FED. RD. DIVISION	STATE	PROJECT	
2	OHIO	I-70-6(8)96	

1/29

I-70-6(8)96

FRANKLIN COUNTY
FRA.-3-(15.14-15.28)

STATE OF OHIO
DEPARTMENT OF HIGHWAYS
FRA.—3—(15.14-15.28)
CITY OF COLUMBUS & CITY OF GRANDVIEW HEIGHTS
FRANKLIN TOWNSHIP, FRANKLIN COUNTY

CONVENTIONAL SIGNS

State Line
County Line
Township Line
Section Line
Center Line
Corporation Line
Fence Line
Guard Rail (existing)
Guard Rail (proposed)
Steam Railroad
Power Poles
Light Poles
Trees or Stumps (existing)
Trees or Stumps (to be removed)

INDEX OF SHEETS

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General Notes	5
Traffic Maintenance	6
Computations	7
General Summary	8,9
Plan and Profile Sheets	10-12
Profile Sheets	13,14
Cross Sections	15-21
Pavement Details	22,23
Miscellaneous Details	24
Drainage	25-28
Right-of-Way	29

LINE DATA

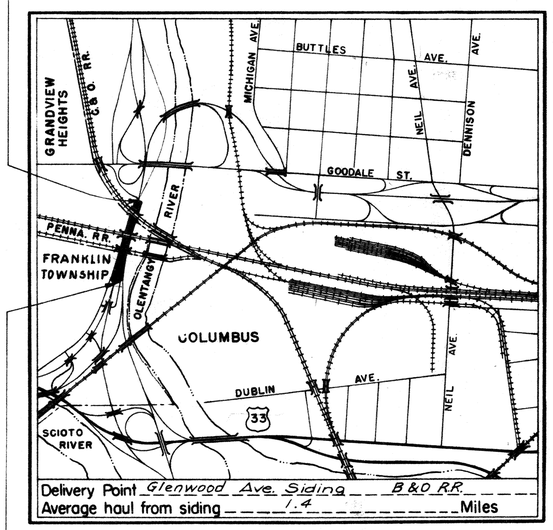
Begin Project ℄ B Sta. 25+85.00
(Sta. 29+64.34 ℄ B = Sta. 90+03.38 ℄ Survey)

End Project ℄ Survey Sta. 96+16.50
= 992.46 Lin. Ft.
= 0.187 Mi.

Begin Work Sta. 19+00.00
Sta. 29+64.34 ℄ B = Sta. 90+03.38 ℄ Survey
Sta. 94+02.72 ℄ Survey = Sta. 94+04.68 ℄ N.B.

End Work Sta. 100+22.00 ℄ N.B.
= 2081.00 Lin. Ft.
= 0.394 Mi.

END PROJECT
Sta. 96+16.50
S.L.M.-15.33



BEGIN PROJECT
Sta. 25+85.00 ℄ "B"
S.L.M.-15.14

LOCATION MAP
SCALE: 1" = 800'

Portion to be improved
State Roads
Other Roads

SCALE

Plan 1" = 50'
Profile: Horizontal 1" = 50'
Profile: Vertical 1" = 5'

"LIMITED ACCESS"

This improvement is especially designed for through traffic and has been declared a limited access highway or freeway by action of the Director of Highways in accordance with the provisions of Section 5511.02 of the Revised Code of Ohio.

The standard specifications of the State of Ohio, Department of Highways, including changes and supplemental specifications listed in the proposal shall govern this improvement.

The right of way for this improvement will be provided by the State of Ohio.

I hereby approve these plans and declare that the making of this improvement will not require the closing of the highway to traffic and that provisions for the maintenance and safety of traffic will be as set forth on the plans and estimates.

Approved E. L. Shelley
Date 9-4-59 Division Deputy Director

OK BFP

Approved Guy E. Meeker
Date 9-24-59 Deputy Director of Planning & Programming

Approved
Date ____ Engineer of Bridges

Approved Warren J. Truman
Date 9-22-59 Engineer of Location & Design

Approved C. W. McCaughey
Date 9-22-59 Deputy Director of Design & Construction

Approved G. A. Berry
Date 9-25-59 First Assistant Director

Approved E. S. Sproat
Date 9-25-59 Director of Highways

ADDED R/W SHEET 29-R
SUPERSEDING R/W SHEET 29
11-20-59 R. E. C.

Revised R/W Parcels 3-S and 4-S shown on Sheet 29-R.
R.E.C. 3-10-60

DEPARTMENT OF COMMERCE
BUREAU OF PUBLIC ROADS

APPROVED:

DIVISION ENGINEER ____ DATE

File No.	Franklin County Fra.-3-(15.14-15.28)
	Date of Letting ____ 19
	Contract No.

Supplemental Prints of Standard Construction Drawings

RI-1	7-15-58	I-1,2,3,4&5	4-24-58	I-14 G	1-22-52	I-8 M.H. No. 2 1-26-59
T-35	1-2-56	I-8 C.B. 2-2-A&B	3-2-59	I-15 No. 1	5-21-59	
L-3	4-1-50	I-8 C.B. No. 16	3-2-59	I-15 No. 2-A	5-21-59	
L-3-A	4-1-50	I-8 I No. 2	4-23-59	I-21-23	8-1-56	
B-T-71 R	3-2-53	I-8 M.H. No. 1	1-26-59	G-7.07	6-1-56	
L.J. No. 1	7-1-55	I-8 M.H. No. 1-A	1-26-59	B-T-50-70-71E No. 1	10-1-47	
T.J.	5-1-56	I-12	7-1-54	HW-A&B	7-15-57	

Supplemental Specifications

B-219	Rev. 3-12-59
M-206.6(b)	5-25-56

U.S. HD DIVISION	STATE	PROJECT	
2	OHIO	I-70-6(8)96	

1/29

I-70-6(8)96

FRANKLIN COUNTY
FRA.-3-(15.14-15.28)

STATE OF OHIO
DEPARTMENT OF HIGHWAYS
FRA.-3-(15.14-15.28)
CITY OF COLUMBUS & CITY OF GRANDVIEW HEIGHTS
FRANKLIN TOWNSHIP, FRANKLIN COUNTY

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END PROJECT
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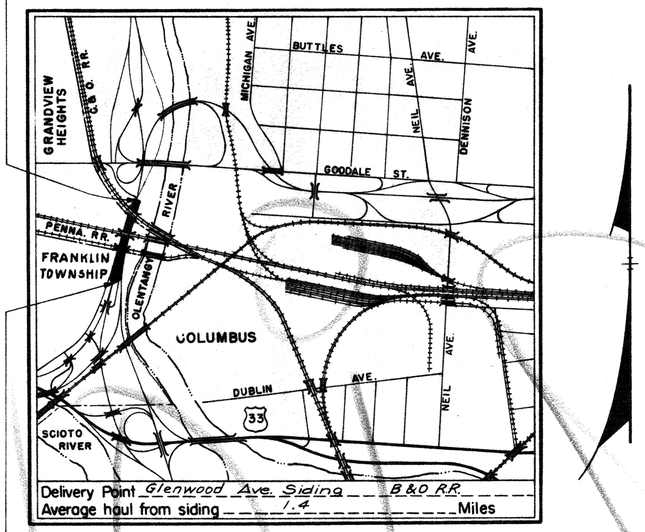
S.L.M.-15.33



BEGIN PROJECT
Sta. 25+85.00 ℄ "B"
S.L.M.-15.14

LOCATION MAP
SCALE: 1" = 800'

Portion to be improved
State Roads
Other Roads

SCALE

Plan 1" = 50'
Profile: Horizontal 1" = 50'
Profile: Vertical 1" = 5'

ADDED R/W SHEET 29-R
SUPERSEDING R/W SHEET 29
11-20-59 R.E.C.

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Date 9-4-59 Division Deputy Director

Approved Guy P. Yeager
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Approved _____
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Date 9-22-59 Engineer of Location & Design

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Approved G. A. Berry
Date 9-25-59 First Assistant Director

Approved C. S. Paxton
Date 9-25-59 Director of Highways

File No.	Franklin County Fra.-3-(15.14-15.28)
	Date of Letting _____ 19
	Contract No. _____

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T-35	1-2-56	I-8 C.B. 2-2-A&B	3-2-59	I-15 No. 1	5-21-59	
L-3	4-1-50	I-8 C.B. No. 16	3-2-59	I-15 No. 2-A	5-21-59	
L-3-A	4-1-50	I-8 I No. 2	4-23-58	I-21-23	8-1-56	
B-T-71 R	3-2-53	I-8 M.H. No. 1	1-26-59	G-7.07	6-1-56	
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B-219	Rev. 3-12-59
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DEPARTMENT OF COMMERCE
BUREAU OF PUBLIC ROADS

APPROVED:

DIVISION ENGINEER _____ DATE _____

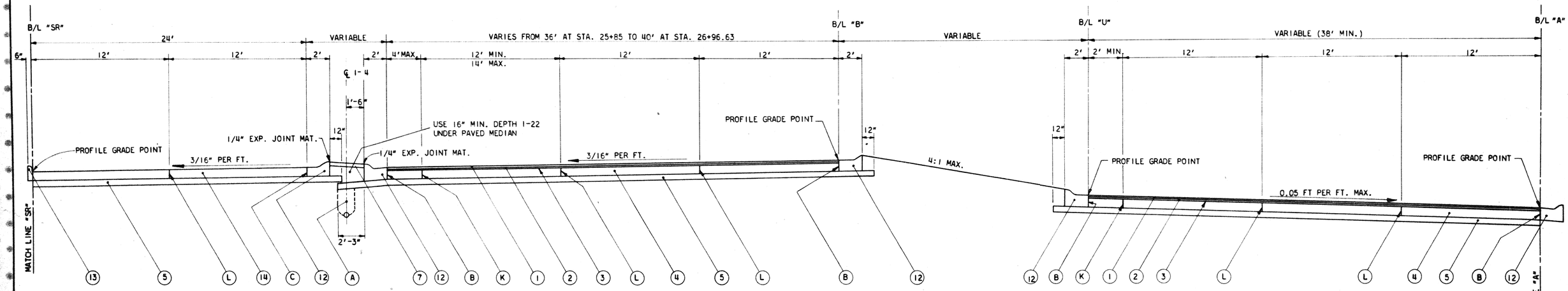
FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

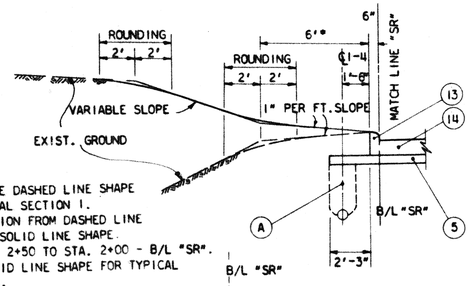
2/29

FRA-3-(15.14-15.28)

TYPICAL SECTIONS

TYPE T-35 ON B-70 AND TYPE T-71



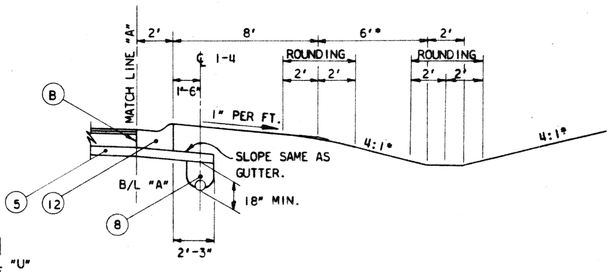


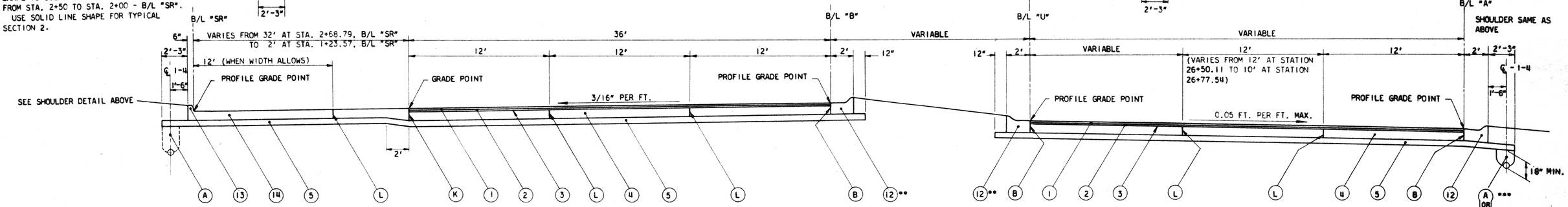
NOTE: USE DASHED LINE SHAPE FOR TYPICAL SECTION 1.
TRANSITION FROM DASHED LINE SHAPE TO SOLID LINE SHAPE FROM STA. 2+50 TO STA. 2+00 - B/L "SR".
USE SOLID LINE SHAPE FOR TYPICAL SECTION 2.

TYPICAL SECTION 1

LIMITING STATIONS

STA. 24+37.00 TO STA. 25+23.16 ON B/L ROAD "A"	=	86.16 LIN. FT.
STA. 25+85.00 TO STA. 26+96.63 ON B/L ROAD "B"	=	111.63 LIN. FT.
STA. 4+28.46 TO STA. 5+17.87 ON B/L RAMP "U"	=	89.41 LIN. FT.
STA. 3+22.40 TO STA. 2+68.79 ON B/L SER. RD.	=	53.61 LIN. FT.





TYPICAL SECTION 2

LIMITING STATIONS

STA. 25+23.16 TO STA. 26+54.18 ON B/L ROAD "A"	=	131.02 LIN. FT.
STA. 26+96.63 TO STA. 28+40.86 ON B/L ROAD "B"	=	144.23 LIN. FT.
STA. 5+17.87 TO STA. 6+53.17 ON B/L RAMP "U"	=	135.30 LIN. FT.
STA. 2+68.79 TO STA. 1+23.57 ON B/L SER. RD.	=	145.22 LIN. FT.

LEGEND

(1) ITEM T-35 1-1/2" ASPHALTIC CONCRETE SURFACE COURSE, TYPE "C" (60-70).

(2) ITEM B-35 1-1/2" ASPHALTIC CONCRETE LEVELING COURSE (60-70).

(3) ITEM T-30 BITUMINOUS TACK COAT: SEC. M-5.5, MS-2 OR RS-1; OR SEC. M-5.2, RC-1, RC-2 OR RC-3, AS PER SEC. T-30.02, APPLIED AT THE RATE OF 0.10 GAL. PER SQ. YD.

(4) ITEM B-70 9" PORTLAND CEMENT CONCRETE BASE COURSE.

(5) ITEM I-22 6" SUBBASE (UNLESS OTHERWISE INDICATED.)

(7) ITEM I-21 4" PORTLAND CEMENT CONCRETE MEDIAN, STANDARD TYPE 1

(8) ITEM I-4 6" UNDERDRAINS

(12) ITEM I-12 COMBINATION CURB AND GUTTER, TYPE 3 MODIFIED

(13) ITEM I-12 CONCRETE CURB, STANDARD TYPE 2A

(14) ITEM T-71 9" REINFORCED PORTLAND CEMENT CONCRETE PAVEMENT. NOTE: EXTRA CONCRETE REQUIRED FOR THICKENED EDGE WHERE SERVICE ROAD ABUTS ROAD "B" SHALL BE INCLUDED IN UNIT PRICE BID PER SQ. YD. FOR ITEM T-71.

(A) EXISTING I-4 UNDERDRAINS - TO BE LEFT IN PLACE.

(B) BUTT JOINT WITHOUT TIE BARS OR HOOK BOLTS.

(C) STANDARD LONGITUDINAL KEY JOINT.

(K) KEY JOINT WITHOUT TIE BARS OR HOOK BOLTS.

(L) STANDARD LONGITUDINAL JOINT.

* UNLESS OTHERWISE SHOWN ON PLAN.

NOTE: ALL DIMENSIONS ARE AT RIGHT ANGLES OR ALONG RADIAL LINES TO PERTINENT BASE LINES.

** CURB TRANSITIONS FROM TYPE 3 MODIFIED TO TYPE 2B FROM STA. 6+03.17 TO STA. 6+53.17 ON B/L "U" AND FROM STA. 27+71.22 TO STA. 28+21.22 ON B/L "B".

*** EXISTING I-4 SHALL REMAIN IN PLACE FROM STA. 26+25 TO STA. 27+50 ON B/L "A".

SCALE: 1/4" = 1'

TYPICAL SECTIONS

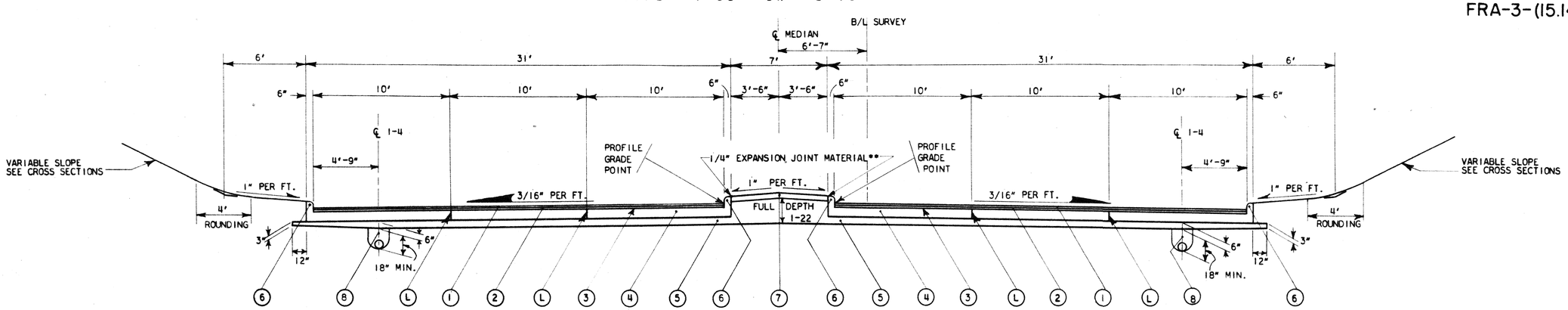
TYPICAL SECTIONS

TYPE T-35 ON B-70

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

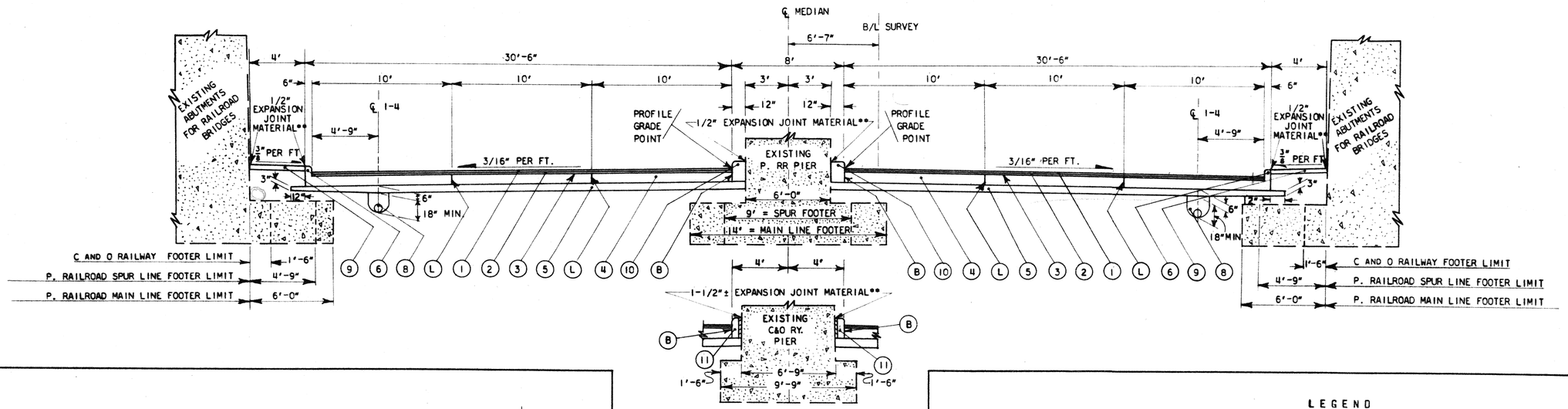
3/29

FRA-3-(15.14-15.28)



NORMAL TYPICAL SECTION 4

APPLIES BETWEEN STRUCTURES
FROM STATION 90+03.38 TO STATION 94+31.66 ON B/L SURVEY



TYPICAL SECTION 5

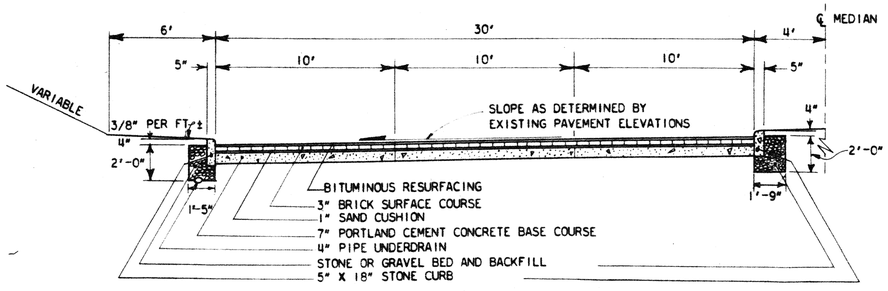
APPLIES THROUGH UNDERPASSES
FROM STA. 90+03.38 TO STA. 94+31.66 ON B/L SURVEY

* UNLESS OTHERWISE SHOWN ON PLAN

**MEETING REQUIREMENTS OF SEC. M-10.02 OR M-10.03 COST OF EXPANSION JOINT MATERIAL SHALL BE INCLUDED IN THE UNIT PRICE BID FOR ITEM 1-21 , ITEM 1-12 OR ITEM 1-13 AS APPLICABLE.

FOR TOP OF FOOTER ELEVATIONS, SEE ALIGNMENT SHEET.

SCALE: 1/4" = 1'



HALF SECTION OF EXISTING PAVEMENT

LEGEND

1	ITEM T-35	1-1/2" ASPHALTIC CONCRETE SURFACE COURSE, TYPE "C" (60-70)
2	ITEM B-35	1-1/2" ASPHALTIC CONCRETE LEVELING COURSE (60-70)
3	ITEM T-30	BITUMINOUS TACK COAT: SEC. M-5.5, MS-2 OR RS-1; OR SEC. M-5.2, RC-1, RC-2 OR RC-3, AS PER SEC. T-30.02, APPLIED AT THE RATE OF 0.10 GALLON PER SQ. YD.
4	ITEM B-70	9" PORTLAND CEMENT CONCRETE BASE COURSE
5	ITEM 1-22	6" SUBBASE (UNLESS OTHERWISE INDICATED)
6	ITEM 1-12	CONCRETE CURB, STANDARD TYPE 2B
7	ITEM 1-21	4" PORTLAND CEMENT CONCRETE MEDIAN, STANDARD TYPE 1
8	ITEM 1- 4	6" UNDERDRAINS
9	ITEM 1-13	4" CONCRETE SIDEWALKS
10	ITEM 1-12	CONCRETE CURB, TYPE 6 MODIFIED
11	ITEM 1-12	CONCRETE CURB, STANDARD TYPE 6
L		STANDARD LONGITUDINAL JOINT
B		BUTT JOINT WITHOUT TIE BARS OR HOOK BOLTS

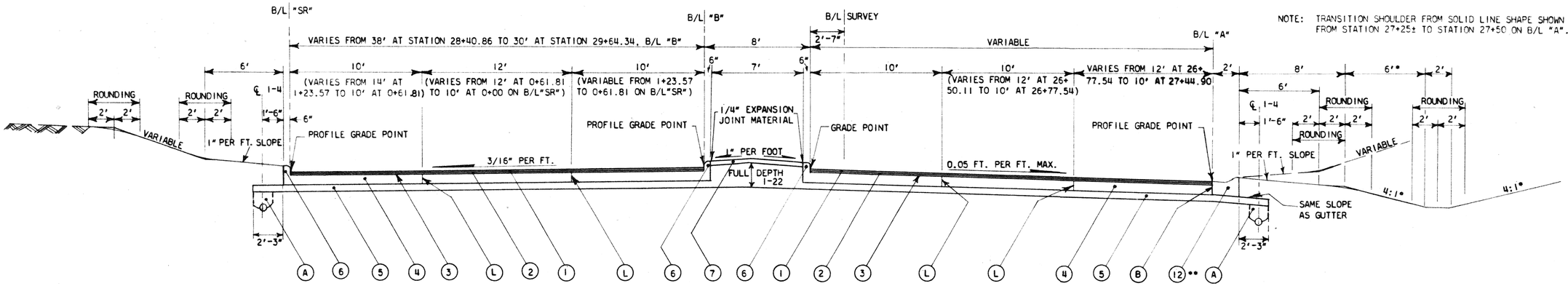
TYPICAL SECTIONS

TYPE T-35 ON B-70

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

FRA-3-(15.14-15.28)

4/29



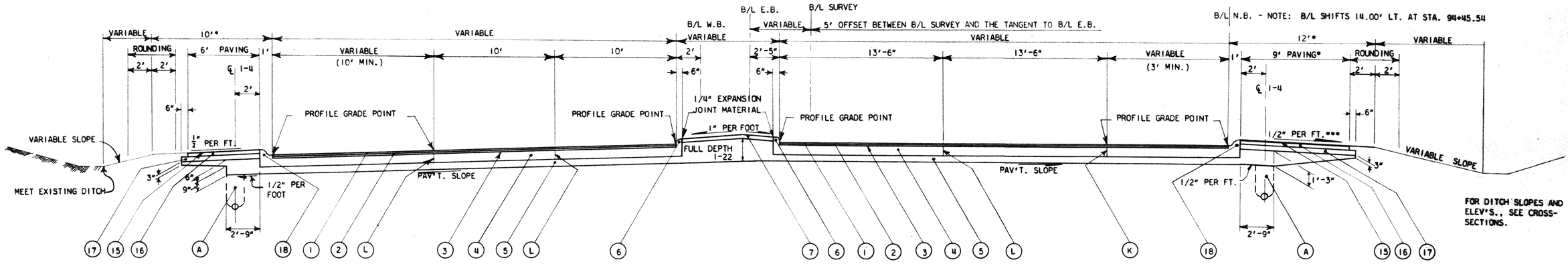
NOTE: TRANSITION SHOULDER FROM SOLID LINE SHAPE SHOWN TO DASHED LINE SHAPE FROM STATION 27+25± TO STATION 27+50 ON B/L "A".

TYPICAL SECTION 3

STATION 26+54.18 TO STATION 27+56.56 ON B/L ROAD "A" = 102.38 LIN. FT.
STATION 28+40.86 TO STATION 29+64.34 ON B/L ROAD "B" = 123.48 LIN. FT.
STATION 1+23.57 TO STATION 0+00.00 ON B/L SER. RD. = 123.57 LIN. FT.

TYPICAL SECTION 6

STATION 94+31.66 TO STATION 96+16.50 ON B/L SURVEY = 184.84 LIN. FT.
SEE PAVEMENT DETAIL SHEETS FOR STATIONING ALONG B/L W.B., B/L E.B. & B/L N.B.



FOR DITCH SLOPES AND ELEV'S., SEE CROSS-SECTIONS.

LEGEND

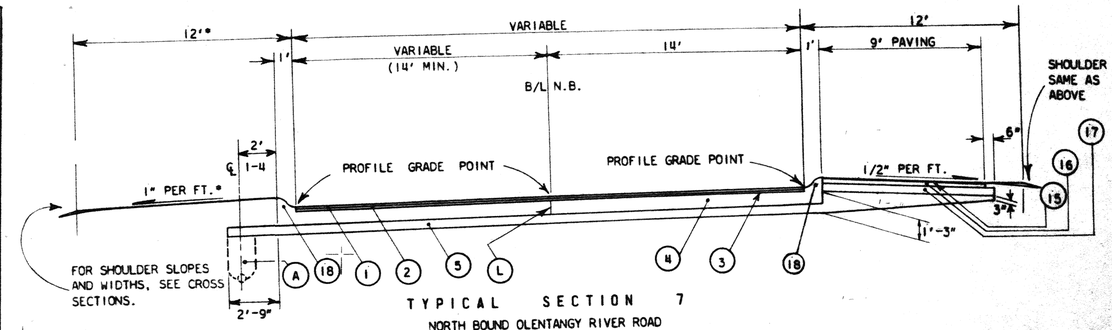
(1)	ITEM T-35	1-1/2" ASPHALTIC CONCRETE SURFACE COURSE, TYPE "C" (60-70)
(2)	ITEM B-35	1-1/2" ASPHALTIC CONCRETE LEVELING COURSE (60-70)
(3)	ITEM T-30	BITUMINOUS TACK COAT: SEC. M-5.5, MS-2 OR RS-1; OR SEC. M-5.2, RC-1, RC-2 OR RC-3, AS PER SEC. T-30.02, APPLIED AT THE RATE OF 0.10 GAL PER SQ. YD.
(4)	ITEM B-70	9" PORTLAND CEMENT CONCRETE BASE COURSE
(5)	ITEM I-22	6" SUBBASE (UNLESS OTHERWISE INDICATED)
(6)	ITEM I-12	CONCRETE CURB, STANDARD TYPE 2B
(7)	ITEM I-21	4" PORTLAND CEMENT CONCRETE MEDIAN, STANDARD TYPE 1
(12)	ITEM I-12	COMBINATION CURB AND GUTTER, TYPE 3 MODIFIED
(15)	ITEM T-31	BITUMINOUS SURFACE TREATMENT. SEE NOTE IN PROPOSAL
(16)	ITEM B-219	3" WATERPROOFED AGGREGATE BASE COURSE
(17)	ITEM I-18	5" STABILIZED CRUSHED AGGREGATE SHOULDERS
(18)	ITEM I-12	CONCRETE CURB, TYPE 3B MODIFIED

(A)	EXISTING I-4 UNDERDRAIN - TO BE LEFT IN PLACE
(B)	BUTT JOINT WITHOUT TIE BARS OR HOOK BOLTS
(K)	KEY JOINT WITHOUT TIE BARS OR HOOK BOLTS
(L)	STANDARD LONGITUDINAL JOINT

* UNLESS OTHERWISE SHOWN ON PLAN

***TRANSITION PAVED BERM FROM 1/2" PER FT. SLOPE TOWARD PAVEMENT AT STATION 94+50 TO SLOPE AS SHOWN ABOVE AT STATION 95+00.

SCALE: 1/4" = 1'



TYPICAL SECTION 7

NORTH BOUND OLENTANGY RIVER ROAD
LIMITING STATIONS 96+20 TO 98+60 ALONG B/L N.B.

NOTE: CURB BEGINS AT ISLAND NOSE STATION 96+89.5

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

5
29

FRA.-3-(15.14-15.28)

GENERAL NOTES

DESIGN SPEED

THE GEOMETRICS ON THIS PROJECT HAVE BEEN PLANNED FOR THE FOLLOWING DESIGN SPEEDS:

EXPRESSWAY ROADS	40 MPH
RAMPS	30 MPH

ELEVATION DATUM

ALL ELEVATIONS ARE BASED ON THE U. S. G. S. DATUM.

FIELD OFFICE

THE CONTRACTOR SHALL, IN ACCORDANCE WITH SEC. S-0.01 (b), PROVIDE FOR THE EXCLUSIVE USE OF THE STATE'S EMPLOYEES, A SUITABLE FIELD OFFICE HAVING A MINIMUM OF 300 SQ. FT. OF FLOOR SPACE. THE CONTRACTOR SHALL HAVE A TELEPHONE INSTALLED AND MAINTAINED IN THIS OFFICE DURING THE CONSTRUCTION OF THIS PROJECT. THE CONTRACTOR SHALL ALSO PROVIDE AND INSTALL WIRING AND OUTLETS SUITABLE FOR CONNECTING ELECTRIC LIGHTS AND OFFICE EQUIPMENT IN THE FIELD OFFICE AND PROVIDE 110-VOLT ALTERNATING CURRENT TO THE OFFICE DURING THE ENTIRE PERIOD OF CONSTRUCTION OF THIS PROJECT.

UTILITY NOTE

ANY AND ALL WORK REQUIRED FOR REMOVING, RELOCATING AND CONSTRUCTING NEW FACILITIES FOR PRIVATE OR PUBLIC UTILITIES WILL BE DONE BY AND AT THE EXPENSE OF THE RESPECTIVE OWNERS UNLESS OTHERWISE NOTED ON THE PLANS.

R/W MONUMENTS, FEDERAL PROJECT MARKERS AND SECTION MARKERS

EXISTING R/W MONUMENTS, BENCH MARKS, FEDERAL PROJECT MARKERS AND SECTION MARKERS THAT WILL BE REMOVED BY CONSTRUCTION, SHALL BE PROTECTED BY THE CONTRACTOR AS PER SECTION G-7.09 UNTIL THEY CAN BE WITNESSED, REFERENCED AND RESET BY THE CONSTRUCTION CREW.

EXISTING UNDERGROUND APPURTENANCES

THE LOCATION, SIZE AND DEPTH OF ALL EXISTING PIPE AND UNDERGROUND UTILITY APPURTENANCES REPRESENTS THE BEST INFORMATION OBTAINABLE, BUT THE STATE OF OHIO DOES NOT GUARANTEE THE CORRECTNESS THEREOF.

REMOVALS

ALL ITEMS MARKED FOR REMOVAL AND DISPOSAL SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND BE DISPOSED OF BY HIM UNLESS OTHERWISE SPECIFIED ON THE DETAILED PLANS.

PIPE REMOVAL

EXISTING PIPE TO BE REMOVED ON THIS PROJECT THAT IS NOT LISTED FOR REMOVAL UNDER ITEM E-12 SHALL BE REMOVED BY ROADWAY EXCAVATION AND THE COST OF SUCH REMOVAL SHALL BE INCLUDED IN THE UNIT PRICE BID PER CUBIC YARD FOR ROADWAY EXCAVATION, ITEM E-1.

LOCATION AND SIZE OF EXISTING PIPE

THE LOCATION, TYPE, DEPTH AND SIZE OF ALL EXISTING PIPES ARE SHOWN AS NEAR EXACT AS THE AVAILABLE INFORMATION WILL PERMIT. THE STATE OF OHIO WILL NOT BE RESPONSIBLE FOR VARIATIONS FOUND DURING CONSTRUCTION AND ANY ADDITIONAL PIPE NEEDED TO MAKE CONNECTIONS REQUIRED SHALL BE PAID FOR AT THE CONTRACT UNIT PRICE BID FOR THE APPROPRIATE TYPE AND SIZE. ALL PAYMENTS SHALL BE BASED ON FINAL MEASUREMENTS.

SEEDING

QUANTITIES FOR SEEDING ARE CALCULATED FOR SOIL AREAS BETWEEN LINES TEN FEET (10') OUTSIDE WORK LIMITS AS SHOWN ON THE CROSS SECTIONS OR TO THE RIGHT OF WAY LINE IF SUCH LINE IS LESS THAN TEN FEET (10') FROM THE WORK LIMITS. COMMERCIAL FERTILIZER (12-12-12) SHALL BE APPLIED TO ALL SEEDED AREAS. THE RATE OF SEEDING SHALL BE 3LBS PER 1000 SQ. FT., AND THE SEED MIXTURE SHALL BE AS FOLLOWS:

10%	KENTUCKY 31 FESCUE (FESTUCA ELATIOR)
30%	CREEPING RED FESCUE (FESTUCA RUBRA)
15%	RED TOP (AGROSTIS ALBA)
5%	WHITE DUTCH CLOVER (TRIFOLIUM REPENS)
40%	KENTUCKY BLUEGRASS (POA PRATENSIS)

BERMS AND SLOPES

BERMS AND SLOPES SHALL BE FINISHED IN ACCORDANCE WITH THE TYPICAL SECTION EXCEPT WHERE OTHERWISE SHOWN ON THE CROSS-SECTIONS. THE ROUNDED CORNERS SHOWN ON STANDARD DRAWING RI-1, AS MODIFIED BY THE TYPICAL SECTIONS, APPLY TO ALL CROSS SECTIONS, EVEN THOUGH OTHERWISE SHOWN ON THESE PLANS.

CATCH BASINS, INLETS AND PIPES

THE PROPOSED ELEVATIONS AND LOCATIONS OF CATCH BASINS, INLETS, PIPES AND THE ESTIMATED LENGTHS OF PIPES MAY BE ADJUSTED BY THE ENGINEER DURING CONSTRUCTION.

CONNECTIONS TO EXISTING PIPE

AT PLACES WHERE THE PLANS PROVIDE FOR PROPOSED DRAINAGE PIPE TO BE CONNECTED TO EXISTING PIPES, IT SHALL BE THE RESPONSIBILITY OF THE CONSTRACTOR TO LOCATE THE EXISTING PIPE BOTH AS TO LINE AND GRADE BEFORE HE STARTS TO LAY THE PROPOSED PIPE. THE COST OF THIS OPERATION SHALL BE INCLUDED IN THE UNIT PRICE BID FOR THE PERTINENT PIPE ITEM.

NON-RIGID PAVEMENT REMOVAL

QUANTITIES FOR REMOVAL AND DISPOSAL OF EXISTING NON-RIGID PAVEMENT HAVE BEEN INCLUDED IN THE CROSS SECTIONS, AND SHALL BE PAID FOR AS ITEM E-1, ROADWAY EXCAVATION.

WASTE

SUITABLE WASTE SHALL BE PLACED IN THE LOW AREA TO THE RIGHT OF STA. 92+50± AND GRADED TO DRAIN AND ALSO ON THE EXISTING EASTERN LEVEE BETWEEN THE PENN. RAILROAD MAIN LINE EMBANKMENT AND THE PENN. RAILROAD SPUR LINE EMBANKMENT AS DIRECTED BY THE ENGINEER, UNTIL THE HEIGHT OF ADJACENT RAILROAD EMBANKMENTS HAS BEEN REACHED. THE COST OF THIS OPERATION SHALL BE INCLUDED IN THE UNIT PRICE BID PER CU. YD. FOR ITEM E-1, ROADWAY EXCAVATION. MATERIAL WASTED IN THE AREA DESCRIBED ABOVE SHALL BE PLACED IN ACCORDANCE WITH SEC. E-1.08.

FINISHING CONCRETE PAVEMENT

SMALL AND IRREGULAR PAVEMENT AREAS THAT, IN THE OPINION OF THE ENGINEER, ARE IMPRACTICAL TO BE CONSTRUCTED WITH A FINISHING MACHINE MAY BE HAND FINISHED IN ACCORDANCE WITH SEC. T-71.211 OF THE SPECIFICATIONS.

CONTRACTION JOINTS

ALTHOUGH SPECIFIC LOCATIONS OF CERTAIN CONTRACTION JOINTS HAVE BEEN DETAILED ON THIS PLAN, NO WAIVER OF THE SPECIFICATIONS IS INTENDED AND THE MAXIMUM DISTANCE BETWEEN CONTRACTION JOINTS SHALL IN ALL CASES BE IN ACCORDANCE WITH STANDARD DRAWING T.J.

COOPERATION NOTE

THE CONTRACTOR WILL NOTE THAT GOODALE EXPRESSWAY FRA-3-15.28 IS BEING CONSTRUCTED FROM STATION 94+34 TO THE NORTH SIMULTANEOUSLY WITH THE CONSTRUCTION OF THIS PROJECT. THE CONTRACTOR SHALL COOPERATE WITH CONTRACTORS ON ADJACENT PROJECTS IN SUCH A MANNER AS TO CAUSE A MINIMUM OF INTERFERENCE WITH OTHER CONTRACTORS.

FLAP GATE

THE 30" FLAP GATE CALLED FOR ON THE DRAINAGE PLAN SHALL BE PROVIDED WITH BRASS NUTS, STUDS, BUSHINGS AND ANCHOR BOLTS. COST OF THESE FIXTURES SHALL BE INCLUDED IN THE UNIT PRICE BID FOR 1-5 30" FLAP GATE.

ESTIMATED QUANTITIES

SPECIFIC LOCATIONS AND USAGE OF ESTIMATED QUANTITIES SET UP ON THIS PLAN TO BE USED "AS DIRECTED BY THE ENGINEER" SHALL BE MADE A MATTER OF RECORD BY INCORPORATION INTO THE FINAL CHANGE ORDER GOVERNING COMPLETION OF THIS PROJECT.

EXISTING PAVEMENT

Existing pavement shall not be disturbed until after April 1, 1960, unless otherwise approved in writing by the Director.

Rev. 10-13-59 REC.

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GENERAL NOTES

DESIGN SPEED

THE GEOMETRICS ON THIS PROJECT HAVE BEEN PLANNED FOR THE FOLLOWING DESIGN SPEEDS:

EXPRESSWAY ROADS	40 MPH
RAMPS	30 MPH

ELEVATION DATUM

ALL ELEVATIONS ARE BASED ON THE U. S. G. S. DATUM.

FIELD OFFICE

THE CONTRACTOR SHALL, IN ACCORDANCE WITH SEC. S-0.01 (b), PROVIDE FOR THE EXCLUSIVE USE OF THE STATE'S EMPLOYEES, A SUITABLE FIELD OFFICE HAVING A MINIMUM OF 300 SQ. FT. OF FLOOR SPACE. THE CONTRACTOR SHALL HAVE A TELEPHONE INSTALLED AND MAINTAINED IN THIS OFFICE DURING THE CONSTRUCTION OF THIS PROJECT. THE CONTRACTOR SHALL ALSO PROVIDE AND INSTALL WIRING AND OUTLETS SUITABLE FOR CONNECTING ELECTRIC LIGHTS AND OFFICE EQUIPMENT IN THE FIELD OFFICE AND PROVIDE 110-VOLT ALTERNATING CURRENT TO THE OFFICE DURING THE ENTIRE PERIOD OF CONSTRUCTION OF THIS PROJECT.

UTILITY NOTE

ANY AND ALL WORK REQUIRED FOR REMOVING, RELOCATING AND CONSTRUCTING NEW FACILITIES FOR PRIVATE OR PUBLIC UTILITIES WILL BE DONE BY AND AT THE EXPENSE OF THE RESPECTIVE OWNERS UNLESS OTHERWISE NOTED ON THE PLANS.

R/W MONUMENTS, FEDERAL PROJECT MARKERS AND SECTION MARKERS

EXISTING R/W MONUMENTS, BENCH MARKS, FEDERAL PROJECT MARKERS AND SECTION MARKERS THAT WILL BE REMOVED BY CONSTRUCTION, SHALL BE PROTECTED BY THE CONTRACTOR AS PER SECTION G-7.09 UNTIL THEY CAN BE WITNESSED, REFERENCED AND RESET BY THE CONSTRUCTION CREW.

EXISTING UNDERGROUND APPURTENANCES

THE LOCATION, SIZE AND DEPTH OF ALL EXISTING PIPE AND UNDERGROUND UTILITY APPURTENANCES REPRESENTS THE BEST INFORMATION OBTAINABLE, BUT THE STATE OF OHIO DOES NOT GUARANTEE THE CORRECTNESS THEREOF.

REMOVALS

ALL ITEMS MARKED FOR REMOVAL AND DISPOSAL SHALL BECOME THE PROPERTY OF THE CONTRACTOR AND BE DISPOSED OF BY HIM UNLESS OTHERWISE SPECIFIED ON THE DETAILED PLANS.

PIPE REMOVAL

EXISTING PIPE TO BE REMOVED ON THIS PROJECT THAT IS NOT LISTED FOR REMOVAL UNDER ITEM E-12 SHALL BE REMOVED BY ROADWAY EXCAVATION AND THE COST OF SUCH REMOVAL SHALL BE INCLUDED IN THE UNIT PRICE BID PER CUBIC YARD FOR ROADWAY EXCAVATION, ITEM E-1.

LOCATION AND SIZE OF EXISTING PIPE

THE LOCATION, TYPE, DEPTH AND SIZE OF ALL EXISTING PIPES ARE SHOWN AS NEAR EXACT AS THE AVAILABLE INFORMATION WILL PERMIT. THE STATE OF OHIO WILL NOT BE RESPONSIBLE FOR VARIATIONS FOUND DURING CONSTRUCTION AND ANY ADDITIONAL PIPE NEEDED TO MAKE CONNECTIONS REQUIRED SHALL BE PAID FOR AT THE CONTRACT UNIT PRICE BID FOR THE APPROPRIATE TYPE AND SIZE. ALL PAYMENTS SHALL BE BASED ON FINAL MEASUREMENTS.

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QUANTITIES FOR SEEDING ARE CALCULATED FOR SOIL AREAS BETWEEN LINES TEN FEET (10') OUTSIDE WORK LIMITS AS SHOWN ON THE CROSS SECTIONS OR TO THE RIGHT OF WAY LINE IF SUCH LINE IS LESS THAN TEN FEET (10') FROM THE WORK LIMITS. COMMERCIAL FERTILIZER (12-12-12) SHALL BE APPLIED TO ALL SEEDED AREAS. THE RATE OF SEEDING SHALL BE 3LBS PER 1000 SQ. FT., AND THE SEED MIXTURE SHALL BE AS FOLLOWS:

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FINISHING CONCRETE PAVEMENT

SMALL AND IRREGULAR PAVEMENT AREAS THAT, IN THE OPINION OF THE ENGINEER, ARE IMPRACTICAL TO BE CONSTRUCTED WITH A FINISHING MACHINE MAY BE HAND FINISHED IN ACCORDANCE WITH SEC. T-71.211 OF THE SPECIFICATIONS.

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COOPERATION NOTE

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ESTIMATED QUANTITIES

SPECIFIC LOCATIONS AND USAGE OF ESTIMATED QUANTITIES SET UP ON THIS PLAN TO BE USED "AS DIRECTED BY THE ENGINEER" SHALL BE MADE A MATTER OF RECORD BY INCORPORATION INTO THE FINAL CHANGE ORDER GOVERNING COMPLETION OF THIS PROJECT.

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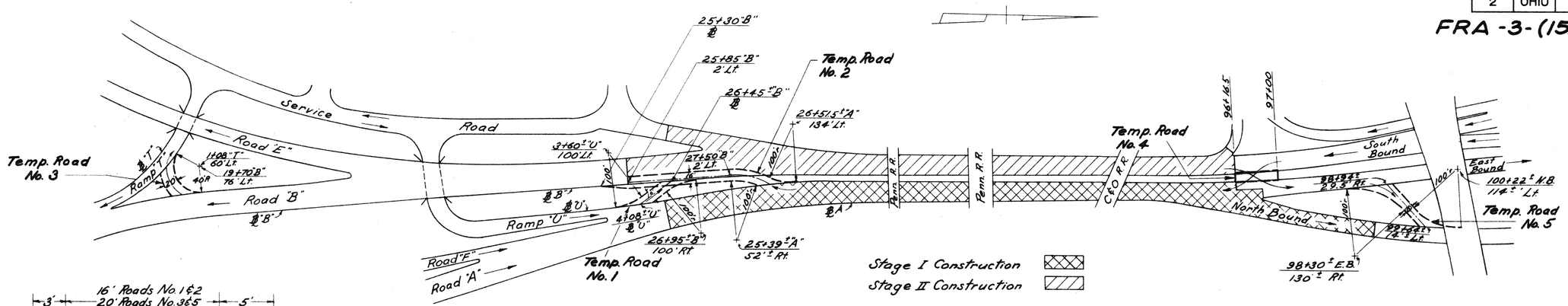
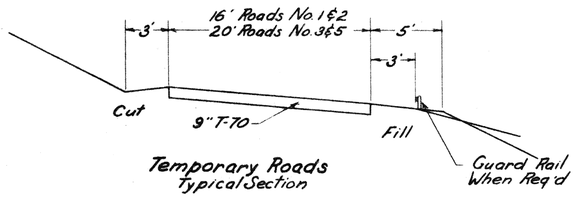




Temporary Roads Typical Section

NOTE: T-70 PAVEMENT SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE PROVISIONS OF SEC. S-15.06 OF THE CONSTRUCTION & MATERIAL SPEC.

THE SUGGESTED CONSTRUCTION SEQUENCE AND PROCEDURE FOR THE MAINTENANCE OF TWO WAY TRAFFIC AS OUTLINED HEREON MAY BE MODIFIED, WITH THE APPROVAL OF THE ENGINEER, DURING CONSTRUCTION. AN ALTERNATE PLAN MAY BE SUBMITTED BY THE CONTRACTOR FOR APPROVAL. NO ALTERNATE PLAN SHALL BE PLACED INTO EFFECT UNTIL APPROVAL HAS BEEN GRANTED, IN WRITING, BY THE DIRECTOR.

TRAFFIC FLOW DURING STAGE 1 CONSTRUCTION

CONSTRUCT TEMPORARY ROADS NO. 1, NO. 4 AND NO. 5. ALLOW NORTHBOUND TRAFFIC ON ROAD "A" TO CROSS OVER TEMPORARY ROAD NO. 1 TO ROAD "B" AND FLOW NORTH TO TEMPORARY ROAD NO. 4, WHERE IT WILL CROSS OVER TO EAST BOUND LANES AND PROCEED NORTH TO TEMPORARY ROAD NO. 5. EASTBOUND GOODALE STREET TRAFFIC WILL REMAIN ON EASTBOUND LANES. NORTHBOUND OLENTANGY RIVER ROAD TRAFFIC WILL CROSS OVER TEMPORARY ROAD NO. 5 TO NORTHBOUND OLENTANGY RIVER ROAD.

ALL SOUTHBOUND TRAFFIC WILL BE MAINTAINED ON NORMAL SOUTHBOUND LANES.

WHEN STAGE 1 CONSTRUCTION IS COMPLETED, EXCEPT AS NOTED IN TRAFFIC NOTES, REMOVE TEMPORARY ROADS NO. 1 AND NO. 5.

TRAFFIC FLOW DURING STAGE 2 CONSTRUCTION

CONSTRUCT TEMPORARY ROADS NO. 2 AND NO. 3. ALLOW SOUTHBOUND TRAFFIC FROM NORTH TO CROSS OVER TEMPORARY ROAD NO. 4 TO EASTBOUND LANES AND FLOW SOUTH TO ROAD "A" AND TEMPORARY ROAD NO. 2. TRAFFIC WILL THEN CROSS OVER TEMPORARY ROAD NO. 2 TO ROAD "B". TRAFFIC FLOWING SOUTH ON ROAD "B" DESIRING TO ENTER SERVICE ROAD WILL CROSS OVER TEMPORARY ROAD NO. 3 TO RAMP T AND CONTINUE TO SERVICE ROAD.

RAMP T WILL MAINTAIN TWO-WAY TRAFFIC FROM INTERSECTION WITH TEMPORARY ROAD NO. 3 TO SERVICE ROAD.

ALL NORTHBOUND TRAFFIC WILL BE MAINTAINED ON NORMAL NORTHBOUND LANES.

TRAFFIC NOTES

DURING STAGE 1 CONSTRUCTION, THE CURB AND GUTTER ON ROAD "A" FROM STATION 25+75 TO STATION 26+54.18 (LEFT) SHALL NOT BE CONSTRUCTED.

DURING STAGE 2 CONSTRUCTION, THE EAST LANE OF ROAD "B" FROM STATION 25+85 TO STATION 28+25 WILL NOT BE CONSTRUCTED DUE TO TEMPORARY ROAD NO. 2. WHEN TEMPORARY ROAD NO. 2 IS NO LONGER REQUIRED, THE EAST LANE OF ROAD "B" CAN BE CONSTRUCTED. A CONSTRUCTION JOINT WILL BE MADE AT STATION 28+25. ANY ADDITIONAL COSTS OF THIS CONSTRUCTION SEQUENCE SHALL BE INCLUDED IN THE PERTINENT ITEMS FOR PAYMENT.

CARE SHALL BE TAKEN TO PROTECT DRAINAGE STRUCTURE IN MEDIAN AT STATION 27+50 RT. ROAD "B". ANY DAMAGE RESULTING, DUE TO TEMPORARY ROAD CONSTRUCTION TO BE RESTORED TO ORIGINAL CONDITION AT CONTRACTORS EXPENSE.

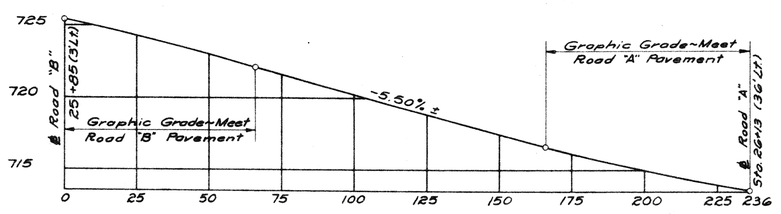
AFTER COMPLETION OF PROPOSED CONSTRUCTION, ALL TEMPORARY ROADS SHALL BE REMOVED, AND AFFECTED ITEMS SHALL BE RESTORED TO ORIGINAL OR PROPOSED CONDITIONS. UNPAVED AREAS SHALL BE SEEDED AND PROTECTED.

PAYMENT FOR REMOVAL OF TEMPORARY PAVEMENT SHALL BE INCLUDED IN THE UNIT PRICE BID PER SQ. YD. FOR "ITEM T-70 PORTLAND CEMENT CONCRETE PAVEMENT, AS PER PLAN". PAYMENT FOR RESTORATION OF ALL OTHER AFFECTED ITEMS SHALL BE AT THE UNIT PRICE BID FOR THE PERTINENT ITEM. QUANTITIES FOR THIS WORK HAVE BEEN INCLUDED IN THE GENERAL SUMMARY.

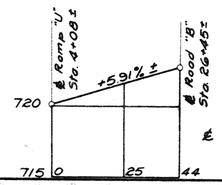
THE FOLLOWING ESTIMATED QUANTITIES ARE CARRIED TO THE SUMMARY FOR THE CONSTRUCTION OF TEMPORARY ROADS FOR THE MAINTENANCE OF TRAFFIC:

ESTIMATED QUANTITIES							
TEMP ROAD NO.	STATION TO STATION		T-70 9"	E-1 EXC.	E-8 REM. & DISP. EX CURB & GUTTER	E-8 REM. & DISP. EX INTEG. CURB	EST. EMB. REQ'D.
			SQ. YDS.	CU. YDS.	LIN. FT.	LIN. FT.	CU. YDS.
1	3+60± "U" TO 26+95± "B"		133	59	68		
2	25+30 "B" TO 26+51.5± "A"		308	15	55		5
3	19+70 "B" TO 1+08 "T"		116	50	100		
4	96+16.5 TO 97+00		88				
5	98+30± EB TO 100+22± NB		370	92*		80*	
1 THRU 5							
	TOTALS		1015	216	223	80	5

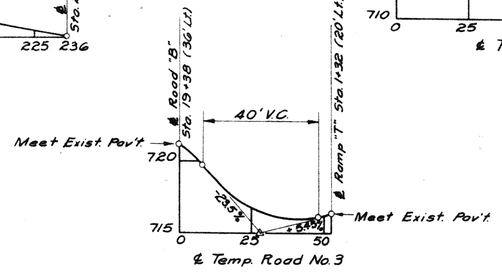
*PORTIONS OR ALL OF THE QUANTITIES THUS INDICATED MAY BE NON-PERFORMED AS DIRECTED BY THE ENGINEER. (SEE NOTE ON SHEET NO. 12).



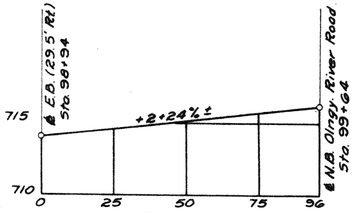
℄ Temp. Road No. 2



℄ Temp. Road No. 1



℄ Temp. Road No. 3



℄ Temp. Road No. 5

Temporary Road Profiles

COMPUTATIONS

FED. RD. DIVISION	STATE	PROJECT	
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ITEM T-71 9" REINFORCED PORTLAND CEMENT CONCRETE PAVEMENT

SERVICE ROAD:
SURFACE AREA = 391.20 SQ. YDS.
ADDITION UNDER 2-A CURB: AREA = 11.05 SQ. YDS.
TOTAL AREA = 402.25 SQ. YDS.

TO SUMMARY USE 402 SQ. YDS.

ITEM T-35 1-1/2" ASPHALTIC CONCRETE SURFACE COURSE

TYPICAL SECTIONS 4 AND 5:
LENGTH = 431.36 LIN. FT.
WIDTH = 60.00 LIN. FT.
AREA = 431.36 X 60.00 ÷ 9 = 2875.73 SQ. YDS.
VOLUME = 2875.73 X 1.5 ÷ 36 = 119.82 CU. YDS.
ROAD "A": NET AREA = 1464.66 SQ. YDS.
VOLUME = 1464.66 X 1.5 ÷ 36 = 61.03 CU. YDS.
ROAD "B" NET AREA = 1492.95 SQ. YDS.
VOLUME = 1492.95 X 1.5 ÷ 36 = 62.21 CU. YDS.
WESTBOUND LANES AND RAMP "T" - STA. 94+43.61 TO STA. 96+16.50:
NET AREA = 688.93 SQ. YDS.
VOLUME = 688.93 X 1.5 ÷ 36 = 28.71 CU. YDS.
EASTBOUND LANES - STA. 94+25.87 TO STA. 96+16.50
AND NORTHBOUND PAV'T. - STA. 94+16.60 TO STA. 96+20.00:
NET AREA = 851.25 SQ. YDS.
VOLUME = 851.25 X 1.5 ÷ 36 = 35.47 CU. YDS.
TOTAL VOLUME = 307.24 CU. YDS.

TO SUMMARY USE 307 CU. YDS.

ITEM B-35 1-1/2" ASPHALTIC CONCRETE LEVELING COURSE

FROM T-35 COMPS.: TOTAL VOLUME = 307.24 CU. YDS.

TO SUMMARY USE 307 CU. YDS.

ITEM T-30 BITUMINOUS TACK COAT

AREA FROM T-35 COMPS:
TYPICAL SECTIONS 4 AND 5 AREA = 2875.73 SQ. YDS.
ROAD "A" AREA = 1464.66 SQ. YDS.
ROAD "B" AREA = 1492.95 SQ. YDS.
"W.B." LANES AND RAMP "T" AREA = 688.93 SQ. YDS.
"E.B." LANES AND "N.B." PAV'T. AREA = 851.25 SQ. YDS.
TOTAL AREA = 7373.52 SQ. YDS.

RATE OF APPLICATION = 0.10 GAL. PER SQ. YD
TOTAL VOLUME = 7373.52 X 0.10 = 737.35 GAL.

TO SUMMARY USE 737 GAL.

ITEM B-70 9" PORTLAND CEMENT CONCRETE BASE COURSE

AREA FROM T-30 COMPS = 7373.52 SQ. YDS.
ADDITION UNDER 2-B CURB:
LENGTHS = 1222.88 LIN. FT.
251.28 LIN. FT.
123.57 LIN. FT.
104.95 LIN. FT.
143.12 LIN. FT.
363.52 LIN. FT.
2209.32 LIN. FT.
AREA = 2209.32 X 0.5 ÷ 9 = 122.74 SQ. YDS.
ADDITION UNDER 3-B MOD. CURB:
LENGTH = 354.82 LIN. FT.
AREA = 354.82 X 1 ÷ 9 = 39.42 SQ. YDS.
TOTAL AREA = 7535.68 SQ. YDS.

TO SUMMARY USE 7536 SQ. YDS.

EARTHWORK

FROM SHEET	EXC. CU. YDS.	EMB. CU. YDS.	EMB. + 20% CU. YDS.
6	216	5	6
11	9062	4	5
12	928	0	0
TOTALS	10206	9	11

ITEM I-21 4" PORTLAND CEMENT CONCRETE MEDIAN

TYPICAL SECTION 4:
LENGTH = 305.72 LIN. FT.
WIDTH = 7.00 LIN. FT.
AREA = 305.72 X 7 ÷ 9 = 237.78 SQ. YDS.
BETWEEN ROAD "B" AND ROAD "A":
LENGTH = 104.95 LIN. FT.
WIDTH = 7.00 LIN. FT.
AREA = 104.95 X 7 ÷ 9 = 81.63 SQ. YDS.
BETWEEN "E.B." LANES AND "W.B." LANES:
LENGTH = 181.76 LIN. FT.
AVG. WIDTH = 7.375 LIN. FT.
AREA = 181.76 X 7.375 ÷ 9 = 148.94 SQ. YDS.
ADDITION FOR R.R. UNDERPASSES
AREA = 3.98 SQ. YDS.
ADDITION FOR NOSE AT STA. 26+96.63 ROAD "B"
AREA = 7.94 SQ. YDS.
TOTAL AREA = 480.27 SQ. YDS.

TO SUMMARY USE 480 SQ. YDS.

ITEM I-22 SUBBASE

TYPICAL SECTION 4: LENGTH = 305.72 LIN. FT.
END AREA = 42.9336 SQ. FT.
VOLUME = 305.72 X 42.9336 ÷ 27 = 486.14 CU. YDS.
TYPICAL SECTION 5 (P.R.R.): LENGTH = 78.80 LIN. FT.
END AREA = 30.9375 SQ. FT.
VOLUME = 78.80 X 30.9375 ÷ 27 = 90.29 CU. YDS.
TYPICAL SECTION 5 (C&O R.R.): LENGTH = 46.84 LIN. FT.
END AREA = 30.5625 SQ. FT.
VOLUME = 46.84 X 30.5625 ÷ 27 = 53.02 CU. YDS.
ADDITION AT UNDERPASSES:
VOLUME = 2.28 CU. YDS.
DEDUCTION FOR FOOTER AT P.R.R., UNDERPASS:
VOLUME = - 1.72 CU. YDS.
ROAD "A": AREA = 1464.66 SQ. YDS.
VOLUME = 1464.66 X 6 ÷ 36 = 244.11 CU. YDS.
ADDITION UNDER LT. AND RT. SIDES ROAD "A":
AREA = 225.62 SQ. YDS.
VOLUME = 225.62 X 6 ÷ 36 = 37.60 CU. YDS.
ROAD "B": AREA = 1492.95 SQ. YDS.
VOLUME = 1492.95 X 6 ÷ 36 = 248.83 CU. YDS.
ADDITION UNDER LT. AND RT. SIDES ROAD "B"
AREA = 170.47 SQ. YDS.
VOLUME = 170.47 X 6 ÷ 36 = 28.41 CU. YDS.
ADDITION UNDER I-21 AT STA 26+96.63 "B":
VOLUME = 5.48 CU. YDS.
ADDITION UNDER I-21 STA. 28+59.39 TO 29+64.34 "B":
LENGTH = 104.95 LIN. FT.
END AREA = 13.00 SQ. FT.
VOLUME = 104.95 X 13 ÷ 27 = 50.53 CU. YDS.
SERVICE ROAD: AREA = 391.20 SQ. YDS.
VOLUME = 391.20 X 6 ÷ 36 = 65.20 CU. YDS.
ADDITION UNDER LT. AND RT. SIDES SERVICE ROAD:
AREA = 70.58 SQ. YDS.
VOLUME = 70.58 X 6 ÷ 36 = 11.76 CU. YDS.
"W.B." LANES AND RAMP "T"
AREA = 688.93 SQ. YDS.
VOLUME = 688.93 X 6 ÷ 36 = 114.82 CU. YDS.
"E.B." LANES AND "N.B." LANES:
AREA = 851.25 SQ. YDS.
VOLUME = 851.25 X 6 ÷ 36 = 141.88 CU. YDS.
ADDITION UNDER 2-B CURB:
AREA = 20.20 SQ. YDS.
VOLUME = 20.20 X 6 ÷ 36 = 3.37 CU. YDS.
ADDITION UNDER 3-B MOD. CURB:
AREA = 39.42 SQ. YDS.
VOLUME = 39.42 X 6 ÷ 36 = 6.57 CU. YDS.
ADDITION UNDER I-21: AREA = 148.94 SQ. YDS.
AVG. DEPTH = 1.7691 LIN. FT.
VOLUME = 148.94 X 1.7691 ÷ 3 = 87.83 CU. YDS.
ADDITION UNDER I-18 (LT. SIDE "W.B."):
END AREA = 4.84375 SQ. FT.; LENGTH = 153.99 LIN. FT.
VOLUME = 153.99 X 4.84375 ÷ 27 = 27.63 CU. YDS.
DEDUCTION AT STA 94+34 (LT.): LENGTH = 1.06 LIN. FT.
VOLUME = 1.06 X 4.84375 ÷ 27 = - 0.19 CU. YDS.
ADDITION UNDER I-18 (RT. SIDE "N.B."):
END AREA = 8.50 SQ. FT.; LENGTH = 200.45 LIN. FT.
VOLUME = 200.45 X 8.50 ÷ 27 = 63.10 CU. YDS.
ADDITION AT STA. 94+34 (RT.): LENGTH = 1.44 LIN. FT.
VOLUME = 1.44 X 8.50 ÷ 27 = 0.45 CU. YDS.
TOTAL VOLUME = 1767.39 CU. YDS.

TO SUMMARY USE 1767 CU. YDS

B-219 3" WATERPROOFED AGGREGATE BASE COURSE

AREA ON LT. SIDE "W.B." AND RAMP "T":
WIDTH = 6.00 LIN. FT.
LENGTH = 153.39 LIN. FT.
VOLUME = 153.39 X 6 X 0.25 ÷ 27 = 8.52 CU. YDS.
DEDUCTION AT STA. 94+34 (LT.):
LENGTH = 1.64 LIN. FT.
VOLUME = 6 X 1.64 X 0.25 ÷ 27 = - 0.09 CU. YDS.
AREA ON RT. SIDE "N.B.":
WIDTH = 9.00 LIN. FT.
LENGTH = 200.21 LIN. FT.
VOLUME = 200.21 X 9 X 0.25 ÷ 27 = 16.68 CU. YDS.
ADDITION AT STA. 94+34 (RT.):
LENGTH = 2.10 LIN. FT.
VOLUME = 9 X 2.10 X 0.25 ÷ 27 = 0.18 CU. YDS.
TOTAL VOLUME = 25.29 CU. YDS.

TO SUMMARY USE 25 CU.YDS.

T-31 BITUMINOUS SURFACE TREATMENT - BITUMINOUS MATERIAL

AREAS OF B-219: 153.39 X 6 ÷ 9 = 102.26 SQ. YDS.
200.21 X 9 ÷ 9 = 200.21 SQ. YDS.
2.10 X 9 ÷ 9 = 2.10 SQ. YDS.
304.57 SQ. YDS.
-1.64 X 6 ÷ 9 = -1.09 SQ. YDS.
303.48 SQ. YDS.
TOTAL VOLUME = 303.48 X 0.25 = 75.87 GAL.

TO SUMMARY USE 76 GAL.

T-31 BITUMINOUS SURFACE TREATMENT - AGGREGATE

AREA FROM COMPS. ABOVE = 303.48 SQ. YDS.
TOTAL VOLUME = 303.48 X 0.008 = 2.43 CU. YDS.

TO SUMMARY USE 2 CU. YDS.

I-18 5" STABILIZED CRUSHED AGGREGATE SHOULDERS

AREA ON LT. SIDE "W.B." AND RAMP "T":
END AREA = 2.71 SQ. FT.
LENGTH = 153.25 LIN. FT.
VOLUME = 153.25 X 2.71 ÷ 27 = 15.38 CU. YDS.
DEDUCTION AT STA. 94+34 (LT.):
LENGTH = 1.78 LIN. FT.
VOLUME = 1.78 X 2.71 ÷ 27 = -0.18 CU. YDS.
AREA ON RT. SIDE "N.B.":
END AREA = 3.96 SQ. FT.
LENGTH = 200.17 LIN. FT.
VOLUME = 200.17 X 3.96 ÷ 27 = 29.36 CU. YDS.
ADDITION AT STA. 94+34 (RT.):
LENGTH = 2.22 LIN. FT.
VOLUME = 2.22 X 3.96 ÷ 27 = 0.33 CU. YDS.
TOTAL VOLUME = 44.89 CU. YDS.

TO SUMMARY USE 45 CU. YDS.

E-1 COMPACTED SUBGRADE

AREA UNDER B-219 *303.48*
AREA UNDER T-71 = 402.25 SQ. YDS.
AREA UNDER B-70 = *7535.68* SQ. YDS.
AREA UNDER TYPE 3 MOD. CURB AND GUTTER = 1160 X 2 ÷ 9 = 257.78 SQ. YDS.
TOTAL *AREA* = 8499.19 SQ. YDS.

TO SUMMARY USE 8499 SQ. YDS.

L-9 FERTILIZER

AREA OF SEEDING = 4,635 SQ. YDS.
TOTAL VOLUME = 4635 X 9 X 20 ÷ (1000 X 2000) = 0.42 TON

TO SUMMARY USE 0.42 TON

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FRA.-3-(15.14-15.28)

GENERAL SUMMARY

ITEM	SHEET NUMBER 6	7	10	11	12	25	ITEM	QUANT	UNIT	DESCRIPTION
										Construction Type Code 6707
										ROADWAY
	216			9062	928		E-1	10,206	Cu. Yds.	Roadway Excavation, Method "B", as per plan
		8499			1320		E-1	9,819	Sq. Yds.	Compacted Subgrade
				6976	535		E-8	7,511	Sq. Yds.	Removal and Disposal of Existing Pavement
	80			1734			E-8	1,814	Lin. Ft.	Removal and Disposal of Existing Curb
	223			924			E-8	1,147	Lin. Ft.	Removal and Disposal of Existing Combination Curb and Gutter
				1010			E-8	1,010	Sq. Ft.	Removal and Disposal of Existing Sidewalk
							E-11	10	M. Gal.	Water
				1010			I-13	1,010	Sq. Ft.	4" Concrete Sidewalks
				562.5	87.5		I-15	650	Lin. Ft.	Guard Rail, Steel Beam Barrier Type (Deep) using steel or 6" x 8" square sawed wood posts
			752	1635	2084		L-9	7,471	Sq. Yds.	Seeding and Protecting, as per plan.
		0.42	0.07		0.19		L-9	0.68	Ton	Commercial Fertilizer (12-12-12)
										DRAINAGE
						13	E-2	13	Cu. Yds.	Excavation for Structures
						1	E-3	1	Cu. Yds.	Channel Excavation
						214	E-12	214	Lin. Ft.	Pipe Removed, 15" and Under
						778	E-12	778	Lin. Ft.	Pipe Removed, Over 15"
						224	I-2	224	Lin. Ft.	15" Class "B" Storm Sewers, Sec. M-6.5(b) or M-6.8(b)
						120	I-2	120	Lin. Ft.	18" Class "B" Storm Sewers, Sec. M-6.5(b) or M-6.8(b)
						428	I-2	428	Lin. Ft.	15" Class "B" Storm Sewers Under Pavement or Approaches
						524	I-2	524	Lin. Ft.	15" Class "B" Storm Sewers UP or A, Sec. M-6.6(d)
						192	I-2	192	Lin. Ft.	30" Storm Sewers Sec. M-6.6(c)
						290	I-2	290	Lin. Ft.	30" Storm Sewers Sec. M-6.6(d)
						98	I-2	98	Lin. Ft.	30" Storm Sewers Sec. M-6.6(d) under Railroad
						92	I-2	92	Lin. Ft.	38"x24" Reinforced Elliptical Concrete Culvert Pipe Sec. M-206.6(b) for Storm Sewers under pavement or Approaches
						1198	I-4	1,198	Lin. Ft.	6" Underdrains
						6	I-5	6	Each	6" Pipe Specials for Underdrains
						1	I-5	1	Each	30" Flap Gate, Armco Model 10-C or Approved Equal, as per plan.
					1	1	I-8	2	Each	Catch Basins Adjusted to Grade
						1	I-8	1	Each	Standard 2-2-A Catch Basin
						1	I-8	1	Each	Standard No. 16 Catch Basin
						3	I-8	3	Each	Standard No. 1 Manholes
						1	I-8	1	Each	Standard No. 2 Manhole Without Drop Pipe
						4	I-8	4	Each	Standard No. 2-6 Median Inlets, as per plan
						1	I-8	1	Each	Standard No. 2-8 Median Inlet, as per plan
						2	I-8	2	Each	Standard No. 2-10 Median Inlets, as per plan
						2	I-8	2	Each	Standard No. 2-12 Median Inlets, as per plan
						1	I-8	1	Each	Manhole No. A, as per plan
					160		I-14	160	Lin. Ft.	Standard Type 1 Paved Gutter, Modified as per plan
						4	I-16	4	Each	Catch Basins Abandoned
						4	I-16	4	Each	Manholes Abandoned
						7.3	S-1	7.3	Cu. Yds.	Concrete for Structures, Class "C"
						286	S-4	286	Lbs.	Reinforcing Steel

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GENERAL SUMMARY

ITEM	SHEET NUMBER 6	7	10	11	12	25	ITEM	QUANT	UNIT	DESCRIPTION
										Construction Type Code 6707
										ROADWAY
	216			9062	928		E-1	10,206	Cu.Yds.	Roadway Excavation, Method "B", as per plan
		8499			1378		E-1	9,877	Sq.Yds.	Compacted Subgrade
				7113	611		E-8	7,724	Sq.Yds.	Removal and Disposal of Existing Pavement
	80			1734			E-8	1,814	Lin.Ft.	Removal and Disposal of Existing Curb
	223			924			E-8	1,147	Lin.Ft.	Removal and Disposal of Existing Combination Curb and Gutter
				1010			E-8	1,010	Sq.Ft.	Removal and Disposal of Existing Sidewalk
							E-11	10	M.Gal.	Water
				1010			I-13	1,010	Sq.Ft.	4" Concrete Sidewalks
				562.5	112.6		I-15	675	Lin.Ft.	Guard Rail, Steel Beam Barrier Type (Deep) using 8"x8" or 6"x8" square sawed wood posts
			752	1635	2084		L-9	7,471	Sq.Yds.	Seeding and Protecting, as per plan.
		0.42	0.07		0.19		L-9	0.68	Ton	Commercial Fertilizer (12-12-12)
										DRAINAGE
						13	E-2	13	Cu.Yds.	Excavation for Structures
						4	E-3	4	Cu.Yds.	Channel Excavation
						214	E-12	214	Lin.Ft.	Pipe Removed, 15" and Under
						778	E-12	778	Lin.Ft.	Pipe Removed, Over 15"
						228	I-2	224	Lin.Ft.	15" Class "B" Storm Sewers, Sec. M-6.5(b) or M-6.8(b)
						120	I-2	120	Lin.Ft.	18" Class "B" Storm Sewers, Sec. M-6.5(b) or M-6.8(b)
						428	I-2	428	Lin.Ft.	15" Class "B" Storm Sewers Under Pavement or Approaches
						524	I-2	524	Lin.Ft.	15" Class "B" Storm Sewers UP or A, Sec. M-6.6(d)
						192	I-2	192	Lin.Ft.	30" Storm Sewers Sec. M-6.6(c)
						290	I-2	290	Lin.Ft.	30" Storm Sewers Sec. M-6.6(d)
						98	I-2	98	Lin.Ft.	30" Storm Sewers Sec. M-6.6(d) under Railroad
						92	I-2	92	Lin.Ft.	38"x24" Reinforced Elliptical Concrete Culvert Pipe Sec. M-206.6(b) for Storm Sewers under pavement or Approaches
						1198	I-4	1,198	Lin.Ft.	6" Underdrains
						6	I-5	6	Each	6" Pipe Specials for Underdrains
						1	I-5	1	Each	30" Flap Gate, Armco Model 10-C or Approved Equal, as per plan.
				1		1	I-8	2	Each	Catch Basins Adjusted to Grade
						1	I-8	1	Each	Standard 2-2-A Catch Basin
						1	I-8	1	Each	Standard No. 16 Catch Basin
						3	I-8	3	Each	Standard No. 1 Manholes
						1	I-8	1	Each	Standard No. 2 Manhole Without Drop Pipe
						4	I-8	4	Each	Standard No. 2-6 Median Inlets, as per plan
						1	I-8	1	Each	Standard No. 2-8 Median Inlet, as per plan
						2	I-8	2	Each	Standard No. 2-10 Median Inlets, as per plan
						2	I-8	2	Each	Standard No. 2-12 Median Inlets, as per plan
						1	I-8	1	Each	Manhole No. A, as per plan
				160			I-14	160	Lin.Ft.	Standard Type 1 Paved Gutter, Modified as per plan
						4	I-16	4	Each	Catch Basins Abandoned
						4	I-16	4	Each	Manholes Abandoned
						7.3	S-1	7.3	Cu.Yds.	Concrete for Structures, Class "C"
						286	S-4	286	Lbs.	Reinforcing Steel

FED. RD DIVISION	STATE	PROJECT	
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GENERAL SUMMARY

ITEM	SHEET NUMBER 6	7	10	11	12	25	ITEM	QUANT	UNIT	DESCRIPTION
										Construction Type Code 6707
										PAVEMENT
		307			48		B-35	355	Cu.Yds.	Asphaltic Concrete Leveling Course (60-70)
		7536			1189		B-70	8723	Sq.Yds.	9" Portland Cement Concrete Base Course
		25			30		B-219	55	Cu.Yds.	Waterproofed Aggregate Base Course
		737			115		T-30	852	Gals.	Bituminous Tack Coat; Sec. M-5.5, MS-2, or RS-1; or Sec. M-5.2, RC-1, RC-2 or RC-3, as per Sec. T-30.02
		76			89		T-31	165	Gals.	Bituminous Surface Treatment, Bituminous Material as per plan.
		2			3		T-31	5	Cu.Yds.	Bituminous Surface Treatment, No. 6 Aggregate
		307			47		T-35	354	Cu.Yds.	Asphaltic Concrete Surface Course, Type "C" (60-70)
	1015						T-70	1,015	Sq.Yds.	9" Portland Cement Concrete Pavement, as per plan
		402					T-71	402	Sq.Yds.	9" Reinforced Portland Cement Concrete Pavement, as per plan
				199			I-12	199	Lin.Ft.	Standard Type 2-A Concrete Curb
				1870	207		I-12	2,077	Lin.Ft.	Standard Type 2-B Concrete Curb
				719	484		I-12	1,203	Lin.Ft.	Standard Type 3-B Concrete Curb, Modified as per plan.
				94	133		I-12	227	Lin.Ft.	Standard Type 6 Concrete Curb
				138			I-12	138	Lin.Ft.	Standard Type 6 Concrete Curb, Modified as per plan.
			223	927			I-12	1,150	Lin.Ft.	Standard Type 3 Combination Curb and Gutter, Modified as per plan
		45			51		I-18	96	Cu.Yds.	Stabilized Crushed Aggregate Shoulders and Approaches
		480			107		I-21	587	Sq.Yds.	4" Standard Type 1 Portland Cement Concrete Median Pavement, Modified as per plan.
		1767			270		I-22	2,037	Cu.Yds.	Subbase

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GENERAL SUMMARY

ITEM	SHEET NUMBER						ITEM	QUANT	UNIT	DESCRIPTION
	6	7	10	11	12	25				Construction Type Code 6707
										PAVEMENT
		307			40		B-35	347	Cu.Yds.	Asphaltic Concrete Leveling Course (60-70)
		7536			972		B-70	8,508	Sq.Yds.	9" Portland Cement Concrete Base Course
		25			29		B-219	54	Cu.Yds.	Waterproofed Aggregate Base Course
		737			93		T-30	830	Gals.	Bituminous Tack Coat; Sec. M-5.5, MS-2, or RS-1; or Sec. M-5.2, RC-1, RC-2 or RC-3, as per Sec. T-30.02
		76			86		T-31	162	Gals.	Bituminous Surface Treatment, Bituminous Material as per plan.
		2			3		T-31	5	Cu.Yds.	Bituminous Surface Treatment, No. 6 Aggregate
		307			39		T-35	346	Cu.Yds.	Asphaltic Concrete Surface Course, Type "C" (60-70)
	1015						T-70	1,015	Sq.Yds.	9" Portland Cement Concrete Pavement, as per plan
		402					T-71	402	Sq.Yds.	9" Reinforced Portland Cement Concrete Pavement, as per plan
				199			I-12	199	Lin.Ft.	Standard Type 2-A Concrete Curb
				1870	167		I-12	2,037	Lin.Ft.	Standard Type 2-B Concrete Curb
				719	484		I-12	1,203	Lin.Ft.	Standard Type 3-B Concrete Curb, Modified as per plan.
				94	100		I-12	194	Lin.Ft.	Standard Type 6 Concrete Curb
				138			I-12	138	Lin.Ft.	Standard Type 6 Concrete Curb, Modified as per plan.
			223	927			I-12	1,150	Lin.Ft.	Standard Type 3 Combination Curb and Gutter, Modified as per plan
		45			49		I-18	94	Cu.Yds.	Stabilized Crushed Aggregate Shoulders and Approaches
		480			95		I-21	575	Sq.Yds.	4" Standard Type 1 Portland Cement Concrete Median Pavement, Modified as per plan.
		1767			236		I-22	2,003	Cu.Yds.	Subbase

	STATE	PROJECT		
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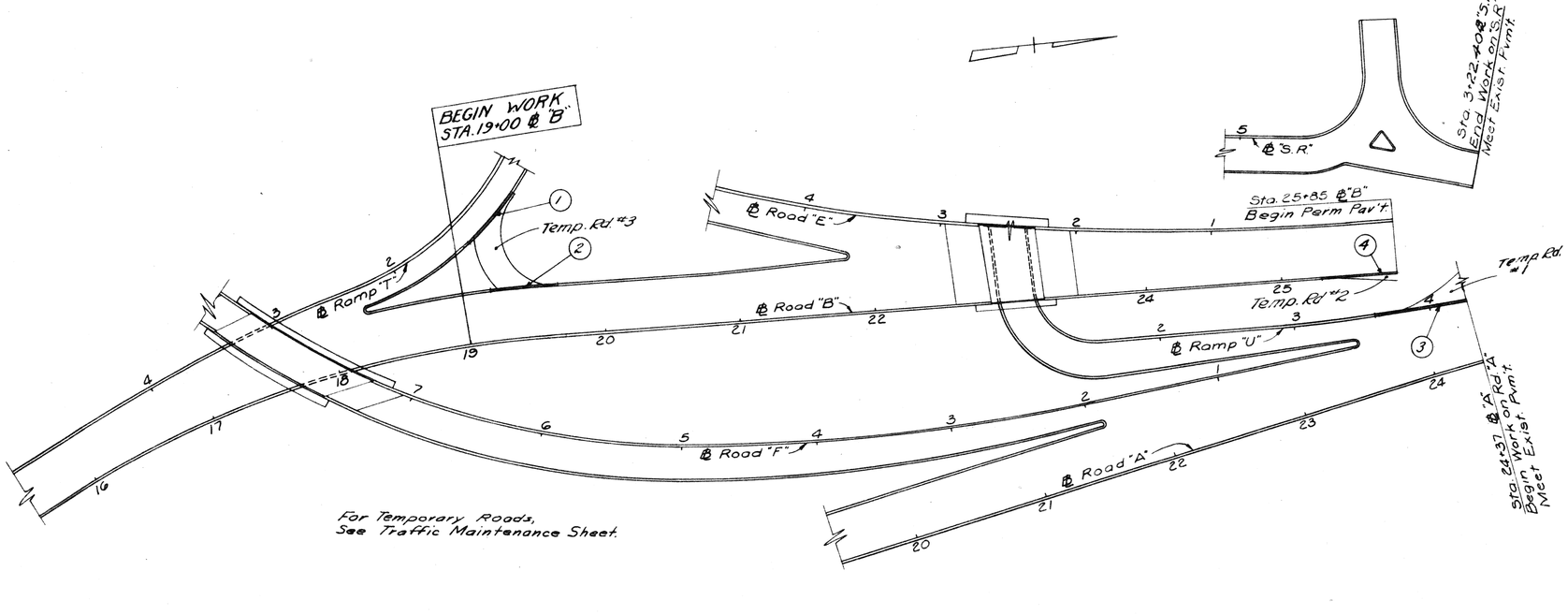
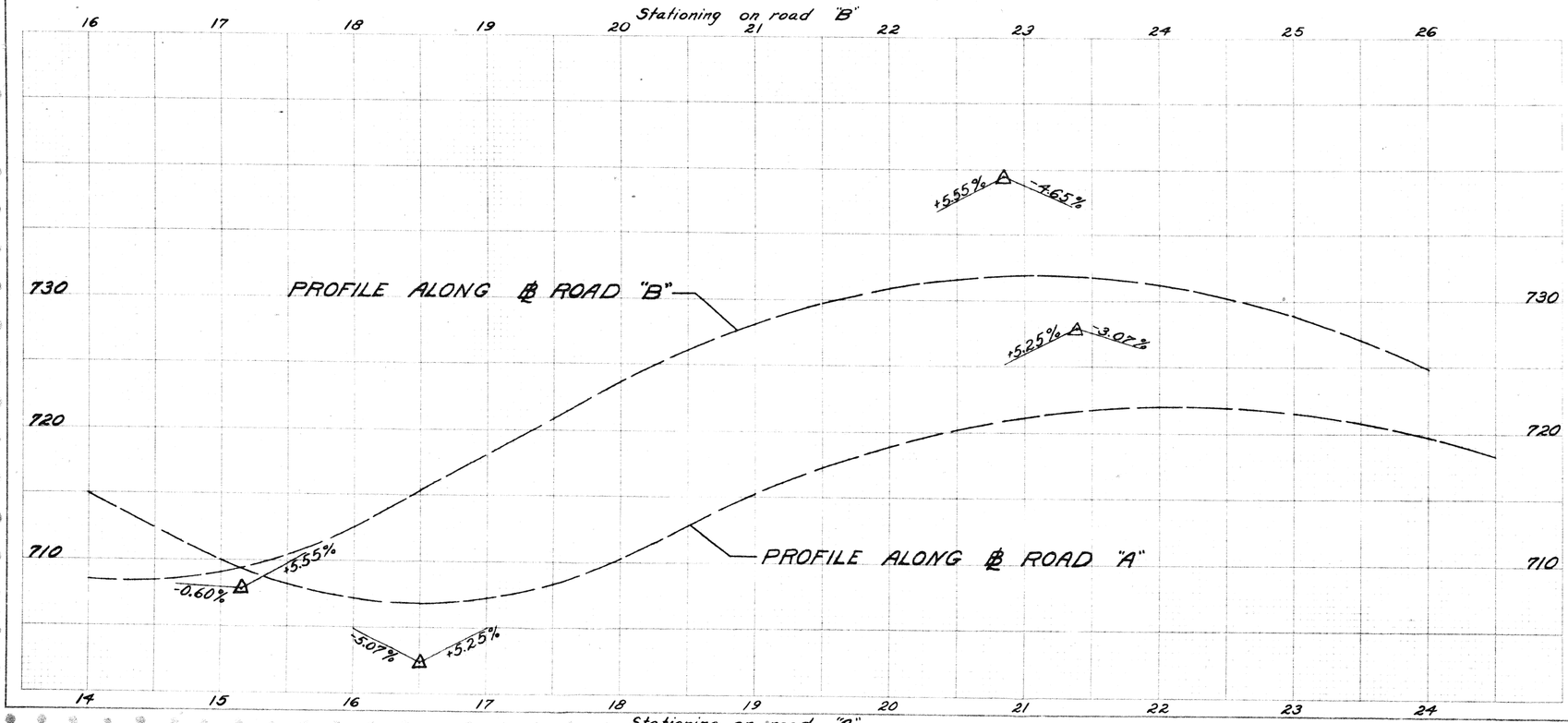
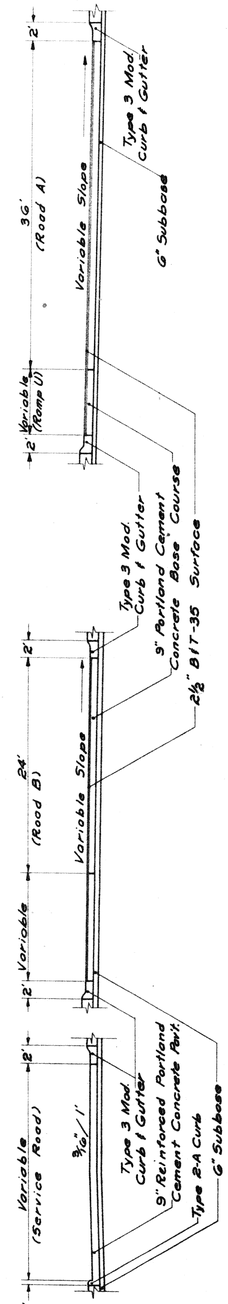




ESTIMATED QUANTITIES

REF NO.	STATION TO STATION	SIDE	1'-12 Conc. C.I.P. Standard Curb Lin. Ft.	L-9 Grading Sq. Yds	L-9 Comm Earth Tons
1	1+00 to 1+50 ("T")	Lt.	50		
2	19+20 to 19+70 ("B")	Lt.	50		
3	3+60 to 4+28 ("U")	Lt.	68		
4	23+30 to 23+85 ("B")	Rt.	55		
	19+00 to 19+70 ("B")	Lt.		194	0.05
	23+30 (B) to 4+28 (U)			238	0.02
	Totals (To Summary)		223	752	0.07

Note: The above items are required to restore Temporary Road areas to original conditions.



TYPICAL SECTIONS OF ADJOINING PAVEMENT

Sta 16+00 to Sta 25+85 ~ Road "B".

NOTE: Marker will be furnished and erected, on the left at Sta. 96+16.5, by the STATE before acceptance of this improvement.

NOTE: Marker will be furnished and erected, on the right at 25+85, by the STATE before acceptance of this improvement.

[1] P.I. Sta. 0+84.26 "S.R." Δ = 10°05'07" D = 6°00' R = 954.93' T = 84.26' L = 168.09'

[2] P.I. Sta. 27+60.27 "B" Δ = 4°34'25" D = 3°45' R = 1527.09' T = 61.01' L = 121.96'

[3] P.I. Sta. 6+03.36 "U" Δ = 9°29'14" D = 9°30' R = 603.11' T = 50.05' L = 99.86'

[4] P.I. Sta. 25+68.83 "A" Δ = 17°45' D = 5°00' R = 1145.92' T = 178.93' L = 355.00'

Shaded Area indicates existing rigid pavement to be removed.

Sta. 94+34 (℄ E.B.) Begin Previous Fed. Aid Project. No. I-539(6)

END PROJECT STA. 96+16.5 (E.B.) S.L.M. = 15.33

I-70-6(8)96

Sta. 25+85 ℄ "B" Permanent Pav't. Meet Exist. Pav't.

Sta. 3+22.40 ℄ S.R. End Work on S.R. Meet Exist. Pav't.

Sta. 24+37 ℄ on Rd. "A" Begin Exist. Pav't. Meet Exist. Pav't.

Exist. R/W

Fire Hydrant

℄ "S.R."

P.T. Sta. 1+68.09 "S.R."

P.C. 0+00 "S.R." = Sta. 29+64.34 "B" P.R.R. Interchange Track

Ex. R/W

P.R.R. Main Line

Exist. P.R.R. Bridge No. 1.03

T.S. Sta. 93+31.80 W.B.

T.S. Sta. 94+02.72 E.B. = 500' Lt. Sta. 94+02.72 ℄ Survey

Exist. Gas Br. No. 11

C.S. Sta. 96+00.44 W.B. = P.C.C. 96+03.06 32.10' Lt. S.B.

S.C. 95+31.80 W.B.

S.C. 96+02.72 E.B.

℄ Ramp "T"

Sta. 8+56 "T" End Work on Ramp "T"

I-70-6(8)96

℄ "B"

P.T. 28+21.22 "B"

P.C. 26+99.26 "B"

℄ "U"

P.C. 5+53.31 "U"

℄ "A"

℄ Survey

℄ W.B.

℄ E.B.

℄ N.B.

N-14°53'43"-E

Transformers

Exist. Reservoir

Exist. Pump House

Exist. Levee

Ex. R/W Exist. Levee

Sta. 26+34.18 "A" = P.T. Sta. 6+53.17 "U" ℄

P.T. Sta. 27+74.30 "A"

P.C. Sta. 23+85.90 "A"

Sta. 94+04.60 N.B. = Sta. 94+02.72 E.B. 32.42' Lt.

P.C. Sta. 94+16.60 N.B.

P.T. 95+45.54 N.B.

Sta. 36+20 ℄ N.B. & Sta. 96+16.5 ℄ E.B. & W.B. = End Permanent Pav't. on W.B. Lanes; Begin Partial Width Pav't. on E.B. Lanes

P.I. Sta. 96+85.56 E.B. = 5.00' Lt. Sta. 96+85.56 ℄ Survey

BEGIN PROJECT STA. 25+85 ℄ "B" S.L.M. 15.14

Sta. 25+85 ℄ "B" Within Previous Fed. Aid Project. No. U-233(5)

I-70-6(8)96

Sta. 90+03.38 on ℄ Survey = Sta. 0+00 "S.R." = 40.58' Lt. Sta. 29+64.34 "B" = 10.58' Lt. Sta. 27+36.56 "A" = 27.42' Rt. Sta. 7+58.12 "U" = 2.58' Lt.

End Previous Fed. Aid Project. No. U-233(5)

UTILITY OWNER: Ohio Bell Telephone Co., City of Columbus, Ohio

ADDRESS: 35 E. Gay St. Columbus, O. City Hall, Columbus, O.

For Drainage Items & Quantities, See Drainage Plan.

ALL ELEVATIONS ARE BASED ON USGS DATUM.

NOTE: For Pavement Widths Location of Joints, & Elevations, See Pavement Detail Sheets.

For Note on Hatched Area & Quantities beyond Sta. 96+16.5, See next Sheet.

B.M. - P.K. Nail in west side of 8" Wild Cherry Rt. of Sta. 91+50 Elev. = 713.74

B.M. - Hub below nail in NW Abutment, C℄O Structure. Elev. = 712.00

B.M. - P.K. Nail in North side of N.W. Abutment, C℄O. RR. Structure Elev. = 718.20

Note: For Pavement Elevations Back of Sta. 90+03.38 See Pavm't. Detail Sheets.

RR. Spike 179°05'30" 631.96' Iron Pin. 90°30' 378.66' Hub Sta. 67+50 ℄ Survey 642' Sta. 90+03.44

For Pavm't. Elevations Beyond C℄O. Structure, See Pavm't. Detail Sheets.

Excavation =	9062 Cu. Yds.
Embankment =	4 Cu. Yds.
Seeding =	4635 Sq. Yds.

400' V.C. from Profile - ℄ "B"

P.V.T. - Sta. 91+73.45 Elev. = 707.33

P.V.T. Sta. 94+34 Tan. Elev. = 708.39

New Excavation Proj. Fra.-3-15.28 See Cross Sections

Exist. Profile Elevs. are along ℄ Survey

P.V.C. Sta. 93+34 Elev. = 707.99

P.V.T. Sta. 95+34 Elev. = 707.89

W. Abut. Footer, Pier Footer, E. Abut. Footer

E. Abut. Footer, Pier Footer, W. Abut. Footer

W. Abut. Footer, Pier Footer, E. Abut. Footer, 200' V.C.

705.49 705.33 705.54 705.32 704.12 705.84 705.48 705.44 705.80

726.45 724.23 722.59 (+67.5) Face/Curb 722.52 (+57) Top/Curb 722.35 (+00) 720.15 717.55 716.38 (+27) Top/Curb 715.58 (+34) Gutter ℄ 715.08 (+50) 713.38 712.01 711.09 710.74 710.50 710.26 710.20 710.43 710.37 710.43 710.14 710.36 711.14 712.50 713.10 (+70) (Edge Broken Pavm't.) 709.25 (+79) - New Excavation 710.0 710.3 709.8 (P.I. Sta. 96+85.56)

86 87 88 89 90 91 92 93 94 95 96

730 720 710 700

ESTIMATED QUANTITIES

REF NO.	STATION TO STATION	SIDE	E-B Ram'd Dig. Excav. Unclass. Curb Lin. Ft.	E-B Ram'd Dispos. Of Excav. Pavm't. Sq. Yds.	E-B Ram'd Dispos. Of Asphalt Pavm't. Sidewalk Sq. Yds.	I-12 Type E-A Curb Lin. Ft.	I-12 Type E-B Curb Lin. Ft.	I-12 Type 3 Mod. C & G. Curb Lin. Ft.	I-12 Type G Curb Lin. Ft.	I-12 Type G Side-Med. walk Lin. Ft.	I-12 4" Side-Med. walk Sq. Ft.	I-15 Rem. & Disp. of Curb & Gutter Lin. Ft.
1	25+85.0" - 3+22.40 S.R."		136					136				
2	1+23.57 - 3+22.40 S.R."			402		199						
3	1+23.57 - 3+22.40 S.R."							236				236
4	25+85 - 28+21.22 "B"											
5	25+85 - 29+64.34 "B"			1493			124	143				143
6	0+00 - 1+23.57 "S.R."		117									
7	28+21.22 - 29+64.34 "B"						143					
8	90+00.10 - 90+27.00			104						21	104	
9	90+06.23 - 90+26.97	Rt. S.B.										
10	90+26.97 - 91+54.03	Rt. S.B.					127					125
11	90+34.5 - 91+47.0	Med.										
12	91+54.03 - 92+01.92	Lt. S.B.			212					49	212	
13	91+46.92 - 92+01.92	Rt. S.B.										
14	92+01.77 - 93+87.90	Med.										
15	92+08.0 - 93+03.8	Med.					186					175
16	90+03.38 - 92+01.77	Lt. S.B.	447									
17	90+03.38 - 92+01.77	Rt. S.B.	199				447					
18	90+03.38 - 94+34.74	Med.										
19	93+87.90 - 94+34.61	Lt. Rt.		2676								100
20	94+25.04 - 94+32.34	Lt. S.B.	49		189				49			
21	4+26.46 - 6+53.17 "U"											104
22	24+37 - 27+36.56 "A"			1465				225				
23	24+37 - 27+46.56 "A"							310				21
24	6+53.17 - 7+58.12 "U"		105				105					
25	25+68.83 - 29+64.34 "B"	Med.										46
26	30+06.73 - 30+27.47	Rt.		104								
27	30+27.47 - 31+54.53	Lt. N.B.					127					212
28	30+27.47 - 31+54.53	Rt. N.B.										
29	31+54.53 - 32+02.27	Lt. N.B.			212							
30	31+54.53 - 32+01.36	Rt. N.B.										
31	32+02.27 - 93+87.90	Lt. N.B.					196					
32	89+93.38 - 94+10.86	Rt. N.B.	415				425					
33	90+03.38 - 92+02.27	Lt. N.B.	199									
34	93+70.76 - 94+10.06	Rt.			189							
35	93+87.90 - 94+32.87	Lt. N.B.							45			189
36	94+34 - 96+16.5 E.B.	Lt.	45									
37	94+50.66 W.B. - 96+20 N.B.	Rt.		713								
38	94+68.86 - 96+20 N.B.	Lt.										
39	94+34.87 - 96+16.5 E.B.	Lt. N.B.										
40	94+49 - 96+16.5 E.B.	Med.										175
41	92+01.77 - 93+90.32	Med.		164								
	TOTALS To Summary		1734	7113	1010	199	1870	927	94	130	1005	925

PLAN & PROFILE SHEET Rev. 10-13-59 R.E.C.

NOTE: Marker will be furnished and erected, on the right at 25+85 by the STATE before acceptance of this improvement.

BEGIN PROJECT
STA. 25+85 ℄ "B"
S.L.M. 15.14

Sta. 25+85 ℄ "B" Within Previous Fed. Aid Project. No. U-233(5)

I-70-6(8)96

P.I. Sta. 0+84.26 "S.R."
Δ = 10°05'07"
D = 6°00'
R = 954.93'
T = 84.26'
L = 168.09'

P.I. Sta. 27+60.27 "B"
Δ = 4°34'25"
D = 3°45'
R = 1527.89'
T = 61.01'
L = 121.96'

P.I. Sta. 6+03.36 "U"
Δ = 9°29'14"
D = 9°30'
R = 603.11'
T = 50.05'
L = 99.86'

P.I. Sta. 25+68.83 "A"
Δ = 17°45'
D = 3°00'
R = 1145.92'
T = 178.93'
L = 355.00'

Sta. 3+22.40 ℄ S.R. End Work on S.R. Meet Exist. Pav't.

Sta. 25+85 ℄ "B" Begin Permanent Pav't. Meet Exist. Pav't.

Sta. 24+37 ℄ "A" Begin Work on Rd "A" Meet Exist. Pav't.

Exist. R/W

Fire Hydrant

P.T. Sta. 1+68.09 "S.R."

℄ "S.R."

P.T. 28+21.22 "B"

℄ "B"

P.C. 26+55.26 "B"

P.C. 5+53.31 "U"

℄ "U"

℄ "A"

Transformers

Exist R/W

P.C. Sta. 23+89.90 "A"

Sta. 26+54.18 "A" = P.T. Sta. 6+53.17 "U" ℄

P.T. Sta. 27+34.90 "A"

Shaded Area indicates existing rigid pavement to be removed.

Exist. P.R.R. Bridge No. 1.03

P.C. 0+00 "S.R." = Sta. 23+64.34 "B"

P.R.R. Interchange Track

P.R.R. Main Line

Ex. R/W

Exist. Reservoir

Exist. Pump House

Exist. Levee

Exist. Retaining Wall

T.S. Sta. 94+02.72 E.B. = 5.00' Lt. Sta. 94+02.72 ℄ Survey

T.S. 93+91.80 W.B.

C.S. Sta. 96+00.44 W.B. = P.C.C. 96+03.06 32.10' Lt. S.B.

S.C. 96+02.72 E.B.

Ramp "T"

Sta. 8+56 "T" End Work on Ramp "T"

Sta. 96+87.5 End Perm. Pav't. on E.B. Lanes

℄ W.B.

℄ E.B.

℄ N.B.

N 14°53'49" E

Sta. 94+04.68 N.B. = Sta. 94+02.72 E.B. 32.42' Lt.

P.C. Sta. 94+16.60 N.B.

P.T. 95+45.54 N.B.

Sta. 96+20 ℄ N.B. & Sta. 96+16.5 ℄ E.B. & W.B. - End Permanent Pav't on W.B. Lanes; Begin Partial Width Pav't on E.B. Lanes

P.I. Sta. 96+85.56 E.B. = 5.00' Lt. Sta. 96+85.56 ℄ Survey

END PROJECT
STA. 96+16.5 (E.B.)
S.L.M. = 15.33

I-70-6(8)96

Sta. 94+34 (℄ E.B.) Begin Previous Fed. Aid Project. No. I-599(6)

UTILITY OWNER
Ohio Bell Telephone Co.
City of Columbus, Ohio

ADDRESS
35 E. Gay St. Columbus, O.
City Hall, Columbus, O.

For Drainage Items & Quantities, See Drainage Plan.

ALL ELEVATIONS ARE BASED ON USGS DATUM.

NOTE: For Pavement Widths Location of Joints, & Elevations, See Pavement Detail Sheets.

For Note on Hatched Area & Quantities beyond Sta. 96+16.5, See next Sheet.

Sta. 90+03.38 on ℄ Survey =
Sta. 0+00 "S.R." = 40.58' Lt.
Sta. 29+64.34 "B" = 10.58' Lt.
Sta. 27+56.56 "A" = 27.42' Rt.
Sta. 7+58.12 "U" = 2.58' Lt.

End Previous Fed. Aid Project No. U-233(5)

B.M. - P.K. Nail in west side of 8" Wild Cherry Rt. of Sta. 91+50 Elev. = 713.74

B.M. - Hub below nail in NW Abutment, C℄0 Structure. Elev. = 712.00

B.M. - P.K. Nail in North side of N.W. Abutment, C℄0. RR. Structure Elev. = 718.20

Note: For Pavement Elevations Back of Sta. 90+03.38 See Pavm't. Detail Sheets.

RR Spike — 179°05'30" — 63.96' — Iron Pin — 90°30' — 64.2' — 378.66 Hub Sta. 67+50 — ℄ Survey — Sta. 90+03.44

For Pavm't. Elevations Beyond C℄0. Structure, See Pavm't. Detail Sheets.

Excavation =	9062 Cu. Yds.
Embankment =	4 Cu. Yds.
Seeding =	4635 Sq. Yds.

400' V.C. from Profile ~ ℄ "B"

P.V.T. ~ Sta. 91+73.45 Elev. = 707.35

P.V.I. Sta. 94+34 Tan. Elev. = 706.39

New Excavation Proj. Fra-3-15.28 See Cross Sections

Exist. Profile Elev's. are along ℄ Survey

705.33 705.43 705.54 — W. Abut. Footer, Pier Footer, E. Abut. Footer

705.32 704.12 705.84 — E. Abut. Footer, Pier Footer, W. Abut. Footer

P.V.C. Sta. 93+34 Elev. = 707.99

705.48 705.44 705.80 — W. Abut. Footer, Pier Footer, E. Abut. Footer 200' V.C.

P.V.T. Sta. 95+34 Elev. = 707.89

726.45 724.23 722.59 (+0.15) Face/Curb 722.52 (+0.7) Top/Curb 722.35 (+0.0) 720.15 717.55 716.38 (+2.7) Top/Curb 715.58 (+3.5) Gutter ℄ 715.08 (+3.5) 713.38 712.01 711.09 710.74 710.50 710.26 710.20 710.43 711.37 710.43 710.14 710.36 711.14 712.50 713.10 (@ Sta. 7+01 (Edge Broken Pavm't) 708.23 (@ Sta. 7+79) - New Excavation 710.0 710.3 709.8 (@ Sta. 96+85.56)

705.80 708.39 707.98 707.67 707.46 707.33 707.30 707.45 707.65 707.85 708.04 708.11 708.15 708.16 708.17 708.15 708.10 708.03 707.54

730 720 710 700

86 87 88 89 90 91 92 93 94 95 96

NOTE: Marker will be furnished and erected, on the left at Sta. 96+16.5, by the STATE before acceptance of this improvement.

FED. ROAD OR STATE PROJECT NO.	STATE	PROJECT	
2	OHIO		

11
29

FRA-3-(15.14-15.28)

SEE SHEET NO

ESTIMATED QUANTITIES

REF NO	STATION TO STATION	SIDE	E.O. Remd. & Disposal of Exist. Pav't. C.Yds.	E.O. Remd. & Disposal of Exist. Pav't. & Exist. Sub-Base C.Yds.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-12 Type 6 Mod. C.&G. Curb Lin. Ft.	I-13 Type 4" Sidewalk Med. walk. Lin. Ft.	I-15 Conc. Slope Paving Sq. Yds.	E.O. Remd. & Disposal of Exist. Curb & Gutter Lin. Ft.
1	25+85.5 ℄ "B" - 1+23.57 "S.R."													
2	1+23.57 - 3+22.40 "S.R."		402											
3	1+23.57 - 3+22.40 "S.R."				199									
4	25+85 - 28+21.22 "B"						236							
5	25+85 - 29+64.34 "B"		1493											
6	0+00 - 1+23.57 "S.R."		117			124								
7	28+21.22 - 29+64.34 "B"					143								
8	90+01.10 - 90+27.00	Lt.		104								104		
9	90+04.23 - 90+56.97	Rt. S.B.										21		
10	90+26.97 - 91+54.03	Rt. S.B.				127								
11	91+54.03 - 92+01.77	Rt. S.B.										48		112.5
12	92+01.77 - 92+01.82	Lt.		212										
13	92+01.82 - 93+07.80	Rt. S.B.				186						212		
14	92+08.8 - 93+03.8	Med.												
15	90+03.36 - 94+50.62	Lt. S.B.	447			447						175		
16	90+03.36 - 92+01.77	Rt. S.B.	199											
17	90+03.36 - 94+34.74	Lt. Rt.	2876											
18	93+87.90 - 94+36.61	Rt. S.B.	49											
19	94+05.04 - 94+35.34	Lt.		189								189		
20	94+05.46 - 6+53.17 "U"													
21	4+26.46 - 6+53.17 "U"						225							
22	24+37 - 27+46.56 "A"						310							
23	24+37 - 27+56.56 "A"		1465											
24	6+53.17 - 7+58.12 "U"			105										
25	28+62.12 - 29+62.12 "B"	Med.												
26	90+06.70 - 90+32.60	Rt.		104								100		
27	90+06.73 - 90+27.47	Lt. N.B.										104		
28	90+27.47 - 91+54.53	Lt. N.B.										21		
29	91+54.53 - 92+02.27	Lt. N.B.										48		
30	91+54.49 - 92+07.30	Rt.		212								212		
31	92+02.27 - 93+87.90	Lt. N.B.												
32	83+93.56 - 94+06.06	Rt. N.B.	415			186								
33	90+03.36 - 92+02.27	Lt. N.B.	199			425								
34	93+70.76 - 94+06.06	Rt.		189								189		
35	93+87.90 - 94+38.87	Lt. N.B.	45											
36	94+05.46 - 96+16.5 E.B.	Lt.		576										
37	94+06.06 - 96+03.77	Rt.										45		
38	94+38.87 - 96+16.5 E.B.	Lt. N.B.												
39	94+38.87 - 96+16.5 E.B.	Rt. N.B.										175		
40	94+43 - 96+18 E.B.	℄ Med.	164											
41	92+01.77 - 93+90.32	℄ Med.												
	TOTALS To Summary		1734	6976	1010	199	870	927	94	130	1005	625	924	

156 199 364 719

225 310 10

236 143

PLAN & PROFILE SHEET

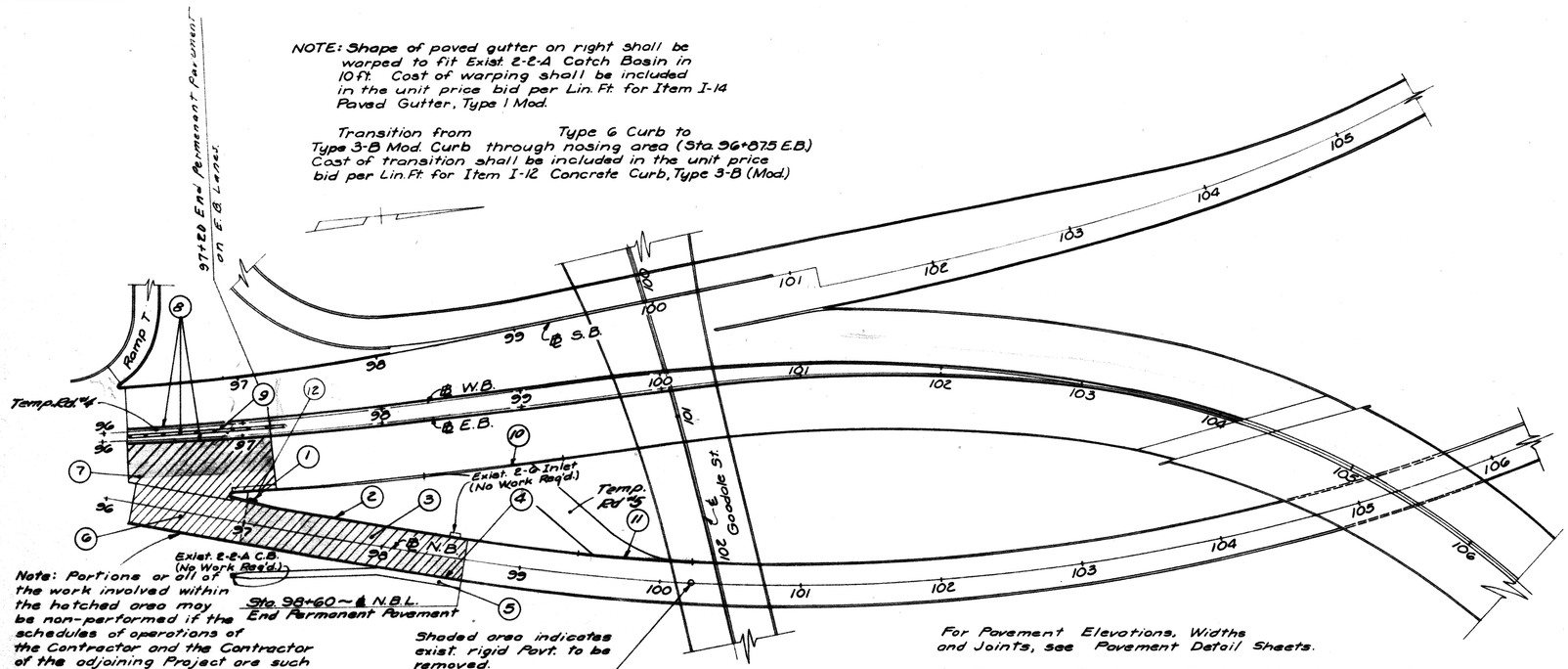
FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

12
29

FRA-3-(15.14-15.28)

NOTE: Shape of paved gutter on right shall be warped to fit Exist. 2-E-A Catch Basin in 10 ft. Cost of warping shall be included in the unit price bid per Lin. Ft. for Item I-14 Paved Gutter, Type 1 Mod.

Transition from Type 6 Curb to Type 3-B Mod. Curb through nosing area (Sta. 96+87.5 E.B.) Cost of transition shall be included in the unit price bid per Lin. Ft. for Item I-12 Concrete Curb, Type 3-B (Mod.)



Note: Portions or all of the work involved within the hatched area may be non-performed if the schedules of operations of the Contractor and the Contractor of the adjoining Project are such as to have no adverse effect on the flow of traffic with this work being performed by the Contractor of the adjoining Project.

Shaded area indicates exist. rigid Pavt. to be removed.

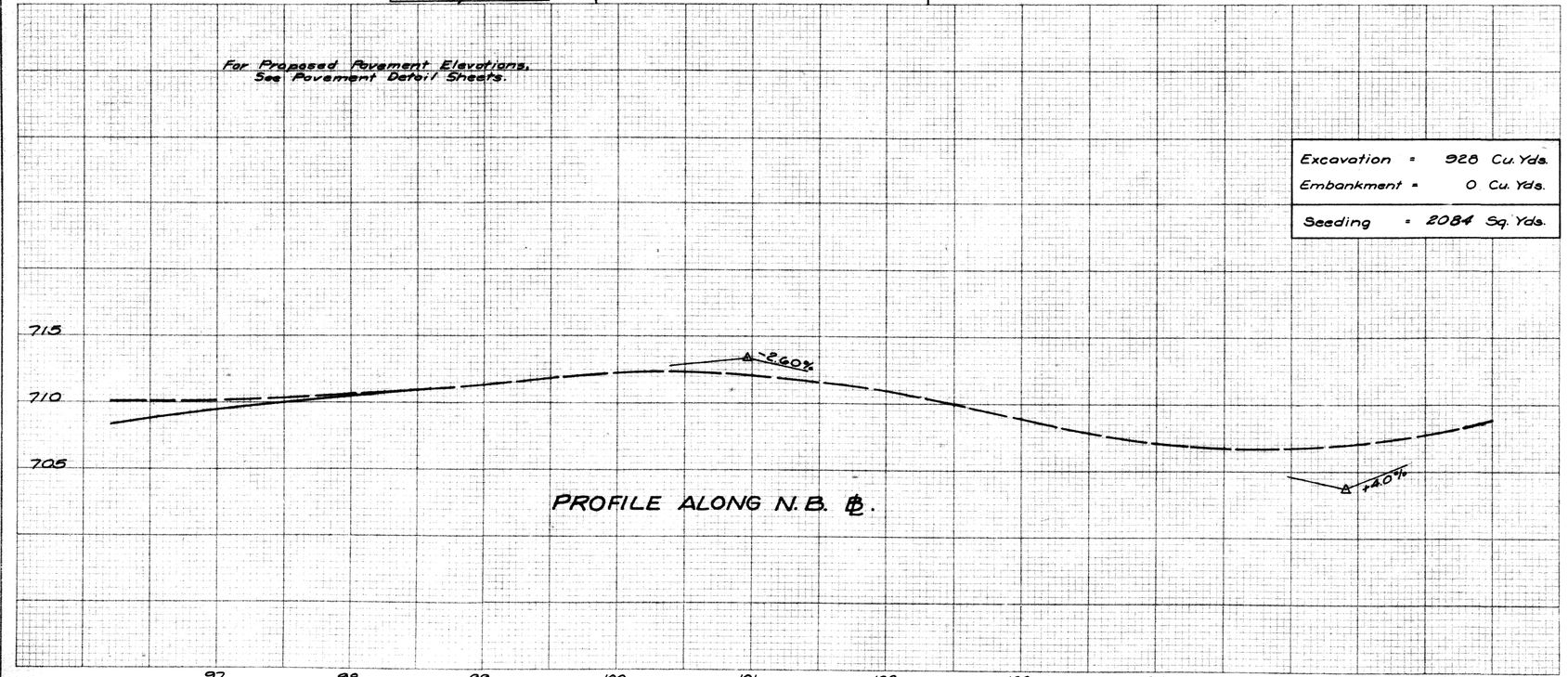
For Pavement Elevations, Widths and Joints, see Pavement Detail Sheets.

For Temporary Roads, see Traffic Maintenance Sheet.

END WORK
STA. 100+22 ℄ N.B.
Olentangy River Road

B.M. ~ N.E. Corner of Transformer Slab. Pump House "A" (Goodale Project) Elev. = 726.85

For Proposed Pavement Elevations, See Pavement Detail Sheets.

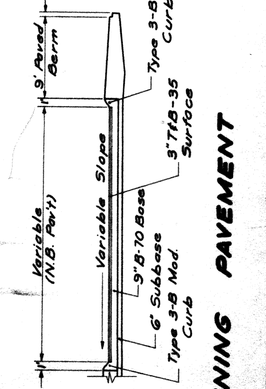


PROFILE ALONG N.B. ℄.

Excavation	=	928 Cu. Yds.
Embankment	=	0 Cu. Yds.
Seeding	=	2084 Sq. Yds.

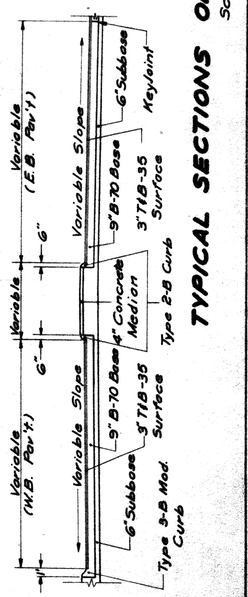
ESTIMATED QUANTITIES

REF. NO.	STATION TO STATION	SIDE	I-8 C.B. Adj. to Grade Each	I-12 3-B Mod. Lin. Ft.	I-14 Type 1 Mod. Lin. Ft.	E-8 Rem. of Pavt. Slab or Curb Sq. Yds.	I-12 Type 6 Lin. Ft.	I-12 Type 2B Lin. Ft.	T-30 Tack Coat Gal.	T-31 Bit. Mat. Agg. Gal.	T-35 Bit. Mat. Agg. Cu. Yds.	I-9 Comm. Fert. Tons	SEE SHEET NO.
1	97+02 (N.B.)	Lt.	1										
2	96+35 - 96+60 (N.B.)	Lt.		164									
3	97+00 - 96+60 (N.B.)	℄			535								
4	96+20 - 96+60 (N.B.)	Rt.		240									
5	97+00 - 96+60 (N.B.)	Rt.			160								
	Pavement												
6	96+20 - 96+60 (N.B.)	℄											
7	96+16.5 - 97+20 (E.B.)	Rt.											
	96+16.5 (E.B.) to 100+22 (N.B.)												
8	96+16.5 to 97+20 (E.B.)	Lt. & Med.						207					
9	96+18 to 97+30.5 (E.B.)	Lt. & Med.							75	60	31		
10	98+25 to 99+23 (E.B.)	Rt.						100	40	3	16		
11	99+42 to 100+22 (N.B.)	Lt.			80								
12	96+87.5 to 97+20 (E.B.)	Rt.					33			26	1		
13	96+16.5 to 97+20 (E.B.)	Rt.				274 Sq. Yds.							
	96+16.5 to 97+20 (E.B.)	Lt.											
	Totals (To Summary)		1	484	160	611	133	207	115	89	47	0.19	
	Portions or all of the above Quantities may be non-performed as directed by the Engineer + See Note for Hatched area on this sheet.												



TYPICAL SECTIONS OF ADJOINING PAVEMENT

Scale: ½" = 1'



Sta. 96+20 to Sta. 106+20 ~ N.B.

REV. 10-13-59 REC.

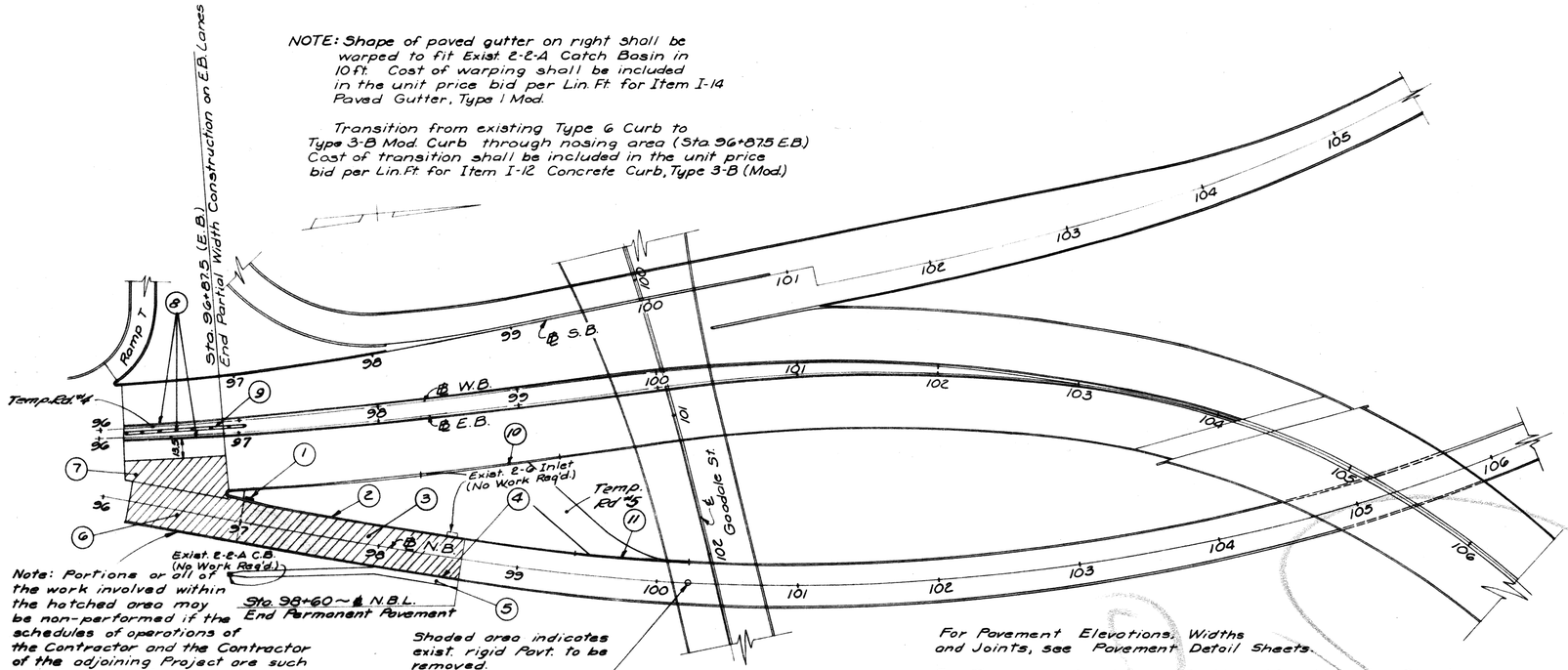
DIST.	STATE	PROJECT	
2	OHIO		

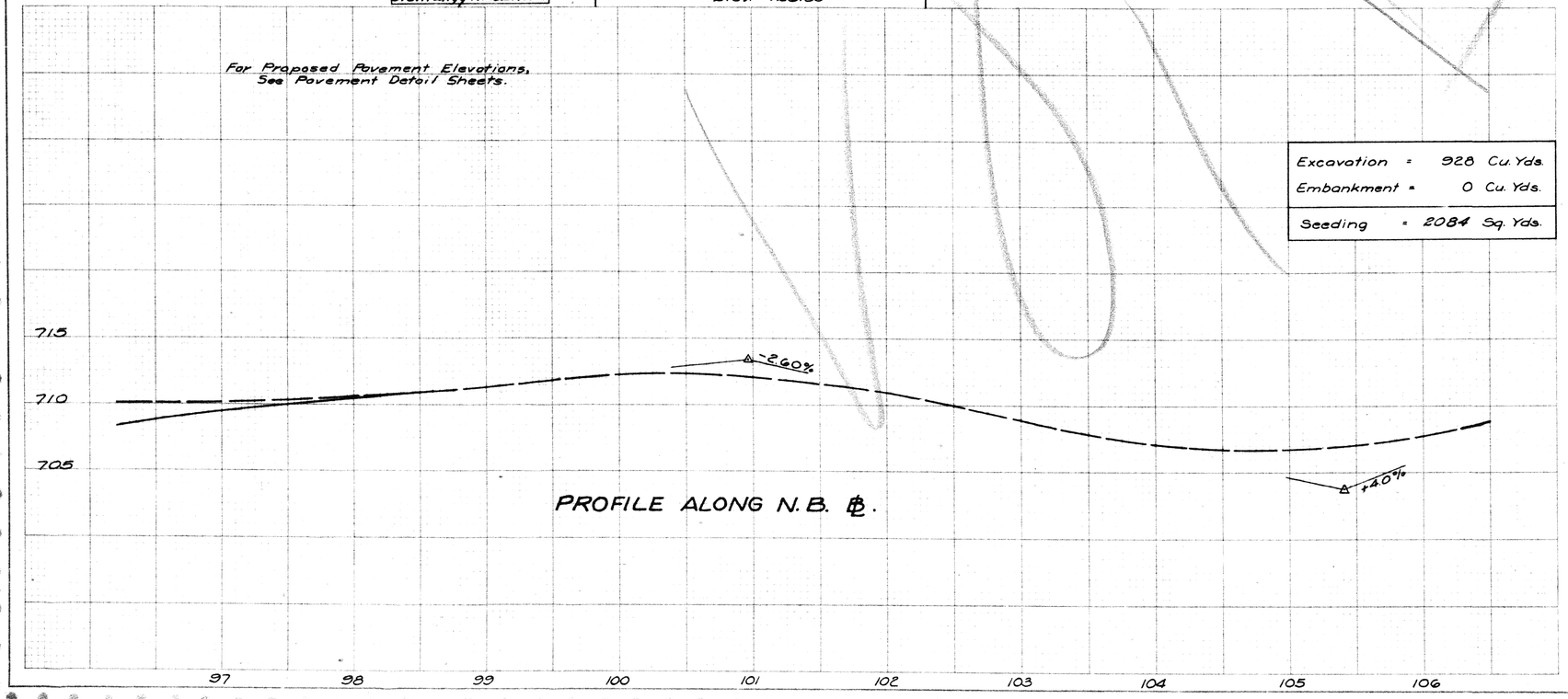
12/29

FRA-3-(15.14-15.28)

NOTE: Shape of paved gutter on right shall be warped to fit Exist. 2-E-A Catch Basin in 10 ft. Cost of warping shall be included in the unit price bid per Lin. Ft. for Item I-14 Paved Gutter, Type I Mod.

Transition from existing Type 6 Curb to Type 3-B Mod. Curb through nosing area (Sta. 96+87.5 E.B.) Cost of transition shall be included in the unit price bid per Lin. Ft. for Item I-12 Concrete Curb, Type 3-B (Mod.)





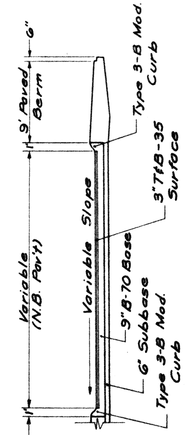
PROFILE ALONG N.B. ℄.

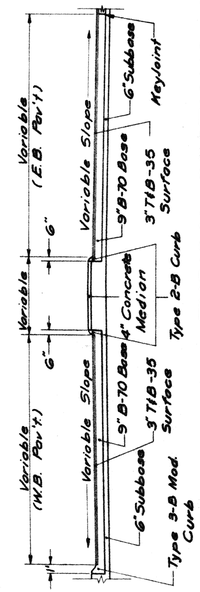
Excavation	=	928 Cu. Yds.
Embankment	=	0 Cu. Yds.
Seeding	=	2084 Sq. Yds.

ESTIMATED QUANTITIES

REF NO	STATION TO STATION	SIDE	I-8 C.B. Adj. to Grade Each	I-18 3-B Mod. Lin. Ft.	I-14 Type I Mod. Lin. Ft.	E-8 Rem. & Disp. of Exist. Pvt.* Sq. Yds.	I-12 Type 6 Lin. Ft.	I-12 Type 3-B Lin. Ft.	T-30 Tack Coat Gal.	T-31 Bit. Mat. Gal.	T-35 B-35 Agg. 1/2" Cu. Yds.	T-35 B-35 Agg. 1/2" Cu. Yds.	T-35 B-70 Agg. 1/2" Cu. Yds.	B219 I-5 Cu. Yds.	I-6 5" Cu. Yds.	I-21 4" Sq. Yds.	I-22 E-1 Comm. Subg. Sq. Yds.	I-9 Comm. Fert. Tons	SEE SHEET NO
1	97+02 (N.B.)	Lt.	1																
2	96+85 - 98+60 (N.B.)	Lt.		164															
3	97+00 - 98+60 (N.B.)	℄				535													
4	96+20 - 98+60 (N.B.)	Rt.		240															
5	97+00 - 98+60 (N.B.)	Rt.			160														
	Pavement																		
6	96+20 - 98+60 (N.B.)	℄							75	60	2	31	31						
7	96+16.5-96+87.5 (E.B.)	Rt.							18			8	8						
	98+16.5 (EB) to 100+22 (NB)																		
8	96+16.5 to 97+00 (EB)	℄ Med.						167				1							
9	96+18 to 97+05 (EB)	℄ Med.													1				
10	98+25 to 99+25 (EB)	Rt.					100			26	1				88				
11	99+42 to 100+22 (NB)	Lt.		80											9	875	14		
	Totals (To Summary)		1	484	160	535	100	167	93	86	3	39	40	19	95	875	236	972	0.19

Portions or all of the above Quantities may be non-performed as directed by the Engineer - See Note for Hatched area on this sheet.





TYPICAL SECTIONS OF ADJOINING PAVEMENT

Scale: ½" = 1'

Sta. 96+20 to Sta. 106+20 ~ N.B.

U.S. RD DIVISION	STATE	PROJECT		13
2	OHIO			29

FRA - 3 - (15.14 - 15.28)

PROFILES - ℄ "A" & ℄ "B"

Exist. 350' V.C.
P.V.C.-Sta. 14+75
Elev.-711.20
P.V.I.-Sta. 16+50
Elev. Tan.-702.33
P.V.T.-Sta. 18+25
Elev.-711.52
-5.07%
+5.25%
Exist. P.V.I.-Sta. 21+37.08
Tan Elev.-727.90
Prop. P.V.I.-21+75
Tan Elev.-729.89
+5.25%
-4.12%
-3.07%
℄ Exist Profile ℄ "A"
Proposed 676' V.C.
Existing 600' V.C.
Prop. ℄ Exist. P.V.C.
Sta. 18+37.00
Elev.-712.15
Exist. P.V.T.-Sta. 24+37.00
Elev.-719.69
Begin Work - Sta. 24+37.00
Meet Existing Pavement
Sta. 25+50.63
Elev.-714.41
Prop. P.V.T.-25+13
Elev.-715.96
Proposed Graphic Grade
Exist. 150' V.C.
Exist. P.V.C.-25+90
Elev.-714.00
Exist. P.V.T.-27+40
Elev.-710.87
Sta. 27+56.56 on ℄ "A"
Sta. 90+03.38 on ℄ Survey
Bottom of Beam
Sta. 90+09.44
Elev.-724.08
-3.07%
-1.10%
Proposed Profile - ℄ "A"
Sta. 91+73.45
Elev.-706.88
+0.40%
Stationing & Profile along ℄ "A"
Profile along Rt. Edge of Northbound Pav't.
Stationing along ℄ Survey

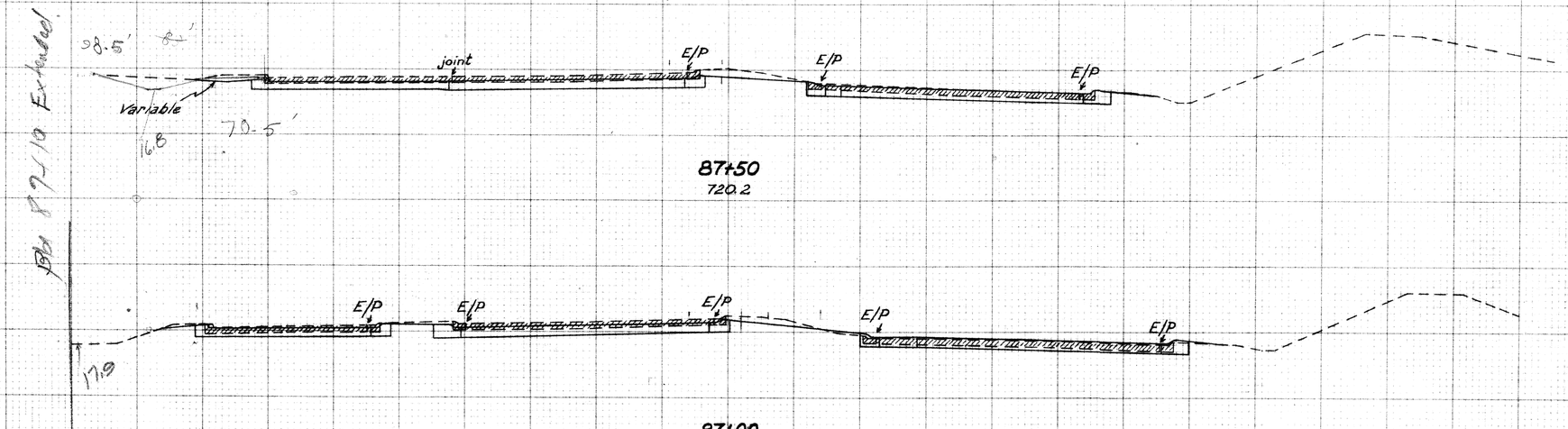
Existing 200' V.C.
P.V.C.-Sta. 16+15
Elev.-708.47
P.V.I.-Sta. 17+15
Tan. Elev.-707.87
P.V.T.-Sta. 18+15
Elev.-713.42
-0.60%
+5.55%
Exist. Profile ℄ "B"
Proposed ℄ Existing
P.V.C.-Sta. 19+85
Elev.-722.85
Existing 600' V.C.
Proposed 650' V.C.
Exist. P.V.I.-22+85
Elev. Tan.-709.50
Prop. P.V.I.-Sta. 23+10.00
Tan. Elev.-740.29
+5.55%
-4.65%
-5.50%
Exist. P.V.T.
Sta. 25+85
Elev.-725.56
Proposed P.V.T.
Sta. 26+35
Elev.-723.02
Begin Work - Sta. 28+85.00
Meet Existing Pavement
Proposed 400' V.C.
Exist. 150' V.C.
Prop. P.V.C. Sta. 27+34.41
Elev.-717.55
Exist. P.V.C.-Sta. 28+00
Elev.-715.58
Exist. P.V.I.-Sta. 29+50
Elev.-711.34
Sta. 29+64.34 ℄ "B" = 10.58' Lt. of
Sta. 90+03.38 on ℄ Survey
Prop. P.V.T.-Sta. 31+73.45
Elev.-707.35
-7.85%
-1.10%
-5.50%
+0.40%
Prop. P.V.I.-29+13.41
Tan. Elev.-706.53
Stationing & Profile Elevations along ℄ "B"
Sta. along ℄ Survey
Elev. along Rt. e/p S.B. = Profile Grade Pt.

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

15
29

FRA-3-(15.14-15.28)

SEEDING			END AREA		VOLUME	
END WIDTH	SQ YDS		CUT	FILL	CUT	FILL
	247				293	
47		720.00				
	281				226	2
54		720.00				
	189				134	2
14		720.00				
	39				32	
0		720.00				



720.00 134 0

720.00 110 2

720.00 35 0

720.00 0

Note: For grade point elevations Sta. 86+00 to Sta. 90+00 see Pavement Detail Sheets

Sta. 86+00 to Sta. 87+50

DIST. RD DIVISION	STATE	PROJECT	
2	OHIO		

16/29

FRA-3-(15.14-15.28)

SEEDING	
END WIDTH	SQ YDS
40	242
53	258
64	325
42	294

140 120 100 80 60 40 20 ℄ 20 40 60 80 100

89+50
710.1

710.00

101 82' 0 0 2:1 E/P E/P E/P E/P 62.5'

89+00
713.40

710.00

97 87' 0 0 3:1 E/P E/P E/P E/P 62.5'

88+50
715.06

710.00

101 82' 0 0 3:1 joint E/P E/P E/P 2:1 63.2'

88+00
717.4

710.00

101' 80' 4:1 2:1 2' 4:1 2:1 joint E/P E/P E/P E. Pump House

1' curb
2' shoulder
6' in slope
2' ditch

140 120 100 80 60 40 20 ℄ 20 40 60 80 100 120 140

Sta. 88+00 to Sta. 89+50

END AREA		VOLUME	
CUT	FILL	CUT	FILL
229		453	
221		417	
224		412	
182		376	

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

17
29

FRA-3-(15.14-15.28)

SEEDING				END AREA		VOLUME	
END WIDTH	SQ YDS			CUT	FILL	CUT	FILL
21	178	710.00		2.72		470	
						548	
43	231	710.00		3.20		566	
40	242	710.00		2.91		510	
47	125	710.00		2.60			

Face Abut.

Face Abut.

Abut. Footer

1:1

707.80
91+50
710.28

Edge Drive

℄ Drive

℄ Drive

1:1

707.46
91+00
710.53

Edge Stone

℄ Drive

℄ Drive

1:1

2:1

707.98
90+50
710.76

1048

Face Wing Wall

1.5:1

2:1

90+00
711.09

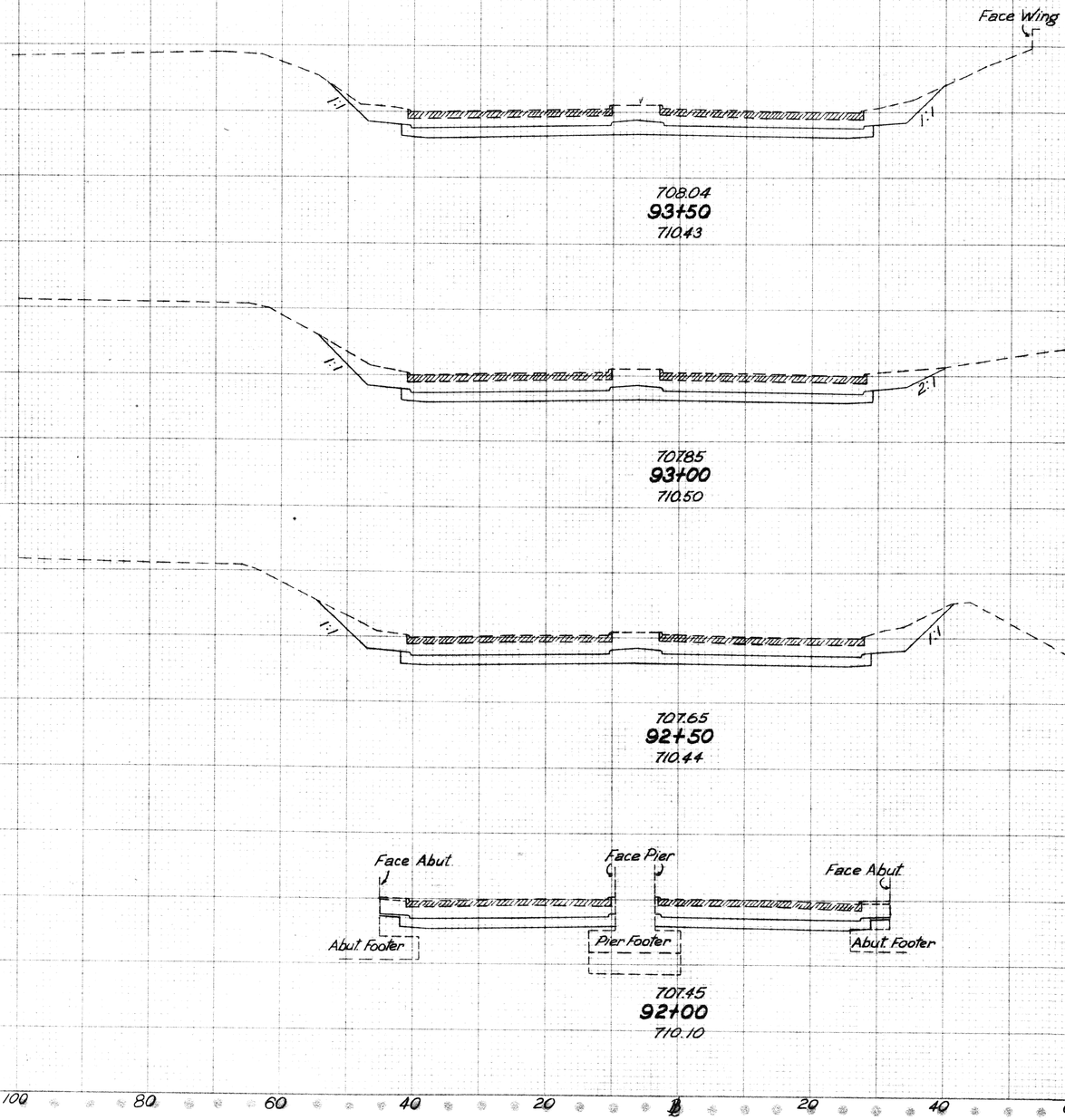
Sta. 90+00 to Sta. 91+50

SEEDING	
END WIDTH	SQ YDS
39	167
	222
41	
	236
44	
	122
0	

STATE DIV.	STATE	PROJECT	
2	OHIO		

18
29

FRA-3-(514-15.28)



END AREA		VOLUME	
CUT	FILL	CUT	FILL
		413	
710.00 260			
		499	
710.00 279			
		531	
710.00 295			
		492	
710.00 236			

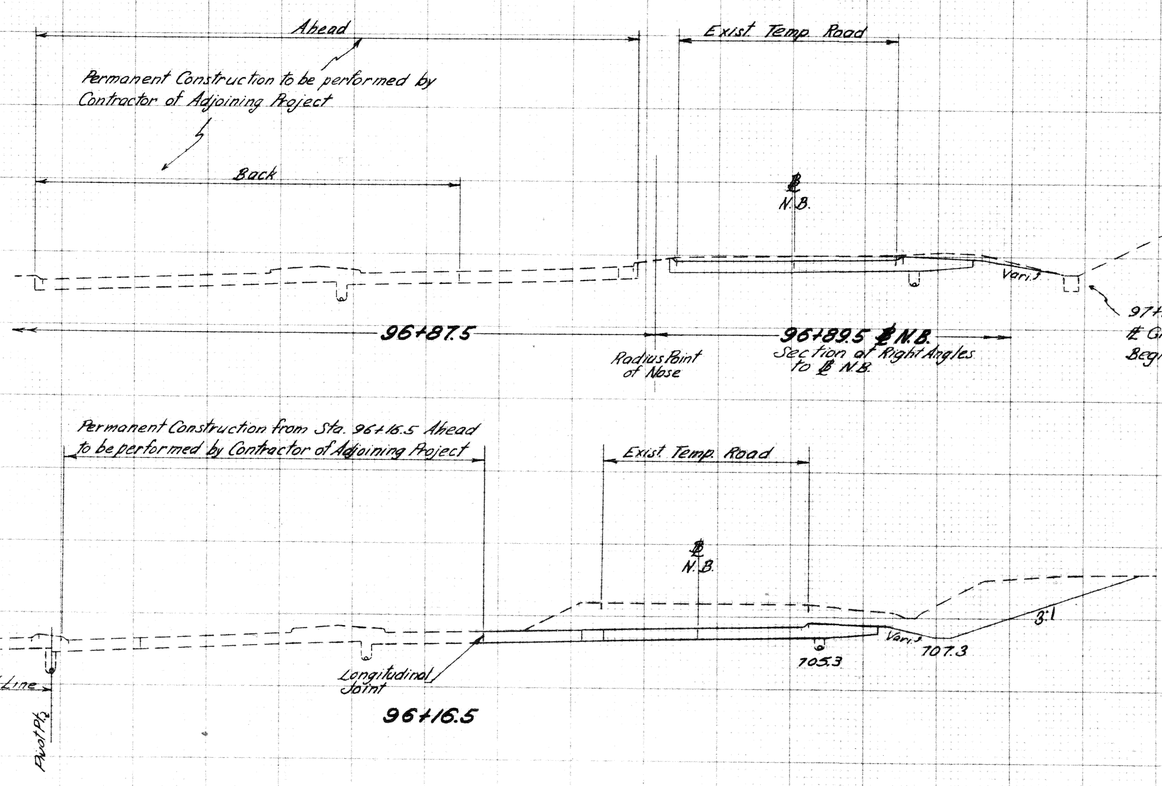
Sta. 92+00 to Sta. 93+50

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

20/29

FRA-3-(15.14-15.28)

SEEDING END WIDTH	SEEDING SQ YDS	END AREA CUT	END AREA FILL	VOLUME CUT	VOLUME FILL
	302			181	
23	700				
	280				
48	700				



END AREA CUT	END AREA FILL	VOLUME CUT	VOLUME FILL
700	94		
700	585		
700	351		

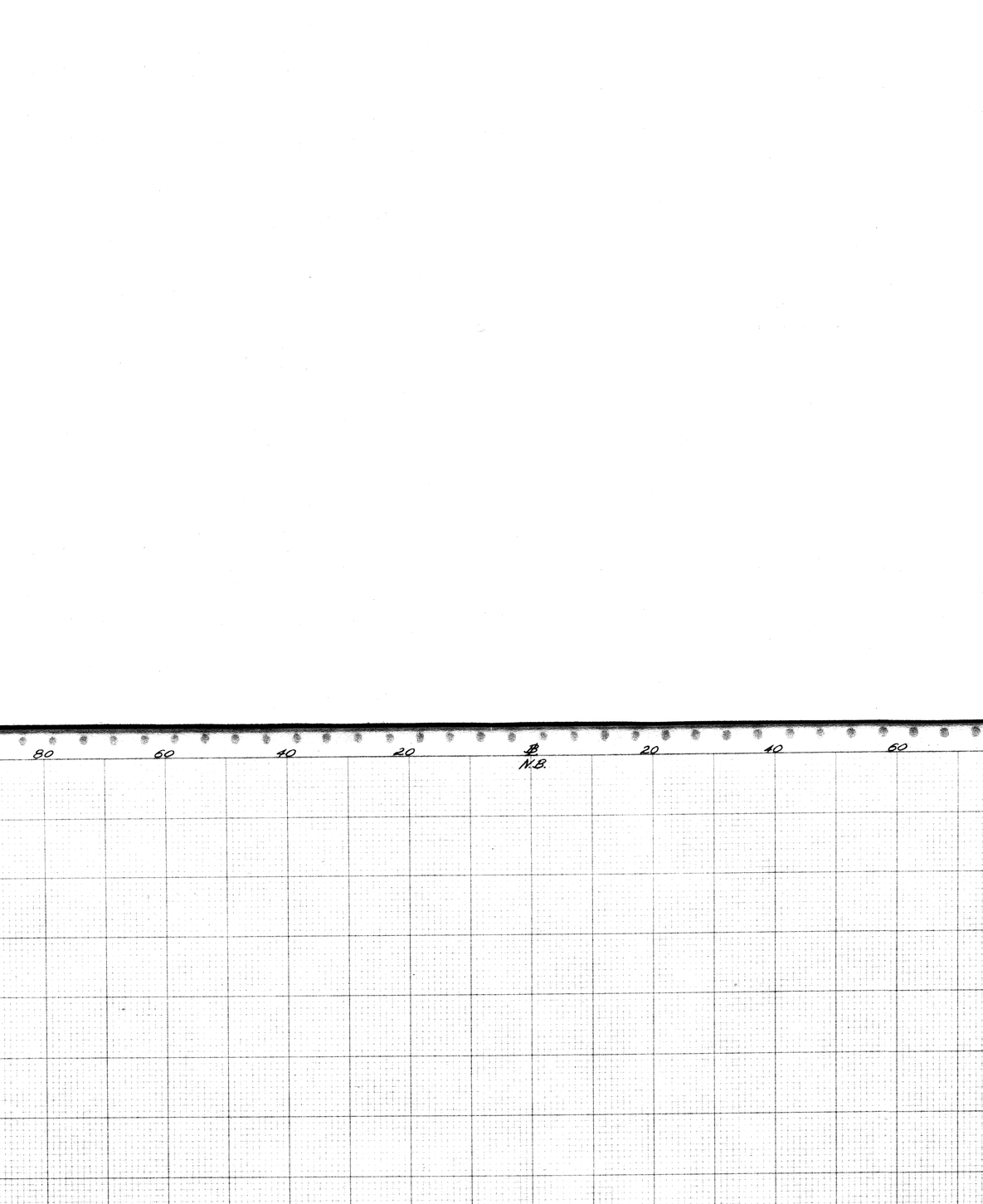
Sta. 96+16.5 to Sta. 96+87.5

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

21/29

FRA-3-(15.14-15.28)

SEEDING END WIDTH	SEEDING SQ YDS	END AREA CUT	END AREA FILL	VOLUME CUT	VOLUME FILL
20	710				
	327				
78	710				
	394				
64	700				



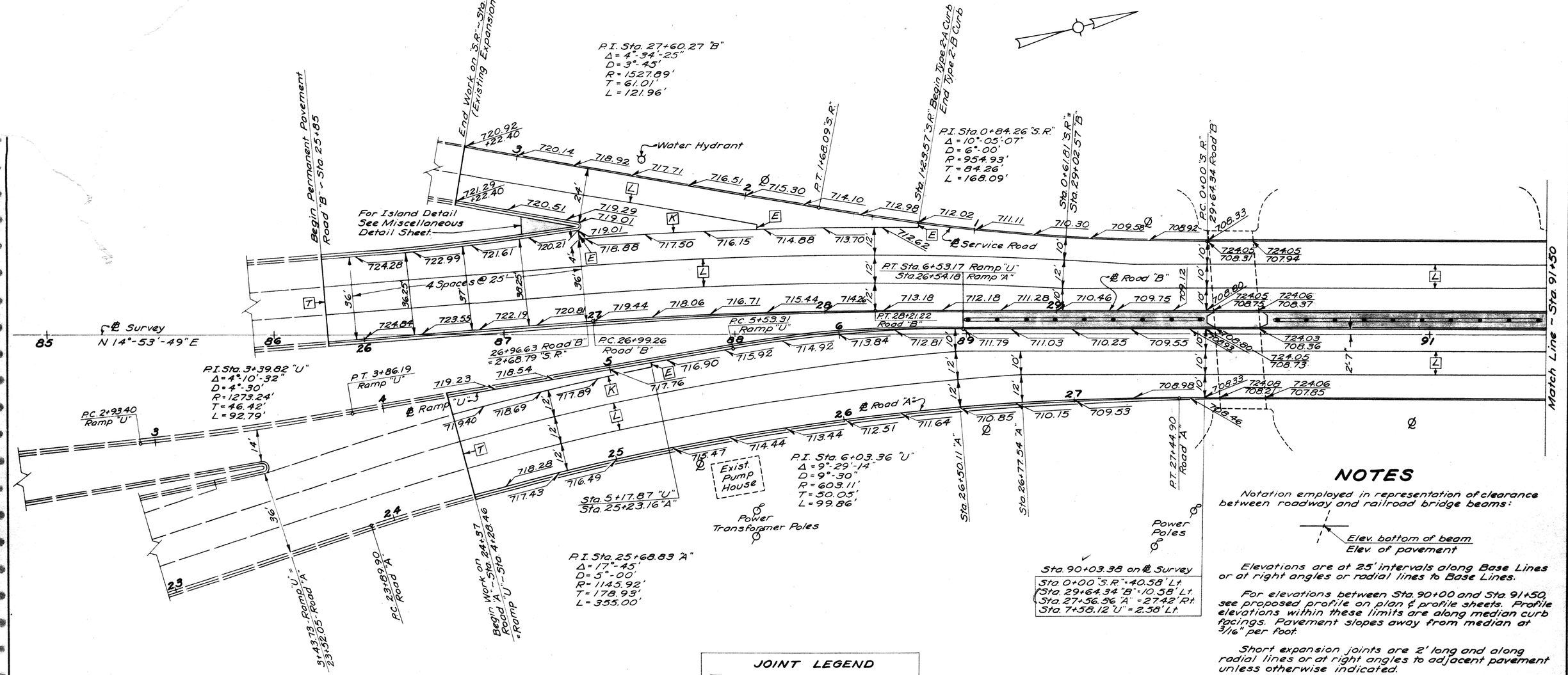
END AREA CUT	END AREA FILL	VOLUME CUT	VOLUME FILL
710	0		
			57
710	51		
			105
	62		
700			

Sta. 97+50 N.B. to Sta. 98+60 N.B.

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

22
29

FRA-3-(15.14-15.28)



NOTES

Notation employed in representation of clearance between roadway and railroad bridge beams:

Elev. bottom of beam
Elev. of pavement

Elevations are at 25' intervals along Base Lines or at right angles or radial lines to Base Lines.

For elevations between Sta. 90+00 and Sta. 91+50, see proposed profile on plan & profile sheets. Profile elevations within these limits are along median curb facings. Pavement slopes away from median at 3/16" per foot.

Short expansion joints are 2' long and along radial lines or at right angles to adjacent pavement unless otherwise indicated.

For drainage facilities see Drainage Plan.

Shaded areas indicate Item I-21 Median Pavement.

50' Curb Transition: Type 3 Mod. to Type 2-B
Sta. 27+71.22 to Sta. 28+21.22 Road "B"
Sta. 6+03.17 to Sta. 6+53.17 Ramp "U"
Sta. 26+96.56 to Sta. 27+46.56 Road "A"

Scale: 1" = 20'

PAVEMENT DETAIL SHEET Sta. 85+00 to Sta. 91+50

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

23
29

FRA-3-(15.14-15.28)

℄ W.B. CURVE DATA
P.I. Sta. 95+96.31
Δ = 7°-18'-08"
D = 3°-30'
L_s = 200'
T_s = 204.51'
L_c = 363.64'
R_c = 1,637.02'
θ_s = 3°-30'
X_c = 199.93'
Y_c = 4.07'
E_s = 4.34'
D.S. = 45
S. = .05

T.S. Sta. 93+91.80 (W.B.) = 8'-7" Lt. of Sta. 93+91.80 ℄ Survey

T.S. = Sta. 94+02.72 (E.B.) = 5'-0" Lt. of Sta. 94+02.72 ℄ Survey

P.T. Sta. 8+84.19 on Ramp "T" = Sta. 95+77.82 (W.B.) 38.15 Lt.

S.C. Sta. 95+91.80 (W.B.)

C.S. Sta. 96+00.44 (W.B.)

End Work on Ramp "T" Sta. 8+56 (Ramp "T")

℄ Ramp "T"

Ramp "A"

End of Project Sta. 96+16.5 (W.B. & E.B.)

96+15 1'R.

W.B.

Limits of Permanent Construction

E.B.

Match Line - Sta. 91+50

723.18 / 706.84
723.22 = Bottom of Beam Elev.
706.98 = Proposed Pav't. Elev.
723.17 / 707.30
723.15 / 707.45
723.16 / 707.30
723.17 / 707.45
723.14 / 706.84
723.17 / 707.00
N 14°-53'-49" E
℄ E.B. Survey
723.23 / 708.13
723.23 / 708.16
723.22 / 708.13
723.24 / 708.16
723.20 / 707.64
723.24 / 707.68
8'-7"
707.68 707.55 707.29 706.94 706.53 706.15 706.42 706.13 706.61 706.84 707.56
707.84 707.75 707.58 707.36 707.10 706.84
708.15 708.10 708.03 707.94 707.81 707.68
708.15 708.10 708.03 707.94 707.81 707.68
707.77 707.83 707.91 707.98 708.00 708.02 708.05 708.08 708.06 707.99
707.69 707.72 707.77 707.86 707.96 708.08 708.24 708.41 708.64 709.04 709.41
℄ N.B.
℄ N.B. Shifts 14' Lt. P.T. Sta. 94+45.54
S.C. Sta. 96+02.72 (E.B.)
N.B. Olentangy River Road
±0
Existing Inlet (to be adjusted)
708.28 / 708.36
708.02 708.11 708.24 708.42 708.82 709.19 709.25 709.51
708.20 708.40 708.91 709.48 709.73
709.70 709.95
N 24°-34'-02" E
Match Line Sta. 97+50
Sta. 94+04.68 (N.B.) = Sta. 94+02.72 (E.B.) 3.242 Lt.
P.C. 94+16.60
Sta. 94+34 (E.B.)
℄ N.B. CURVE DATA
P.I. Sta. 94+81.22
Δ = 9°-40'-13"
D_c = 7°-30'
L_c = 128.94'
T_c = 64.62'
R_c = 763.94'
* Transition Type 6 Curb to Type 3 (Mod.) in 3' nosing radius.
Nose 1.89.5 3' Radius
Existing 15" I-2 Pipe & No. 2-2-A Catch Basin (no work required.)
T.S. Sta. 97+38.71 (N.B.)
℄ E.B. CURVE DATA
P.I. Sta. 96+85.56
Δ = 7°-18'-08"
D = 2°-00'
L_s = 200'
T_s = 282.84'
L_c = 165.12'
R_c = 2864.79'
θ_s = 2°-00'
X_c = 199.98'
Y_c = 2.35'
E_s = 6.41'

NOTES

Elevations are at 25' intervals along Base Lines or at right angles or radial lines to Base Lines, unless otherwise indicated.

For elevations between Sta. 91+50 and Sta. 94+00, see proposed profile on plan & profile sheets. Profile elevations within these limits are along median curb facings. Pavement slopes away from median at 3/16" per foot.

Short expansion joints are 2' long and along radial lines or at right angles to adjacent pavement, unless otherwise indicated.

For drainage facilities, see Drainage Plan.

Shaded areas indicate Item I-21 Median Pavement.

JOINT LEGEND

- [C] Contraction Joint
- [E] Expansion Joint
- [K] Key Joint without Tie Bars
- [L] Standard Longitudinal Joint
- [T] Traverse Construction Joint using Expansion Bolts as per Std. Drwg. LJ No. 1.

Match Line Sta. 97+50

709.72 709.89 710.01 710.19 710.21 710.33 710.52 710.75
709.97 710.23 710.47 710.72 710.93 711.14 711.36 711.59
710.21 710.57 710.95 711.31 711.65 711.96 712.20 712.43
3-B (Mod.) Curb
Existing Inlet (no work required)
Profile Grade
98
99
℄ N.B.
3-B (Mod.) Curb
Sta. 99+50
℄ N.B. CURVE DATA
P.I. Sta. 104+06.07
Δ = 44°-55'-01" Lt.
D = 4°-00'
L_s = 150'
T_s = 667.36'
L_c = 972.92'
R_c = 1,432.39'
θ_s = 3°-00'
X_c = 149.96'
Y_c = 2.62'
E_s = 118.26'
Sta. 98+60.00 End Permanent Pavement on N.B. Lanes
S.C. - Sta. 98+88.71 (N.B.)
N.B. Olentangy River Road

Scale: 1" = 20'

PAVEMENT DETAIL SHEET Sta. 91+50 to Sta. 98+00

Rev. 10-13-59 EEC

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

23
29

FRA-3-(15.14-15.28)

℄ W.B. CURVE DATA
P.I. Sta. 95+96.31
Δ = 7°-18'-08"
D = 3°-30'
L_s = 200'
T_s = 204.51'
L_c = 8.64'
R_c = 1,637.02'
Θ_s = 3°-30'
X_c = 199.93'
Y_c = 4.07'
E_s = 4.34'
D.S. = 45
S. = .05

T.S. Sta. 93+91.80 (W.B.) = 8'-7" Lt. of Sta. 93+91.80 ℄ Survey

T.S. = Sta. 94+02.72 (E.B.) = 5'-0" Lt. of Sta. 94+02.72 ℄ Survey

P.T. Sta. 8+84.19 on Ramp "T" = Sta. 95+77.82 (W.B.), 38.5' Lt.

S.C. Sta. 95+91.80 (W.B.)

C.S. Sta. 96+00.44 (W.B.)

End Work on Ramp "T" Sta. 8+56 (Ramp "T")

℄ Ramp "T"

Ramp "A"

End of Project Sta. 96+16.5 (W.B. & E.B.)

96+15 1' R.

W.B.

Limits of Permanent Construction

E.B.

Match Line - Sta. 91+50

723.18 / 706.84
723.22 = Bottom of Beam Elev.
706.98 = Proposed Pav't. Elev.
723.17 / 707.30
723.15 / 707.43
723.16 / 707.30
723.17 / 707.45
723.14 / 706.84
723.17 / 707.00
N 14°-53'-49" E
℄ B Survey
723.22 / 708.13
723.20 / 707.64
723.24 / 707.68
723.23 / 707.68
723.23 / 708.13
723.23 / 708.16
723.24 / 708.16
92 93 94 95 96 97 98
10' 10' 10' 10' 10' 10'
27'
8'-7"
5'

707.68 707.55 707.29 706.94 706.53 706.15 706.74 706.42 706.13 706.84 706.61 707.58
707.84 707.75 707.58 707.36 707.10 706.84 707.56
708.15 708.10 708.03 707.94 707.81 707.68
708.15 708.10 708.03 707.94 707.81 707.68
707.77 707.83 707.91 707.98 708.00 708.02 708.05 708.08 708.06 707.99
707.69 707.72 707.77 707.86 707.96 708.02 708.11 708.20 708.24 708.42 708.40 708.82 708.91 709.19 709.25 709.51
708.08 708.24 708.41 708.64 709.04 709.41 709.70 709.95 709.73

℄ N.B.
N.B. Olentangy River Road
±20
14'
9'
±1.9
Existing Inlet (to be adjusted)
708.28
708.36
N 24°-34'-02" E
Match Line Sta. 97+30

℄ E.B. CURVE DATA
P.I. Sta. 96+85.56
Δ = 7°-18'-08"
D = 2°-00'
L_s = 200'
T_s = 282.84'
L_c = 165.12'
R_c = 2864.79'
Θ_s = 2°-00'
X_c = 199.98'
Y_c = 2.33'
E_s = 6.41'

S.C. Sta. 96+02.72 (E.B.)

* Transition Type 6 Curb to Type 3 (Mod.) in 3' nosing radius.

Nose 1.89.5 3' Radius

Existing 15" I-2 Pipe & No. 2-2-A Catch Basin (no work required.)

T.S. Sta. 97+38.71 (N.B.)

Sta. 94+04.68 (N.B.) = Sta. 94+02.72 (E.B.), 32.42' Lt.

P.C. 94+16.60

Sta. 94+34 (E.B.)

℄ N.B. CURVE DATA
P.I. Sta. 94+81.22
Δ = 9°-40'-13"
D_s = 7°-30'
L_c = 128.94'
T_s = 64.62'
R_c = 763.94'

℄ N.B. Shifts 14' Lt. P.T. Sta. 94+45.54

NOTES

Elevations are at 25' intervals along Base Lines or at right angles or radial lines to Base Lines, unless otherwise indicated.

For elevations between Sta. 91+50 and Sta. 94+00, see proposed profile on plan & profile sheets. Profile elevations within these limits are along median curb facings. Pavement slopes away from median at 3/16" per foot.

Short expansion joints are 2' long and along radial lines or at right angles to adjacent pavement, unless otherwise indicated.

For drainage facilities, see Drainage Plan.

Shaded areas indicate Item I-21 Median Pavement.

JOINT LEGEND

- [C] Contraction Joint
- [E] Expansion Joint
- [K] Key Joint without Tie Bars
- [L] Standard Longitudinal Joint
- [T] Traverse Construction Joint using Expansion Bolts as per Std. Drwg. LJ No. 1.

Match Line Sta. 97+50

709.72 709.89 710.01 710.19 710.21 710.33 710.52 710.75
709.97 710.23 710.47 710.72 710.93 711.14 711.36 711.59
710.21 710.57 710.95 711.31 711.65 711.96 712.20 712.43
98 99

3-B (Mod.) Curb
Existing Inlet (no work required)
Profile Grade
℄ N.B.
3-B (Mod.) Curb
N.B. Olentangy River Road
Sta. 99+50

℄ N.B. CURVE DATA
P.I. Sta. 104+06.07
Δ = 44°-55'-01" Lt.
D = 4°-00'
L_s = 150'
T_s = 667.36'
L_c = 972.92'
R_c = 1,432.39'
Θ_s = 3°-00'
X_c = 149.96'
Y_c = 2.62'
E_s = 118.26'

Sta. 98+60.00 End Permanent Pavement on N.B. Lanes

S.C. ~ Sta. 98+68.71 (N.B.)

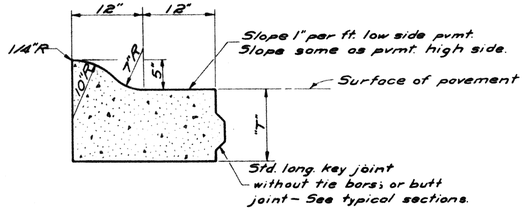
Scale: 1" = 20'

PAVEMENT DETAIL SHEET Sta. 91+50 to Sta. 98+00

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

24
29

FRA-3-(15.14-15.28

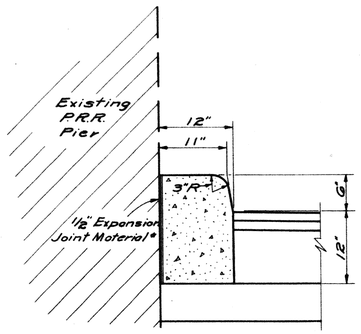


TYPE 3 MOD. CURB & GUTTER

Scale: 1"=1'

T=12" when adjacent to T-35 surfaced pavement.
T=9" when adjacent to T-71 surfaced pavement.

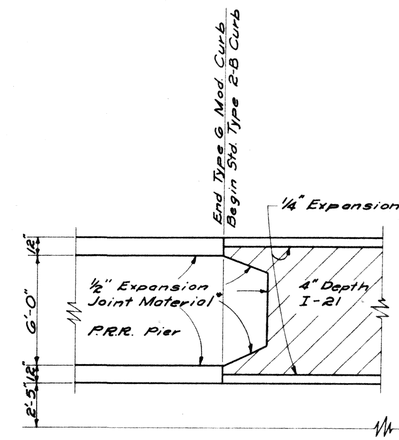
Transition of curb section in vicinity of inlets shall be as directed by the Engineer and the cost included in the unit price bid for Item I-12 Combination Curb and Gutter Type 3 modified as per plan.



DETAIL OF TYPE 6 CURB MODIFIED AS PER PLAN

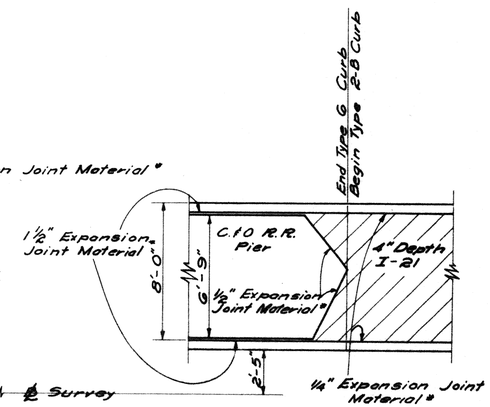
Scale: 1"=1'

All pertinent notes and references shown on Standard Drawing I-12 shall apply. The width modification, as shown above, is the only variation from Standard Type 6 Curb that is intended.



P.R.R. PIER TERMINAL DETAIL

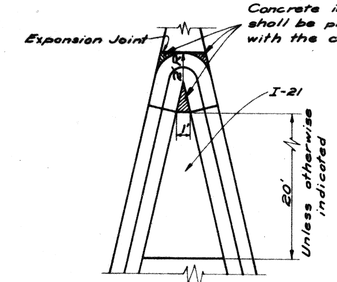
Scale: 1/4"=1'



C.t.O PIER TERMINAL DETAIL

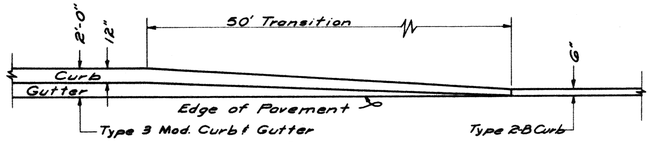
Scale 1/4"=1'

*Meeting the requirements of Sec. M-10.02 or M-10.03. Cost to be included in the unit price bid for Item I-21 or Item I-12 as applicable.



NOSE DETAIL

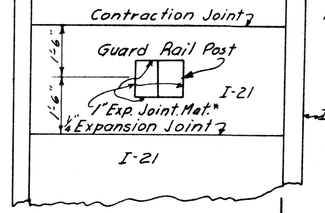
Scale: 1"=5'



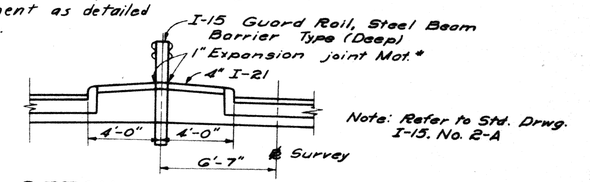
CURB TRANSITION

Scale: 1"=5'

Note: "Curb Transitions are listed with quantites as Item I-12 Combination Curb and Gutter, Type 3 Modified," for payment.



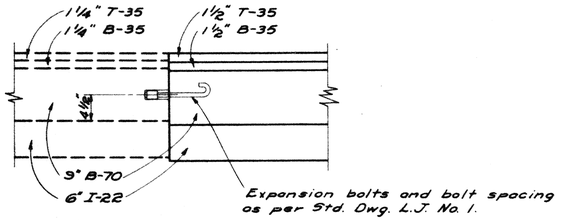
Note: In lieu of the spacing requirements of Std. Drawing I-21-23, expansion and contraction joints shall be provided in I-21 Median Pavement as detailed hereon.



Note: Refer to Std. Drwg. I-15, No. 2-A

DETAIL OF GUARD RAIL IN MEDIAN

Scale: 1/4"=1'

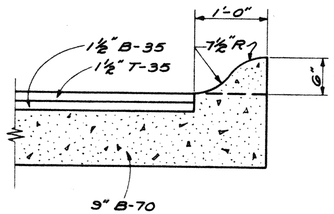


JOINT DETAIL AT CONNECTION OF EXISTING AND PROPOSED EXPRESSWAY ROADS "A" & "B"

(Similar joints at other connections)

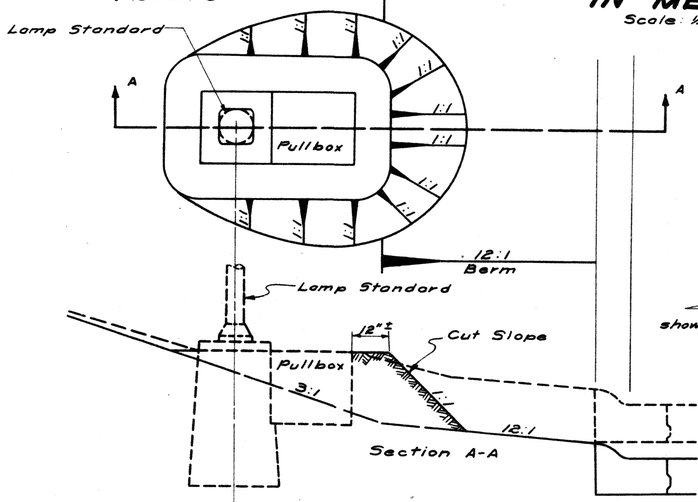
Scale: 1"=1'

Where cutting of existing pavement is required, payment for cutting shall be included in cost of Item E-8, Removal and Disposal of Existing Pavement.



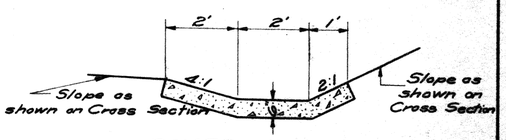
TYPE 3-B CURB (MOD)

Scale: 1"=1'



SPECIAL SLOPE TREATMENT VICINITY OF LAMP STANDARDS

Scale: 1"=2'



PAVED GUTTER TYPE 1 MODIFIED

Scale: 1/2"=1'

MISCELLANEOUS DETAILS

LOCATION NO.	STATE	PROJECT	
2	OHIO		

25
29

FRA-3-(15.14-15.28)

LEGEND

- Proposed Storm Sewer
- Existing Sewer
- Proposed Drainage Structures
- Existing Drainage Structures

Item 6-D Sta. 91+84 to Sta 94+25
Remove 214'-12"
Remove 58'-8"
Abandon 4 C.B.
Abandon 4 M.H.
Remove 132'-21"
Remove 98'-30"
Remove 28'-24"

Item 2-D will be the total linear ft. of proposed I-4 to be placed in this plan.

Palmer-Donavin Bldg.
Shed
Power Pole
Signal
Gas Line
Sewer Manhole
Construction Dept. prepared Changeable
Existing 6" I-4
I-4 Existing 6"
Existing 30"
Interchange Track
F.R.R.
P.R.R. Main Line
C.S.O.R.R.
Ramp "T"
(W.B.)
(E.B.)
N.B.
Pump Sta. NO. 1
Top of Levee
Exist. Headwall
Pump Sta "A"
Exist. Apron
RESERVOIR
Sta. 0+00 "S.R." = 40.58' Lt.
Sta. 29+64.34 "B" = 10.58' Lt.
Sta. 27+56.56 "A" = 27.42' Rt.
Sta. 90+03.38 ℄ Survey
Sta. 94+02.72 EB 32.41' Lt.
P.T. 95+49.02 (N.B.)
P.T. 95+77.85 (W.B.) 38.13' Lt.
T.S. Sta 94+02.72 (E.B.)
T.S. 93+91.80 W.B.
=500' Lt. Sta 94+02.72 ℄ Survey

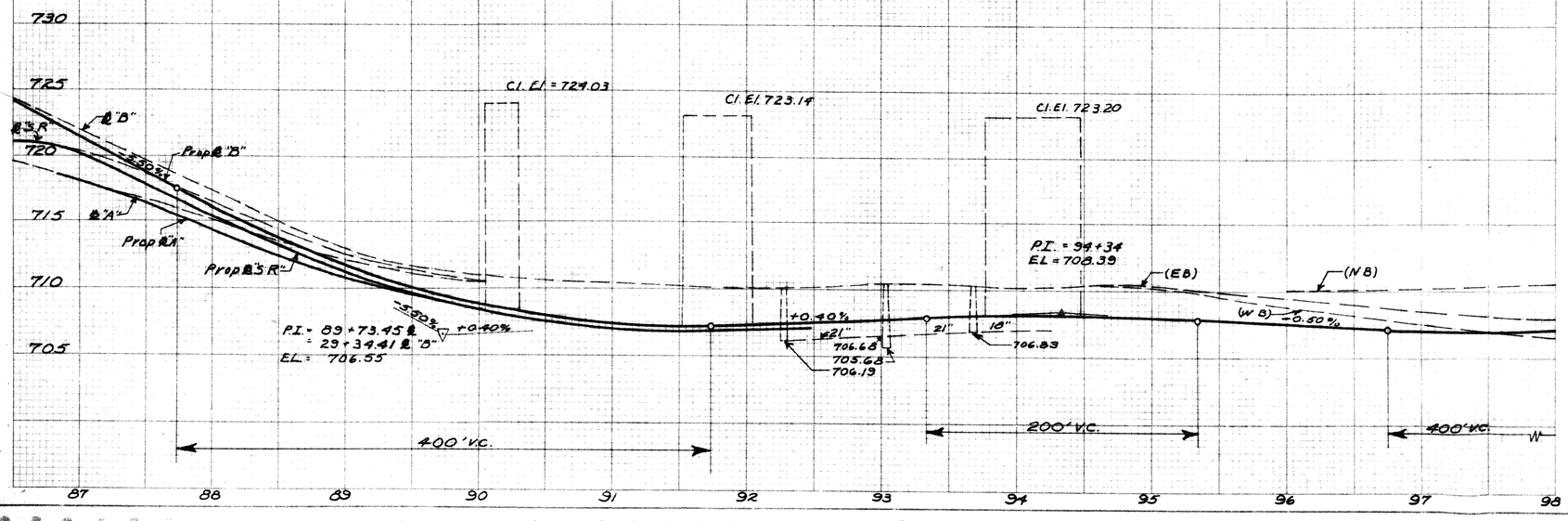
Items 4-D, 5D & 9D are abandon items. The pipes shall be plugged 2' outside the limits of construction. In addition plugs shall be placed at the 30" river outlet, at the 24" inlet in the wet well of the existing pump station, and as shown by Item 9-D. Plugging shall be in accordance with Sec. 1-16.03. Payment for plugging shall be included in the unit price bid for Item E-1 Roadway Excavation.

For drainage items beyond 96+15 (N.B.) See Sheet 12.

Notes

For sewer profiles see sheet 27
For identification of drainage structures and under drains see sheet 26

DRAINAGE PLAN



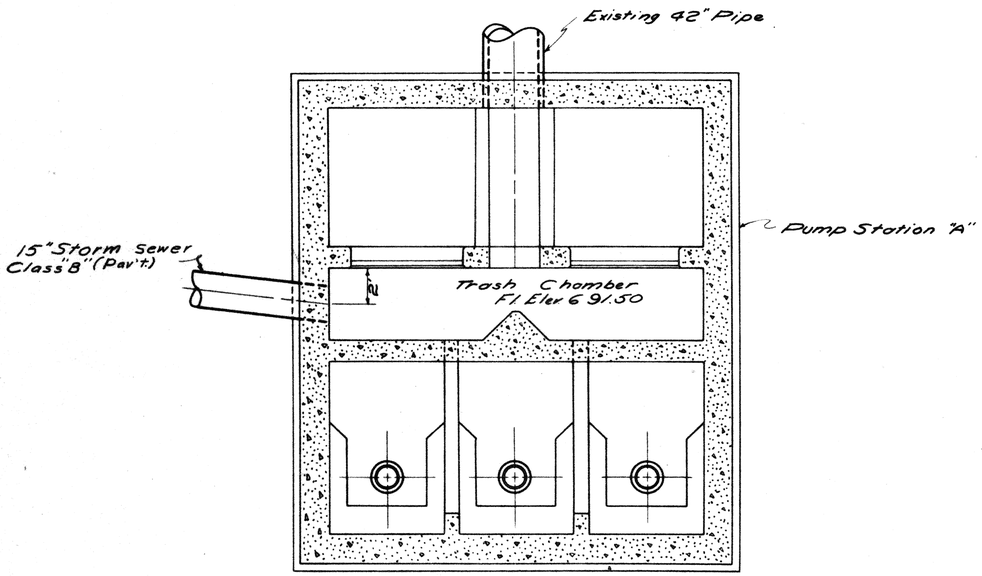
DRAINAGE PLAN

ESTIMATED QUANTITIES

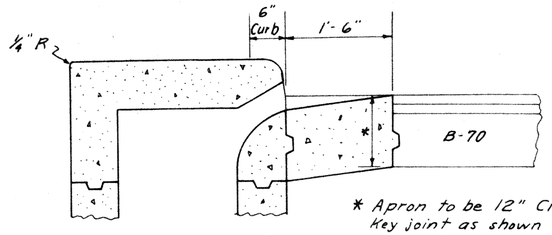
REF NO.	STATION TO STATION	SIDE	E-2 Pipe Culverts 24" Class "A" Storm Sewers Structure Excav. Lin. Ft.	E-2 Pipe Culverts 18" Class "A" Storm Sewers Structure Excav. Lin. Ft.	E-2 Pipe Culverts 15" Class "A" Storm Sewers Structure Excav. Lin. Ft.	E-12 Pipe Culverts 24" Class "A" Storm Sewers Trench Excav. Over 15" Lin. Ft.	E-12 Pipe Culverts 18" Class "A" Storm Sewers Trench Excav. Over 15" Lin. Ft.	E-12 Pipe Culverts 15" Class "A" Storm Sewers Trench Excav. Over 15" Lin. Ft.
1-D	1+45.56 "L" - 26+09.21 "L"	Lt. & Rt.				94		
2-D	87+00 - 96+16.5	Rt.				225		
3-D	90+06 - 92+31	Lt.						
4-D	90+22 - 93+92	Rt.						
5-D	92+30 - 92+35	Lt.						
6-D	91+44 - 94+25	Lt. & Rt.				315	214	
7-D	26+00.21 "A" - 27+25.21 "A"	Rt.				118		
8-D	27+25.21 "A" - 27+56.21 "A"	Rt.				26		
9-D	26+00.21 "A" - 27+25.21 "A"	Rt.						
A-16	27+25.21 "A" - 27+56.21 "A"	Rt.						
A-17	27+25.21 "A" - 27+56.21 "A"	Rt.						
A-18	27+25.21 "A" - 27+56.21 "A"	Rt.						
B-11	26+90.21 "A" - 29+56.21 "B"	Lt.						
B-3	29+56.21 "B" - 30+47	Lt.						
SR-2	1+44.5 "S.R." - 0+40.58 "S.R."	Rt.						
EB-1	91+45	Lt.						
EB-2	92+05	Lt.						
EB-3	92+95	Lt.						
WB-1	91+45	Rt.						
WB-2	92+12	Rt.						
WB-3	93+23	Rt.						
1	90+47	Lt.						
2	93+06	Lt.						
3	94+59	Lt.						
4	88+48	Lt.						
P.99	1+44 "SR" - 26+09.21 "A"	Lt. & Rt.						
P.100	26+00 "A" - 27+25.21 "A"	Rt.						
P.101	27+25.21 "A" - 27+56.21 "A"	Rt.						
P.102	26+00.21 "A" - 27+56.21 "A"	Lt. & Rt.						
P.103	90+47 - 91+45	Rt.						
P.104	90+47 - 91+45	Lt.						
P.105	27+25.21 "A" - 90+47	Rt.						
P.106	92+07 - 92+93	Lt.						
P.107	92+13 - 93+21	Rt.						
P.108	92+95 - 93+05	Lt.						
P.109	93+06 - 93+23	Lt. & Rt.						
P.110	93+06 - Pump Sta "A"	Lt. & Rt.						
P.111	88+20 - 92+36	Lt.						
P.112	28+68	Lt.						
9-D	92+65 - 92+98	Lt.						
5	26+10 "A"	Rt.						
10-D	69+39 - 90+12	Lt.						
11-D	90+40 - 92+04	Lt.						
TOTALS			290	120	18	1778	214	224

REF NO.	STATION TO STATION	SIDE	I-2 Pipe Culverts 30" Class "A" Storm Sewers Structure Excav. Lin. Ft.	I-2 Pipe Culverts 30" Class "A" Storm Sewers Trench Excav. Over 15" Lin. Ft.	E-4 Pipe Culverts 6" Class "A" Storm Sewers Sand Backfill Lin. Ft.	S-1 Removing Pipe Culverts Steel Structures Ea.	S-1 Removing Pipe Culverts Concrete Structures Ea.	E-3 M.H. Removed and Reset Ea.	I-8 Pipe Culverts 30" Flap Gates Each	I-8 C.B. Adj. to Grade Each	I-8 C.B. 2-2:4 Each	I-8 M.H. No. 1 Each	I-8 C.B. No. 2 Each	I-8 C.B. No. 2-A Each	I-8 M.H. No. 4 Each	I-8 C.B. Inlet No. 2-6 Each	I-8 C.B. Inlet No. 2-8 Each	I-8 C.B. Inlet No. 2-10 Each	I-8 C.B. Inlet No. 2-12 Each	S-16 C.B. Removed Each
1-D	1+44.56 "SR" - 26+09.21 "A"	Lt. & Rt.																		
2-D	87+00 - 96+16.5	Rt.																		
3-D	90+06 - 92+31	Lt.																		
4-D	90+22 - 93+92	Rt.																		
5-D	92+30 - 92+35	Lt.																		
6-D	91+44 - 94+25	Lt. & Rt.																		
7-D	26+00.21 "A" - 27+25.21 "A"	Rt.																		
8-D	27+25.21 "A" - 27+56.21 "A"	Rt.																		
9-D	26+00.21 "A" - 27+25.21 "A"	Rt.																		
A-16	26+00.21 "A" - 27+56.21 "A"	Rt.																		
A-17	27+25.21 "A" - 27+56.21 "A"	Rt.																		
A-18	27+25.21 "A" - 27+56.21 "A"	Rt.																		
B-11	26+90.21 "A" - 29+56.21 "B"	Lt.																		
B-3	29+56.21 "B" - 30+47	Lt.																		
SR-2	1+44.5 "S.R." - 0+40.58 "S.R."	Rt.																		
EB-1	91+45	Lt.																		
EB-2	92+05	Lt.																		
EB-3	92+95	Lt.																		
WB-1	91+45	Rt.																		
WB-2	92+12	Rt.																		
WB-3	93+23	Rt.																		
1	90+47	Lt.																		
2	93+06	Lt.																		
3	94+59	Lt.																		
4	88+48	Lt.																		
P.99	1+44 "SR" - 26+09.21 "A"	Lt. & Rt.																		
P.100	26+00 "A" - 27+25.21 "A"	Rt.		120																
P.101	27+25.21 "A" - 27+56.21 "A"	Rt.																		
P.102	26+00.21 "A" - 27+56.21 "A"	Lt. & Rt.		30																
P.103	90+47 - 91+45	Rt.																		
P.104	90+47 - 91+45	Lt.																		
P.105	27+25.21 "A" - 90+47	Rt.																		
P.106	92+07 - 92+93	Lt.																		
P.107	92+13 - 93+21	Rt.																		
P.108	92+95 - 93+05	Lt.																		
P.109	93+06 - 93+23	Lt. & Rt.																		
P.110	93+06 - Pump Sta "A"	Lt. & Rt.																		
P.111	88+20 - 92+36	Lt.																		
P.112	28+68	Lt.																		
9-D	92+65 - 92+98	Lt.																		
5	26+10 "A"	Rt.																		
10-D	69+39 - 90+12	Lt.																		
11-D	90+40 - 92+04	Lt.																		
TOTALS			290	120	1966	1	1	7.3	4	1	1	3	1	1	4	4	2	2	1	1

DRAINAGE PLAN



Plan of Existing Pump Station-"A"
Wet Well & Trash Chamber
Scale 1"=5'



I-8 MEDIAN INLET No. 2

For details and dimensions not shown
see Std. Drawing I-8 I. No. 2

* Apron to be 12" Class "C" concrete with key joint as shown when adjacent to B-70 Base; and 9" Class "D" concrete integral with T-71 Pavement (without key joint.) when adjacent to T-71.

DRAINAGE STRUCTURES

CODE	LOCATION	DESCRIPTION	ELEV	REMARKS
A-16	26+00A, Rt.	CB No 16	712.34	Adjust to Grade
A-17	27+25A, 14' Rt.	CB No 2-2-A	706.75	Top of Grate
A-18	27+56.51A, Rt.	Inlet No 2-8	708.83	Top of Casting
B-11	26+90B, Lt.	Inlet No 2-12	719.43	See Note 1
B-13	29+56.29B, Lt.	Inlet No 2-12	708.83	Top of Casting
EB-1	91+44.67 ℄, Lt.	Inlet No 2-10	707.26	Top of Casting
EB-2	92+04.67 ℄, Lt.	Inlet No 2-6	707.50	Top of Casting
EB-3	92+94.67 ℄, Lt.	Inlet No 2-6	707.86	Top of Casting
SR-2	1+48 "SR" Rt.	C.B. No. 16	712.48	See Note 2
WB-1	91+44.67 ℄, Rt.	Inlet No 2-10	707.26	Top of Casting
WB-2	92+11.67 ℄, Rt.	Inlet No 2-6	707.53	Top of Casting
WB-3	93+22.67 ℄, Rt.	Inlet No 2-6	707.97	Top of Casting
1	90+47 7' Lt.	Manhole No 1	708.00	Top of Casting
2	93+06 6.5' Lt	Manhole No 1	708.70	Top of Casting
3	92+58 110' Lt.	M.H. No. 2 W/o dp. pipe	721.75	Top of Casting
4	88+68, 80' Lt.	Manhole No A	717.75	Top of Casting, See Note 3
5	26+10A, 8' Rt.	Manhole No 1	712.25	Top of Casting

Notes
(1) Connect existing 12" Storm Sewer into inlet
(2) Connect existing 30" Storm Sewer into inlet
(3) Special Manhole - See Sheet 28 for Details

UNDERDRAIN DETAILS

Location	From	To	℄ Elev. Invert	℄ Elev. Outlet	Length Ft.	Remarks
Road "A" Right	24+37	25+99	715.28	709.23	162	Conn. to existing I-4
Road "A" Right	26+01	26+25	709.21	707.27	24	Conn. to existing I-4
℄ Survey Left	89+98	91+44	705.47	703.84	146	Connect to inlet
℄ Survey Right	90+04	91+44	705.31	703.84	140	Connect to inlet
℄ Survey Left	92+02	91+46	704.03	703.88	58	1-90°I-5 to inlet
℄ Survey Right	92+10	91+46	704.06	703.88	66	1-90°I-5 to inlet
℄ Survey Left	92+92	92+06	704.39	704.09	88	1-90°I-5 to inlet
℄ Survey Right	93+19	92+13	704.50	704.07	108	1-90°I-5 to inlet
℄ Survey Left	97+45	92+96	704.73	704.40	130	1-90°I-5 to inlet
℄ Survey Right	96+16.5	93+24	705.30	701.75	276	1-90°I-5 to inlet

Note: For distances Lt. & Rt. of ℄ Survey or Road "A" See Typical Sections.

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

FRA-3-(15.14-15.28)

27
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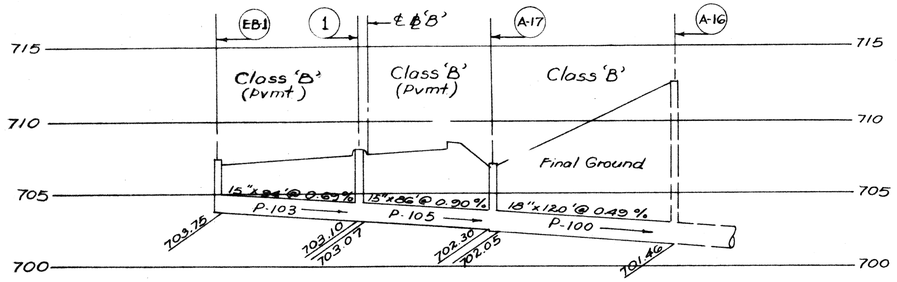
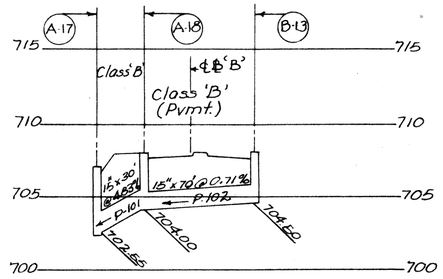
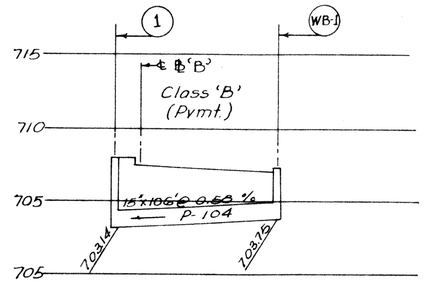
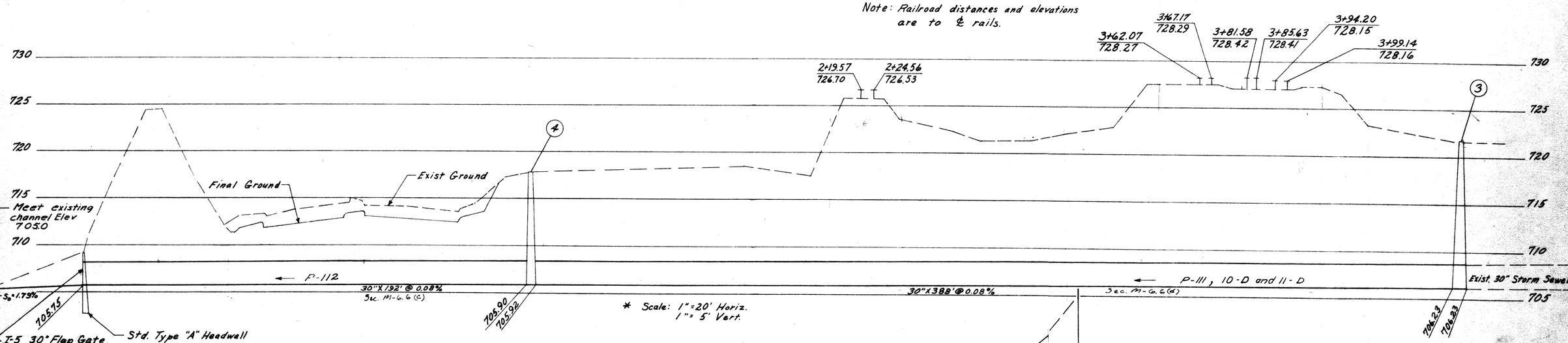


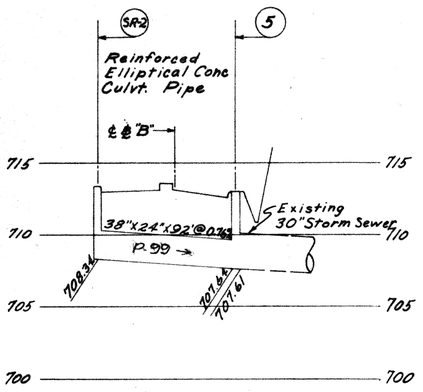


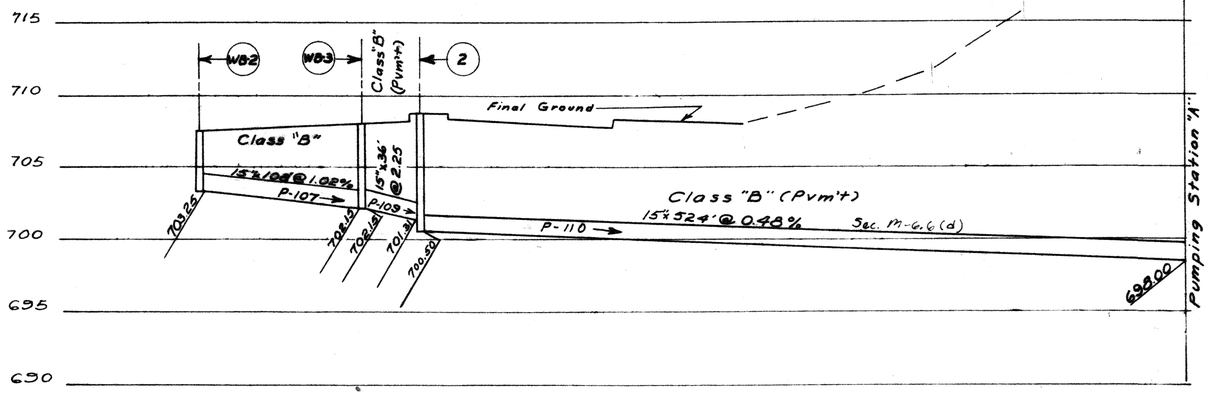


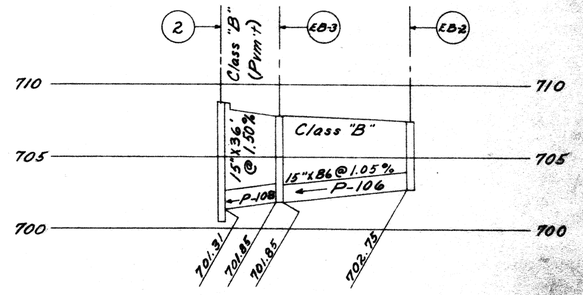
Note: Railroad distances and elevations are to ℄ rails.



* Scale: 1"=20' Horiz.
1"=5' Vert.







PROFILE OF STORM SEWERS

DESIGNED	CHECKED	INKED
6-30-55 PMG	LLC 7-2-62	B.C. 7-6-62

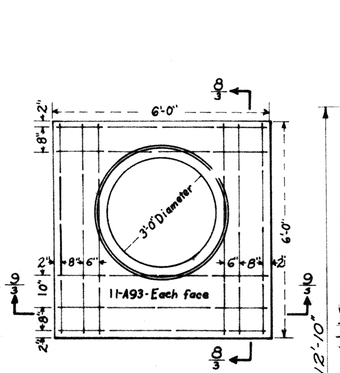
Scale: Horz. 1"=50' Vert 1"=5'

STORM SEWER SYSTEMS

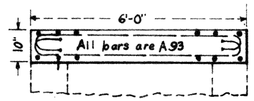
FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

28
29

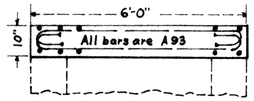
FRA.-3-(15.14-15.28)



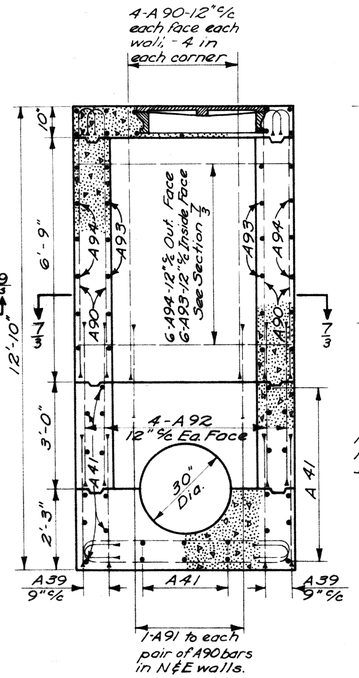
MANHOLE COVER SLAB
SCALE ½ IN.=1 FT.

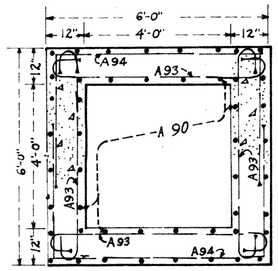


SECTION 9/3
SCALE ½ IN.=1 FT.



SECTION 8/3
SCALE ½ IN.=1 FT.





SECTION 7/3
SCALE ½ IN.=1 FT.

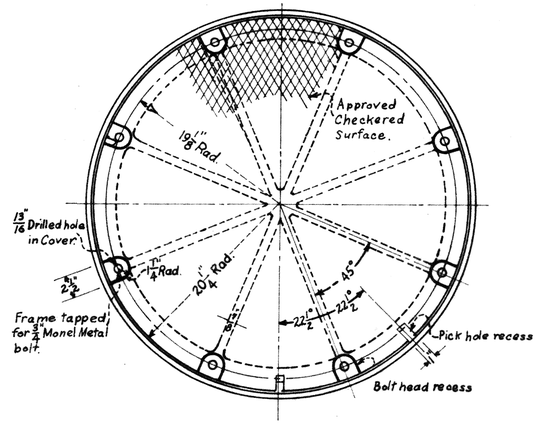
NOTE: For 8 steps (not shown) inside manhole, see Std. Drwg. I-8 Manhole No. 1.

MANHOLE NO. A
SCALE ½ IN.=1 FT.
REINFORCED CONCRETE MANHOLE

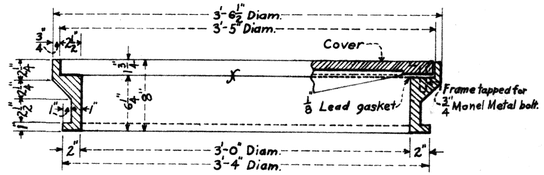
STEEL SCHEDULE

MARK	SIZE	LENGTH	NUMBER OF PIECES	TOTAL LENGTH (FEET)	TOTAL WEIGHT (POUNDS)	DESCRIPTION	LOCATION
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
A39	½"	3'-7"	16	57.3'	38	Straight	Manhole No. A
A40	¾"	8'-3"	14	115.5'	173	5'-8" 3"R 3"R 18" 12"	Manhole No. A
A41	½"	5'-8"	26	147.4'	98	Straight	Manhole No. A
A90	½"	8'-8"	48	416.2'	278	7'-5" 3"R 12"	Manhole No. A
A91	½"	5'-8"	4	22.7'	15	2'-6" 5" 2'-6"	Manhole No. A
A92	½"	4'-6"	16	72.0'	48	Straight	Manhole No. A
A93	⅝"	8'-3"	46	379.5'	395	12" 12" 3"R. 3"R 5'-8"	Manhole No. A Manhole Cover Slab
A94	⅝"	13'-2"	12	158.0'	164	5'-8" 3'-9" 3'-9"	Manhole No. A

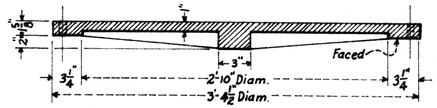
NOTE: Payment for reinforcing steel shall be included in the unit price bid for Item I-8 Manhole No. A.



PLAN OF FRAME AND COVER

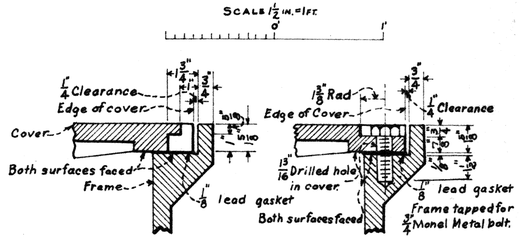


SECTION OF FRAME



SECTION OF COVER

SCALE ½ IN.=1 FT.



SECTION AT PICK HOLE SECTION AT BOLT

SCALE 3 IN.=1 FT.

PRESSURE TYPE MANHOLE FRAME AND COVER

DETAIL OF MANHOLE NO. A

Note :
* Limited Access Acquired on Parcel No. 1 in 1956

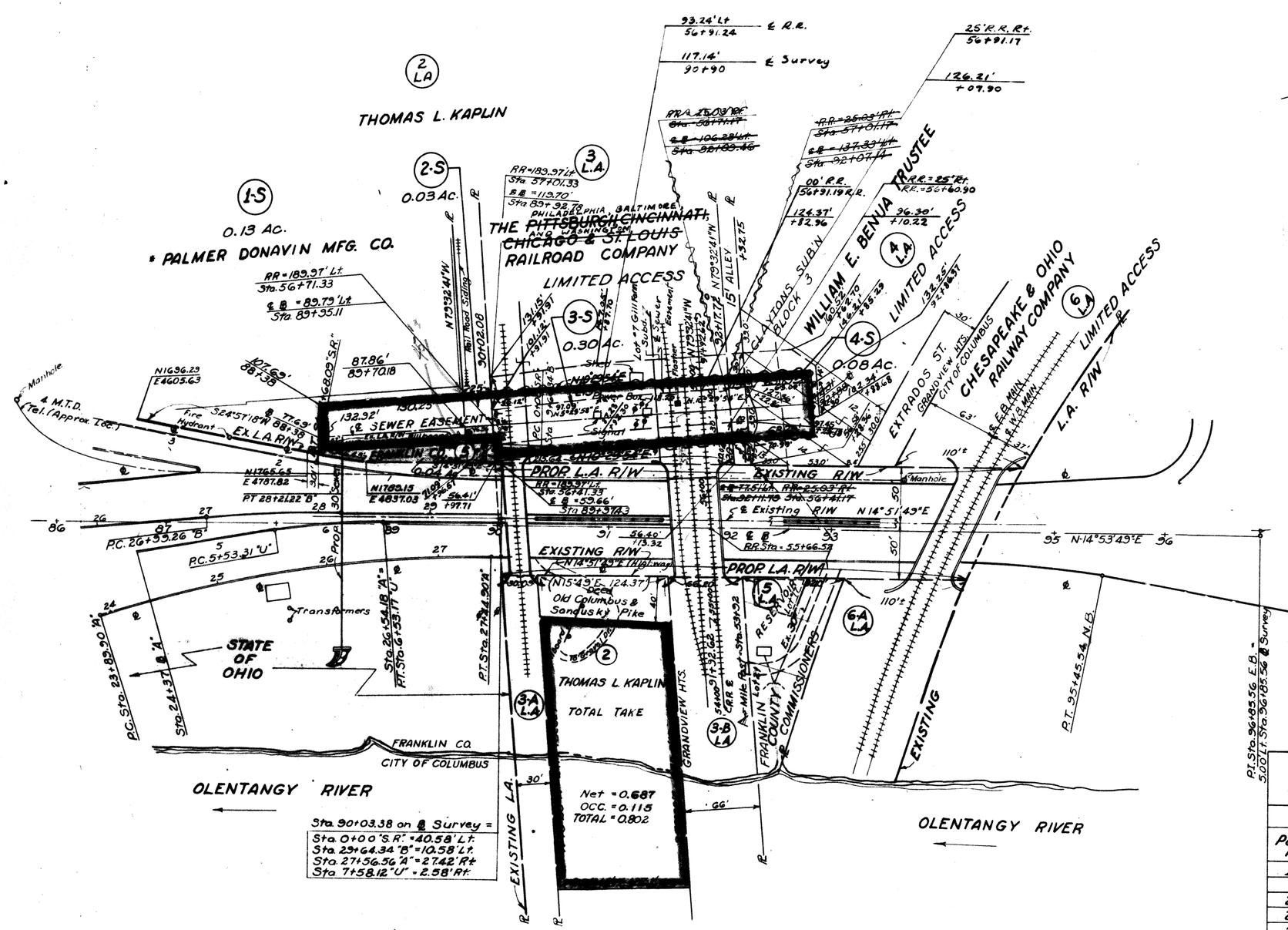
FRANKLIN COUNTY FRANKLIN TOWNSHIP
SECTION 7 TOWNSHIP 5 RANGE 22

FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

29-R
29

FRA. 3 (15.14-15.28)
R/W PLAN
LIMITED ACCESS

THIS SHEET SUPERSEDES
SHEET NO. 29
11-20-59, R.E.C.



DATE	DESCRIPTION
9-29-59	Completed Inking Sheet
10-13-59	Completely Revised

Rev. 3-10-60 R.E.C.

Route 3 Section (15.14-15.28) County FRANKLIN
Total Number Owners 6

SUMMARY OF ADDITIONAL R/W REQUIRED

Parcel No's.	Owner	Area Acres	Exist. Bldg's.	Sheet Nos	Remarks
1-S	PALMER DONAVIN MFG. CO.	0.13		1	
2	THOMAS L. KAPLIN	0.687		1	TOTAL TAKE
2-L.A.	" " "	0.00		1	L.A. ONLY
2-S	" " "	0.03		1	
3-L.A.	THE ~~PITTSBURGH CINCINNATI, CHICAGO & ST. LOUIS~~ RAILROAD CO.	0.00		1	L.A. ONLY
3-A-L.A		0.00		1	" "
3-B-L.A		0.00		1	" "
3-S		0.30		1	
4-L.A	WILLIAM E. BENUA TRUSTEE	0.00		1	L.A. ONLY
4-S	" " " "	0.08		1	
5	FRANKLIN CO. COMMISSIONERS	0.04		1	
5-L.A.	" " "	0.00		1	
6-L.A.	CHESAPEAKE & OHIO	0.00		1	LA ONLY
6A-L.A	RAILWAY COMPANY	0.00		1	" "

Note :
* Limited Access Acquired on Parcel No. 1 in 1956

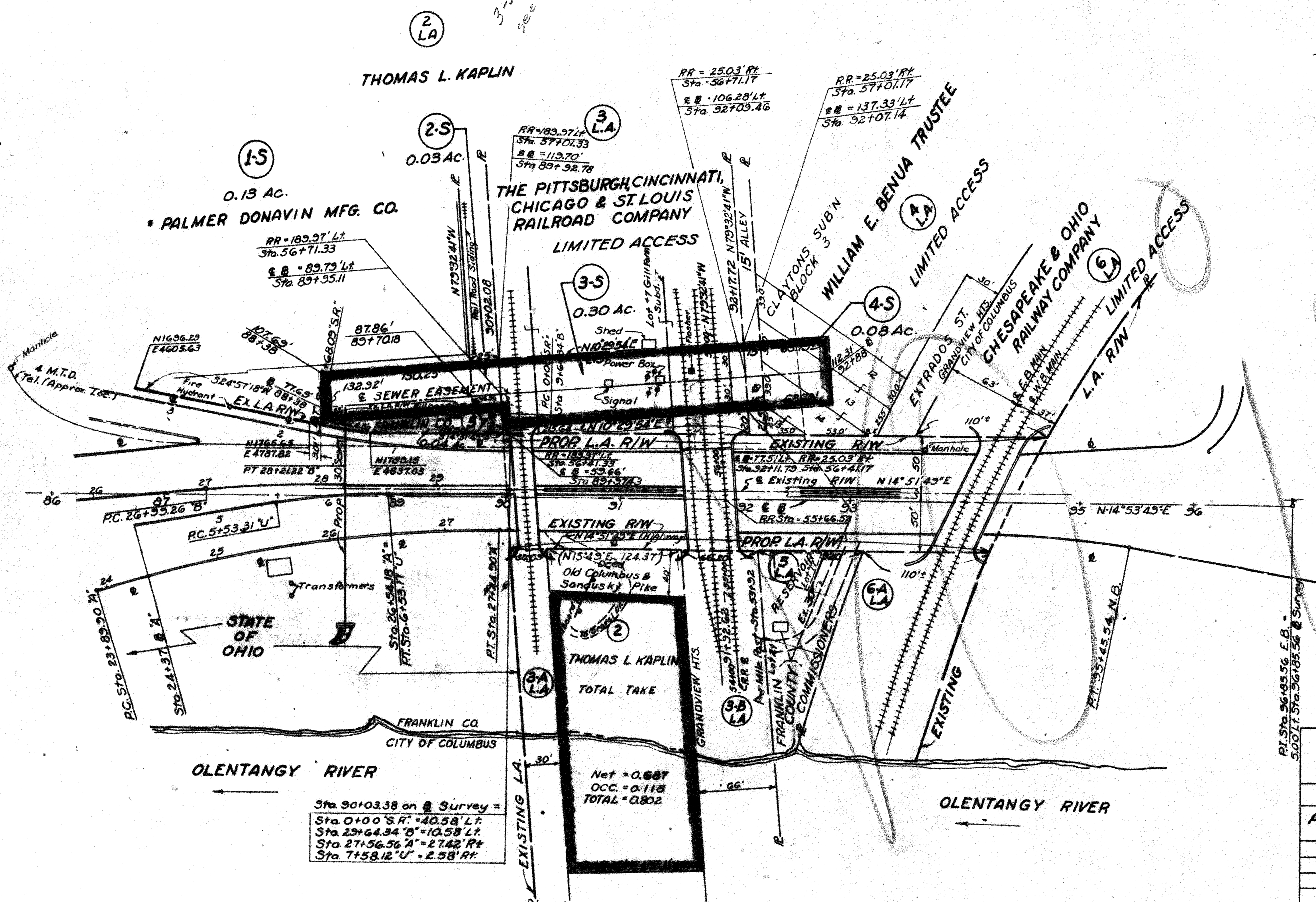
FRANKLIN COUNTY FRANKLIN TOWNSHIP
SECTION 7 TOWNSHIP 5 RANGE 22

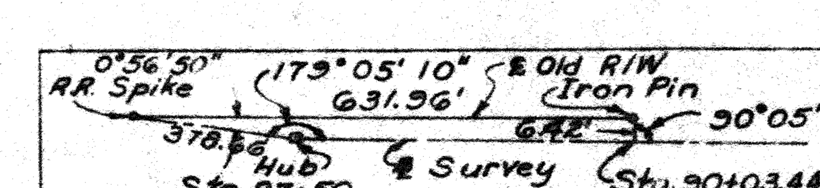
FED. RD. DIVISION	STATE	PROJECT	
2	OHIO		

29-R
29

FRA. 3 (15.14-15.28)
R/W PLAN
LIMITED ACCESS

THIS SHEET SUPERSEDES
SHEET NO. 29
11-20-59, R.E.C.





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3-A-LA	CHICAGO & ST. LOUIS	0.00		1	" "
3-B-LA	RAILROAD CO.	0.00		1	" "
3-S		0.30		1	
4-LA	WILLIAM E. BENUA TRUSTEE	0.00		1	L.A. ONLY
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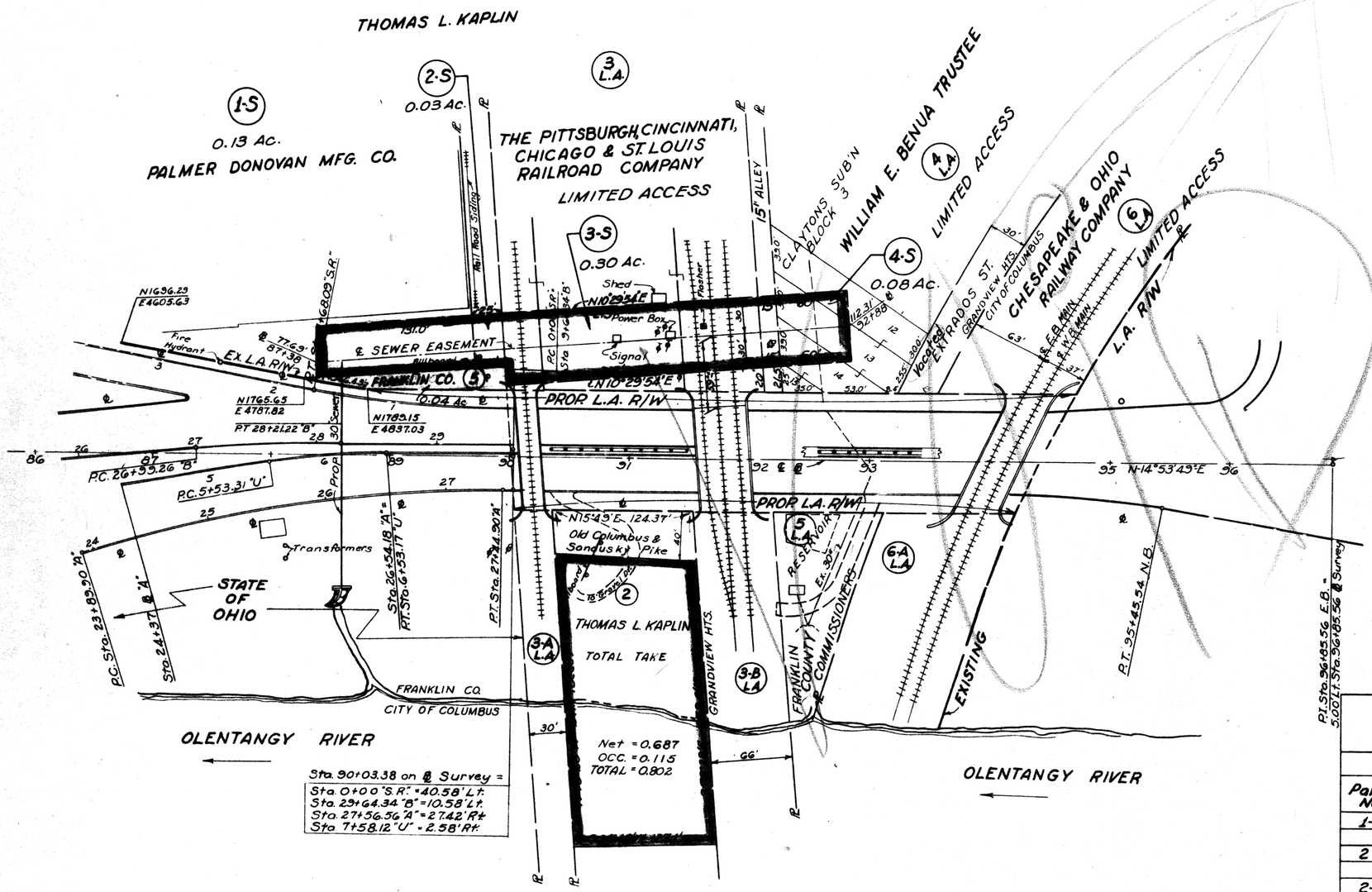
FED. RD. DIVISION	STATE	PROJECT		29/29
2	OHIO			

FRA. 3 (15.14-15.28)
R/W PLAN



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9-29-59	Completed Inking Sheet

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