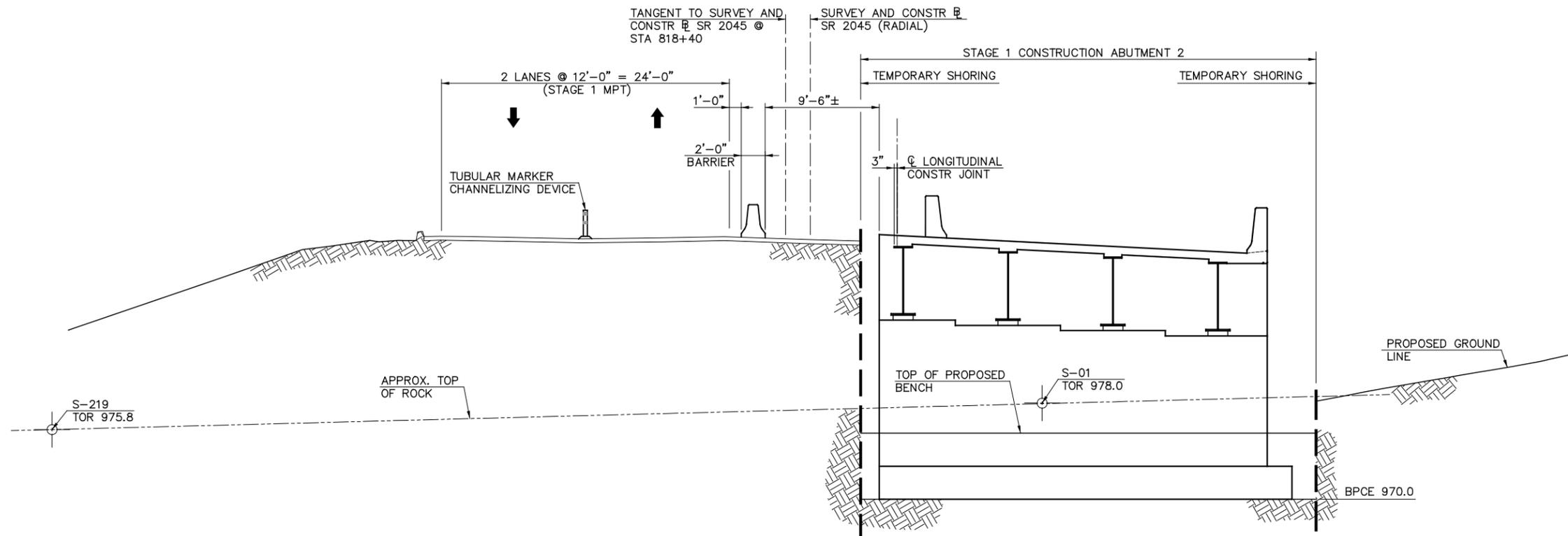
**MON/FAYETTE EXPRESSWAY  
 SECTION 53B1A  
 STATE ROUTE 0043**

DISTRICT: 1 | COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

BMS. NO. 02 2045 0030 0841 | BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)  
 OVER UNION RAILROAD STA. 818+40.00  
 SINGLE SPAN COMPOSITE STEEL PLATE  
 MULTI-GIRDER BRIDGE  
 CONCEPTUAL ABUTMENT ACCESS PLAN  
 SHEET 5 OF 6**

DRAWING: OF  
 SHEET: 13 OF 66



DATUM 950.0

**LEGEND**

-  TEMPORARY BARRIER 42", STRUCTURE MOUNTED
-  TEMPORARY MEDIAN BARRIER 32", STRUCTURE MOUNTED

**SECTION PERPENDICULAR TO TANGENT @ SURVEY AND CONSTR @ STA 819+03.00**  
**LOOKING STATIONS AHEAD**  
**(ELEVATION - ABUTMENT 2)**



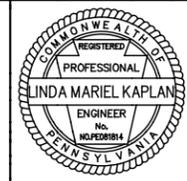
*FOR INFORMATION ONLY*

**NOTES:**

- FOR BORING LOCATION TABLE, SEE SHEET 1.
- TOR DENOTES TOP OF ROCK.

PENNONI ASSOCIATES, INC.  
 FILE NAME: \\...FINAL DESIGN\1601Stdt14.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRIVER  
 DATE PLOTTED: 9/17/2025 @ 11:59:10 AM  
 USER NAME: Abuter@adg

DES: DFG DWG: ASA CKD: JDS



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: 1601Stdt14

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY**  
**SECTION 53B1A**  
**STATE ROUTE 0043**

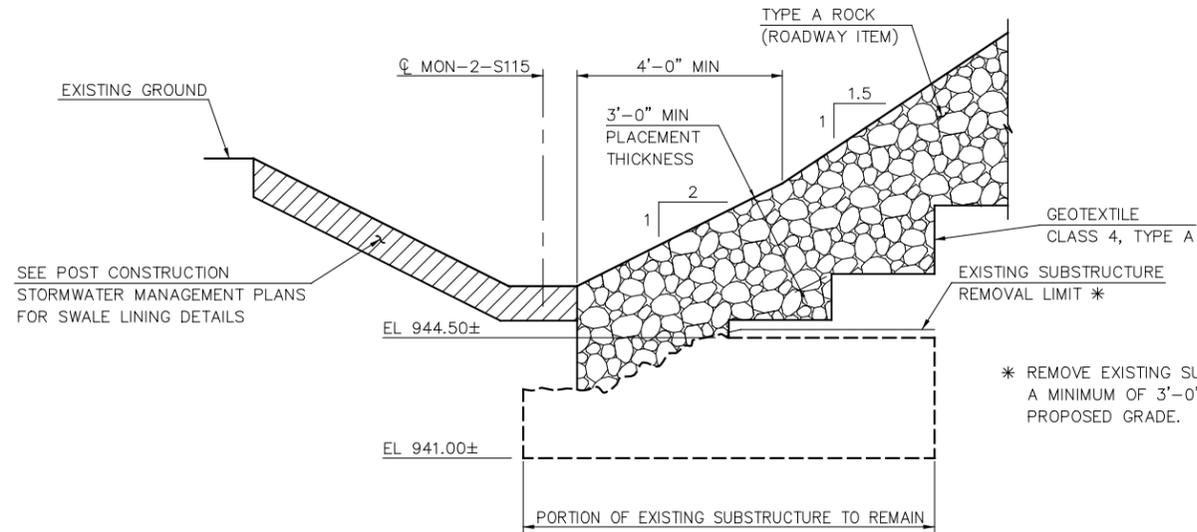
DISTRICT: 1 COUNTY: ALLEGHENY

TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

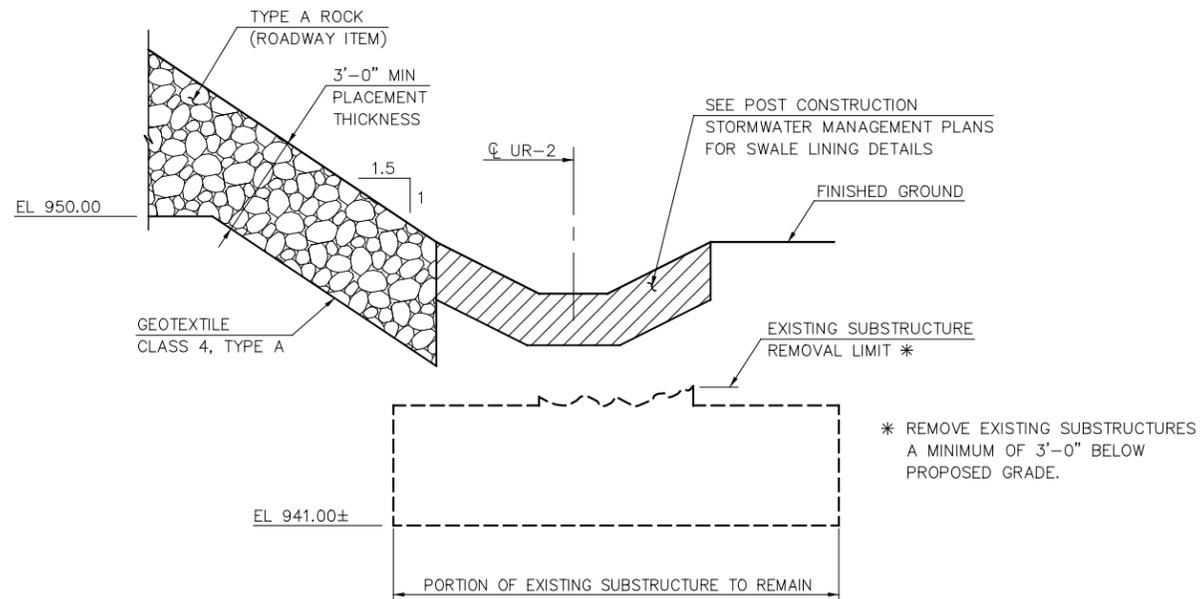
BMS. NO. 02 2045 0030 0841 BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)**  
**OVER UNION RAILROAD STA. 818+40.00**  
**SINGLE SPAN COMPOSITE STEEL PLATE**  
**MULTI-GIRDER BRIDGE**  
**CONCEPTUAL ABUTMENT ACCESS PLAN**  
**SHEET 6 OF 6**

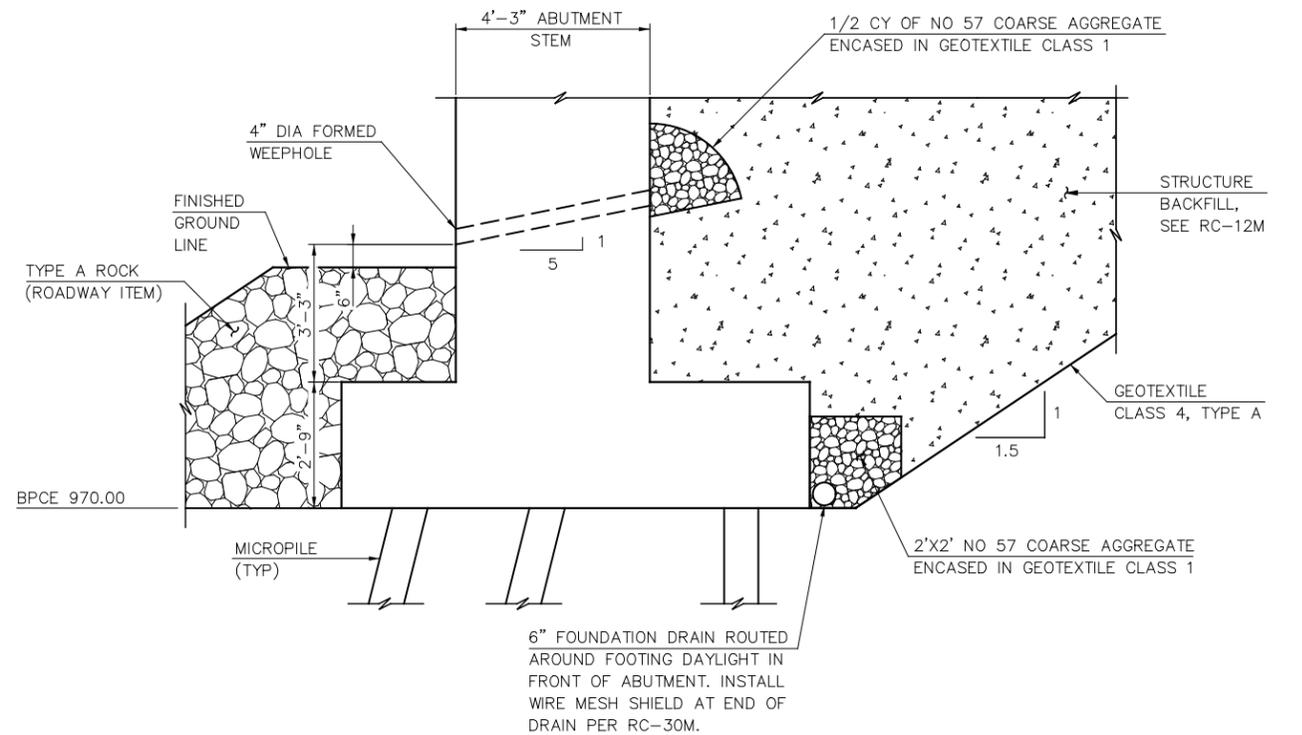
DRAWING: OF  
 SHEET: 14 OF 66



**TYPE A ROCK SLOPE  
PLACEMENT DETAIL  
ABUTMENT 2**  
NOT TO SCALE



**TYPE A ROCK SLOPE  
PLACEMENT DETAIL  
ABUTMENT 1**  
NOT TO SCALE

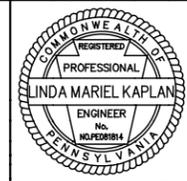


**ABUTMENT 2  
DRAINAGE DETAIL**  
1 0 1 2 FEET

- NOTES:**
- FOR ABUTMENT 2 WEEPHOLE LOCATIONS, SEE SHEET 30.
  - FOR WATERPROOFING DETAILS, SEE BC-788M.
  - FOR BACKFILL DETAILS, SEE RC-12M.

PENNONI ASSOCIATES, INC.  
 FILE NAME: \\...FINAL DESIGN\601STdt16.dgn  
 PEN TABLE: PENNONI-PTC-X-COLOR.TBL  
 PLOT DRIVER: PENNONI-MCH-PTC-FULL-PDF.PLOTDRIVER  
 DATE PLOTTED: 9/17/2025 @ 11:59:43 AM  
 USER NAME: abuter@adg

DES: ALB | DWG: ALB | CKD: DFG



PREPARED BY:  
 PENNONI  
 FOSTER PLAZA 6  
 681 ANDERSEN DRIVE, SUITE 305  
 PITTSBURGH, PA 15220

PREPARED FOR:  
 THE PENNSYLVANIA  
 TURNPIKE COMMISSION



NO.	REVISIONS	DATE	APPR.

WBS NO.  
 M-052.50X002-3-03

NETWORK NUMBER: 7008401

FILE NAME: X601STdt16

DRAWING TYPE: 2G

STRUCTURE NUMBER: S-40589 (MF-412)

SCALE: AS NOTED

**MON/FAYETTE EXPRESSWAY  
SECTION 53B1A  
STATE ROUTE 0043**

DISTRICT: 1 | COUNTY: ALLEGHENY  
 TOWNSHIP / BOROUGH: DRAVOSBURG BOROUGH

BMS. NO. 02 2045 0030 0841 | BRKEY NO. 1559

**S.R. 2045 (PITTSBURGH-McKEESPORT BLVD.)  
OVER UNION RAILROAD STA. 818+40.00  
SINGLE SPAN COMPOSITE STEEL  
PLATE MULTI-GIRDER BRIDGE  
ROCK PLACEMENT AND DRAINAGE DETAILS**

DRAWING: OF  
 SHEET: 16 OF 66