

Documented Categorical Exclusion Justification Request

Date	8/28/17	Project No.	J2-8992(004)
County	Oklahoma	State Job Piece No.	JP#28992(04)
NEPA Project Manager	Siv Sundaram / Jared Schwennesen	Phone Number	405-521-2676
ODOT Field Division	4	Bridge NBI No. (<i>County & State Projects</i>) & Location No. (<i>County Projects Only</i>)	15560 and 15573
Project Description from JPINFO	<i>Douglas Boulevard Bridge Replacement and Interchange Reconstruction 6.5 Miles East of I-35 (includes removal of Engle Road bridge)</i>		

Existing Conditions

The Douglas Boulevard bridge over I-40 (NBI #15573) is six lanes wide including four through lanes, two loop ramp weaving lanes, curb and gutter, and 3-ft wide sidewalks on each side of the bridge. The existing Douglas Boulevard bridge is an 80-ft wide roadway width concrete continuous slab bridge, with a sufficiency rating of 77.0. The vertical clearance for I-40 is posted as 16-ft-9-in (eastbound) and 16-ft-4-in (westbound). The current annual average daily traffic (AADT) on Douglas Boulevard is 26,100 vehicles per day (vpd), and is projected to increase to 48,000 vpd by the year 2045.

I-40 underneath Douglas Blvd is a four-lane divided urban interstate with a 40-ft wide grass median, 12-ft wide driving lanes, 3-ft wide inside shoulders, and 10-ft wide outside shoulders. The current AADT on I-40 is 54,600 vpd, and is projected to increase to 84,600 vpd by the year 2045. The existing I-40 and Douglas Boulevard interchange is a full cloverleaf interchange with collector-distributor roads along I-40. The number of collisions at this location is higher than the state average at similar locations.

The existing Engle Road bridge (NBI #15560) over I-40 formerly provided access to a residential neighborhood south of I-40. However, the neighborhood no longer exists and the property is now owned by Tinker Air Force Base. Therefore, Engle Road bridge is closed to traffic and not in use.

This project will tie to an adjacent project east for I-40 improvements eastward to the I-40/Choctaw Road interchange.

Purpose & Need

The purpose of this project is to correct the functionally obsolete Douglas Boulevard bridge and improve safety while accommodating future traffic volumes, which indicate I-40 should be widened from four lanes to six lanes.

Alternatives considered, Logical Termini, & Proposed Improvement

Three (3) interchange alternatives have been identified for consideration:

- Alternative 1 - Single Point Urban Interchange (SPUI). A Single Point Urban Interchange is a basic diamond interchange with a single signalized central intersection in the center of the bridge. The Douglas Boulevard traffic along with the I-40 ramp traffic will converge to a single point utilizing a single set of traffic signals. The SPUI accommodates large traffic volumes efficiently with minimal right-of-way impacts. I-40 will be improved to a six-lane facility. Through the interchange, Douglas Boulevard will consist of six through lanes, dual left-turn lanes, and right-turn lanes where needed. Entrance and exit ramp lanes will also be constructed along I-40. Collector-distributor roads will be

removed and will not be re-constructed. Alternative 1 would require less than one acre of right-of-way to be acquired from Oklahoma County in the southwest quadrant.

- Alternative 2 - Tight Urban Diamond Interchange (TUDI) with Ramp Flyover. A Tight Urban Diamond Interchange is an interchange that compresses a standard diamond interchange. This design includes all four interchange ramps, as well as the option of adding a future flyover ramp for northbound Douglas Boulevard traffic destined for westbound I-40. I-40 will be improved to a six-lane facility. Through the interchange, Douglas Boulevard will consist of six through lanes, dual left-turn lanes, and right-turn lanes where needed. Upon construction of the northbound to westbound ramp flyover, the northbound to westbound left-turn lanes on Douglas will be removed. Entrance and exit ramp lanes will also be constructed along I-40. Collector-distributor roads will be removed and will not be re-constructed. Alternative 2 would require less than one acre of right-of-way to be acquired from Oklahoma County in the southwest quadrant.
- Alternative 3 - Cloverleaf Interchange. The existing cloverleaf will be completely reconstructed to accommodate widening I-40 to a six-lane facility. All ramps and both collector-distributor roads will be reconstructed. Through the interchange, Douglas Boulevard will consist of four through lanes, two lanes for loop ramp weaving, two additional lanes located in the median which can be used in the future for left turning traffic, and entrance and exit lanes where needed. Entrance and exit ramp lanes will also be constructed along I-40. Alternative 3 would require less than one acre of right-of-way to be acquired from Oklahoma County in the southwest quadrant.

A Public Meeting was held to present the project information on January 17, 2017, 6:00 p.m., in the Raider Room of the Bill Atkinson Student Center at Rose State College, Midwest City, Oklahoma. At that meeting, the three alternatives described previously were presented, based on the results of an engineering design study.

ODOT received comments from the public, as well as state and federal agencies. More than half of the written public comments received which expressed support for an alternative supported Alternative 1. Alternative 2 received the next most support. Other public comments addressed traffic operations at the nearby S.E. 29th Street/Douglas Boulevard intersection, pedestrian accommodations, and other miscellaneous issues. Based on these comments and the completed engineering design study, ODOT has selected Alternative 1, the Single Point Urban Interchange, as the Preferred Alternative. Alternative 1 improves safety, accommodates large volumes of traffic, and provides greater mobility for both cars and large trucks due to long, gradual turns. Alternative 2 was eliminated due to higher construction costs and less efficient traffic operations and turning traffic mobility. Alternative 3 was eliminated due to less than desirable interchange geometry, fewer safety improvements, and difficulty in providing pedestrian facilities.

Did the project have public involvement (*Check the applicable items and include public involvement summary and supporting documents in the appendix*)

X	Property Owner Notification		Road Closure Letter		X	Public/Stakeholder Meeting
X	Legal Notice/Website Posting		Small City Letter			None

IMPORTANT: ATTACH THE FOLLOWING:

1. **STUDY FOOTPRINT OR PLANS**
2. **THE PROJECT INITIATION REPORT, LOCAL GOVERNMENT NEPA CHECKLIST OR OTHER DOCUMENTS OUTLINING THE PROJECT SCOPE**

ATTACHMENTS (Check all that apply):

- NEPA Study Footprint and Plans
- Location Map
- Other: Project Initiation Report, Public Involvement Summary

Reasons DCE format is being proposed rather than EA.		
Description/Question	Yes	No
1. Based on prior planning studies and public involvement – this project has no or little substantive controversy	X	
2. This project has no new R/W or minor R/W adjacent to the existing facility and no or few residential/commercial relocations.	X	
3. The project has no potentially significant social, economic, environmental impacts identified by studies or agency solicitation	X	

Requester's Signatures

<i>Diane Abernathy</i> Diane Abernathy, Triad Design Group	8/28/17
Environmental Consultant Project Manager & Firm Name (If Applicable)	Date
ODOT Environmental Project Manager	Date
Assistant Environmental Programs Division Engineer	Date
CONCLUSION:	
Based on the 2011 ODOT/FHWA Programmatic Agreement for Categorical Exclusion processing and information provided, FHWA concurs that this project may be processed as a Documented CE (DCE). Upon completion of all studies and coordination, a draft DCE document will be submitted to FHWA for review and approval.	YES
	NO

Special Requirements from FHWA	
FHWA Representative	Date

Attachments: Project Information listed above

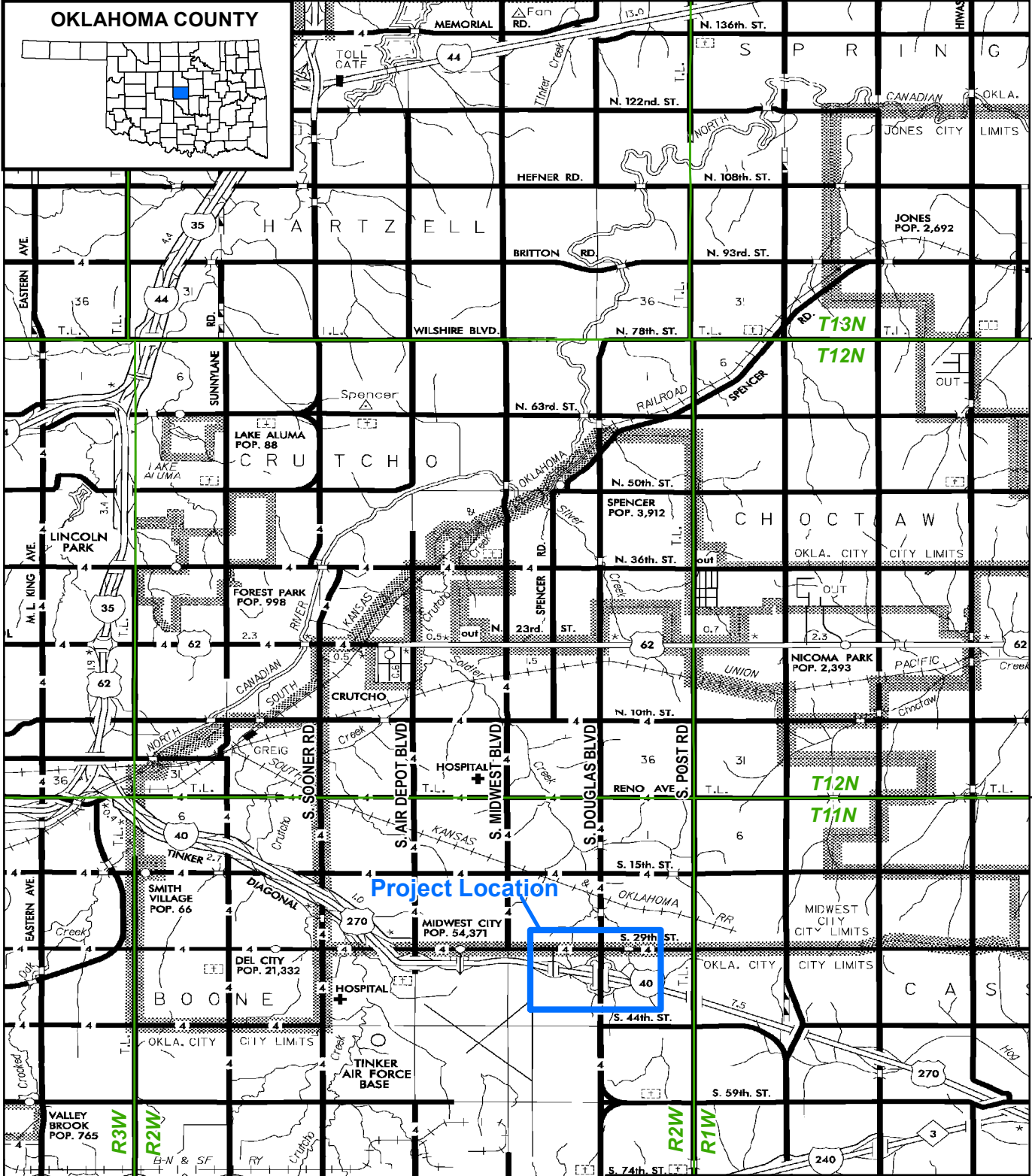
NS 312

NS 314

NS 316

NS 318

OKLAHOMA COUNTY



Project Location

I-40/Douglas Boulevard Interchange
Oklahoma County
JP No 28992(04)
Proj No J2-8992(004)



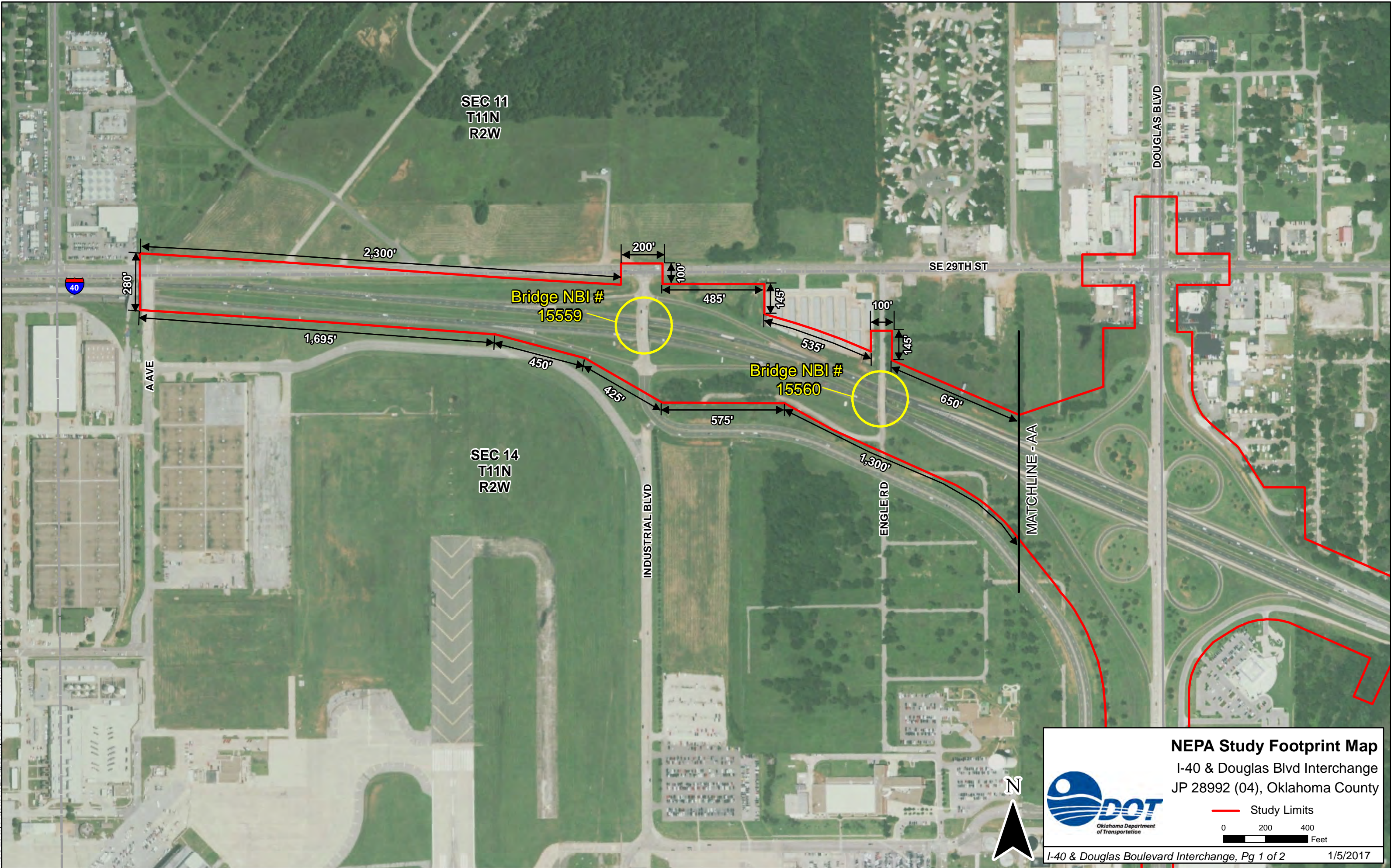
Location Map
November 11, 2016

R3W

R2W

R1W



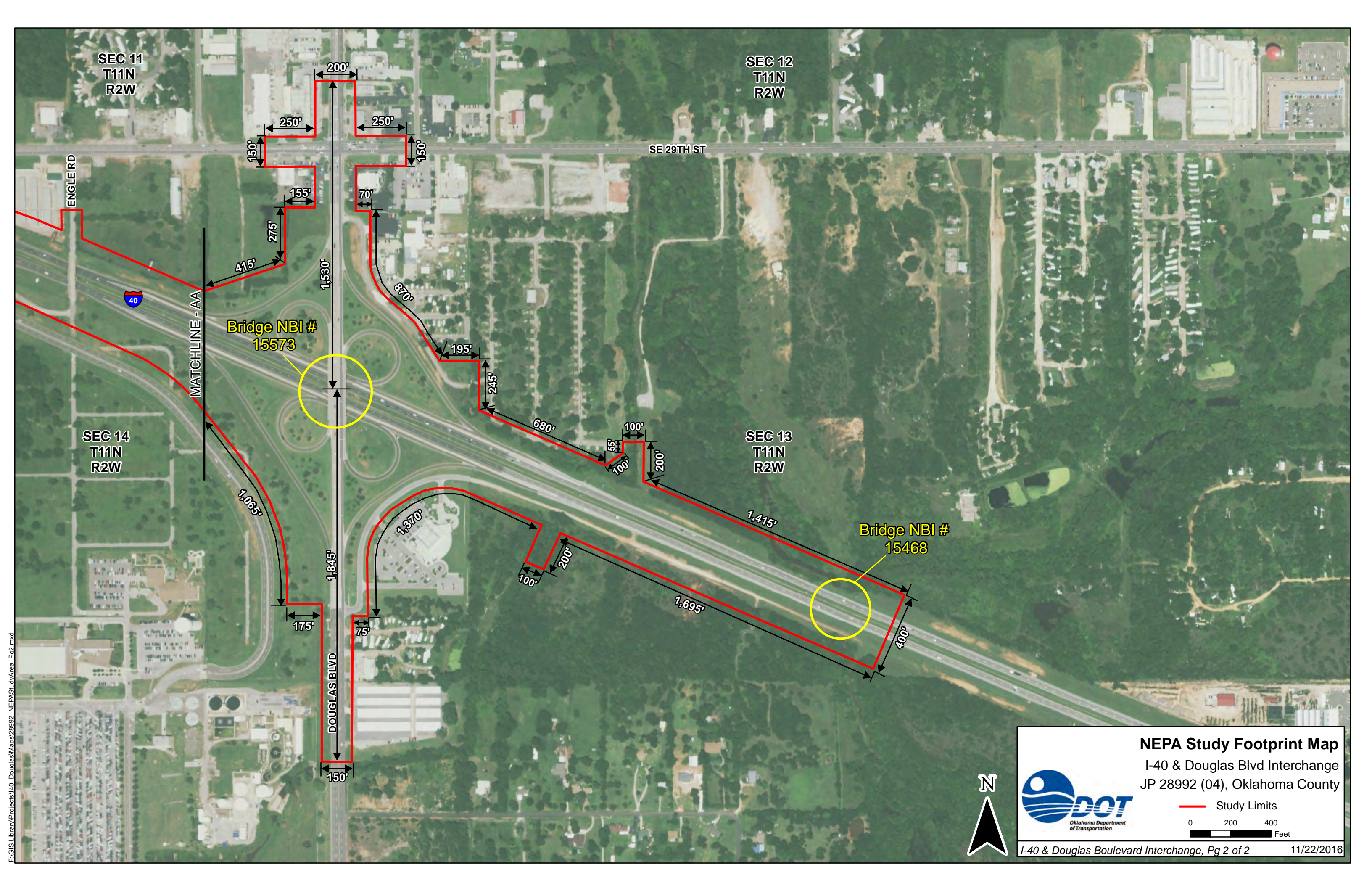


NEPA Study Footprint Map
 I-40 & Douglas Blvd Interchange
 JP 28992 (04), Oklahoma County

— Study Limits

0 200 400
 Feet

I-40 & Douglas Boulevard Interchange, Pg 1 of 2 1/5/2017



SEC 11
T11N
R2W

SEC 12
T11N
R2W

SE 29TH ST

ENGLE RD



MATCHLINE - AA

Bridge NBI #
15573

SEC 14
T11N
R2W

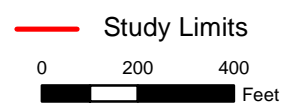
SEC 13
T11N
R2W

Bridge NBI #
15468

DOUGLAS BLVD



NEPA Study Footprint Map
I-40 & Douglas Blvd Interchange
JP 28992 (04), Oklahoma County



F:\GIS Library\Projects\I40_Douglas\Maps\28992_NEPAStudyArea_Pg2.mxd

STATE OF OKLAHOMA
DEPARTMENT OF TRANSPORTATION

PLAN OF PROPOSED
STATE HIGHWAY
FEDERAL AID PROJECT NO. 28992(04)
BRIDGE REPLACEMENT & INTERCHANGE SPUI
I-40 & DOUGLAS BLVD. INTERCHANGE
OKLAHOMA COUNTY

CONTROL SECTION NO. 40-55-68
STATE JOB NO. 28992(04)
BRIDGE A LOCATION NO. 5568-0634X EXIST. NBI NO. 15573 NEW NBI NO. xxxxx

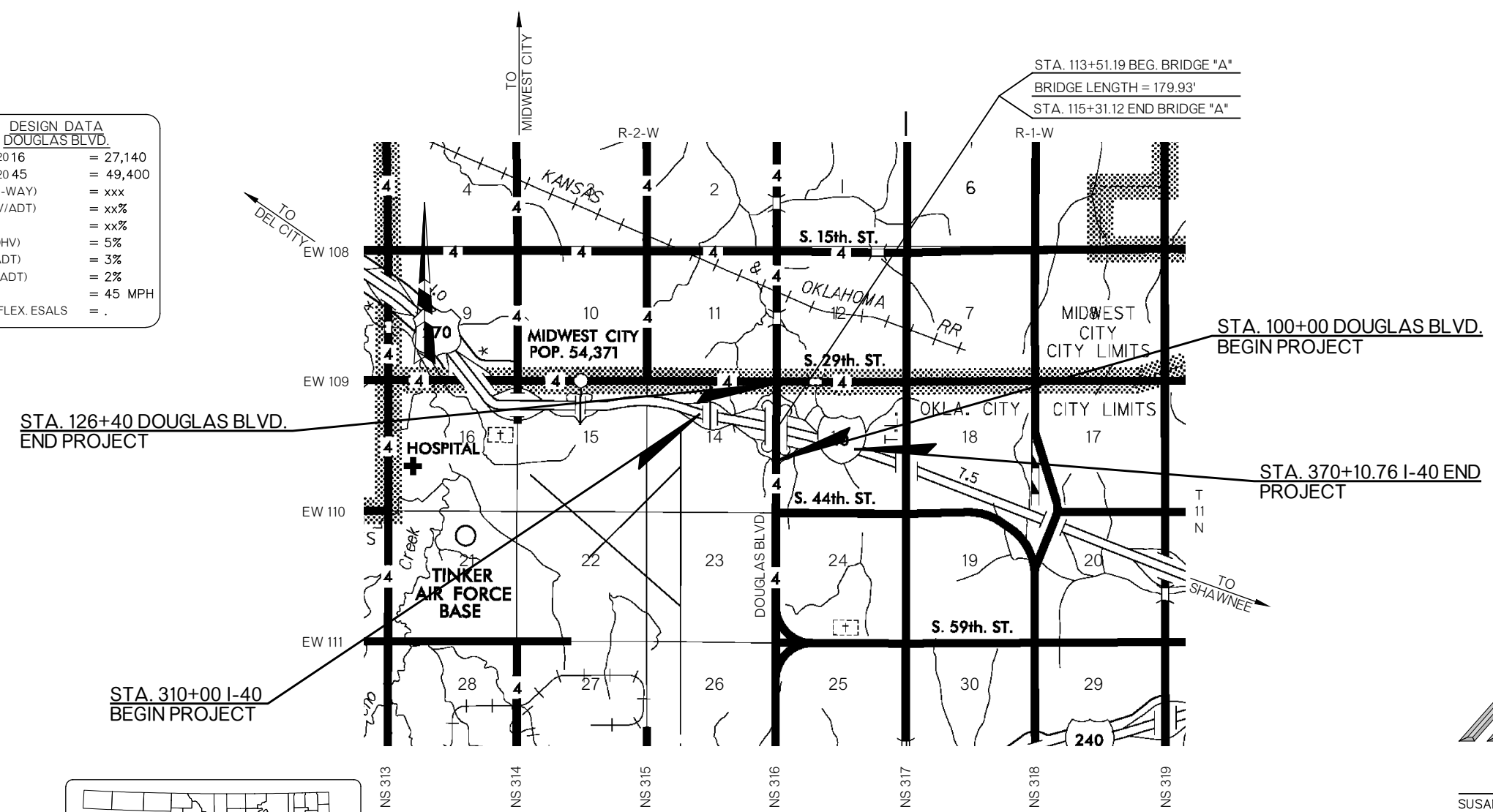
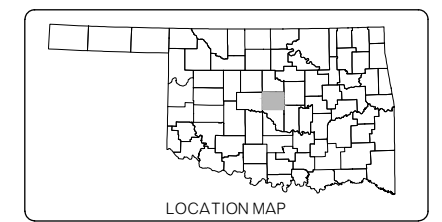
FOR SURVEY CONTROL DATA,
SEE SURVEY DATA SHEETS

DESIGN DATA I-40		DESIGN DATA DOUGLAS BLVD.	
ADT 2016	= 51,774	ADT 2016	= 27,140
ADT 2045	= 84,580	ADT 2045	= 49,400
DHV (1-WAY)	= 5,244	DHV (1-WAY)	= xxx
K (DHV/ADT)	= 10%	K (DHV/ADT)	= xx%
D	= 62%	D	= xx%
T (% DHV)	= XXX	T (% DHV)	= 5%
T (% ADT)	= 15%	T (% ADT)	= 3%
T3 (% ADT)	= 12%	T3 (% ADT)	= 2%
V	=	V	= 45 MPH
20YR FLEX. ESALS	= .	20YR FLEX. ESALS	= .

SCALES

PLAN	1" = 30'
PROFILE HOR.	1" = 30'
VER.	1" = 3'
LAYOUT MAP	1" = 3,000'

- CONVENTIONAL SYMBOLS
- PROPOSED ROAD
 - RAILROADS
 - RANGE & TOWNSHIP
 - SECTION LINES
 - QUARTER SECTION LINES
 - FENCES
 - GROUND LINE
 - EXISTING ROADS
 - BASE LINE
 - GRADE LINES
 - TELEPHONE & TELEGRAPH
 - POWER LINES
 - BUILDINGS
 - OIL WELLS
 - DRAINAGE STRUCTURES - IN PLACE
 - DRAINAGE STRUCTURES - NEW
 - RIGHT-OF-WAY LINES - EXISTING
 - RIGHT-OF-WAY LINES - NEW
 - CONTROLLED ACCESS
 - RIGHT-OF-WAY FENCE



PRELIMINARY
THIS DOCUMENT IS PRELIMINARY
IN NATURE AND IS NOT A FINAL
SIGNED AND SEALED DOCUMENT.

TRIAD DESIGN GROUP
Architecture • Engineering

3020 N.W. 149TH STREET
OKLAHOMA CITY, OK 73134
PH. (405) 752-1122
FAX (405) 752-8855
CA# 1759, RENEWAL 06-30-2017

SUSAN LYNN DAVIS
REGISTERED PROFESSIONAL ENGINEER NO. 16026

NOTE: PROJECT LENGTH BASED ON I-40 AND DOUGLAS BLVD. STATIONING.

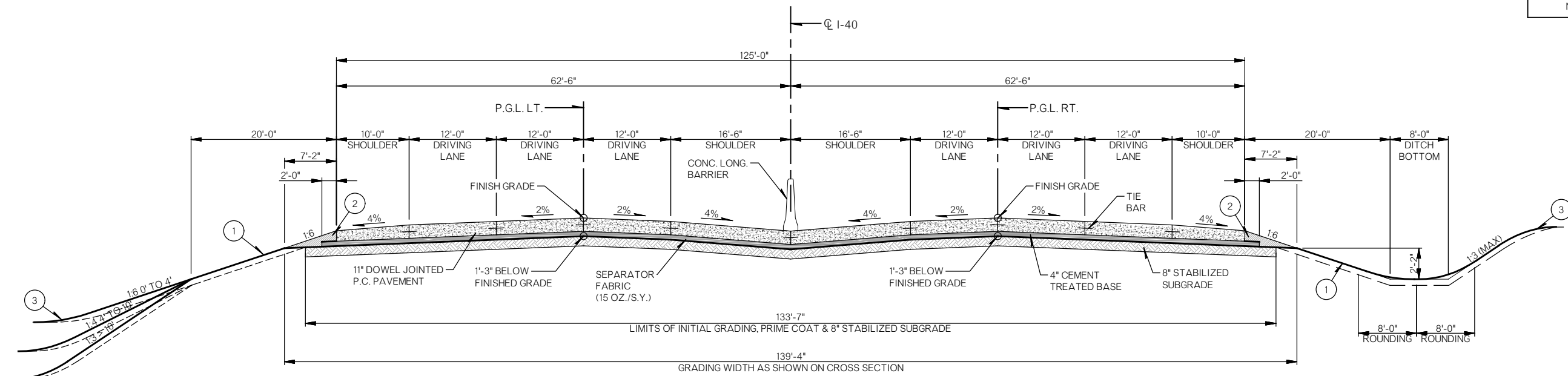
ROADWAY LENGTH	8,470.83 FT.	1.604 MI.
BRIDGE LENGTH	179.93 FT.	0.034 MI.
PROJECT LENGTH		1.638 MI.

EQUATIONS: NONE
EXCEPTION: NONE

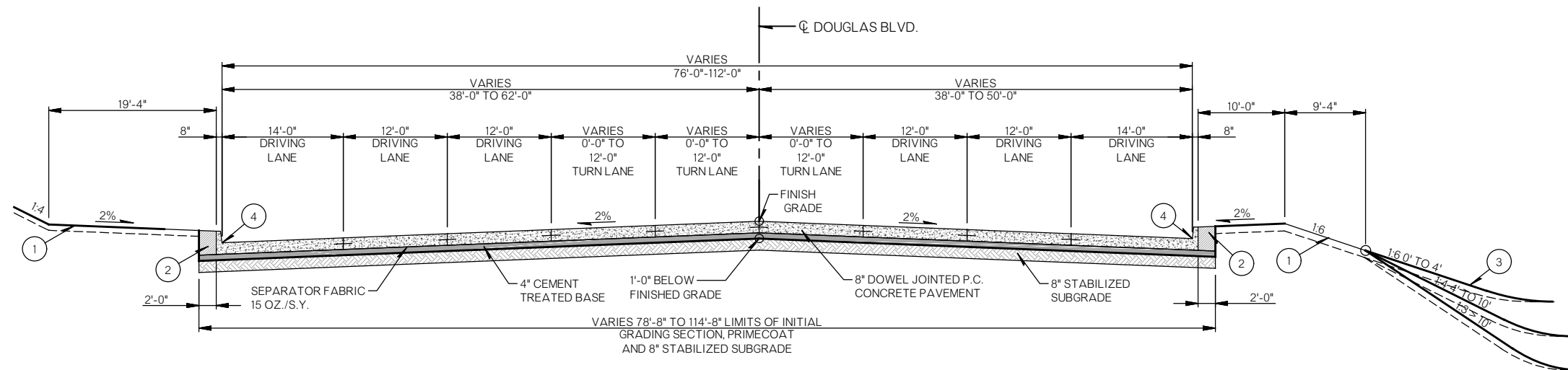
2009 OKLAHOMA STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION GOVERN, APPROVED BY THE U.S. DEPARTMENT OF TRANSPORTATION, FEDERAL HIGHWAY ADMINISTRATION, JANUARY 4, 2010.

OKLAHOMA DEPARTMENT OF TRANSPORTATION	DEPARTMENT OF TRANSPORTATION FEDERAL HIGHWAY ADMINISTRATION
DATE APPROVED	DATE APPROVED
BY	BY
CHIEF ENGINEER	DIVISION ADMINISTRATOR
SWO XXXX(X)	F.A. PROJECT NO. 28992(04)
COUNTY OKLAHOMA COUNTY	HIGHWAY I-40 SHEET NO. 1

P.E. NO. XXXXX



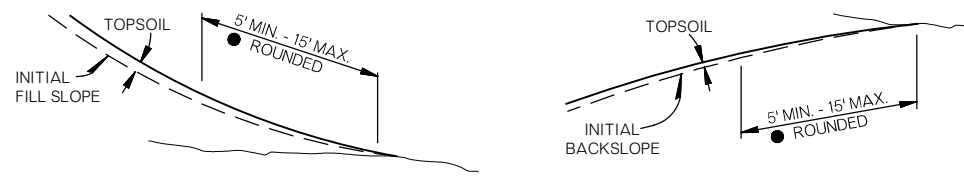
TYPICAL SECTION NO. 1
I-40



TYPICAL SECTION NO. 2
DOUGLAS BLVD.

ROUNDING DETAIL

- INTERSECTION OF CUT AND/OR FILL SLOPES WITH GROUND LINE TO BE ROUNDED AS PART OF FINISHING OPERATIONS. ROUNDED SHALL BE 5' MINIMUM FOR SMALLER CUTS AND FILLS TO 15' MAXIMUM FOR LARGER CUTS AND FILLS OR AS DESIGNATED BY THE ENGINEER. COST OF ROUNDED TO BE INCLUDED IN THE PRICE BID FOR OTHER ITEMS OF WORK.



TOE OF FILL ROUNDED

TOP OF CUT ROUNDED

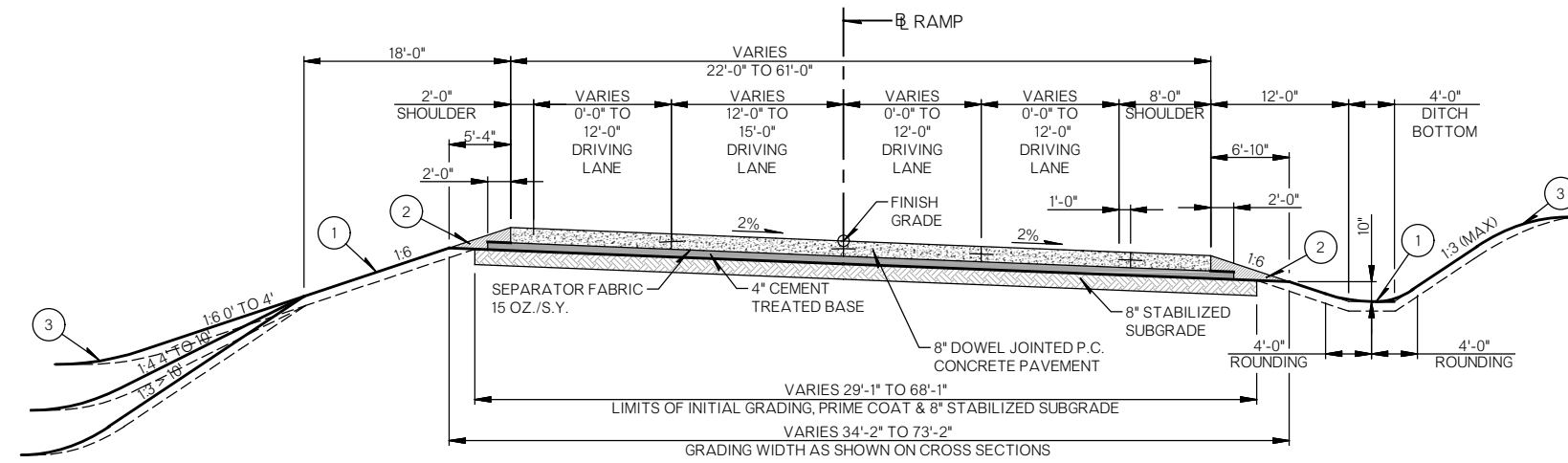
1 BACKFILL NOTE:
TO BE BACKFILLED AS PART OF THE FINISHING OPERATIONS. COST TO BE INCLUDED IN OTHER ITEMS OF WORK.

1 TOPSOIL NOTE:
THE CONTRACTOR SHALL STRIP ALL OF THE AVAILABLE TOPSOIL, STOCKPILE IT, AND PLACE IT BACK ON THE SECTION IN ACCORDANCE WITH SECTION 205 OF THE STANDARD SPECIFICATIONS. RESERVED TOPSOIL SHALL BE SPREAD FIRST ON THE COMPLETED SLOPES OF THE CUT SECTIONS AND THE REMAINDER ON COMPLETED FILL SLOPES OR OTHER PRIORITY AREAS LOCATED BY THE ENGINEER. ALL ADDITIONAL COSTS ASSOCIATED WITH OPERATIONS SHALL BE INCLUDED IN THE PAY ITEM FOR SALVAGED TOPSOIL, LUMP SUM.

THE GRADING LINE AS SHOWN ON THE TYPICAL AND CROSS SECTIONS IS TO THE TOP OF THE TOPSOIL. EARTHWORK QUANTITIES WERE NOT ADJUSTED FOR SALVAGE AND THE TOPSOIL QUANTITY IS INCLUDED IN THE MASSLINE BALANCE.

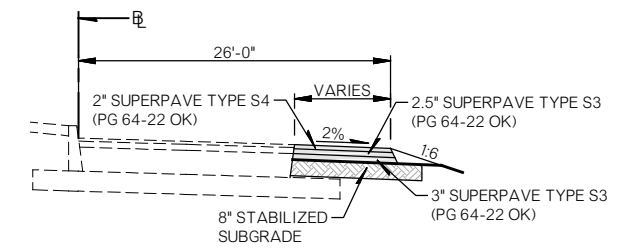
- 3 SEE ROUNDED DETAIL
- 4 CONCRETE CURB (8" BARRIER-INTEGRAL)

TYPICAL SECTION



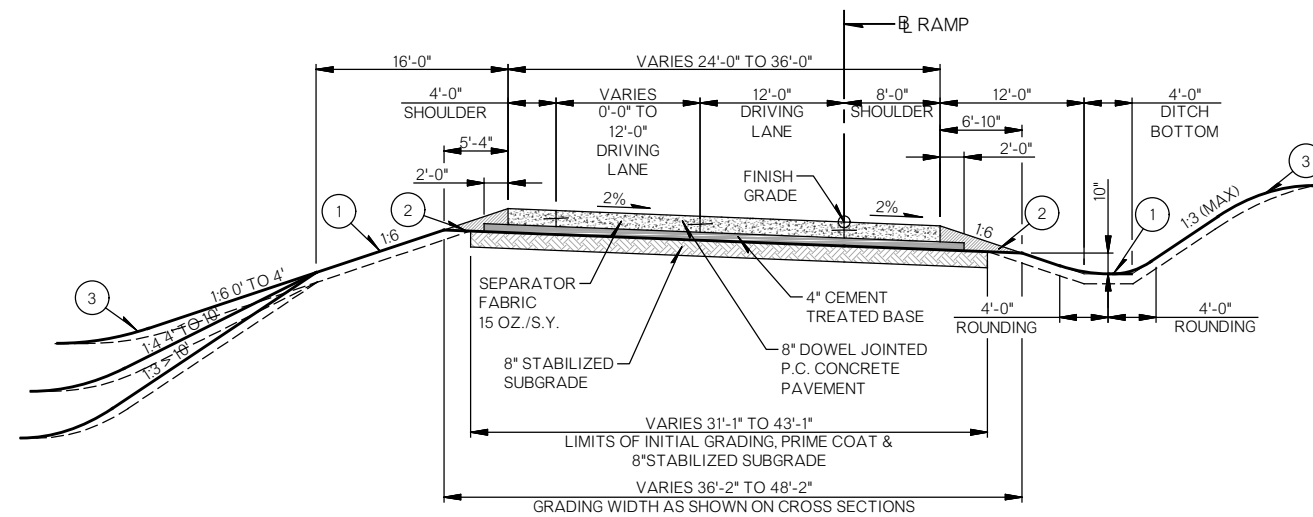
TYPICAL SECTION NO. 3

- RAMP A
- RAMP B
- RAMP C
- RAMP D



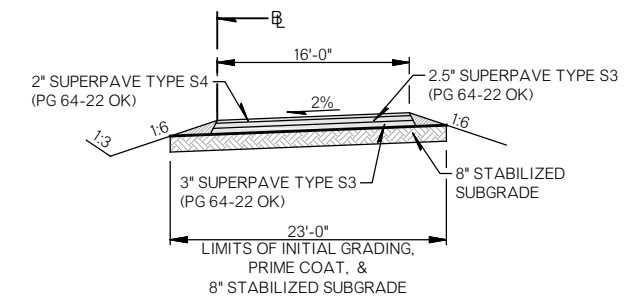
TYPICAL SECTION NO. 5

- TEMPORARY WIDENING
- COLLECTOR - DISTRIBUTOR ROAD EASTBOUND
- COLLECTOR - DISTRIBUTOR ROAD WESTBOUND



TYPICAL SECTION NO. 4

- RAMP A.1
- RAMP B.1
- RAMP C.1
- RAMP D.1



TYPICAL SECTION NO. 6

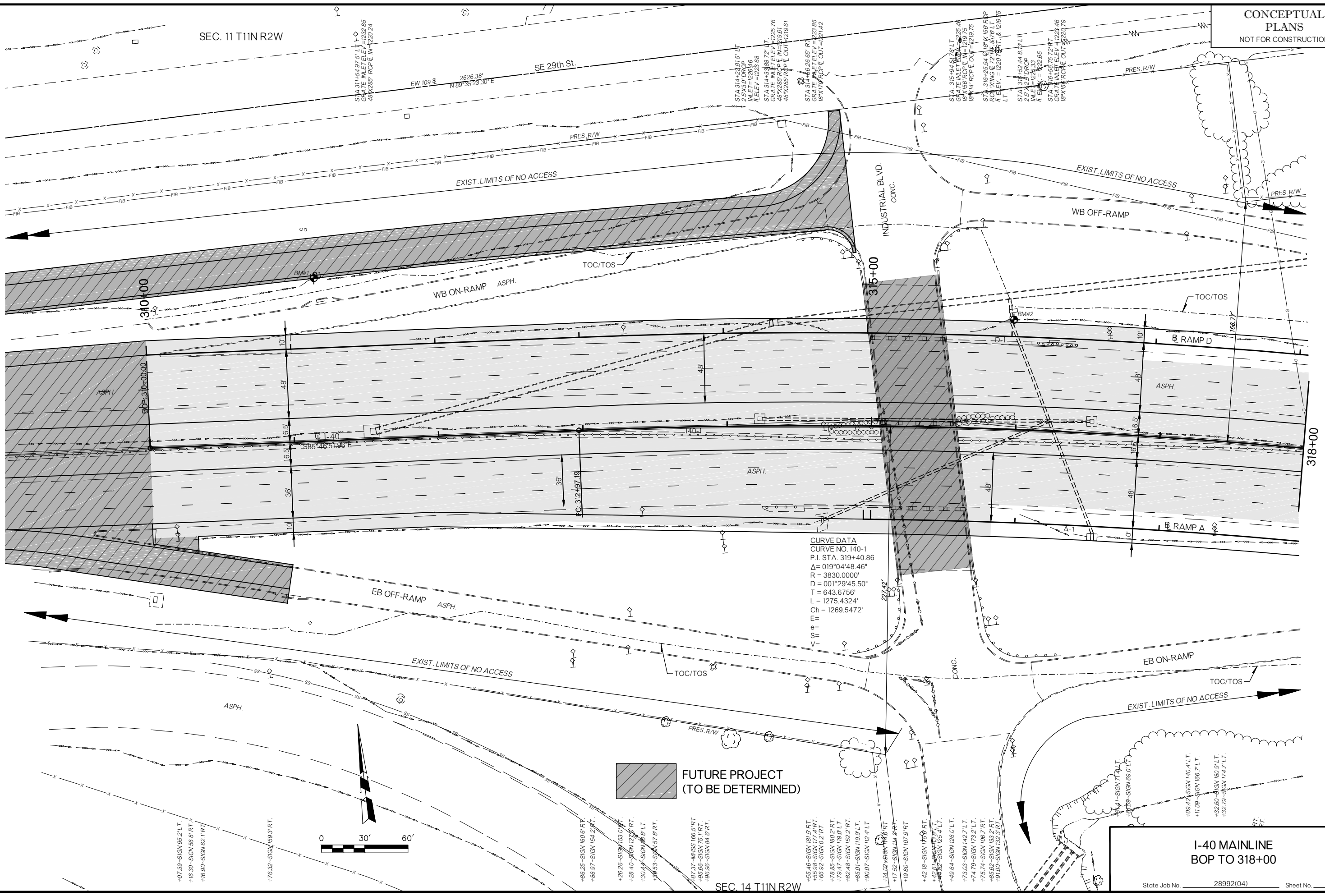
- RAMP P DETOUR
- RAMP Q DETOUR
- RAMP S DETOUR
- RAMP U DETOUR

- 1 SEE TOPSOIL NOTE ON SHEET 2
- 2 SEE BACKFILL NOTE ON SHEET 2
- 3 SEE ROUNDING DETAIL ON SHEET 2

TYPICAL SECTION

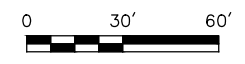
SEC. 11 T11N R2W

SEC. 14 T11N R2W

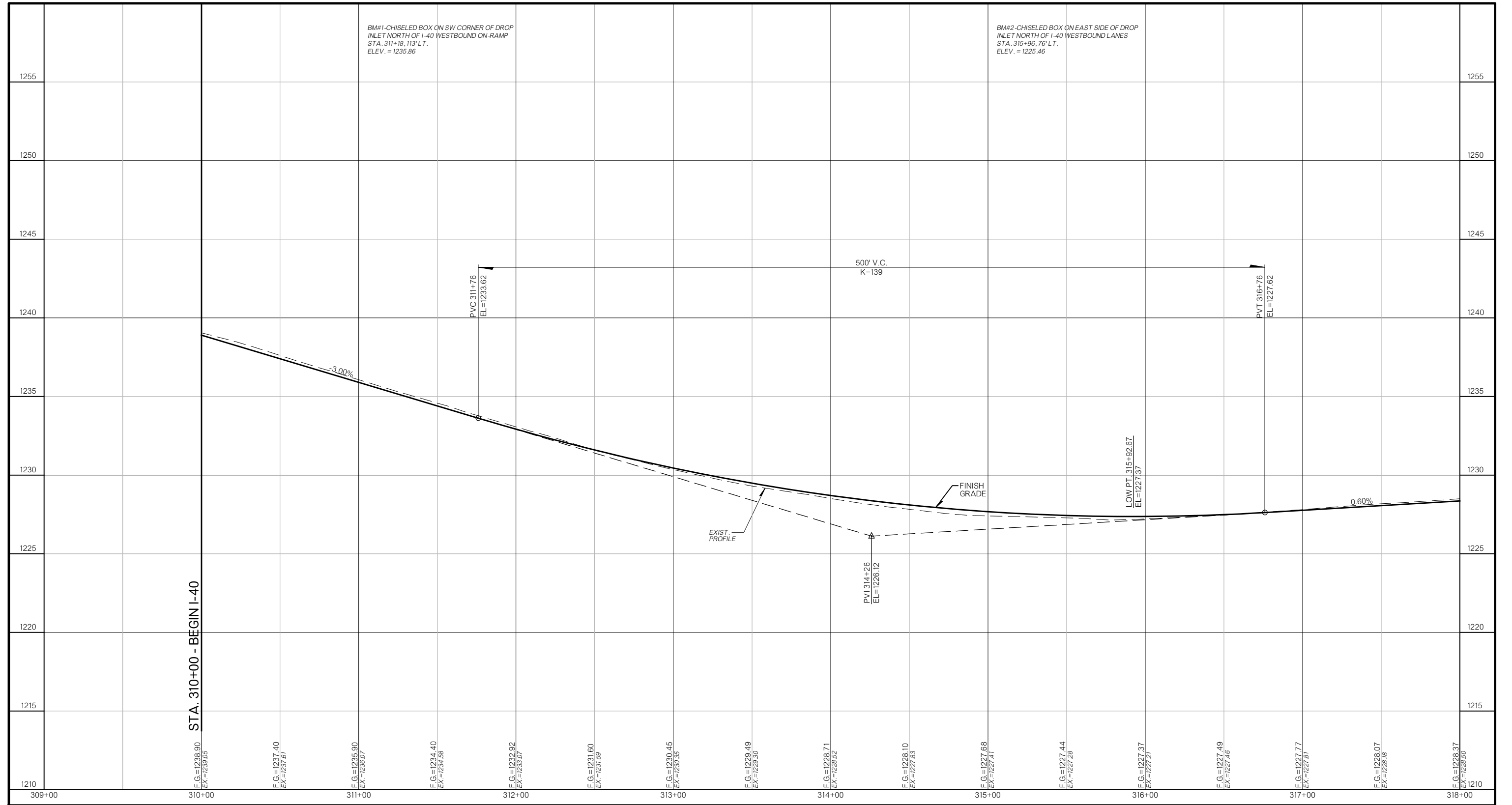


CURVE DATA
 CURVE NO. 140-1
 P.I. STA. 319+40.86
 $\Delta = 019^{\circ}04'48.46''$
 $R = 3830.0000'$
 $D = 001^{\circ}29'45.50''$
 $T = 643.6756'$
 $L = 1275.4324'$
 $Ch = 1269.5472'$
 $E =$
 $e =$
 $S =$
 $V =$

FUTURE PROJECT
(TO BE DETERMINED)



I-40 MAINLINE
BOP TO 318+00

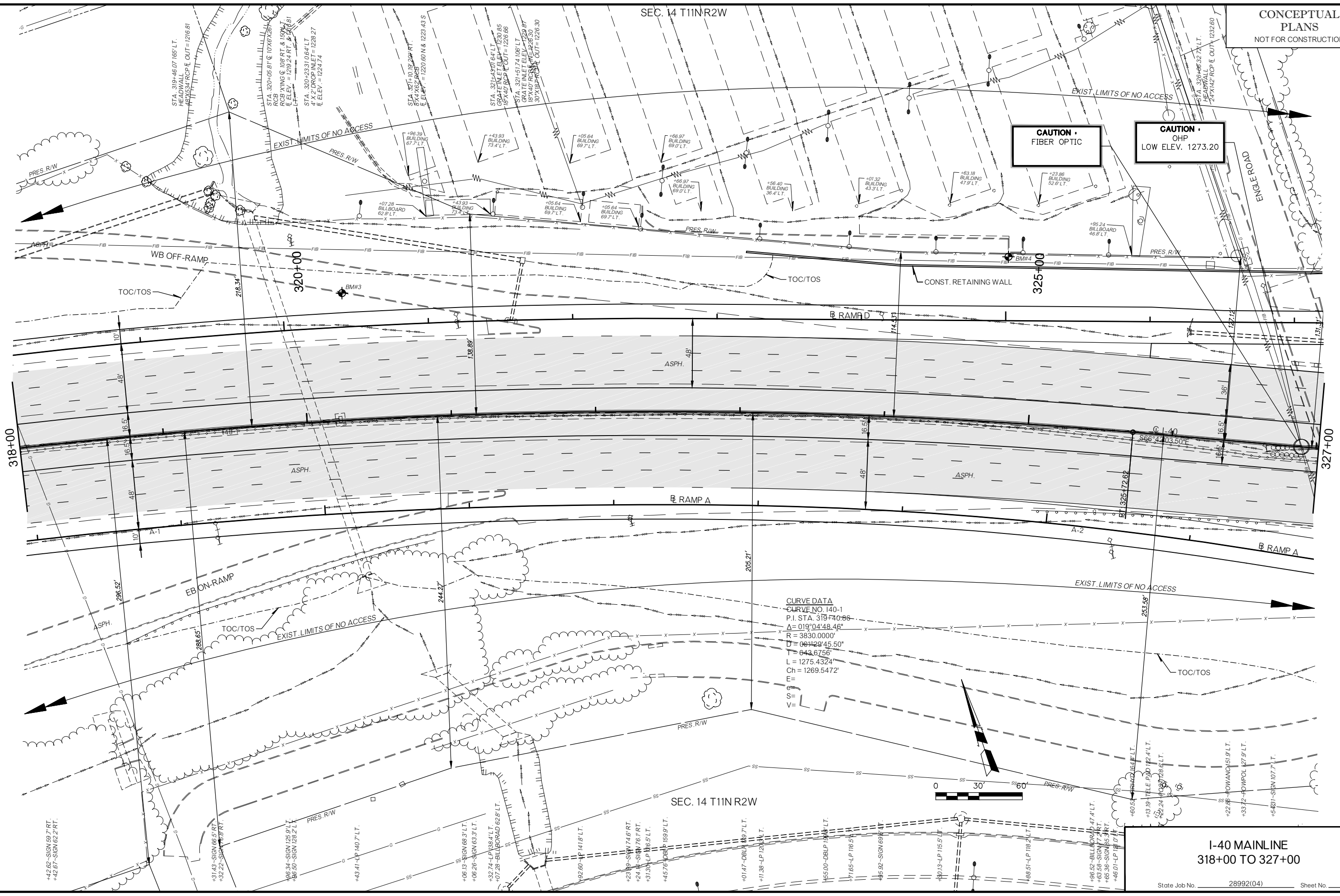


STA. 310+00 - BEGIN I-40

I-40 MAINLINE
BOP TO 318+00

SEC. 14 T11N2W

SEC. 14 T11N2W

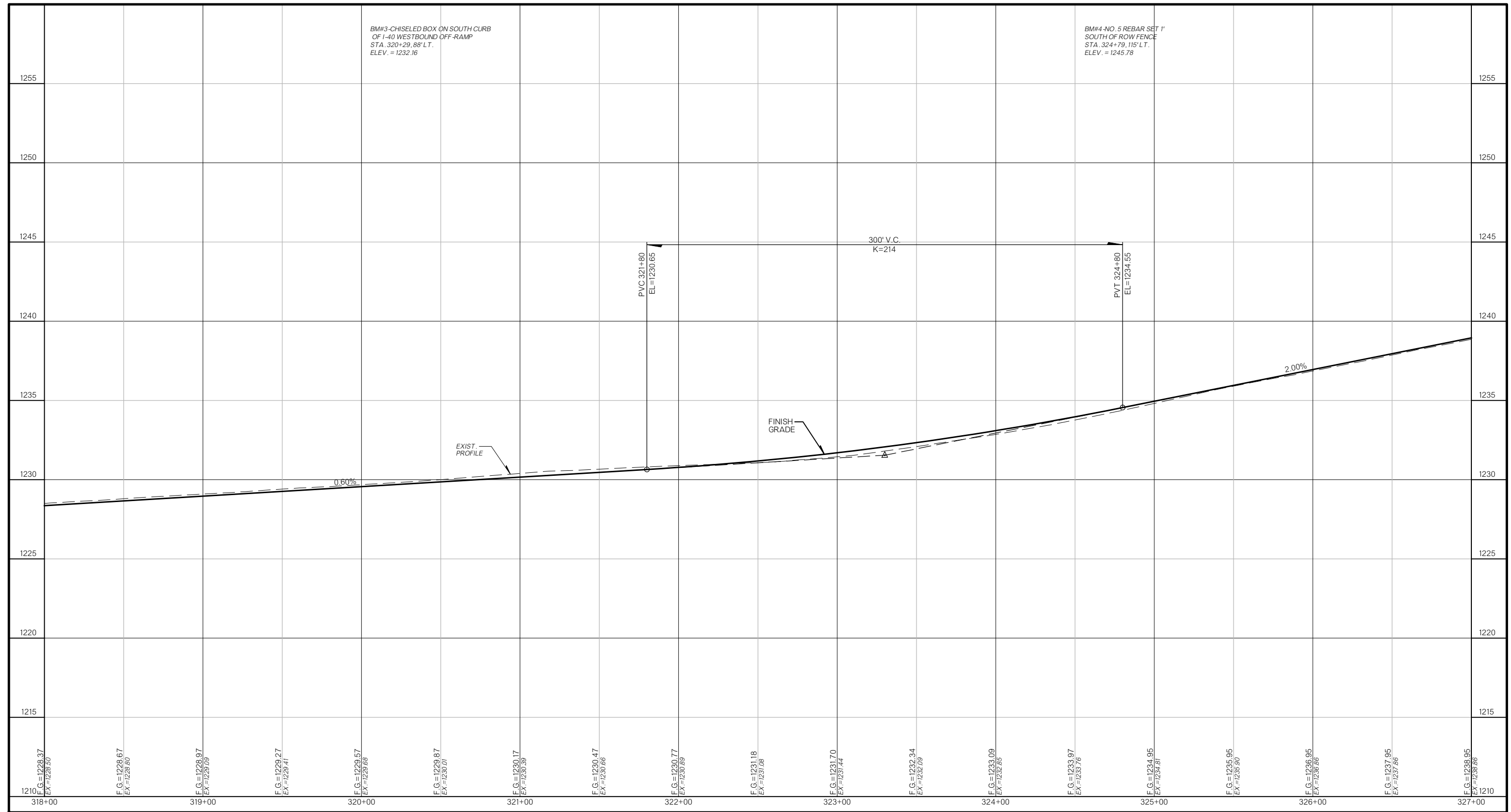


CAUTION
FIBER OPTIC

CAUTION
OHP
LOW ELEV. 1273.20

CURVE DATA
CURVE NO. 140-1
P.I. STA. 319+40.86
 $\Delta = 019^{\circ}04'48.46''$
 $R = 3830.0000'$
 $D = 061^{\circ}29'45.50''$
 $T = 643.6756'$
 $L = 1275.4324'$
 $Ch = 1269.5472'$
E =
S =
V =

I-40 MAINLINE
318+00 TO 327+00



BM#3-CHISELED BOX ON SOUTH CURB
OF I-40 WESTBOUND OFF-RAMP
STA. 320+29.88' LT.
ELEV. = 1232.16

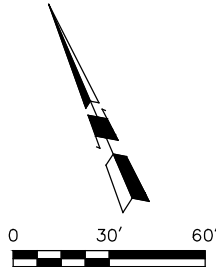
BM#4-NO. 5 REBAR SET 1'
SOUTH OF ROW FENCE
STA. 324+79.115' LT.
ELEV. = 1245.78

I-40 MAINLINE
318+00 TO 327+00

SEC. 14 T11N R2W

CONCEPTUAL PLANS
NOT FOR CONSTRUCTION

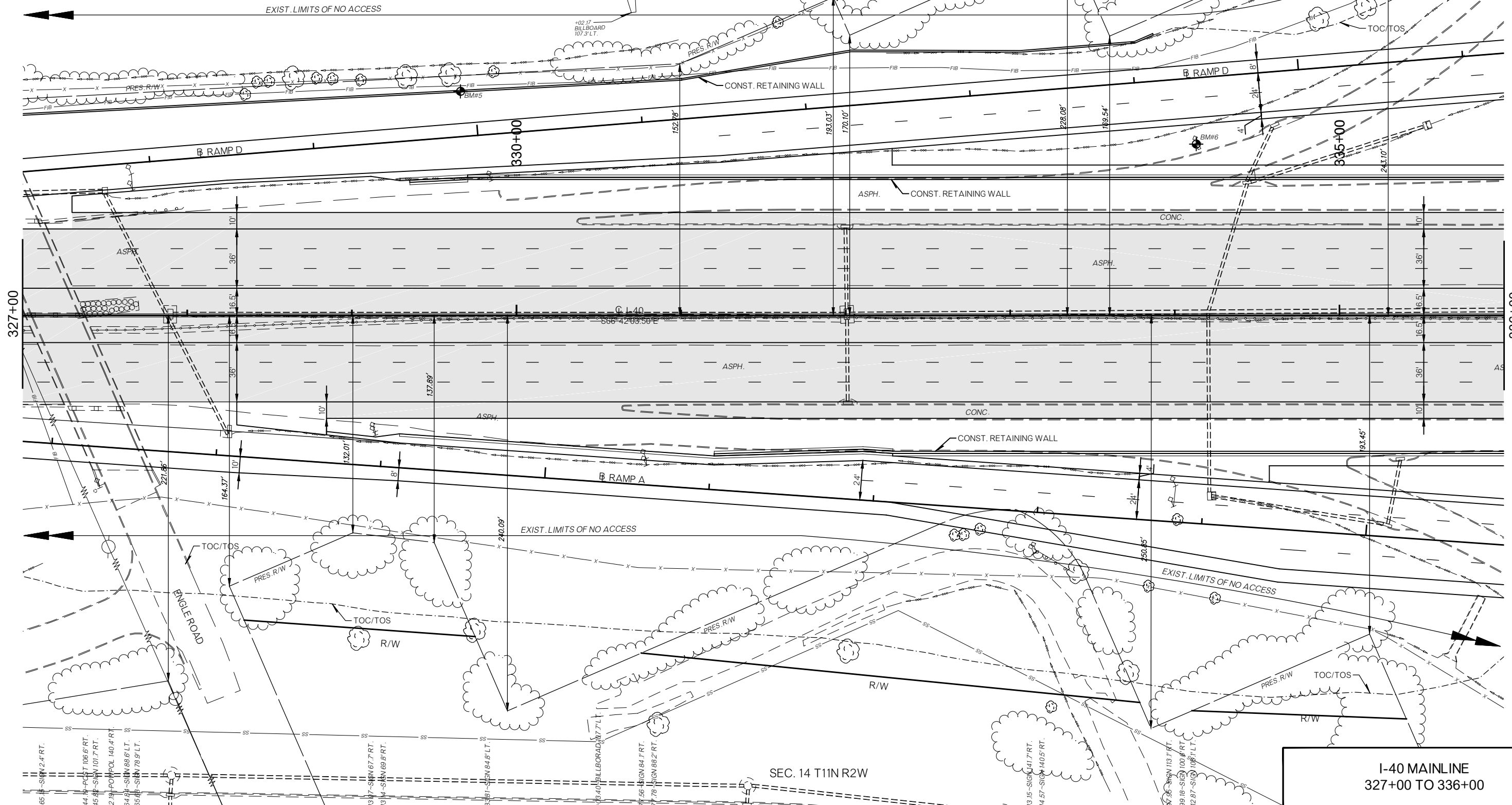
STA. 327+50.05 76' LT.
GRATE INLET ELEV = 1269.25
18"X17" RCP/E, IN = 1265.70
18"X17" RCP/E, OUT = 1265.70
STA. 327+87.72 Q. 18" X 163" RCP
RCP XING Q. 72' RT. & 76' LT.
L. ELEV. = 1235.40 RT. & 1233.21
STA. 327+89.81 0.78' LT.
6" X 3" DROP INLET = 1238.82
E. ELEV. = 1235.14
STA. 328+25.84 72' RT.
GRATE INLET ELEV = 1239.60
18"X19" RCP/E, OUT = 1235.40



STA. 331+60.81 54' LT.
Q. 18" X 163" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1248.13
15"X49" RCP/E, OUT = 1245.97
STA. 332+00.72 Q. 15" X 105" RCP
RCP XING Q. 53' RT. & 54' LT.
L. ELEV. = 1243.62 RT. & 1243.97 LT.
6" X 3" DROP INLET = 1247.66
0.75' E. ELEV. = 1243.29
STA. 332+01.23 53' RT.
GRATE INLET ELEV = 1248.17
15"X49" RCP/E, OUT = 1243.62

STA. 334+20.22 Q. 18" X 107' & 18" X 81"
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1246.26 RT. & 1245.72 LT.
STA. 334+22.24 110' RT.
AREA INLET ELEV = 1248.76
18"X106" RCP/E, IN = 1246.26
18"X106" RCP/E, OUT = 1246.26
STA. 334+43.78 91' LT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1245.72
18"X106" RCP/E, IN = 1246.26
18"X106" RCP/E, OUT = 1246.26
STA. 335+29.08 127' RT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1246.17
18"X106" RCP/E, IN = 1246.17
18"X106" RCP/E, OUT = 1246.17
STA. 335+36.82 82' RT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1251.63
18"X106" RCP/E, IN = 1247.66
18"X106" RCP/E, OUT = 1247.66

STA. 334+60.57 116' LT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1250.07
18"X106" RCP/E, OUT = 1246.63
STA. 335+29.08 127' RT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1249.76
18"X106" RCP/E, IN = 1246.17
18"X106" RCP/E, OUT = 1246.17
STA. 335+36.82 82' RT.
Q. 18" X 107" RCP
RCP XING Q. 107' RT. & 80' LT.
L. ELEV. = 1251.63
18"X106" RCP/E, IN = 1247.66
18"X106" RCP/E, OUT = 1247.66



+65 SIGN 2.4' RT.
+44 SIGN 106.6' RT.
+45 SIGN 101.7' RT.
+52 SIGN 140.4' RT.
+64 SIGN 88.6' LT.
+65 SIGN 78.9' LT.

+137 SIGN 67.7' RT.
+13 SIGN 69.8' RT.
+63 SIGN 84.8' LT.

+63 SIGN 84.8' LT.
+71 SIGN 64.7' RT.
+77 SIGN 88.2' RT.

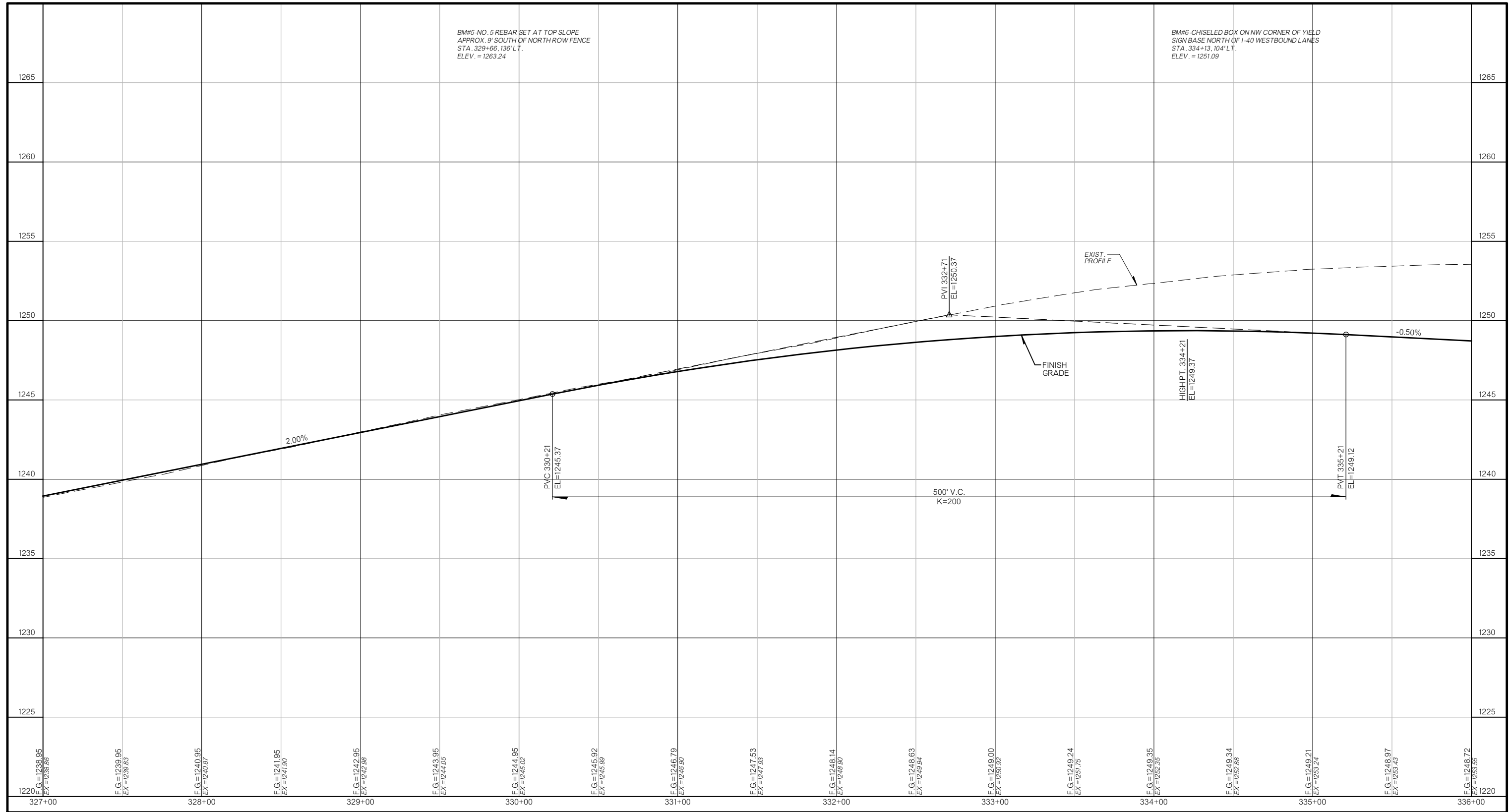
+13 SIGN 113.1' RT.
+99 SIGN 100.8' RT.
+12 SIGN 106.7' LT.

SEC. 14 T11N R2W

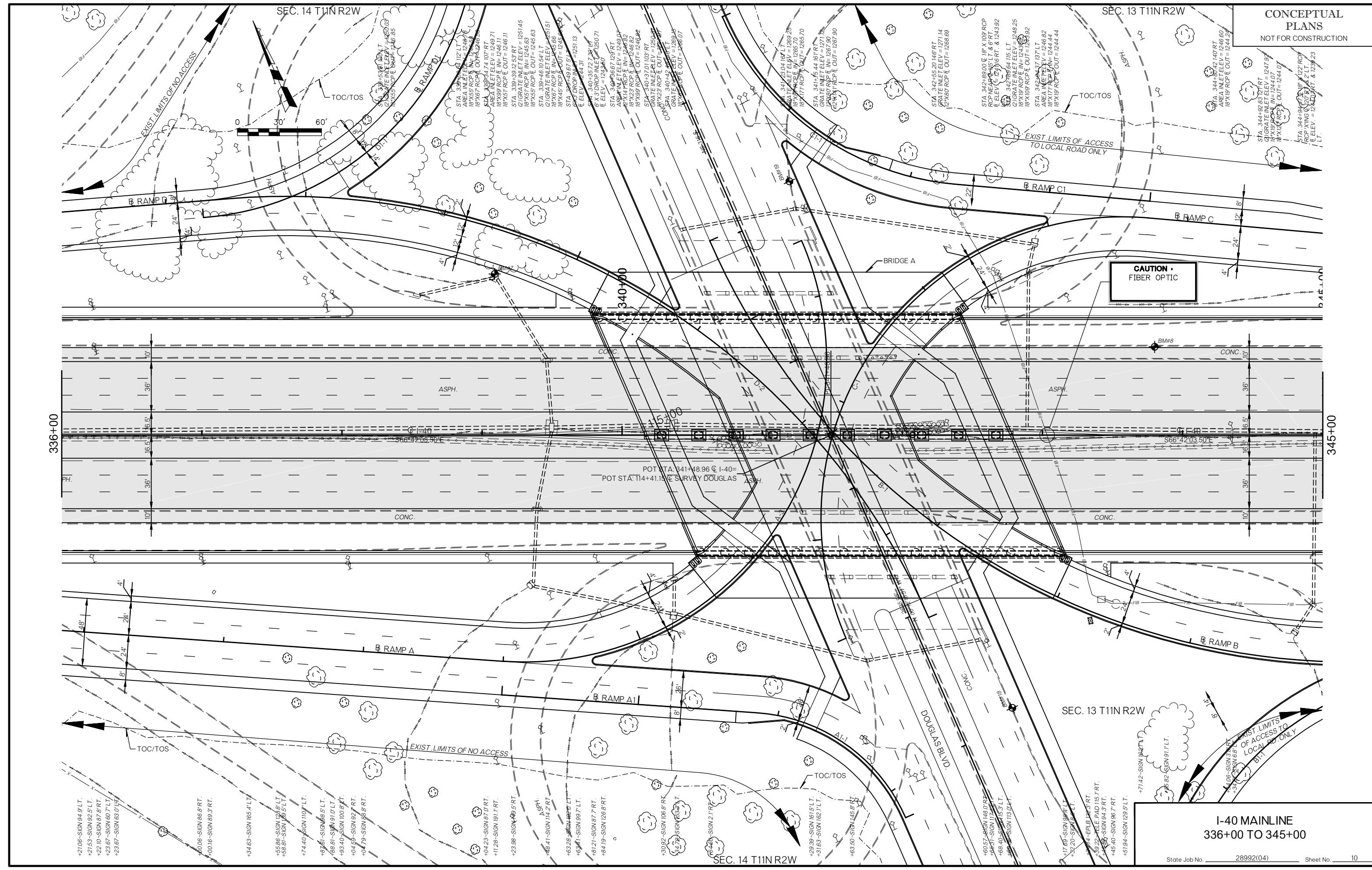
I-40 MAINLINE
327+00 TO 336+00

BM#5-NO. 5 REBAR SET AT TOP SLOPE
APPROX. 9' SOUTH OF NORTH ROW FENCE
STA. 329+66, 136' L.T.
ELEV. = 1263.24

BM#6-CHISELED BOX ON NW CORNER OF YIELD
SIGN BASE NORTH OF I-40 WESTBOUND LANES
STA. 334+13, 104' L.T.
ELEV. = 1251.09

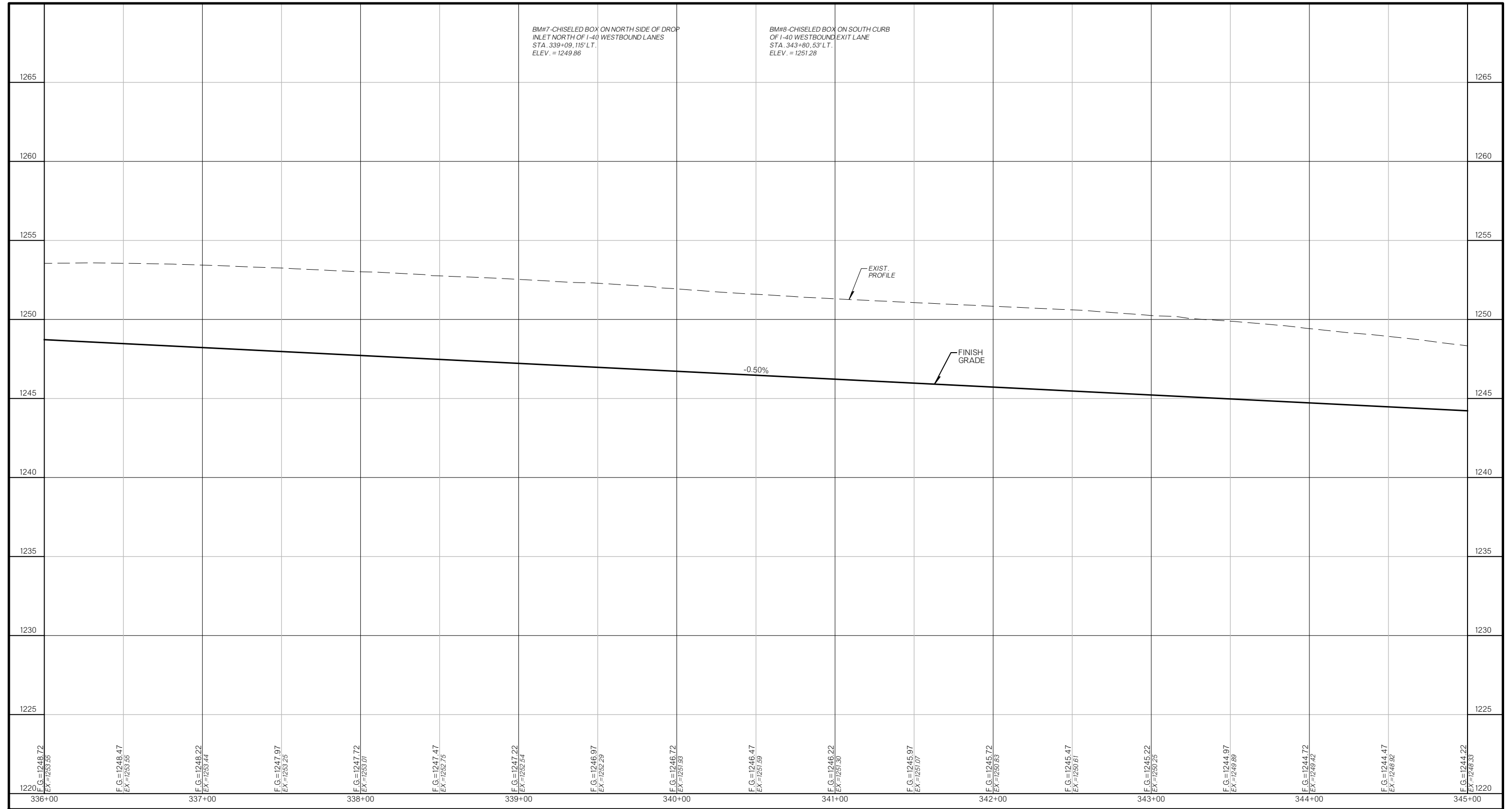


I-40 MAINLINE
327+00 TO 336+00



CAUTION -
FIBER OPTIC

I-40 MAINLINE
336+00 TO 345+00

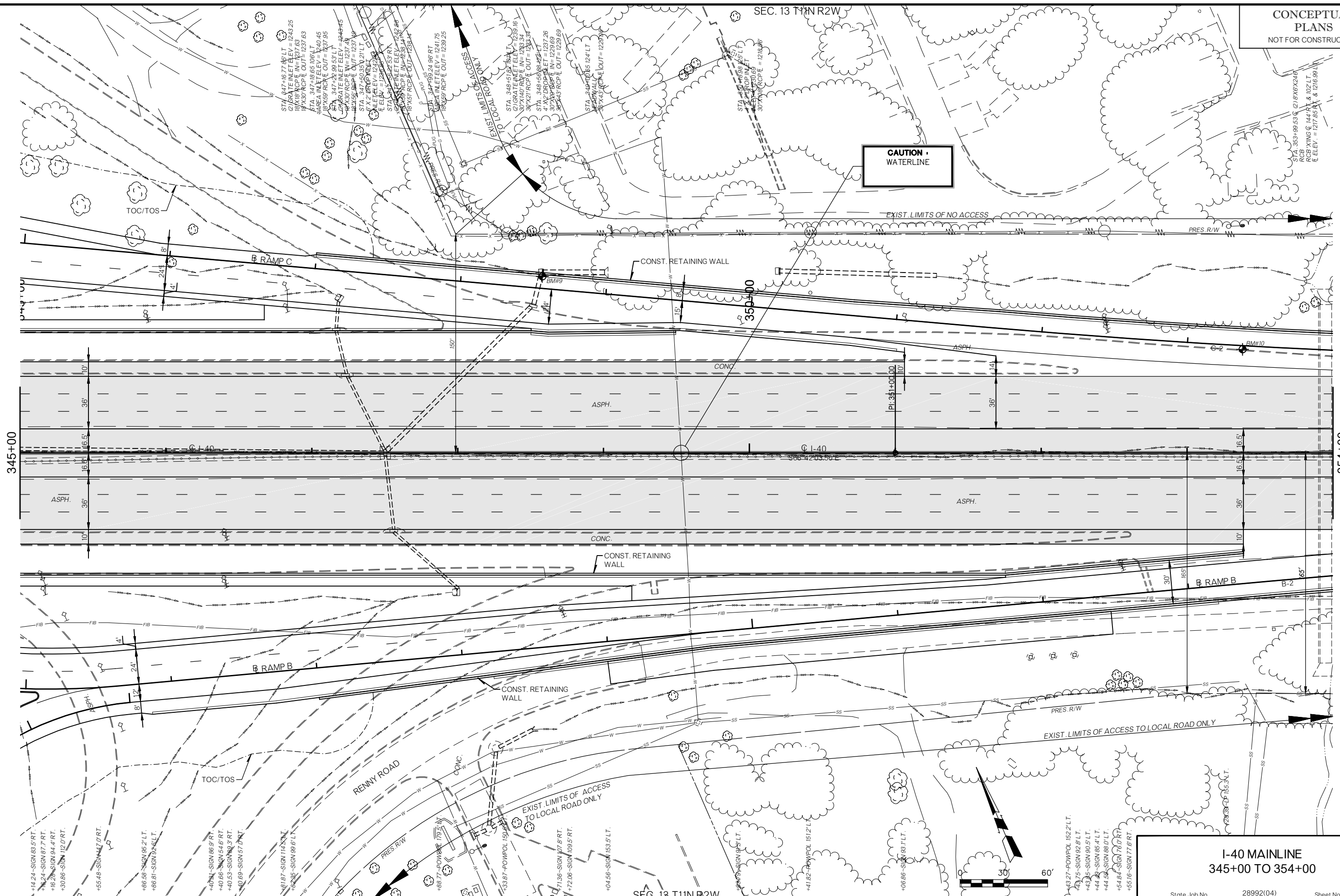


I-40 MAINLINE
336+00 TO 345+00

SEC. 13 T11N R2W

CAUTION
WATERLINE

STA. 353+99.53 @ 1218'X6'24" RCB XING @ 144' R/L & 102' L/T. ELEV. = 1217'85" & 1216'96"



345+00

354+00

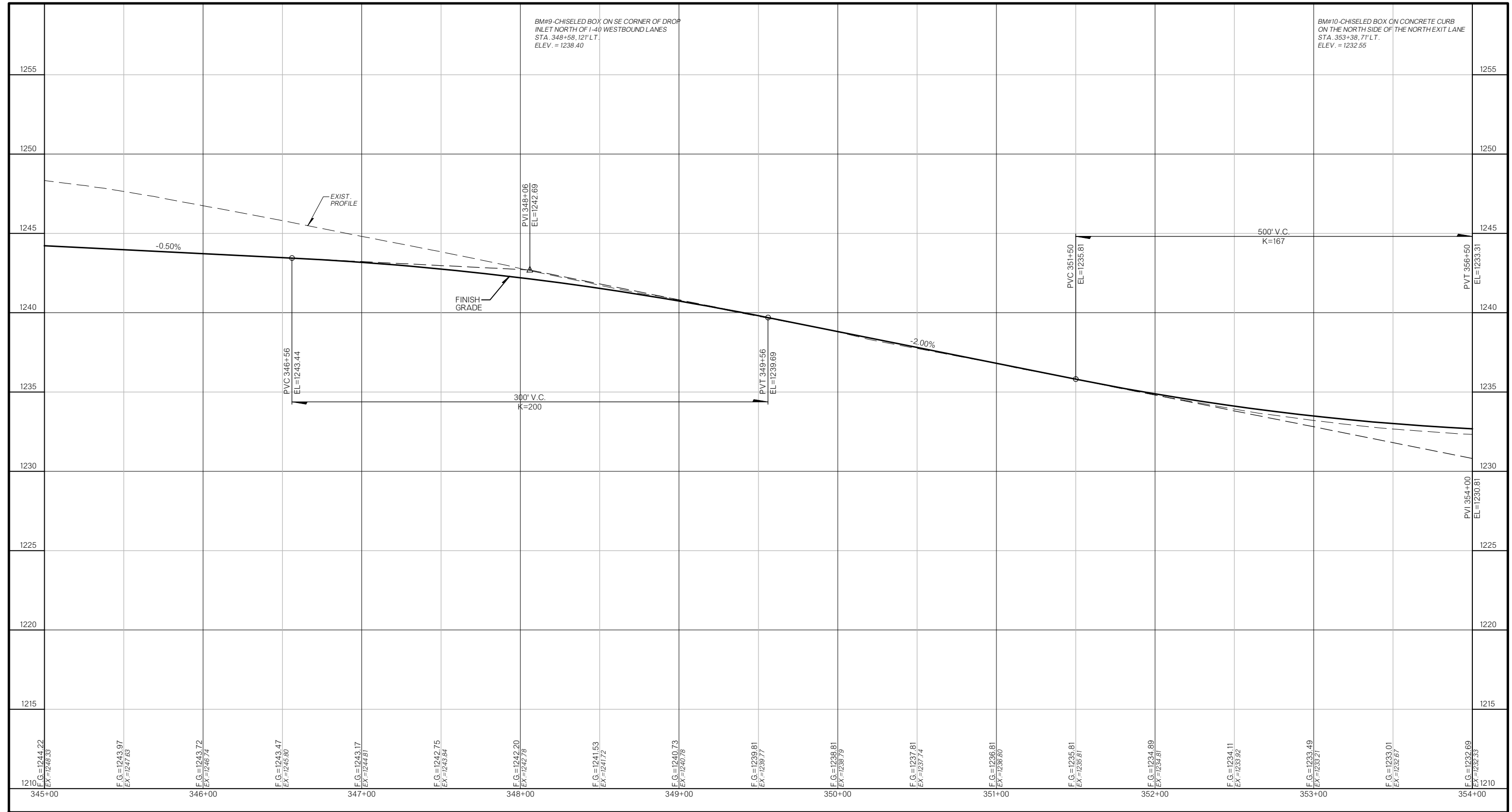
I-40 MAINLINE
345+00 TO 354+00

SEC. 13 T11N R2W

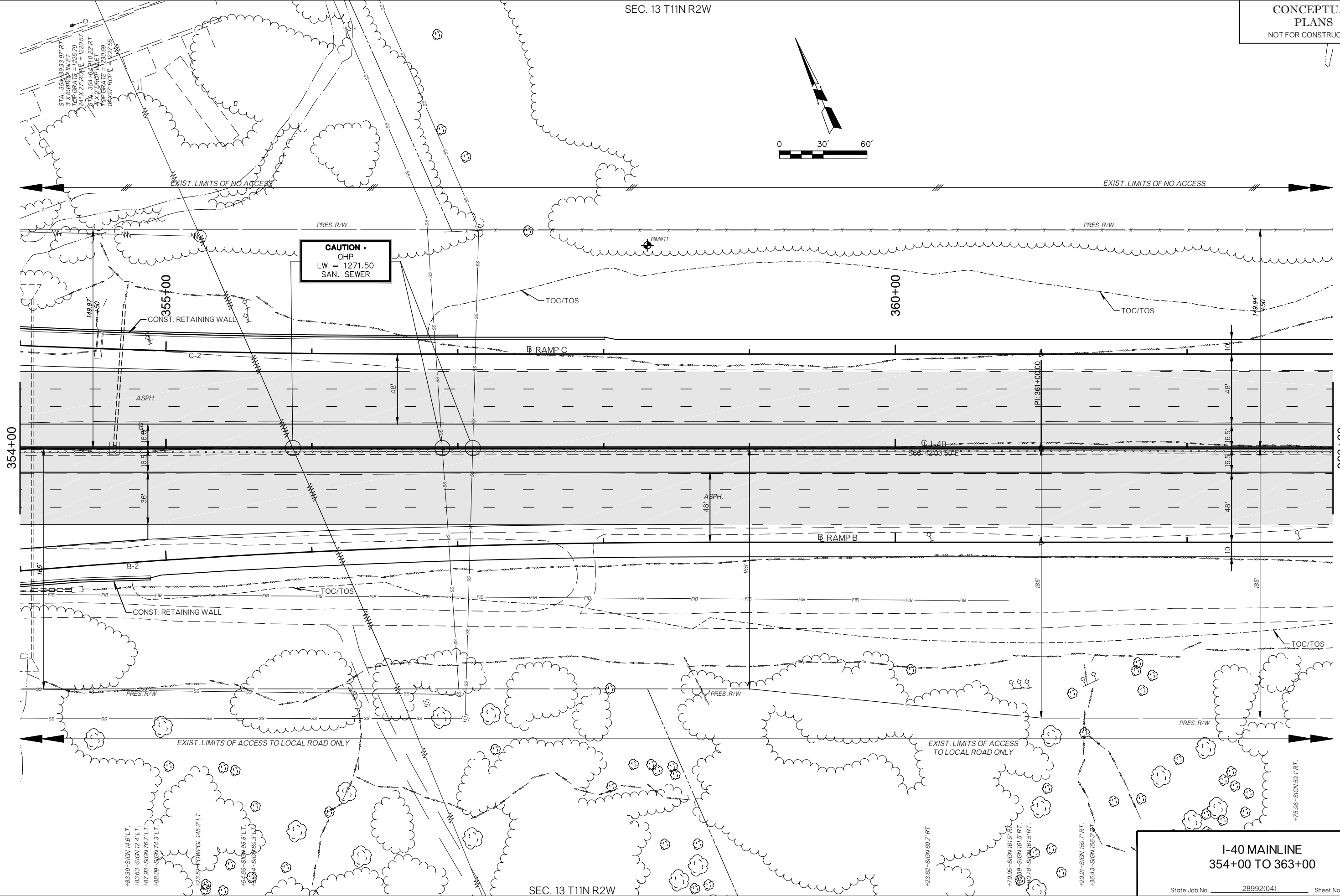
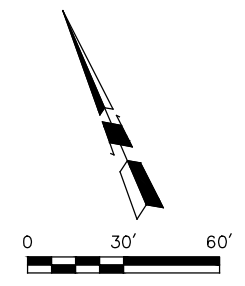


+14.24-SIGN 89.5 RT.
+16.24-SIGN 87.7 RT.
+16.28-SIGN 94.4 RT.
+30.86-SIGN 112.0 RT.
+55.48-SIGN 47.0 RT.
+66.56-SIGN 95.2 LT.
+66.81-SIGN 94.8 LT.
+80.11-SIGN 86.9 RT.
+40.66-SIGN 54.6 RT.
+40.53-SIGN 49.3 RT.
+40.69-SIGN 57.0 RT.
+81.87-SIGN 114.8 RT.
+62.96-SIGN 99.8 LT.
+88.77-POW POL 179.5 N
+33.87-POW POL 150.0 N
+71.36-SIGN 107.8 RT.
+72.06-SIGN 109.5 RT.
+04.56-SIGN 163.5 LT.
+84.70-SIGN 95.1 LT.
+41.82-POW POL 151.2 LT.
+06.86-SIGN 93.7 LT.

+43.27-POW POL 152.2 LT.
+43.75-SIGN 92.8 LT.
+43.35-SIGN 90.5 LT.
+44.20-SIGN 85.4 LT.
+44.59-SIGN 88.0 LT.
+54.84-SIGN 76.0 RT.
+55.16-SIGN 77.8 RT.



I-40 MAINLINE
345+00 TO 354+00



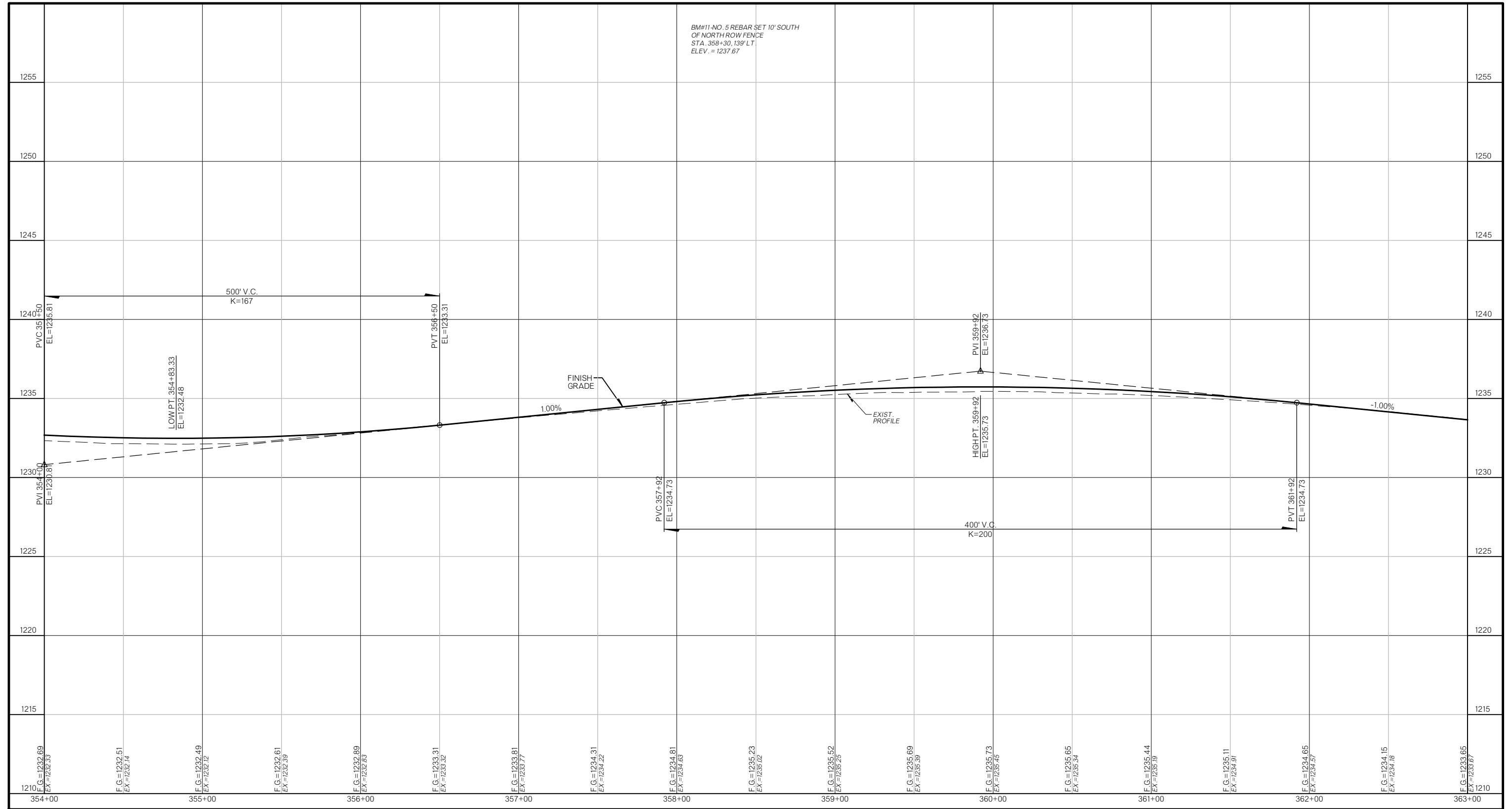
CAUTION
OHP
LW = 1271.50
SAN. SEWER

**I-40 MAINLINE
354+00 TO 363+00**

+83.39-SIGN 146' LT.
+83.63-SIGN 124' LT.
+87.93-SIGN 76' LT.
+88.09-SIGN 74' LT.
+23.15-POW POL 145.2' LT.
+54.69-SIGN 98.8' LT.
+62.47-SIGN 89.3' LT.

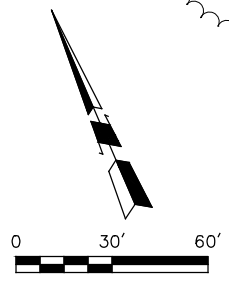
+23.62-SIGN 60.7' RT.
+79.95-SIGN 161.9' RT.
+89.39-SIGN 161.5' RT.
+90.78-SIGN 161.5' RT.
+29.21-SIGN 159.7' RT.
+36.43-SIGN 156.3' RT.

+75.96-SIGN 59.1' RT.



I-40 MAINLINE
354+00 TO 363+00

SEC. 13 T11N R2W

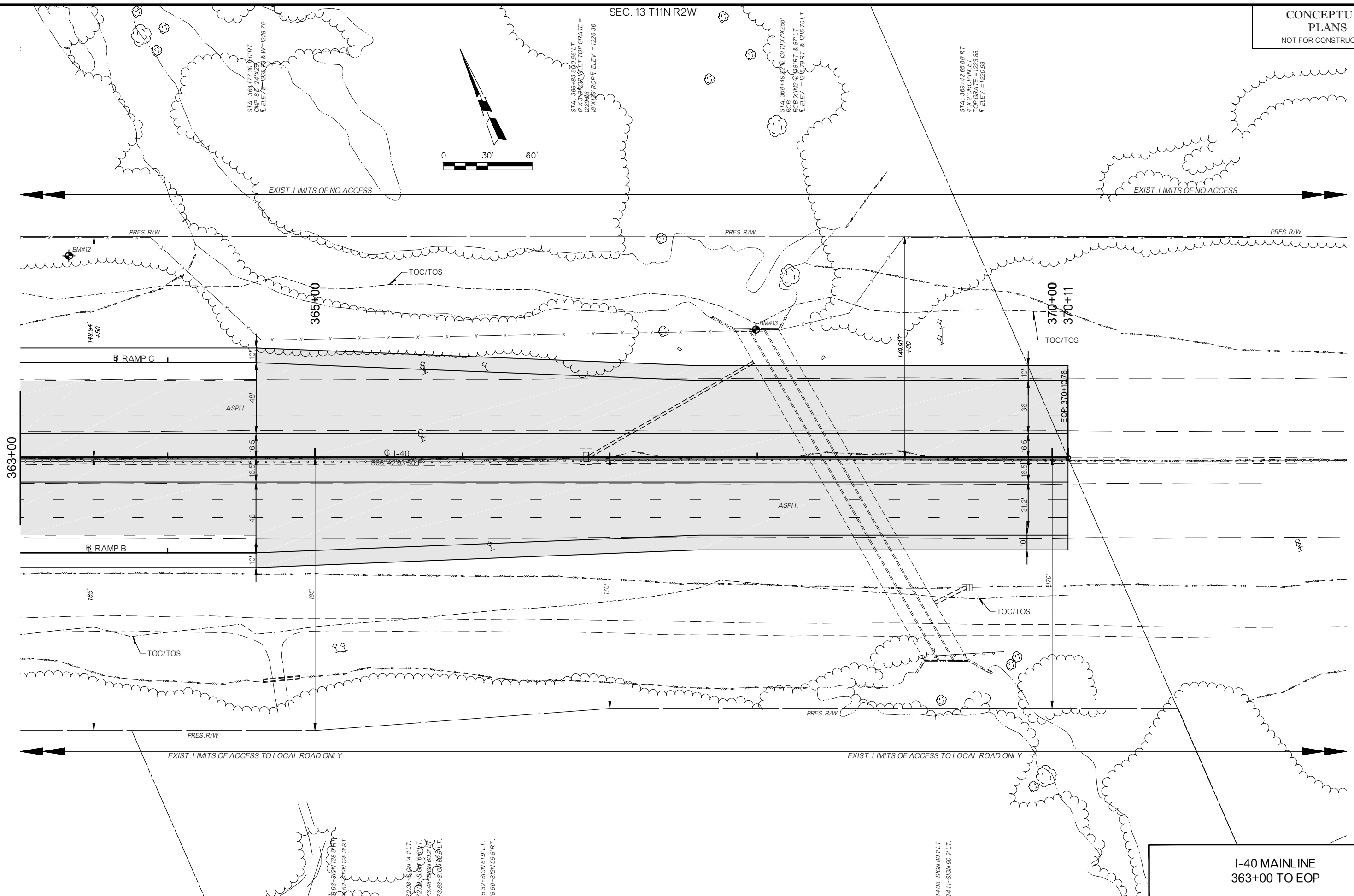


STA. 364+77.30 10' RT
CMP S.C. 24'X25'
E. ELEV. = 1228.75

STA. 366+63.00 0.66' LT
6' X 5' BOX CULVERT
TOP GRADE = 1229.46
18'X10' RCP E. ELEV. = 1226.36

STA. 368+49.42 0.31' X 2.68'
RCB X'ING C. 8' RT. & 8' LT.
E. ELEV. = 1210.97 RT. & 1215.70 LT.

STA. 369+42.65 8.8' RT
4' X 2' DROP INLET
TOP GRADE = 1223.88
E. ELEV. = 1220.93

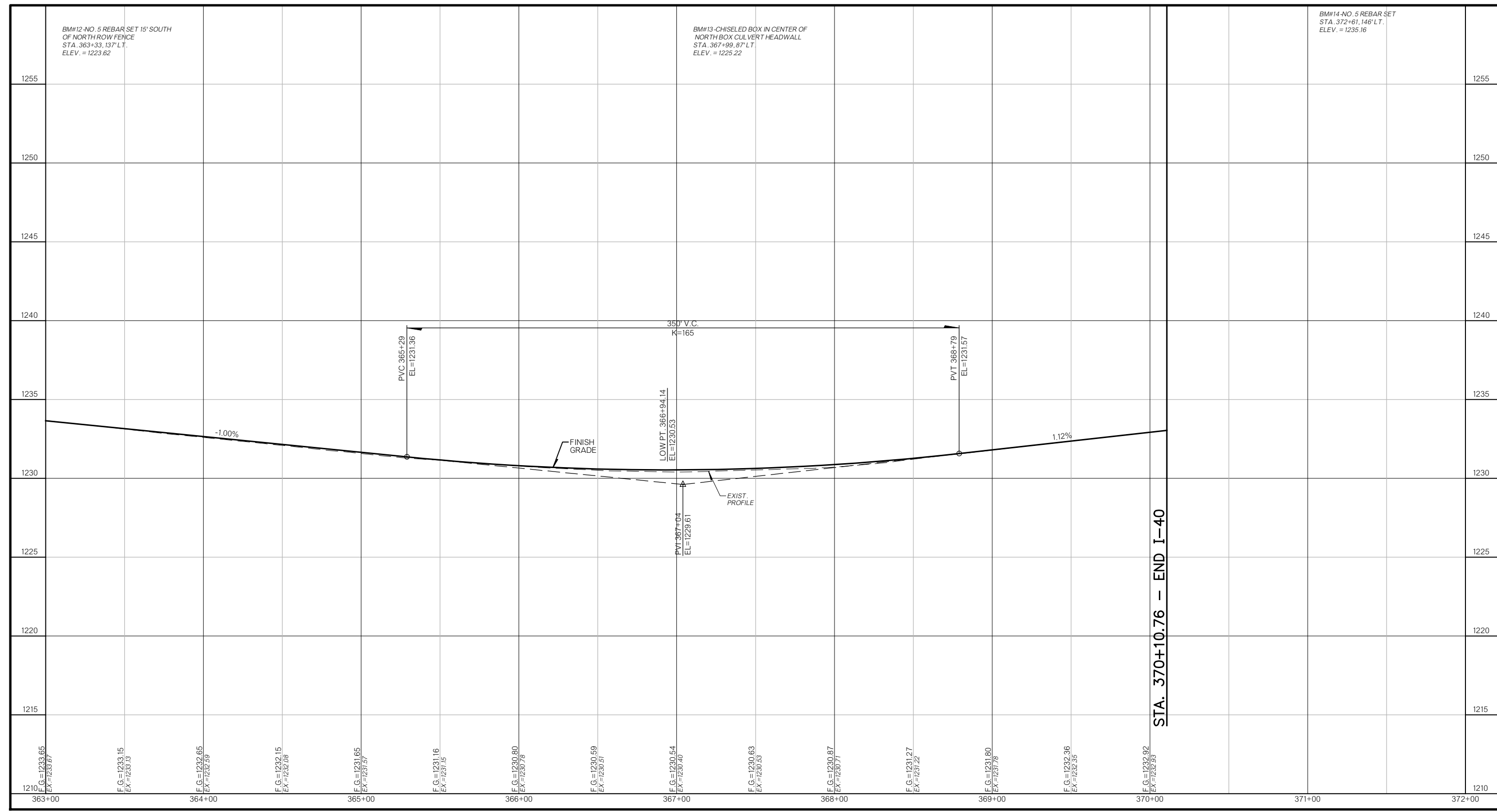


+24.08-SIGN 14' LT.
+72.04-SIGN 16' LT.
+73.40-SIGN 16.2' LT.
+73.63-SIGN 16.5' LT.
+15.32-SIGN 61.9' LT.
+18.96-SIGN 59.8' RT.

+24.08-SIGN 80.7' LT.
+24.11-SIGN 80.9' LT.

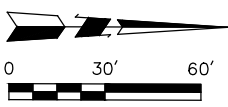
SEC. 13 T11N R2W

I-40 MAINLINE
363+00 TO EOP



I-40 MAINLINE
363+00 TO EOP

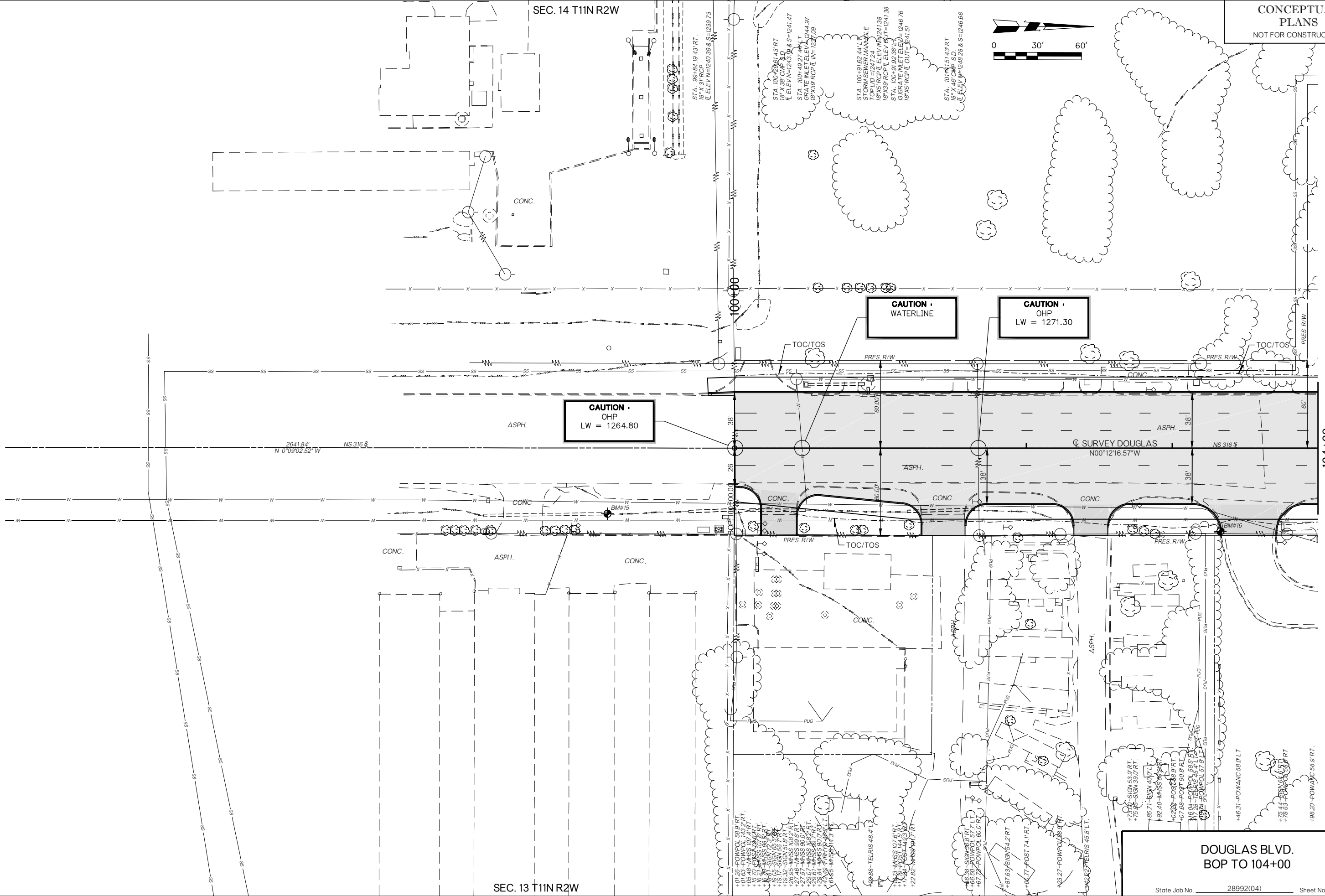
CONCEPTUAL PLANS
NOT FOR CONSTRUCTION



SEC. 14 T11N R2W

SEC. 13 T11N R2W

104+00



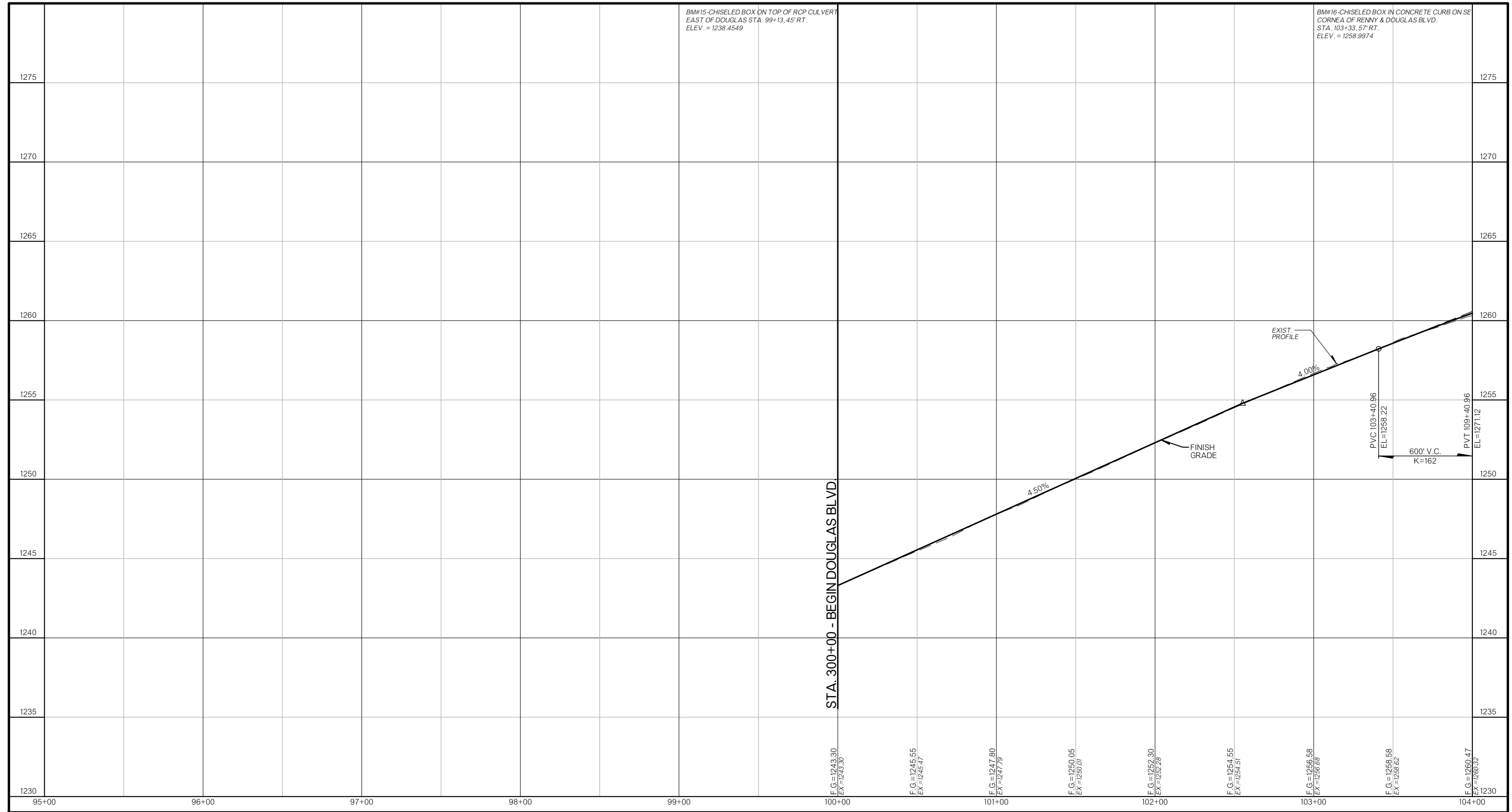
CAUTION -
OHP
LW = 1264.80

CAUTION -
WATERLINE

CAUTION -
OHP
LW = 1271.30

- +01.26-POWPOL 59.9 RT.
- +01.63-POWPOL 143.2 RT.
- +05.46-POWSS 116.6 RT.
- +16.51-MASS 107.6 RT.
- +16.70-MASS 107.6 RT.
- +19.05-SIGN 58.5 RT.
- +19.32-SIGN 58.5 RT.
- +26.95-MASS 109.2 RT.
- +27.46-MASS 99.6 RT.
- +27.57-MASS 90.0 RT.
- +29.81-MASS 87.7 RT.
- +29.84-MASS 80.0 RT.
- +32.88-MASS 74.5 RT.
- +32.88-MASS 74.5 RT.
- +60.88-TELRS 48.4 RT.
- +118-MASS 104.6 RT.
- +131.1-POST 44.3 RT.
- +22.82-MASS 74.5 RT.
- +66.38-SIGN 58.8 RT.
- +66.50-POWPOL 57.7 LT.
- +67.72-POWPOL 60.0 RT.
- +87.63-SIGN 54.2 RT.
- +100.71-POST 74.1 RT.
- +23.27-POWPOL 38.9 RT.
- +85.71-SIGN 40.0 LT.
- +75.95-SIGN 39.0 RT.
- +92.40-MASS 99.6 RT.
- +02.68-POST 38.9 RT.
- +07.68-POST 90.8 RT.
- +16.04-POWPOL 59.9 RT.
- +17.28-TELRS 45.4 RT.
- +22.82-POWPOL 57.9 LT.
- +46.31-POWANC 58.0 LT.
- +75.44-SIGN 64.3 RT.
- +75.63-POWANC 58.9 RT.
- +98.20-POWANC 58.9 RT.

DOUGLAS BLVD.
BOP TO 104+00



STA. 300+00 - BEGIN DOUGLAS BLVD

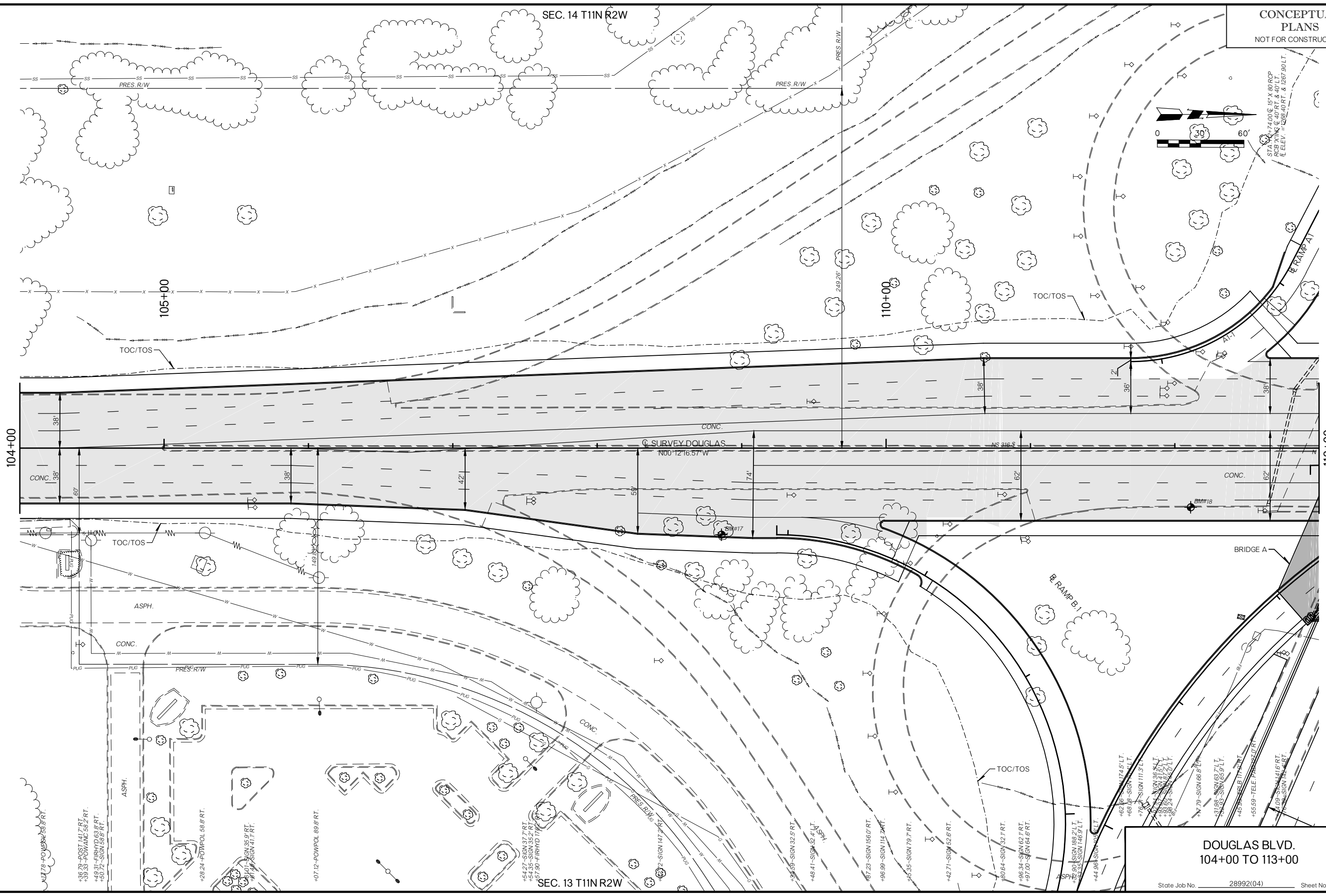
DOUGLAS BLVD.
BOP TO 104+00

SEC. 14 T11N R2W

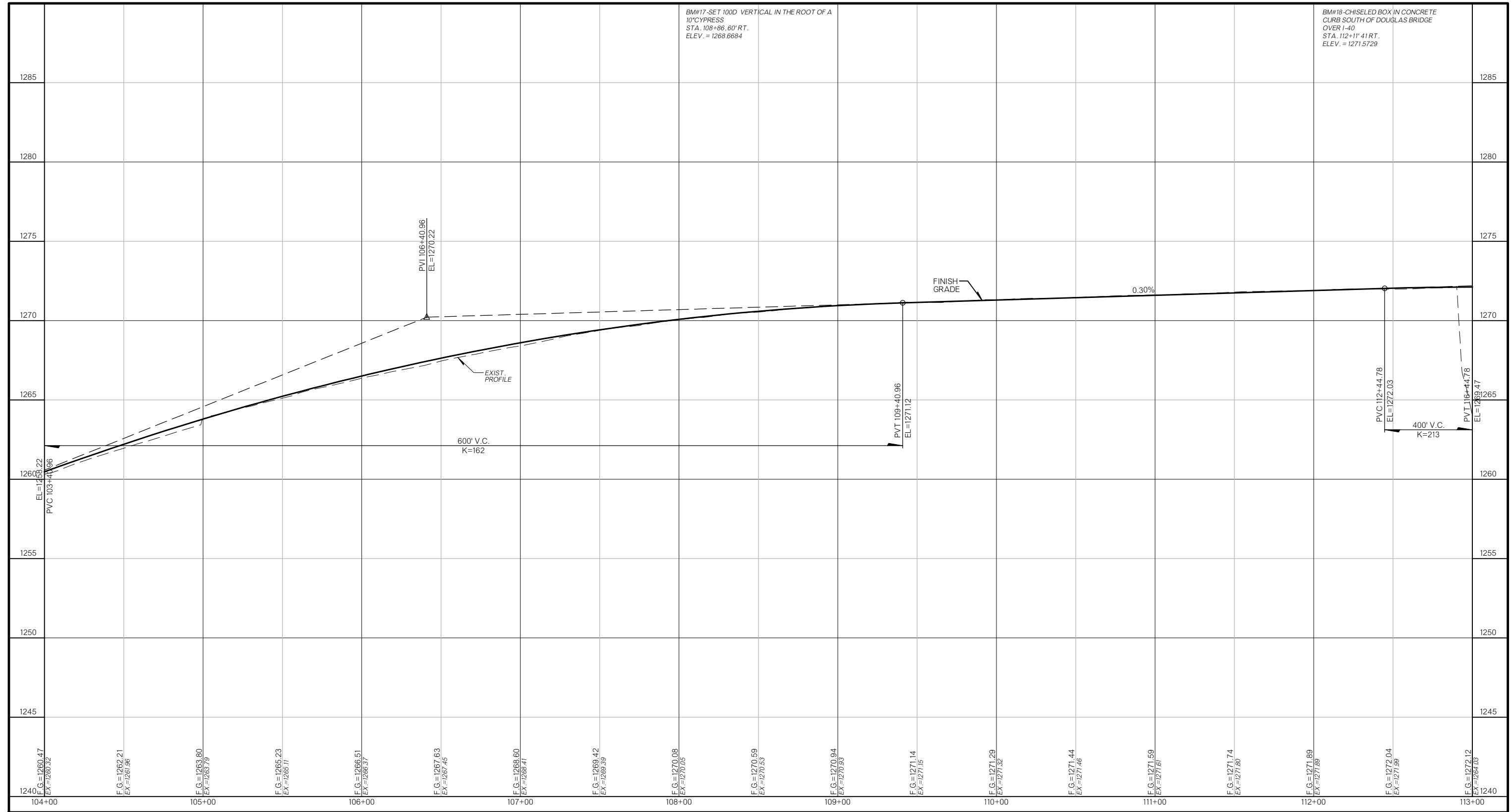
CONCEPTUAL
PLANS
NOT FOR CONSTRUCTION

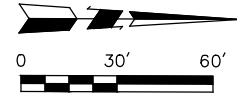


STA. 104+74.00 G. 15' X 80' RCP
RCP XING @ 40' RT. & 40' LT.
E. ELEV. = 6288.40 RT. & 1267.90 LT.

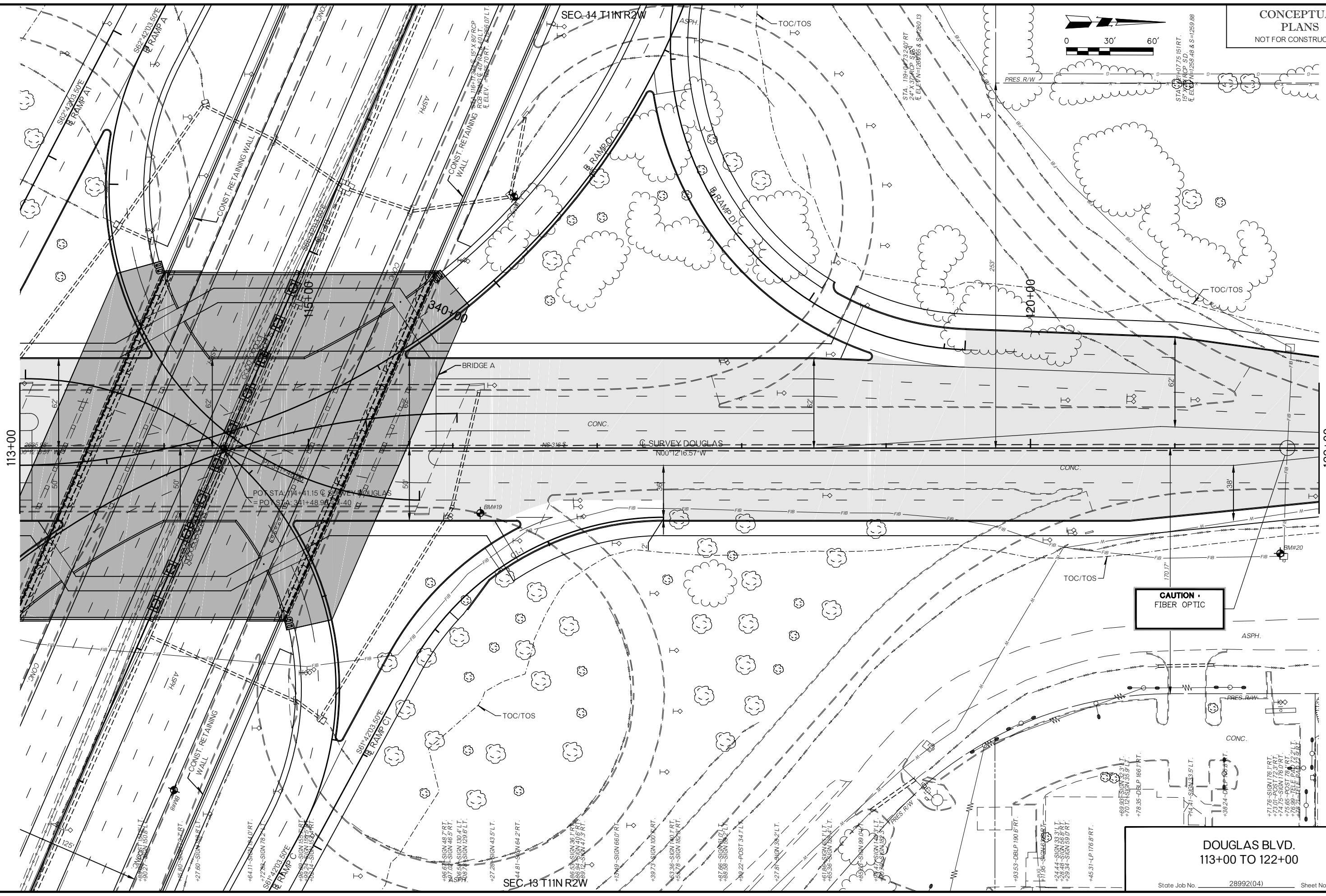


DOUGLAS BLVD.
104+00 TO 113+00



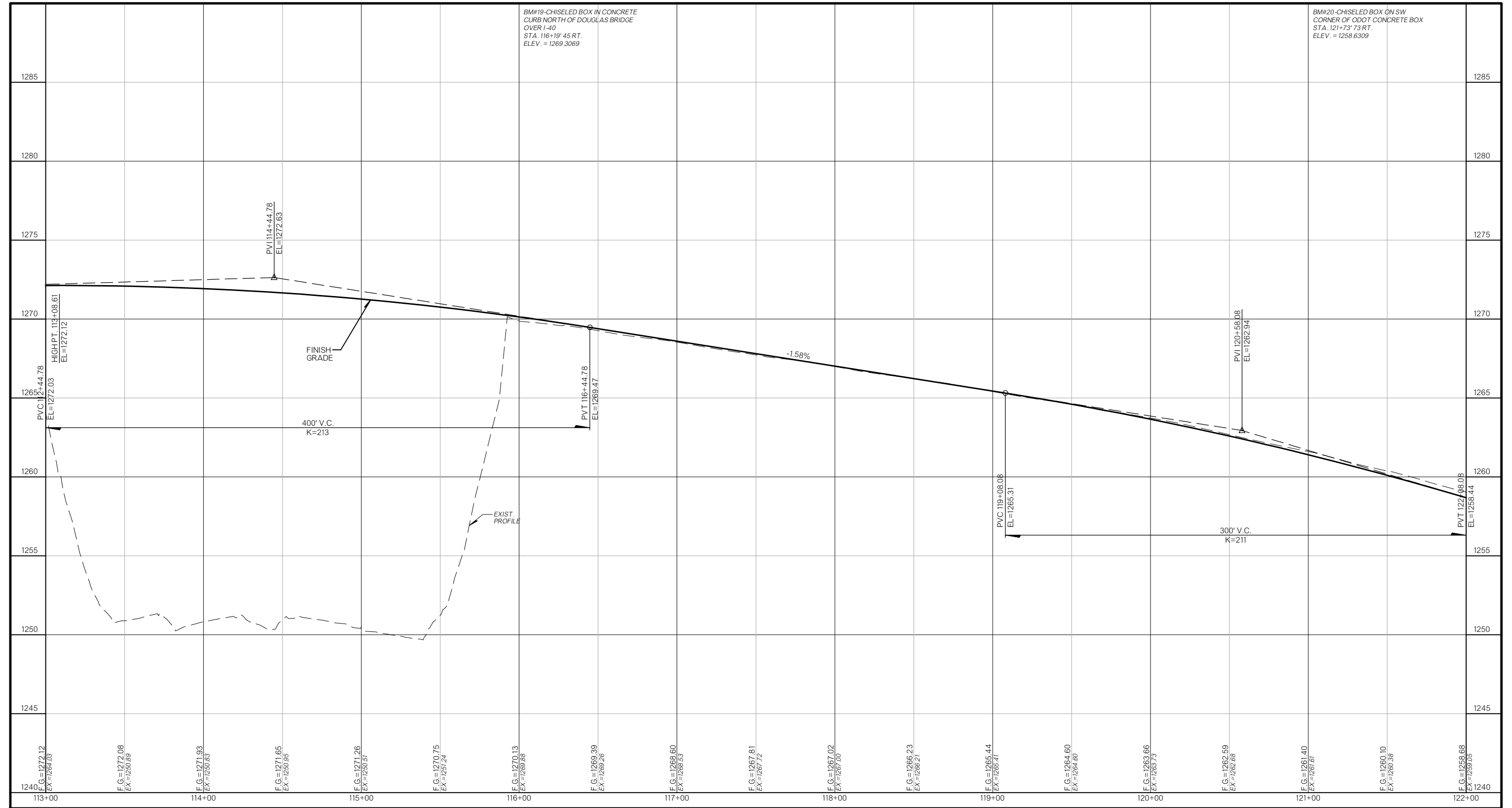


STA. 119+00 TO 123+00 RT.
15' X 20' RCP S.D.
I.E. ELEV. = 1259.88 & S = 1259.88



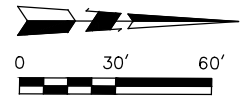
CAUTION
FIBER OPTIC

DOUGLAS BLVD.
113+00 TO 122+00



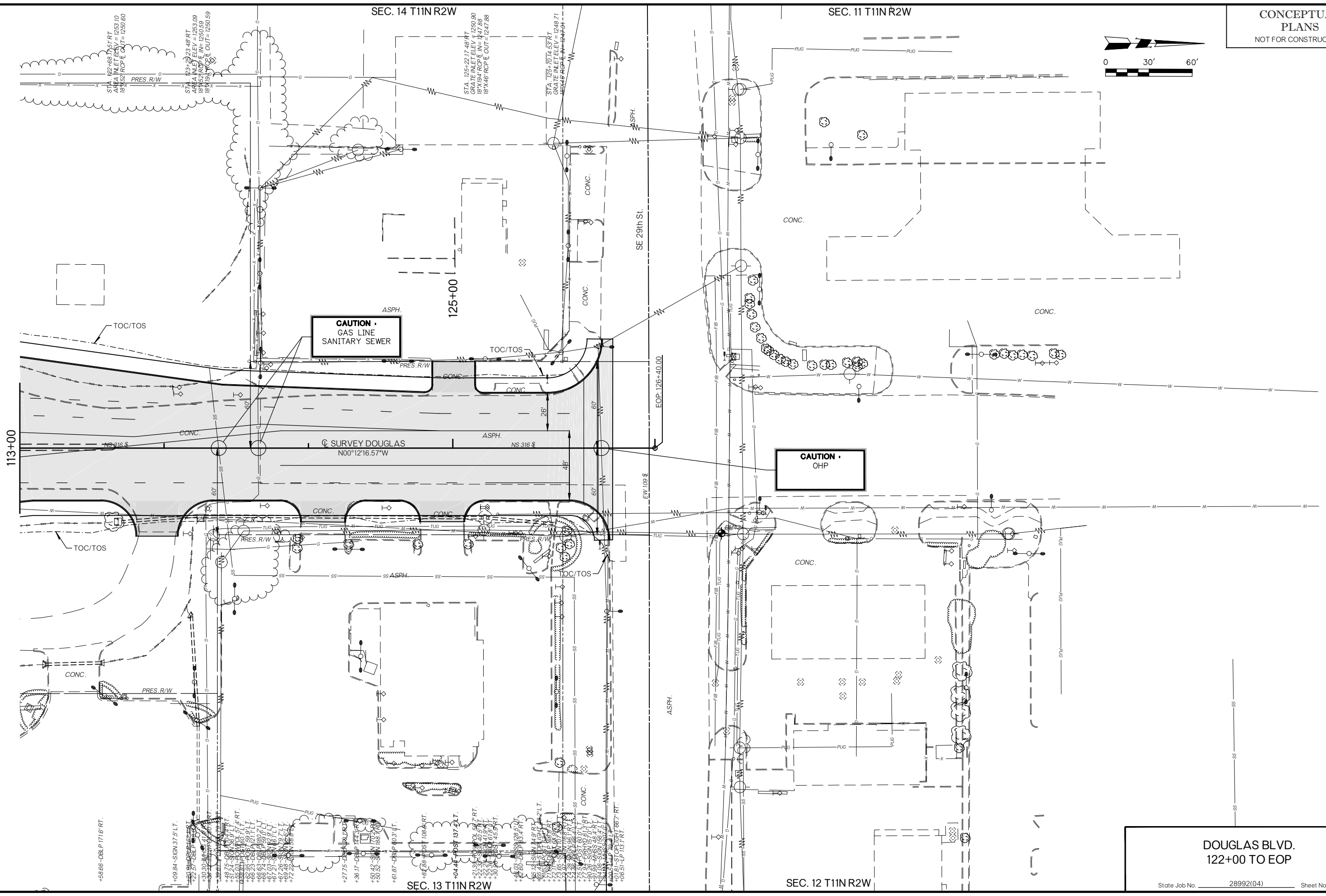
DOUGLAS BLVD.
113+00 TO 122+00

State Job No. 28992(04) Sheet No. 23



SEC. 14 T11N R2W

SEC. 11 T11N R2W



CAUTION
GAS LINE
SANITARY SEWER

CAUTION
OHP

CL SURVEY DOUGLAS
N00°12'16.57"W

DOUGLAS BLVD.
122+00 TO EOP

+56.66 -DBLP 171.6 RT.

+09.84 -SIGN 37.5 LT.

+22.57 -DBLP 160.0 RT.

+30.30 -DBLP 160.0 RT.

+48.75 -DBLP 160.0 RT.

+50.03 -DBLP 160.0 RT.

+52.95 -DBLP 160.0 RT.

+56.66 -DBLP 160.0 RT.

+57.21 -DBLP 160.0 RT.

+59.49 -DBLP 160.0 RT.

+72.22 -DBLP 160.0 RT.

+27.75 -DBLP 160.0 RT.

+36.17 -DBLP 160.0 RT.

+50.42 -SIGN 70.0 RT.

+50.52 -SIGN 188.0 RT.

+61.87 -DBLP 160.0 RT.

+84.38 -DBLP 108.0 RT.

+04.46 -DBLP 137.0 LT.

+21.93 -DBLP 160.0 RT.

+23.25 -DBLP 160.0 RT.

+25.25 -DBLP 160.0 RT.

+30.30 -DBLP 160.0 RT.

+46.03 -DBLP 160.0 RT.

+61.87 -DBLP 160.0 RT.

+65.15 -SIGN 160.0 RT.

+67.44 -SIGN 160.0 RT.

+72.22 -DBLP 160.0 RT.

+77.94 -DBLP 160.0 RT.

+80.26 -SIGN 160.0 RT.

+89.70 -SIGN 160.0 RT.

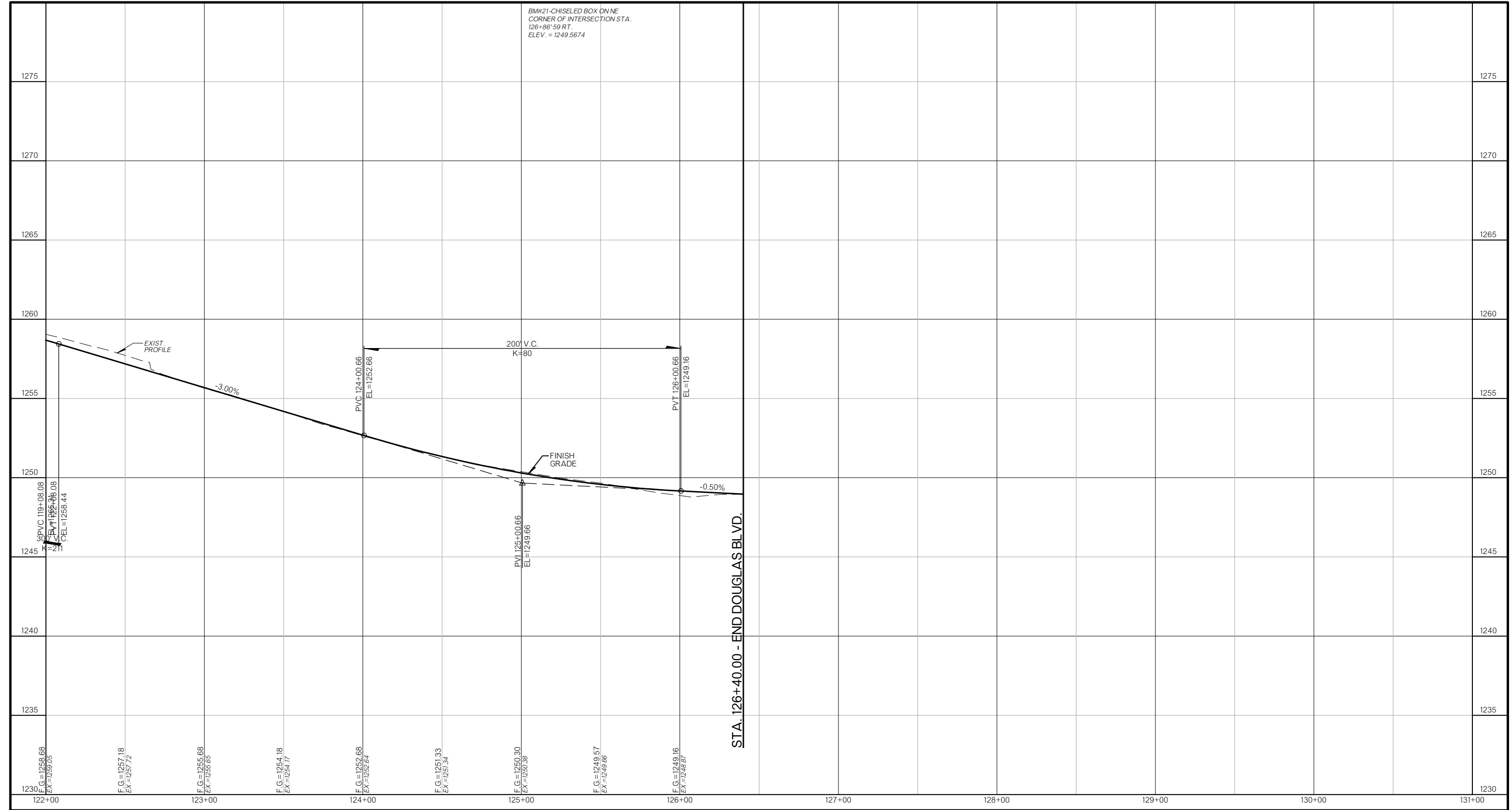
+94.48 -SIGN 160.0 RT.

+101.81 -SIGN 160.0 RT.

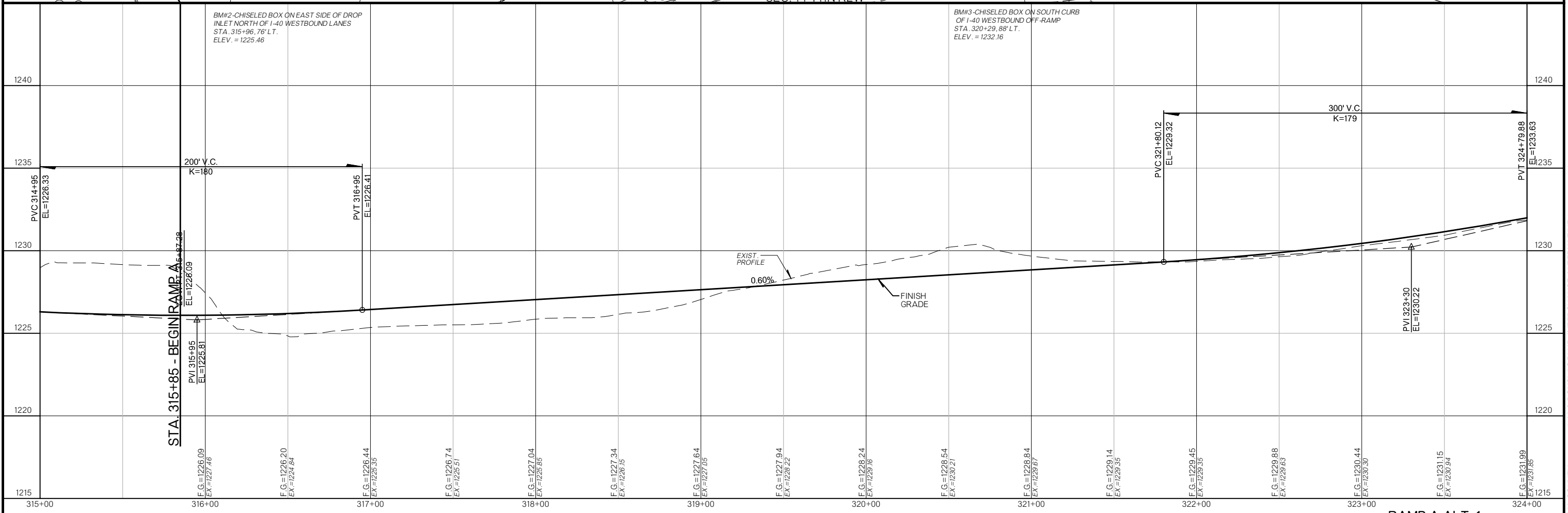
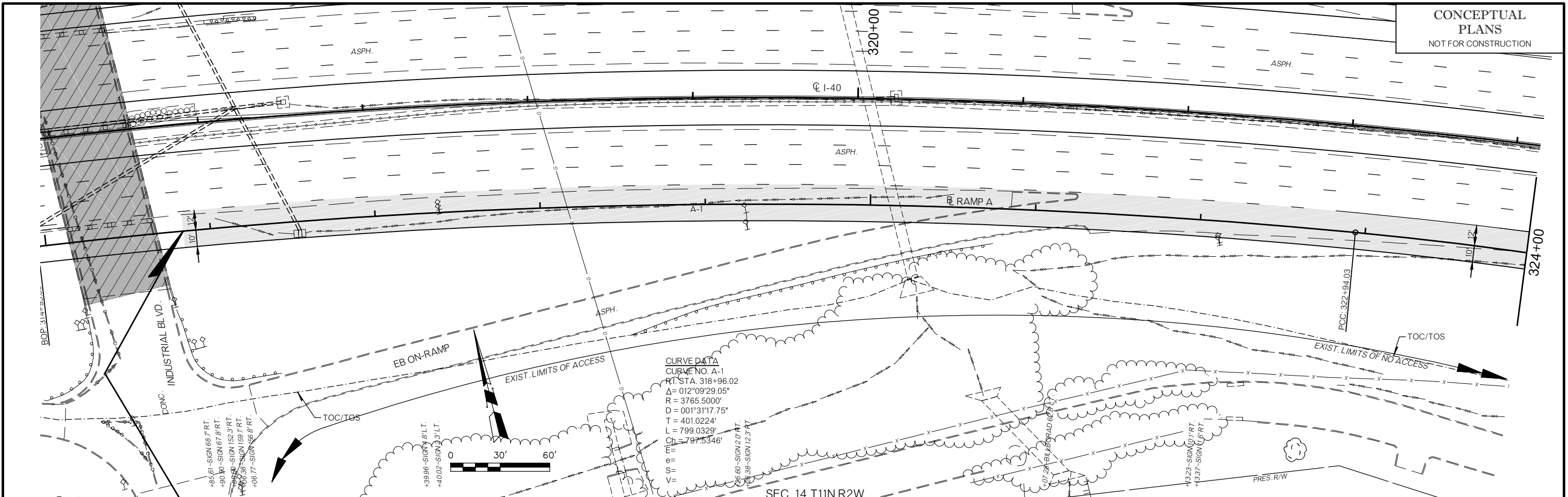
+106.51 -LP 113.7 RT.

SEC. 13 T11N R2W

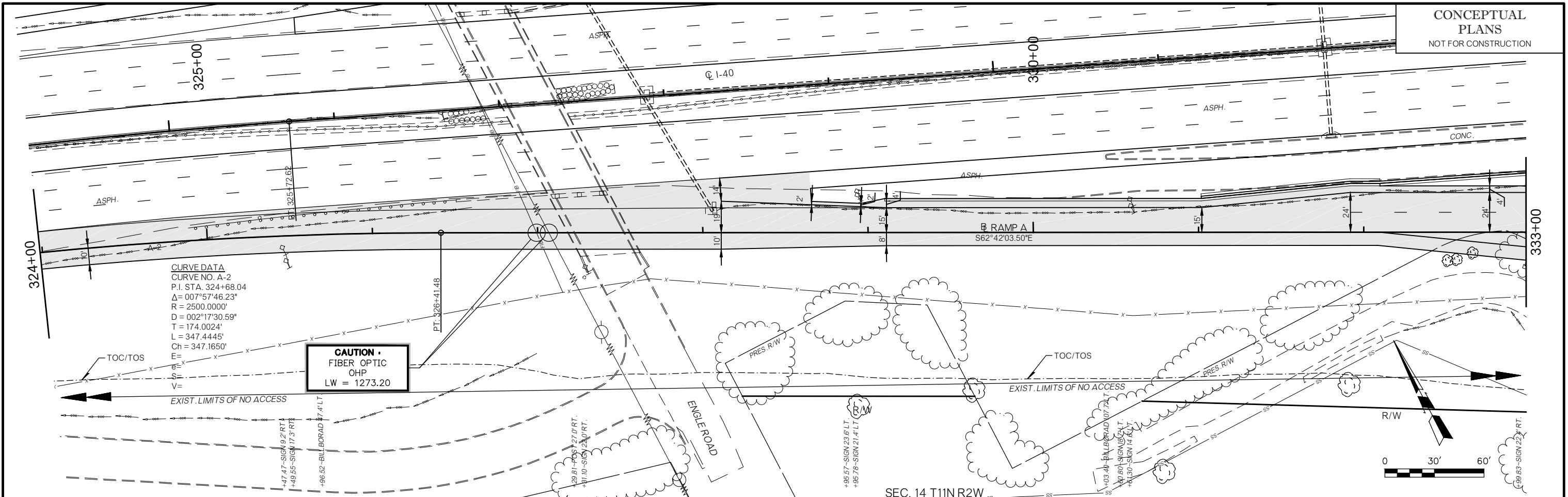
SEC. 12 T11N R2W



DOUGLAS BLVD.
122+00 TO EOP

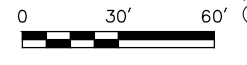


RAMP A ALT. 1

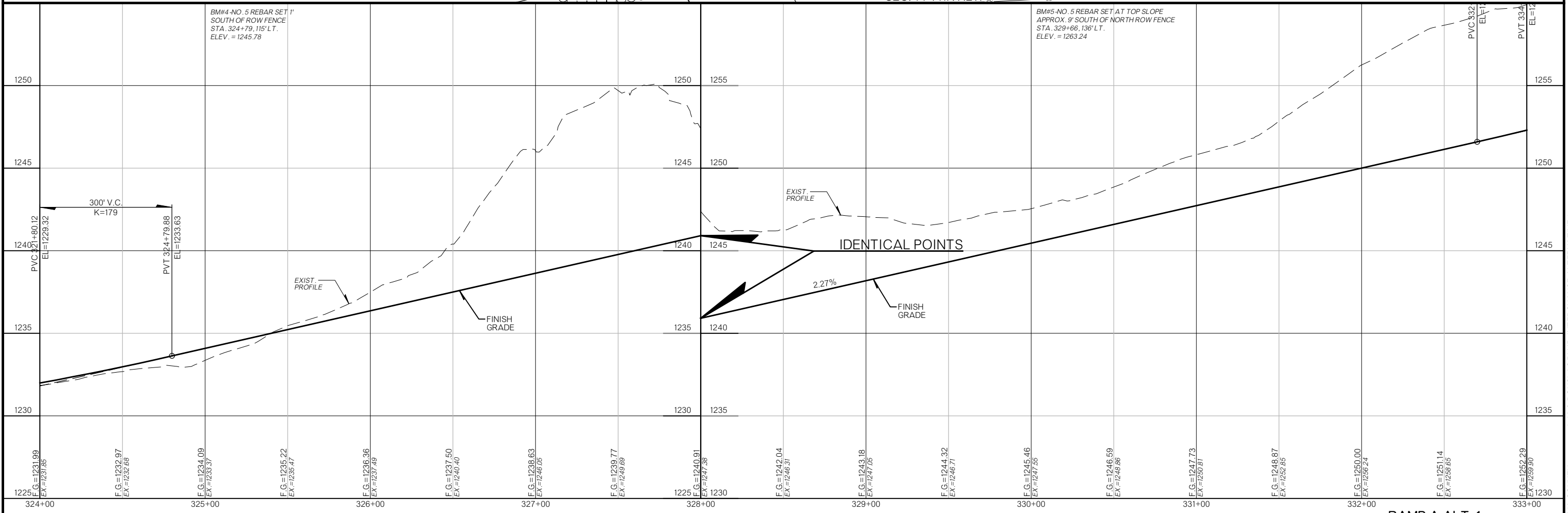


CURVE DATA
 CURVE NO. A-2
 P.I. STA. 324+68.04
 $\Delta = 007^{\circ}57'46.23''$
 $R = 2500.0000'$
 $D = 002^{\circ}17'30.59''$
 $T = 174.0024'$
 $L = 347.4445'$
 $Ch = 347.1650'$
 $E =$
 $S =$
 $V =$

CAUTION - FIBER OPTIC OHP
 LW = 1273.20



SEC. 14 T11N R2W

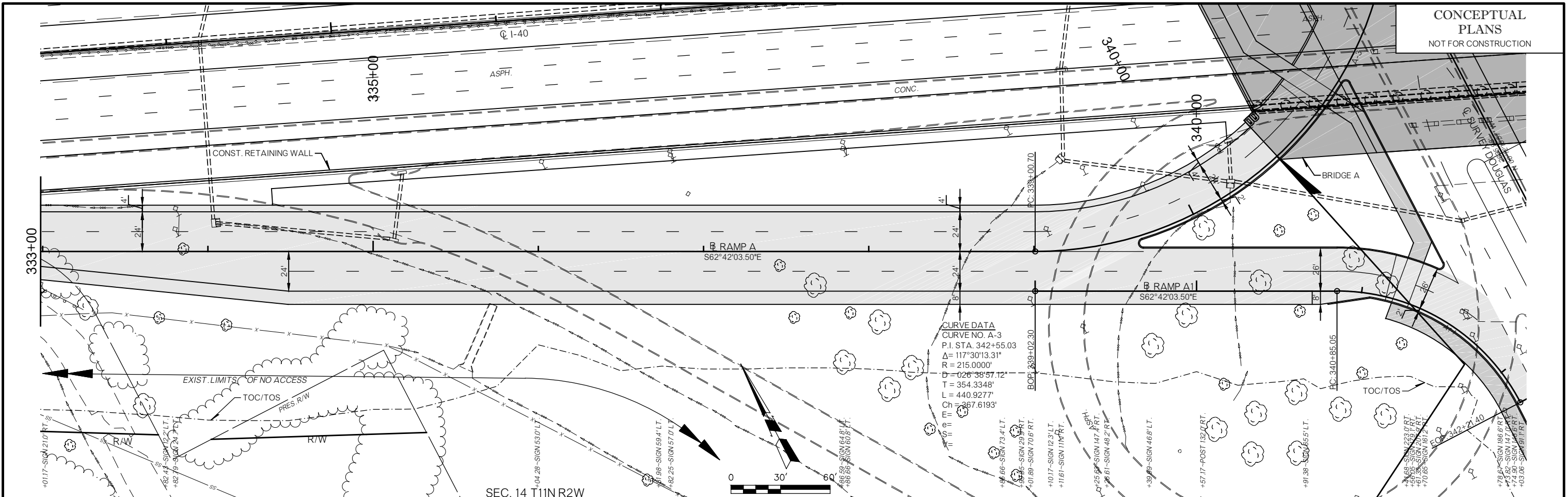


BM#4-NO. 5 REBAR SET 1' SOUTH OF ROW FENCE STA. 324+79.115' LT. ELEV. = 1245.78

BM#5-NO. 5 REBAR SET AT TOP SLOPE APPROX. 9' SOUTH OF NORTH ROW FENCE STA. 329+66.136' LT. ELEV. = 1263.24

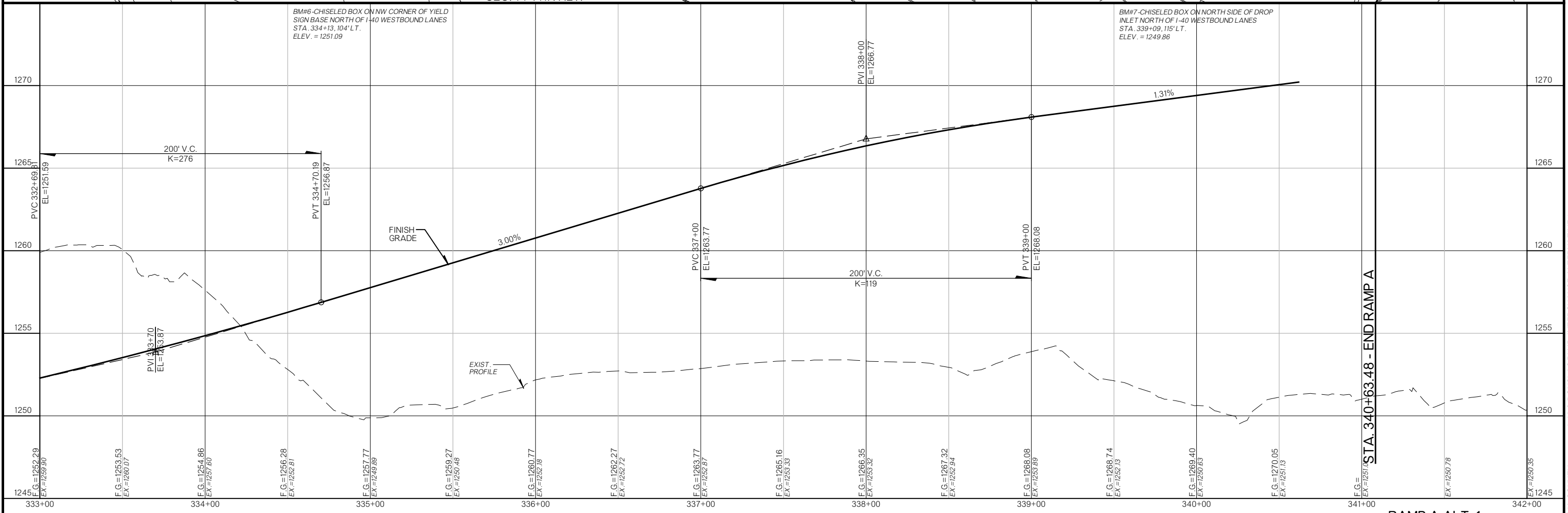
1225	F.G. = 1231.99 EX = 1237.66	324+00	F.G. = 1232.97 EX = 1232.68	325+00	F.G. = 1234.09 EX = 1237.37	326+00	F.G. = 1235.22 EX = 1236.47	327+00	F.G. = 1236.36 EX = 1237.49	328+00	F.G. = 1237.50 EX = 1240.40	329+00	F.G. = 1238.63 EX = 1246.65	330+00	F.G. = 1239.77 EX = 1249.69	331+00	F.G. = 1240.91 EX = 1247.38	332+00	F.G. = 1242.04 EX = 1246.31	333+00	F.G. = 1243.18 EX = 1247.65
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RAMP A ALT. 1



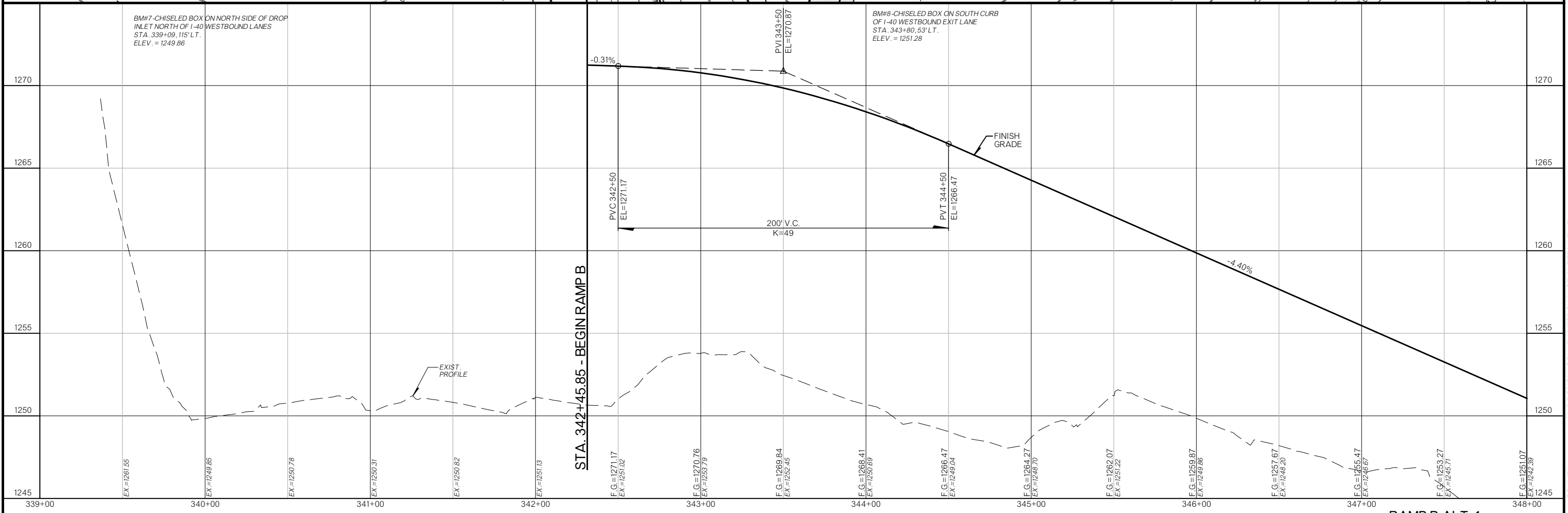
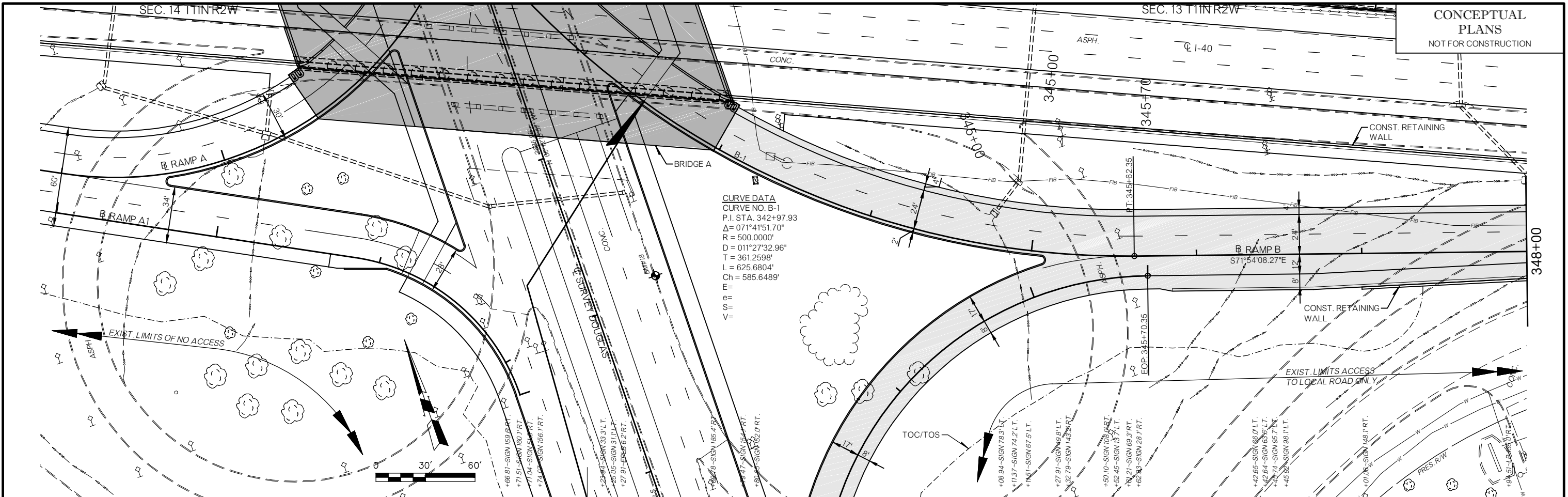
SEC. 14 T11N R2W

CURVE DATA
 CURVE NO. A-3
 P.I. STA. 342+55.03
 $\Delta = 117^{\circ}30'13.31''$
 $R = 215.0000'$
 $D = 026^{\circ}38'57.12''$
 $T = 354.3348'$
 $L = 440.9277'$
 $Ch = 267.6193'$



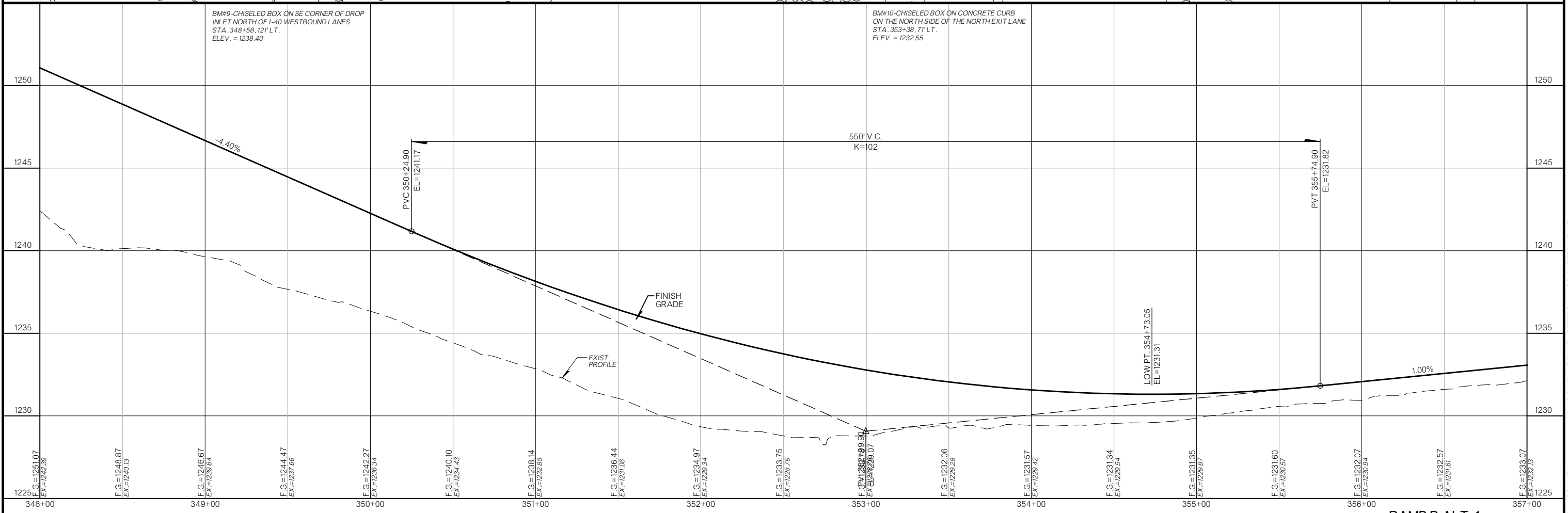
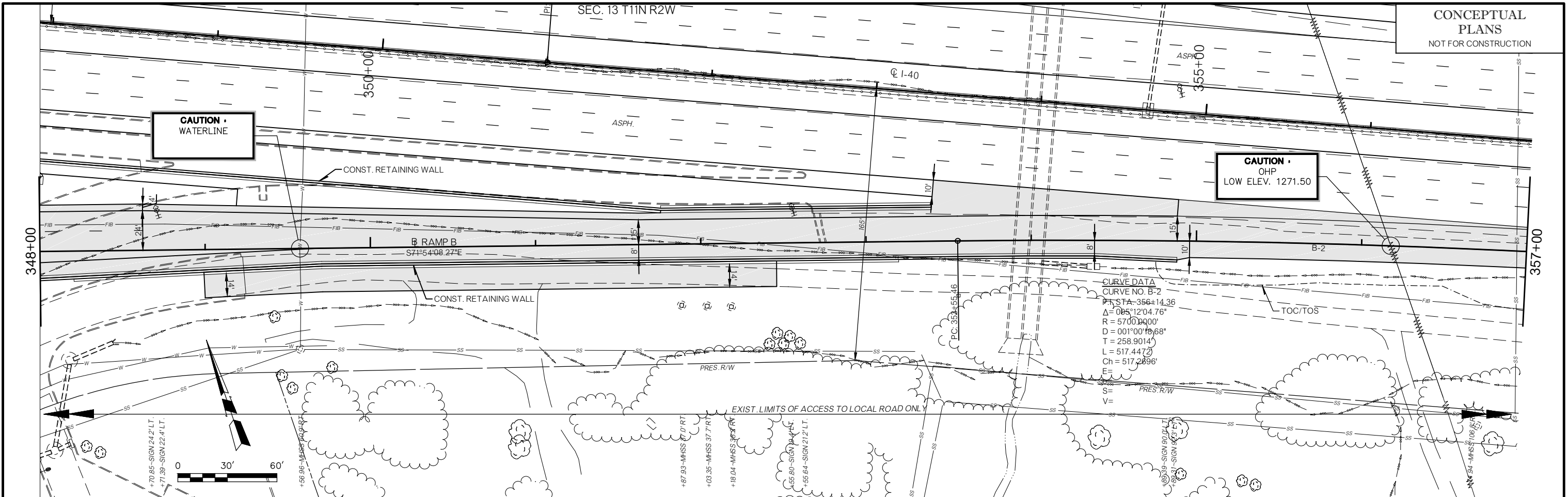
STA. 340+63.48 - END RAMP A

RAMP A ALT. 1

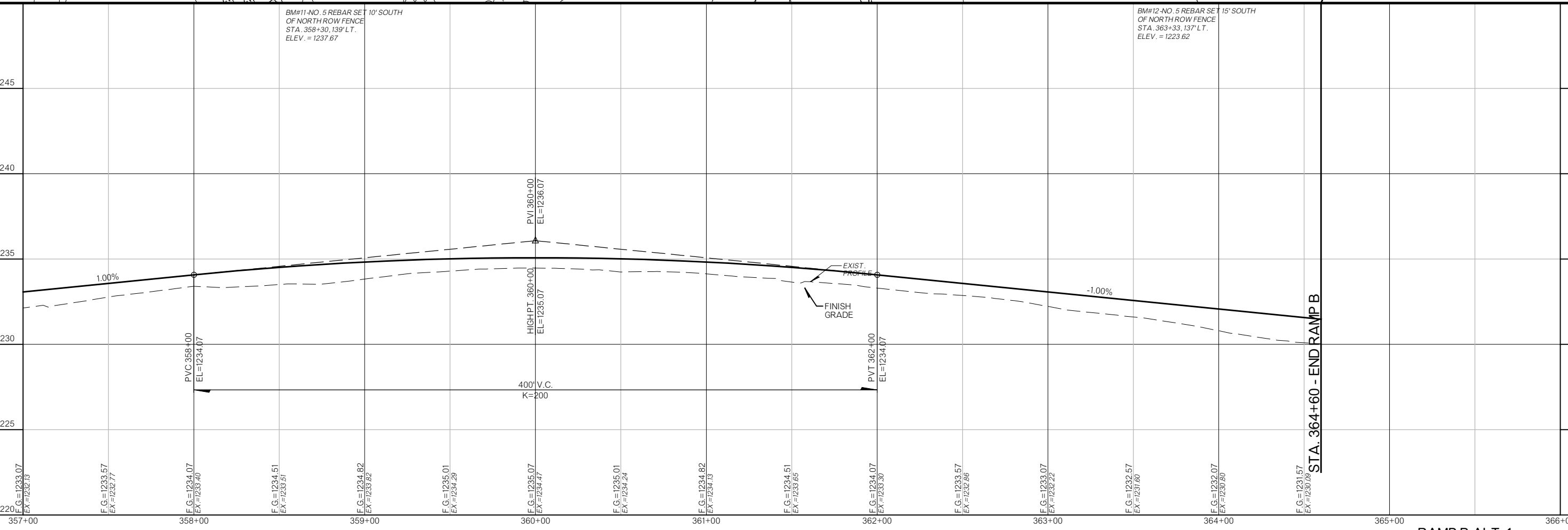
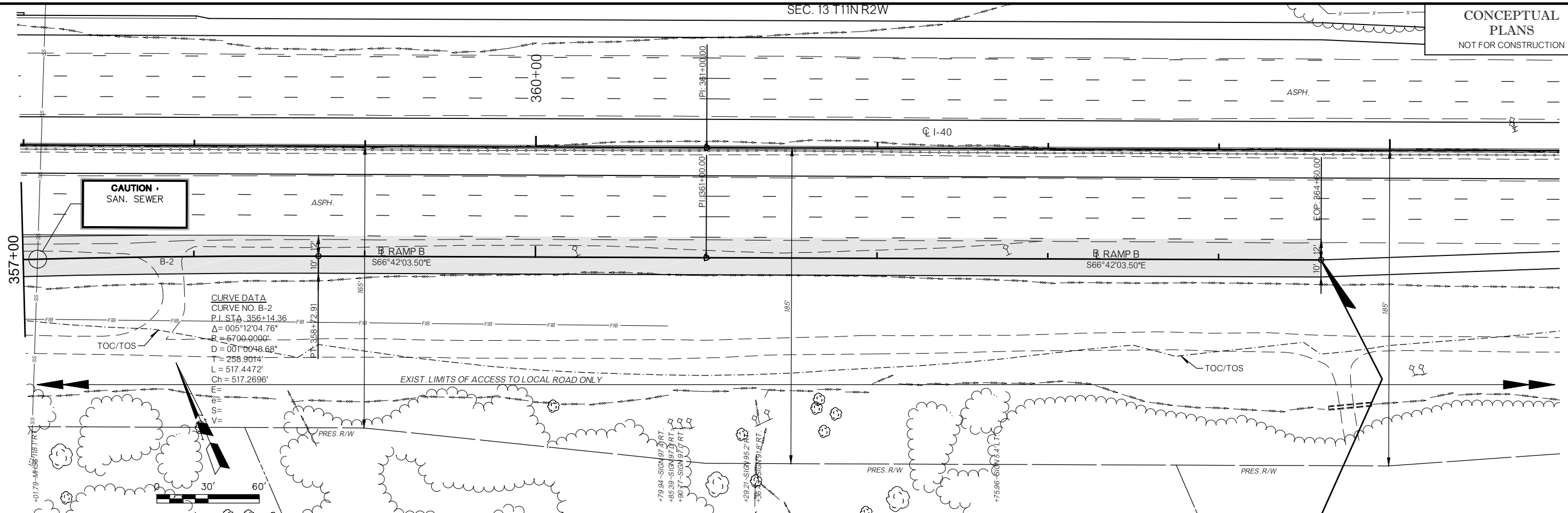


STA. 342+45.85 - BEGIN RAMP B

RAMP B ALT. 1

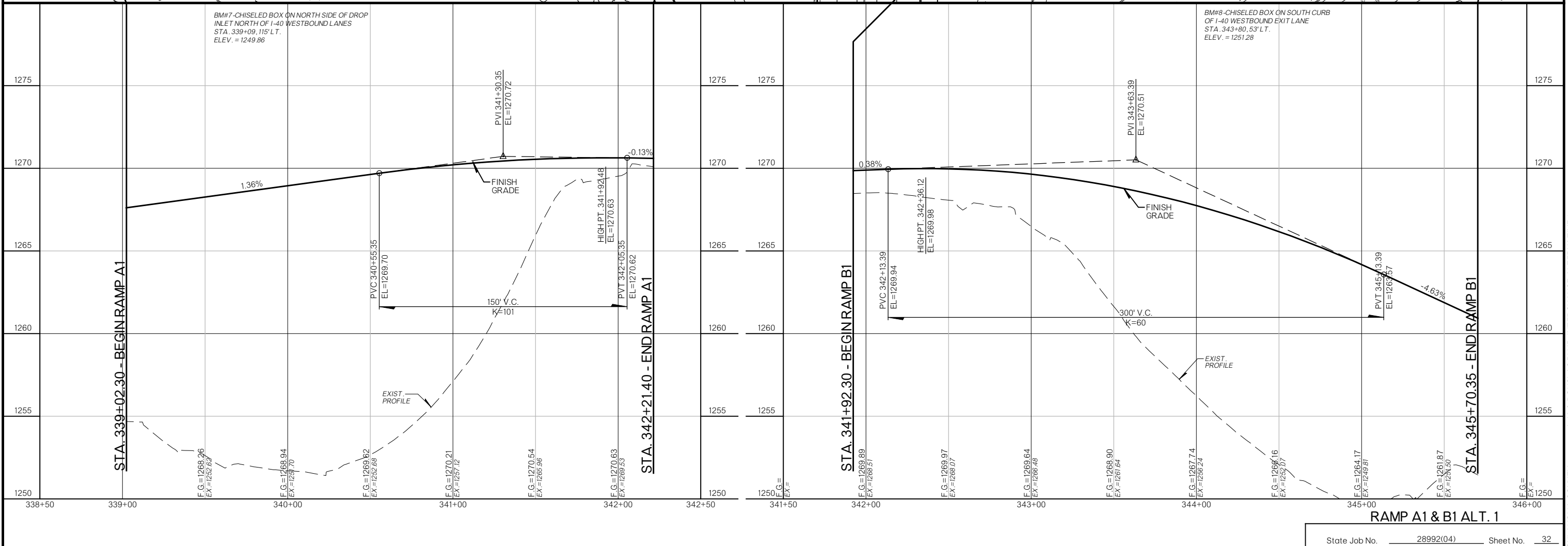
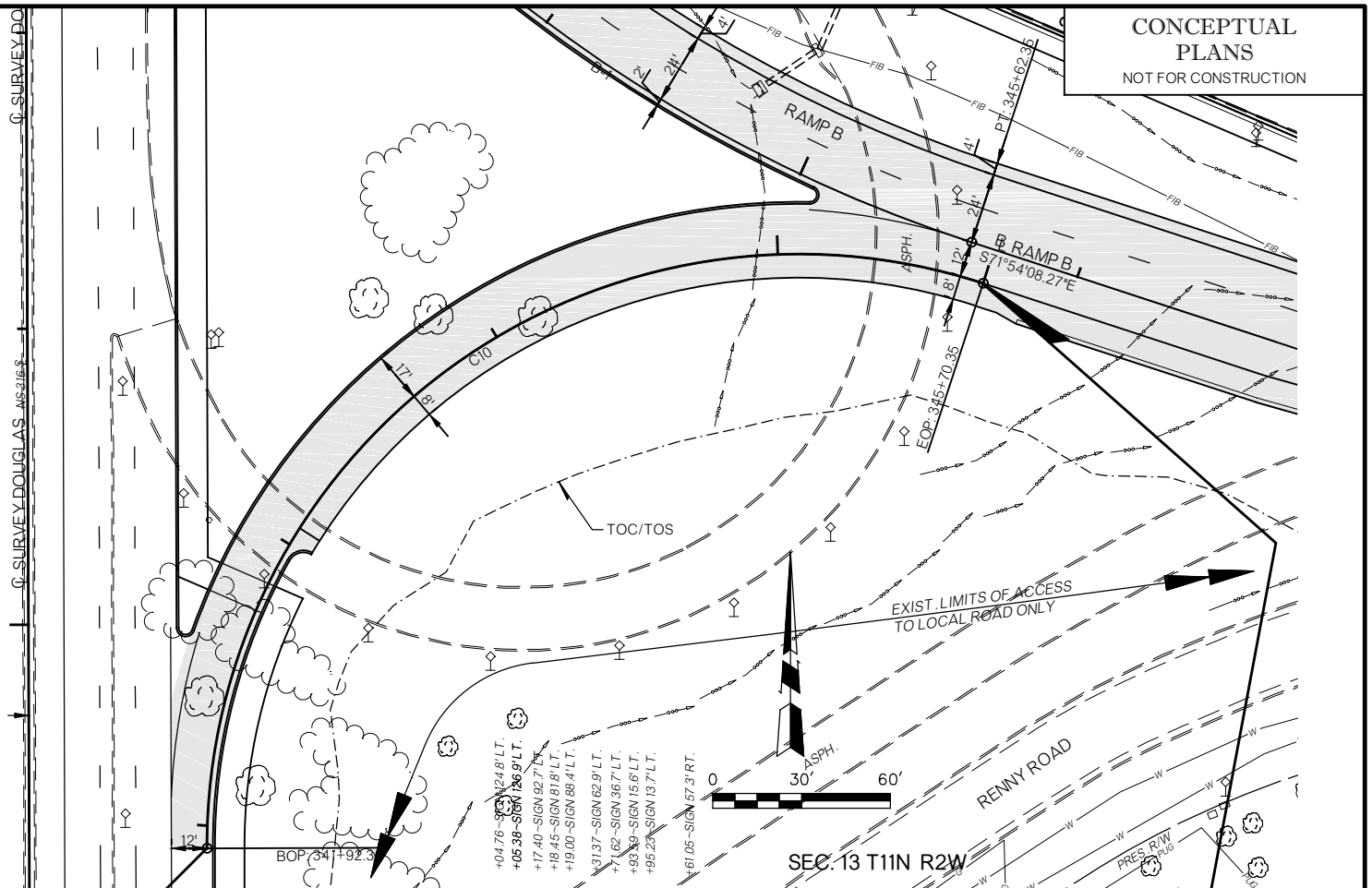
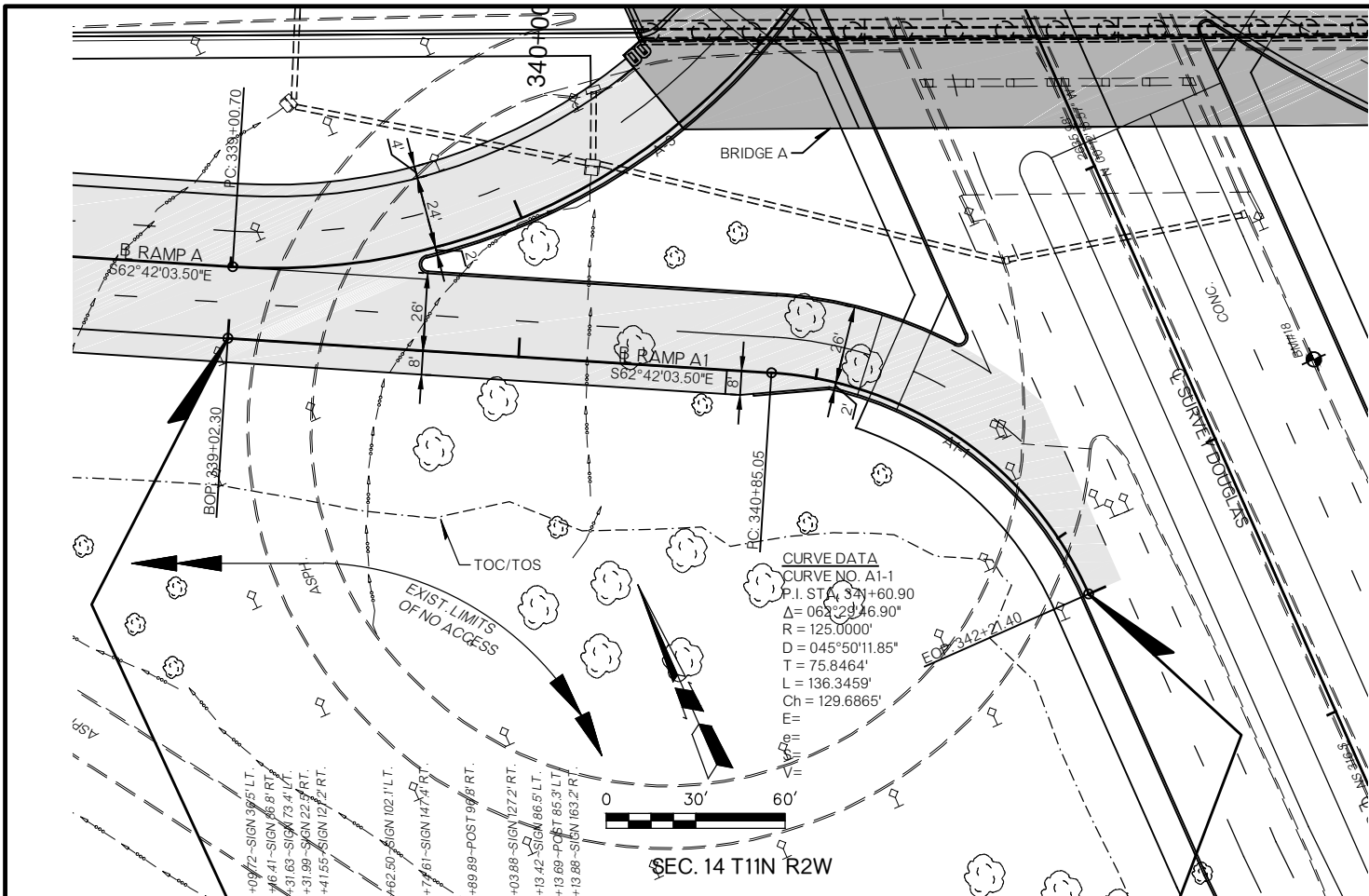


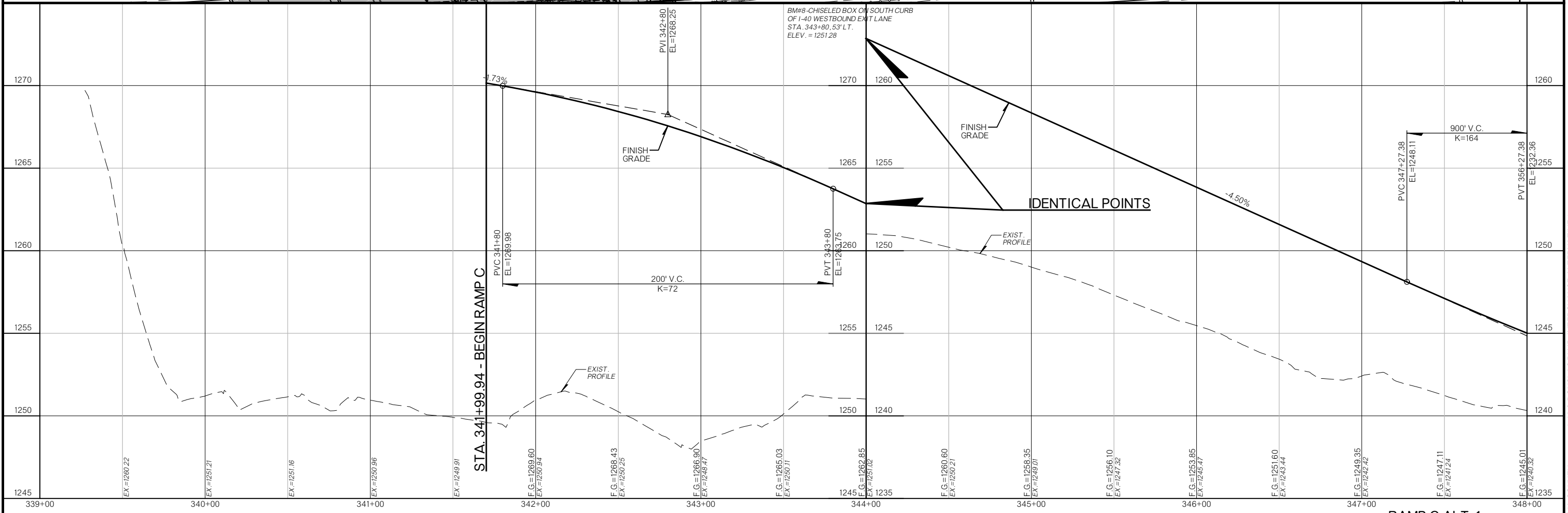
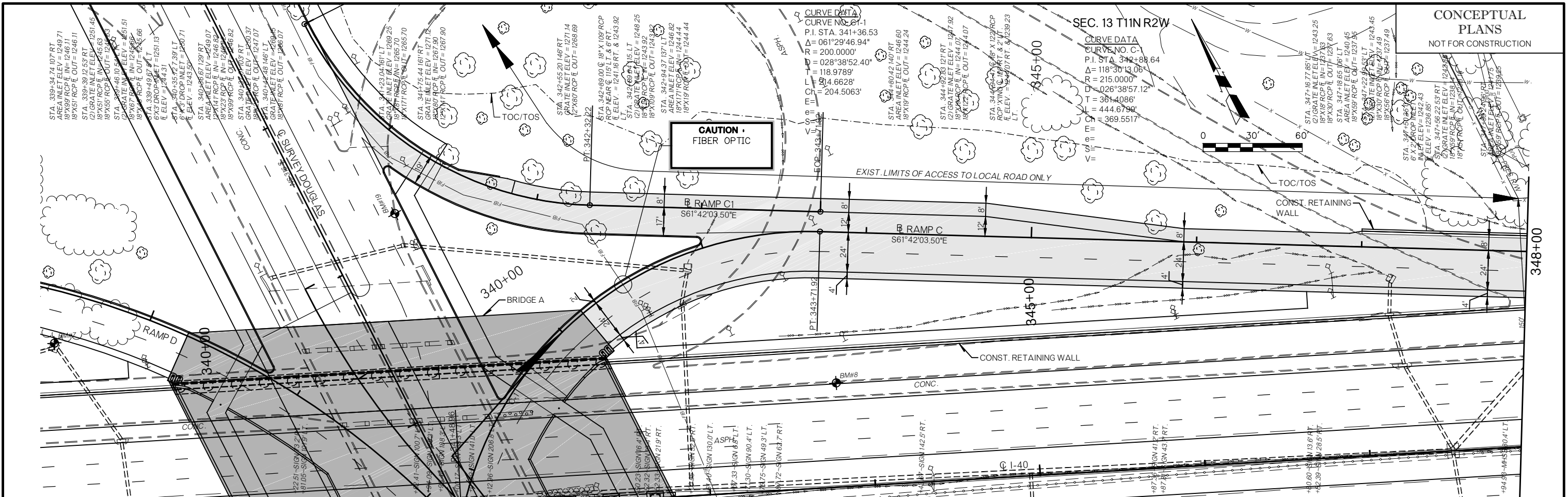
RAMP B ALT. 1



STA. 364+60 - END RAMP B

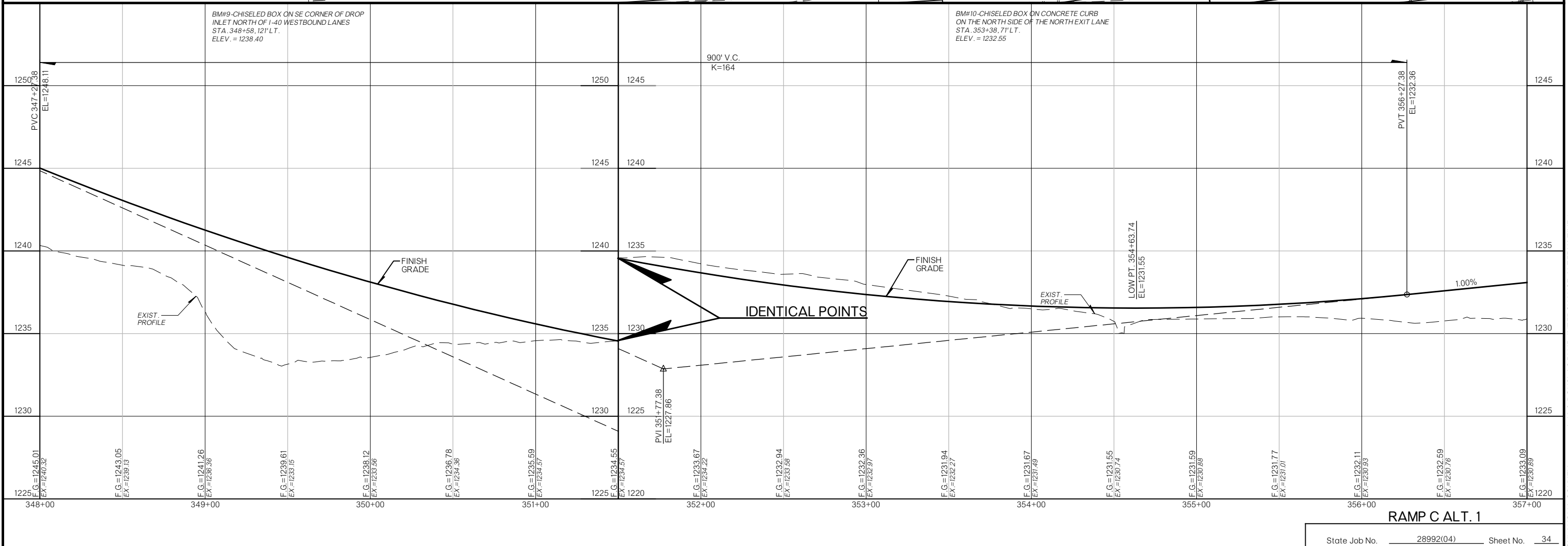
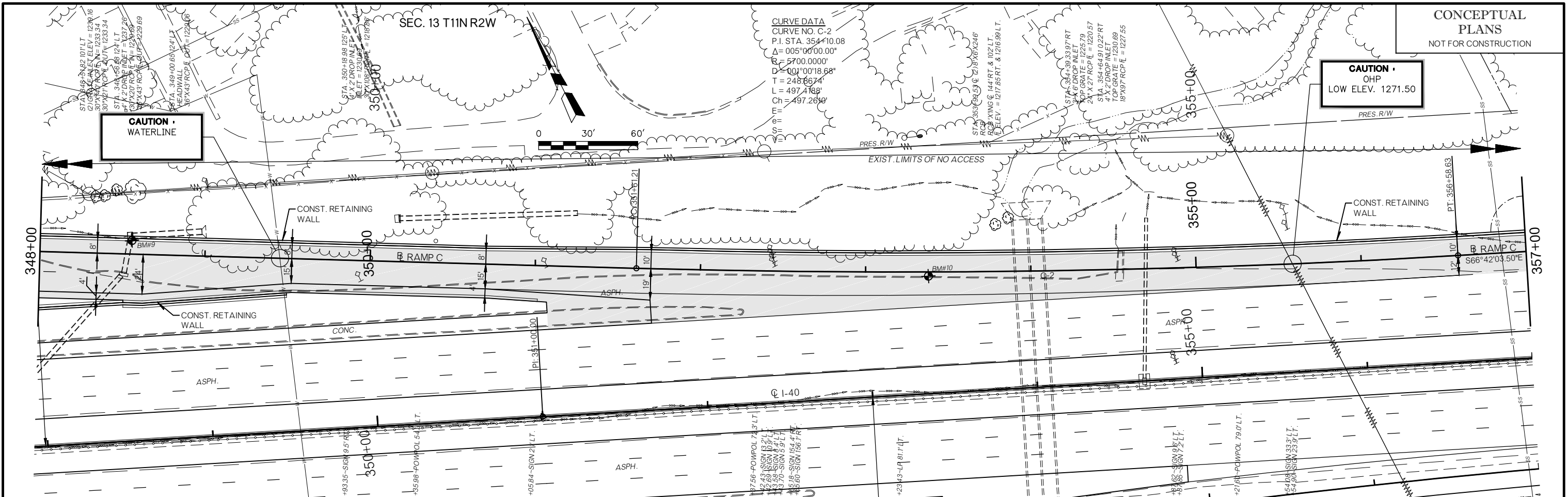
RAMP B ALT. 1





RAMP C ALT. 1

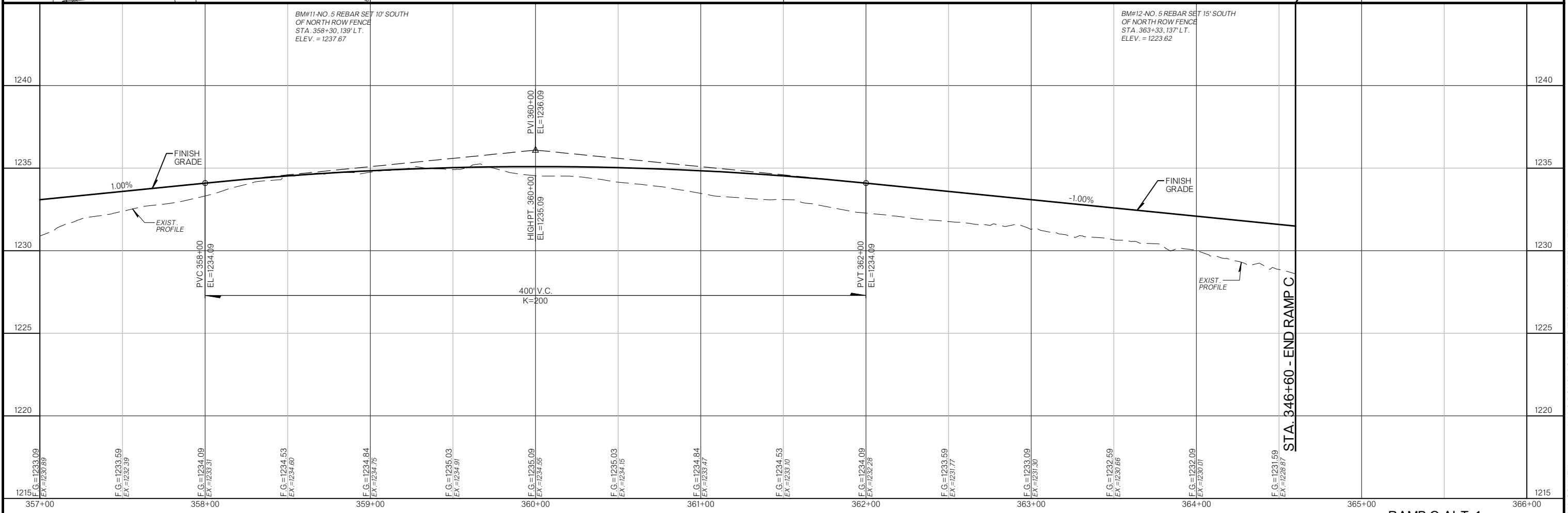
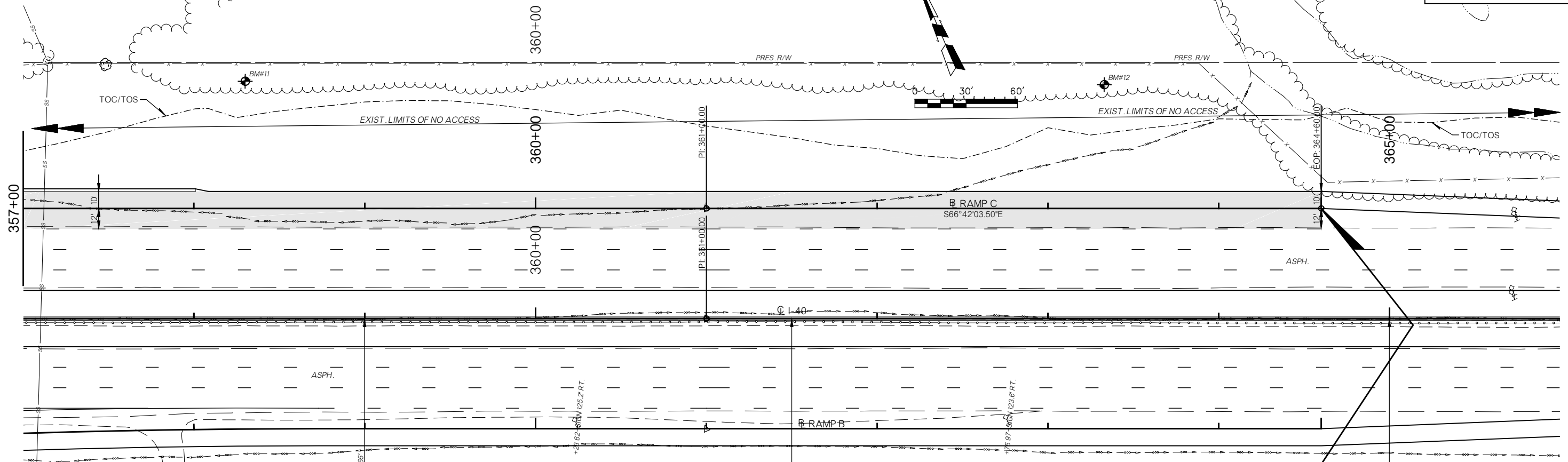
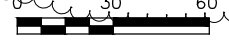
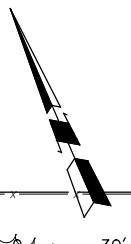
CONCEPTUAL PLANS
NOT FOR CONSTRUCTION



RAMP C ALT. 1

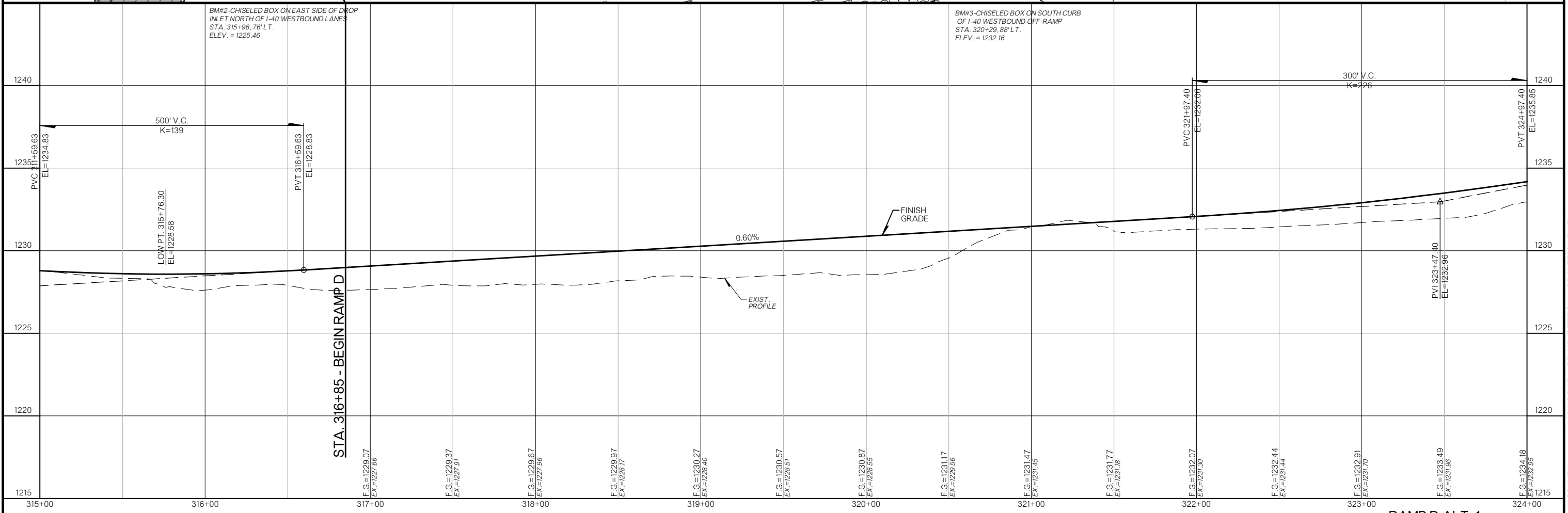
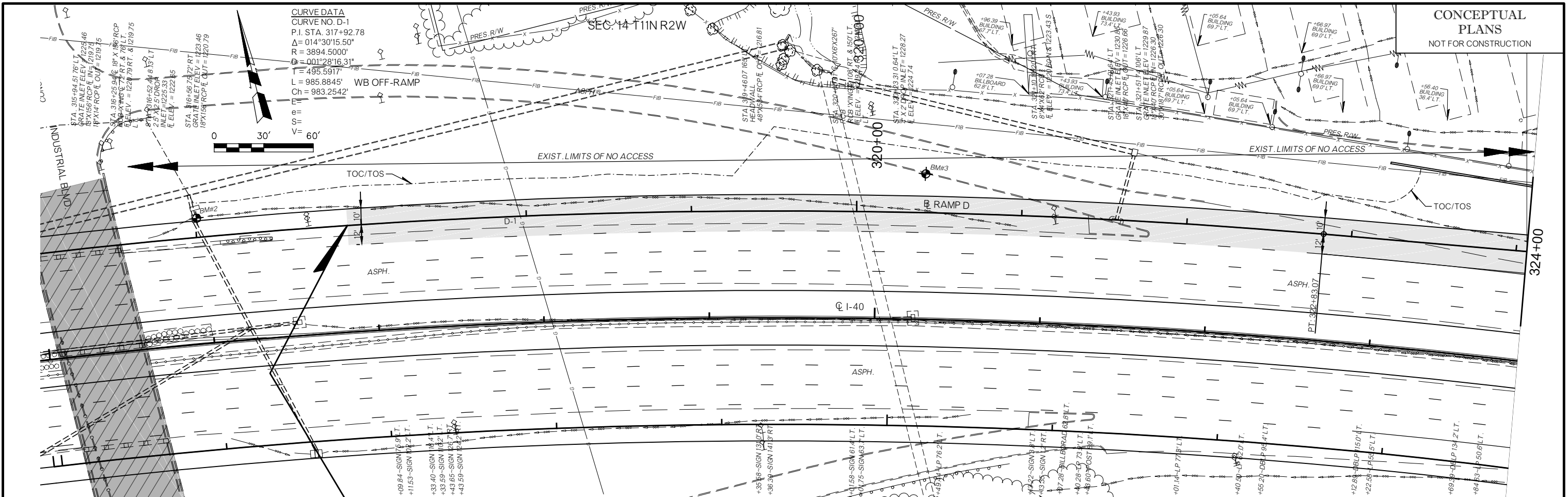
SEC. 13 T11N R2W

CONCEPTUAL PLANS
NOT FOR CONSTRUCTION

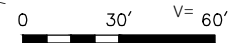


STA. 346+60 - END RAMP C

RAMP C ALT. 1



CURVE DATA
CURVE NO. D-1
P.I. STA. 317+92.78
Δ = 014°30'15.50"
R = 3894.5000'
Δ = 001°28'16.31"
L = 495.5917'
L = 985.8845'
Ch = 983.2542'



BM#2-CHISELED BOX ON EAST SIDE OF DROP
INLET NORTH OF I-40 WESTBOUND LANES
STA. 315+96.76' LT.
ELEV. = 1225.46

BM#3-CHISELED BOX ON SOUTH CURB
OF I-40 WESTBOUND OFF-RAMP
STA. 320+29.88' LT.
ELEV. = 1232.16

STA. 316+85 - BEGIN RAMP D

RAMP D ALT. 1

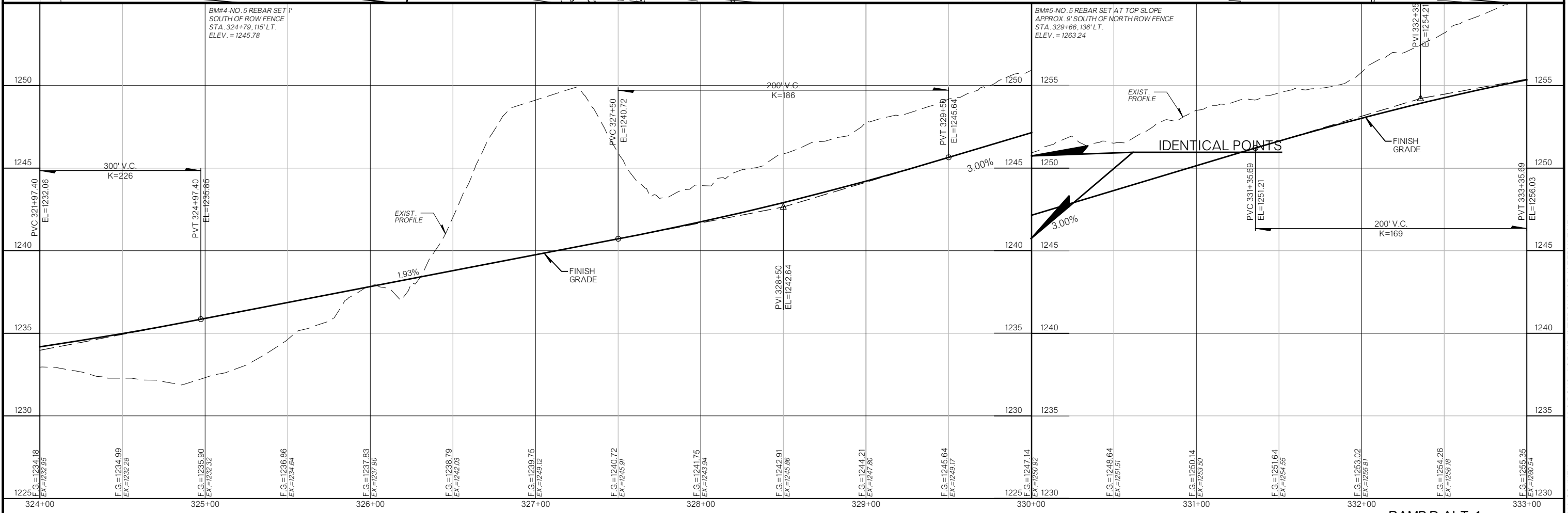
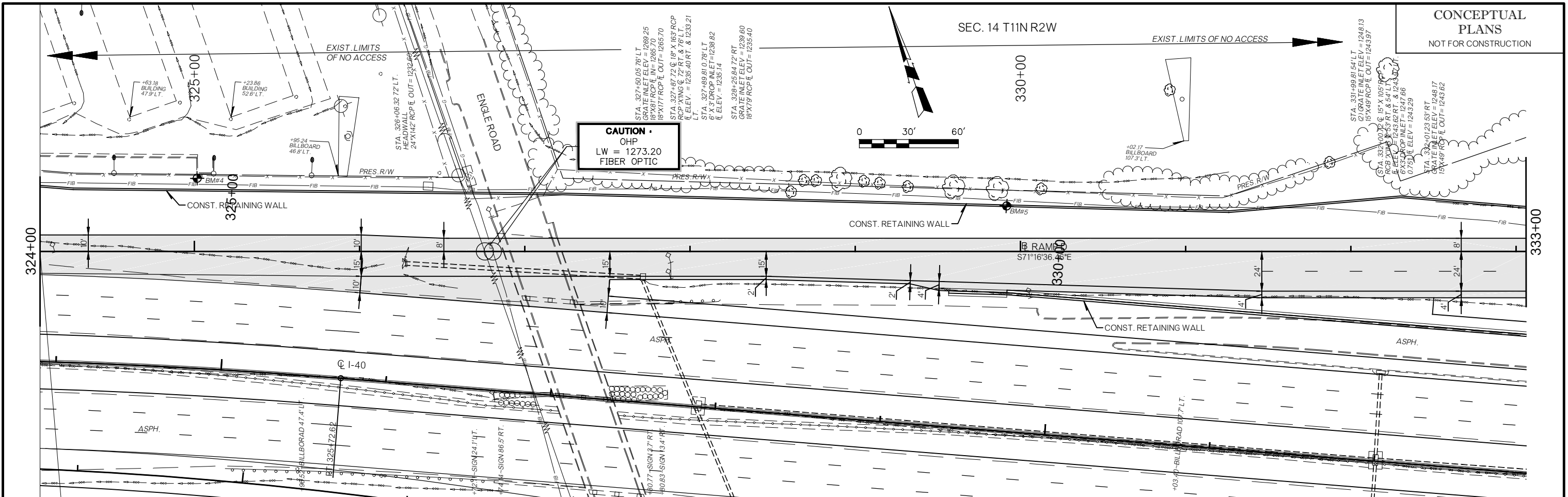
CONCEPTUAL PLANS
NOT FOR CONSTRUCTION

SEC. 14 T11N R2W

EXIST. LIMITS OF NO ACCESS



CAUTION
OHP
LW = 1273.20
FIBER OPTIC



BM#4 NO. 5 REBAR SET 1' SOUTH OF ROW FENCE
STA. 324+79.115' LT.
ELEV. = 1245.78

BM#5 NO. 5 REBAR SET AT TOP SLOPE
APPROX. 9' SOUTH OF NORTHROW FENCE
STA. 329+66.136' LT.
ELEV. = 1263.24

RAMP D ALT. 1

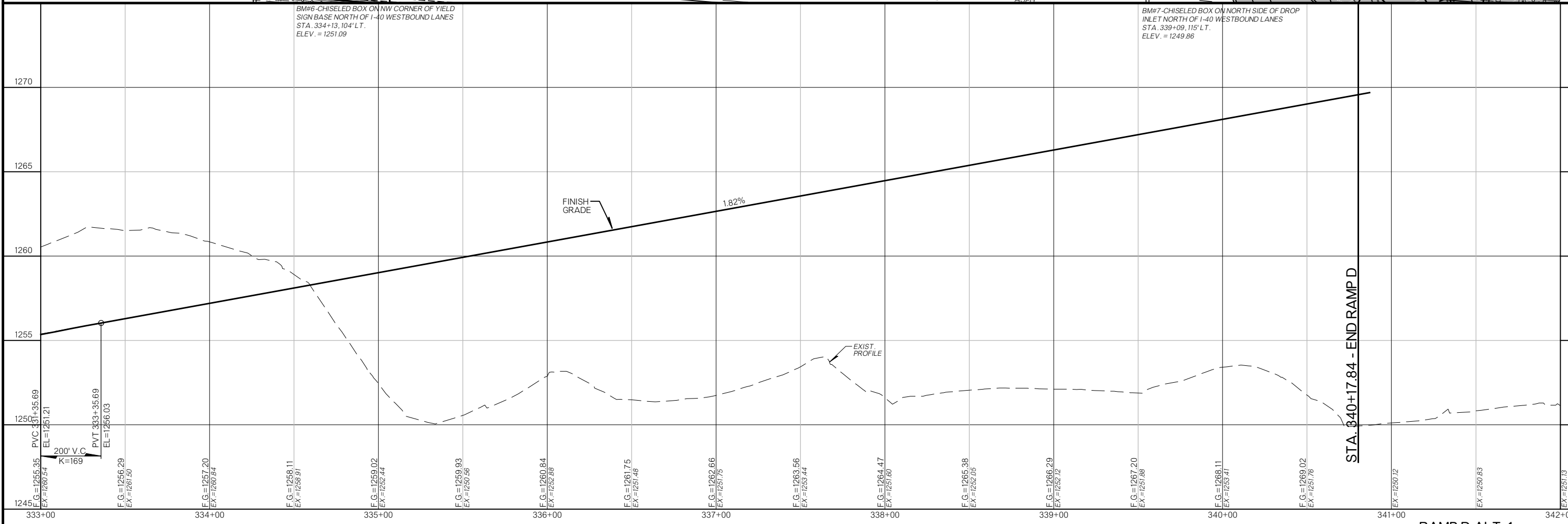
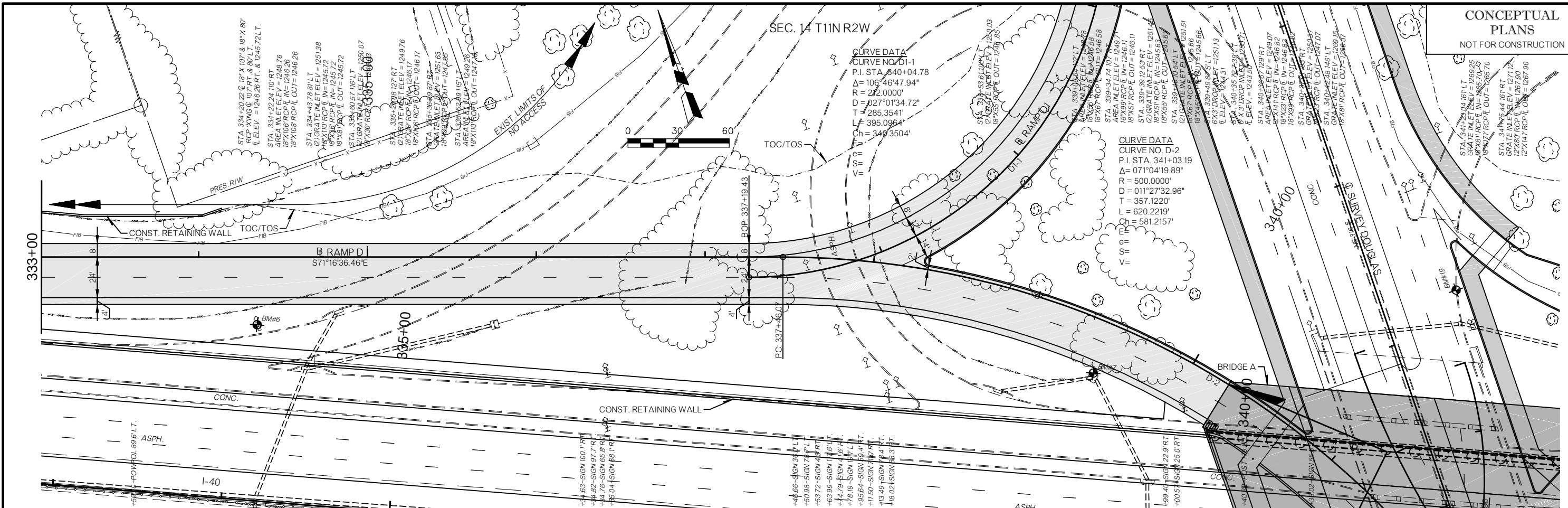
SEC. 14 T11N R2W

CURVE DATA
 CURVE NO. D-1
 P.I. STA. 340+04.78
 $\Delta = 106^{\circ}46'47.94"$
 R = 272.0000'
 $D = 027^{\circ}01'34.72"$
 T = 285.3541'
 L = 395.0964'
 Ch = 349.3504'

CURVE DATA
 CURVE NO. D-2
 P.I. STA. 341+03.19
 $\Delta = 071^{\circ}04'19.89"$
 R = 500.0000'
 $D = 011^{\circ}27'32.96"$
 T = 357.1220'
 L = 620.2219'
 Ch = 581.2157'

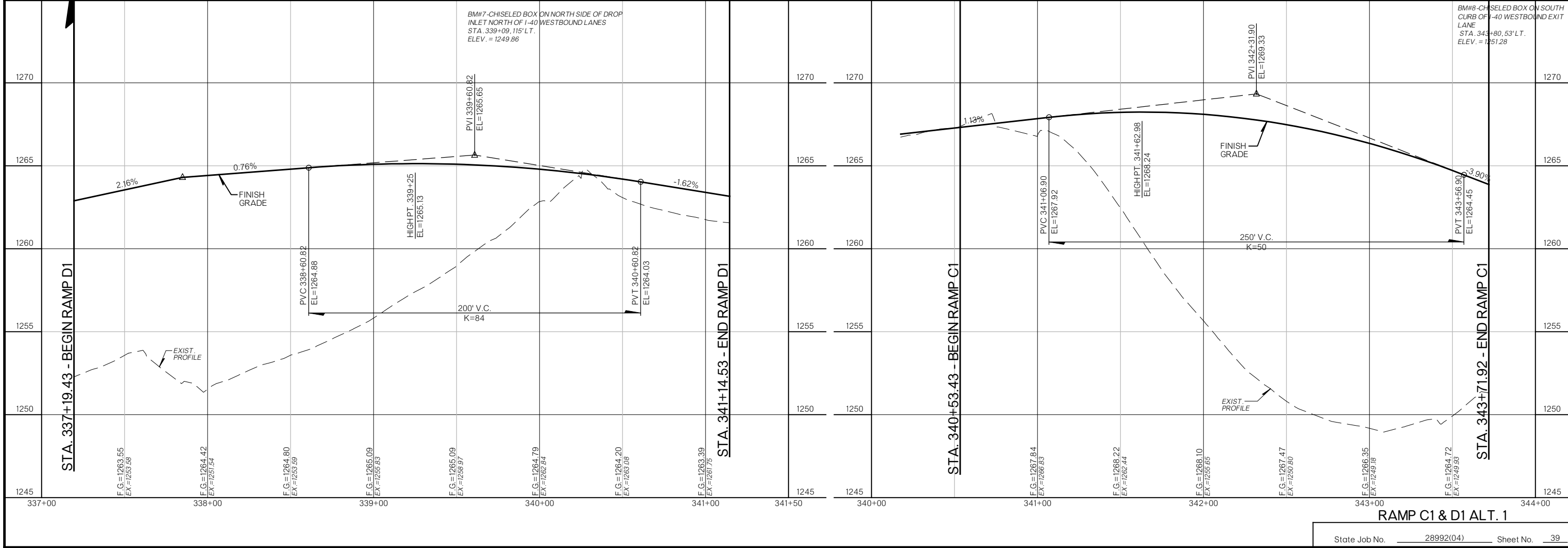
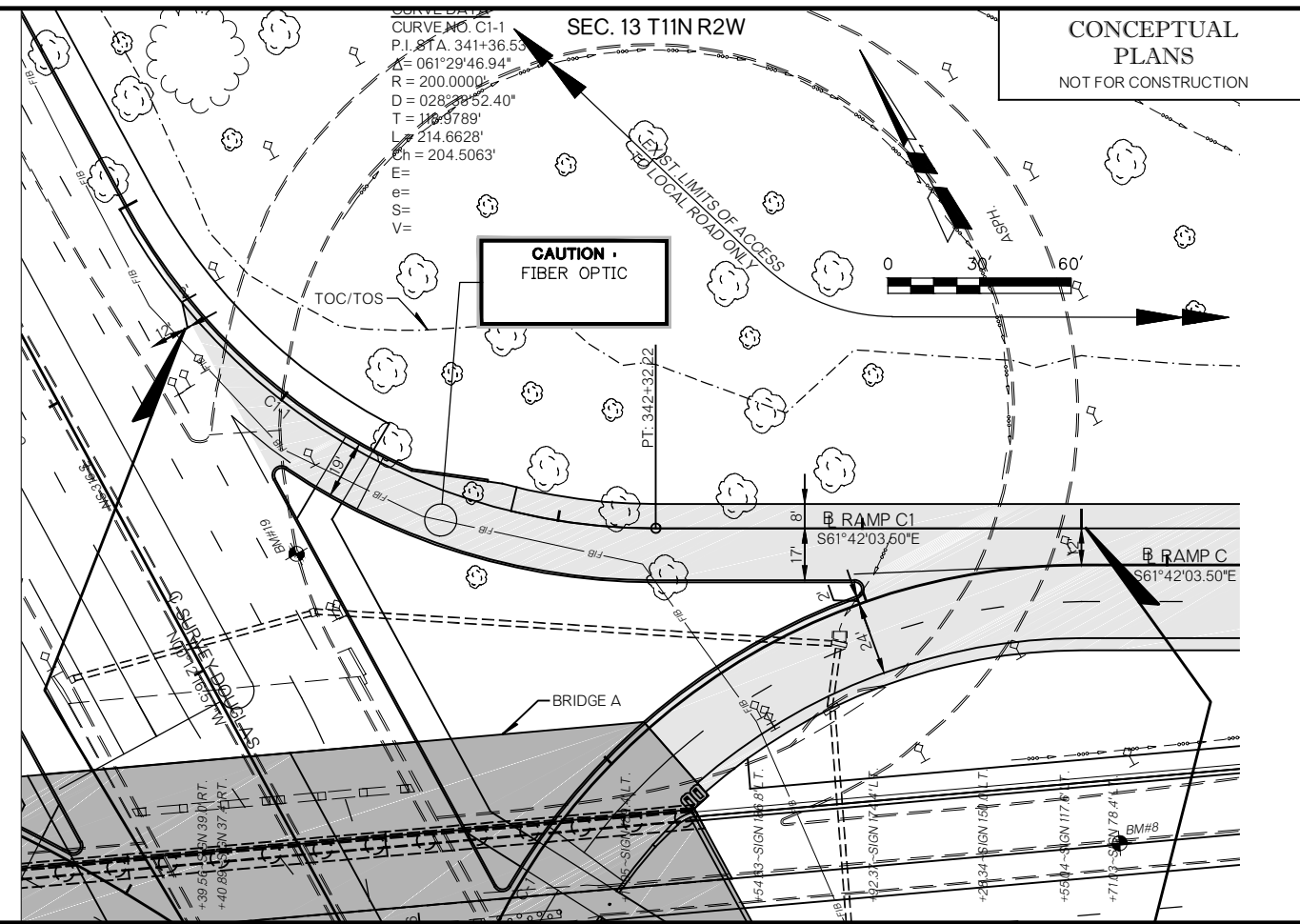
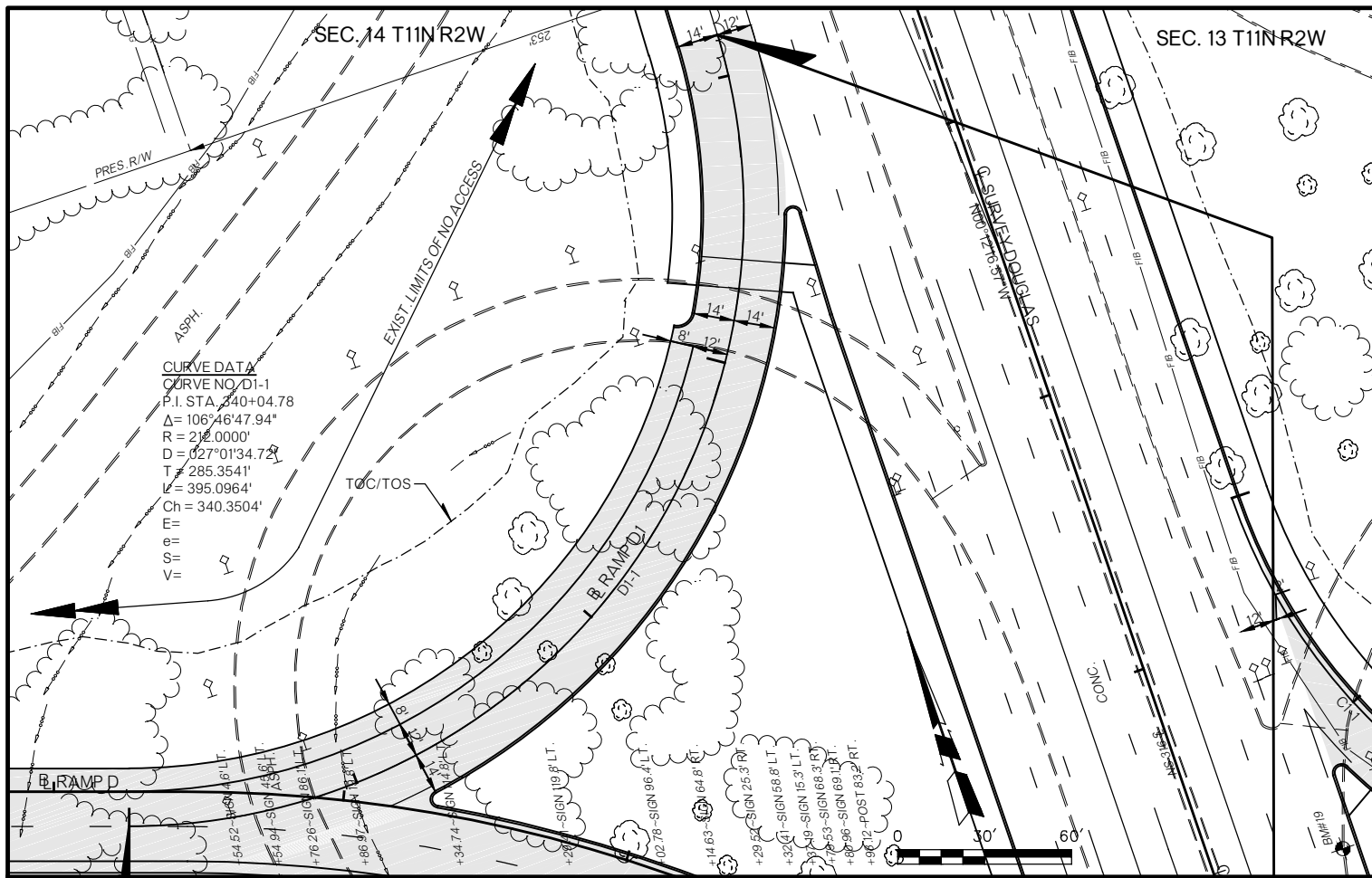
STA. 341+25.04 161' LT.
 GRATE INLET ELEV. = 1269.25
 18'X18' RCP E. IN = 1265.74
 18'X18' RCP E. OUT = 1265.70

STA. 341+75.44 161' RT.
 GRATE INLET ELEV. = 1271.12
 12'X18' RCP E. IN = 1267.90
 12'X11' RCP E. OUT = 1267.90

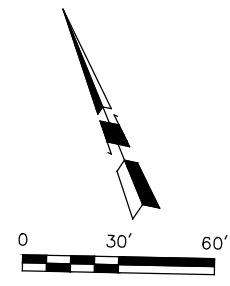


STA. 340+17.84 - END RAMP D

RAMP D ALT. 1



SEC. 14 T11N R2W

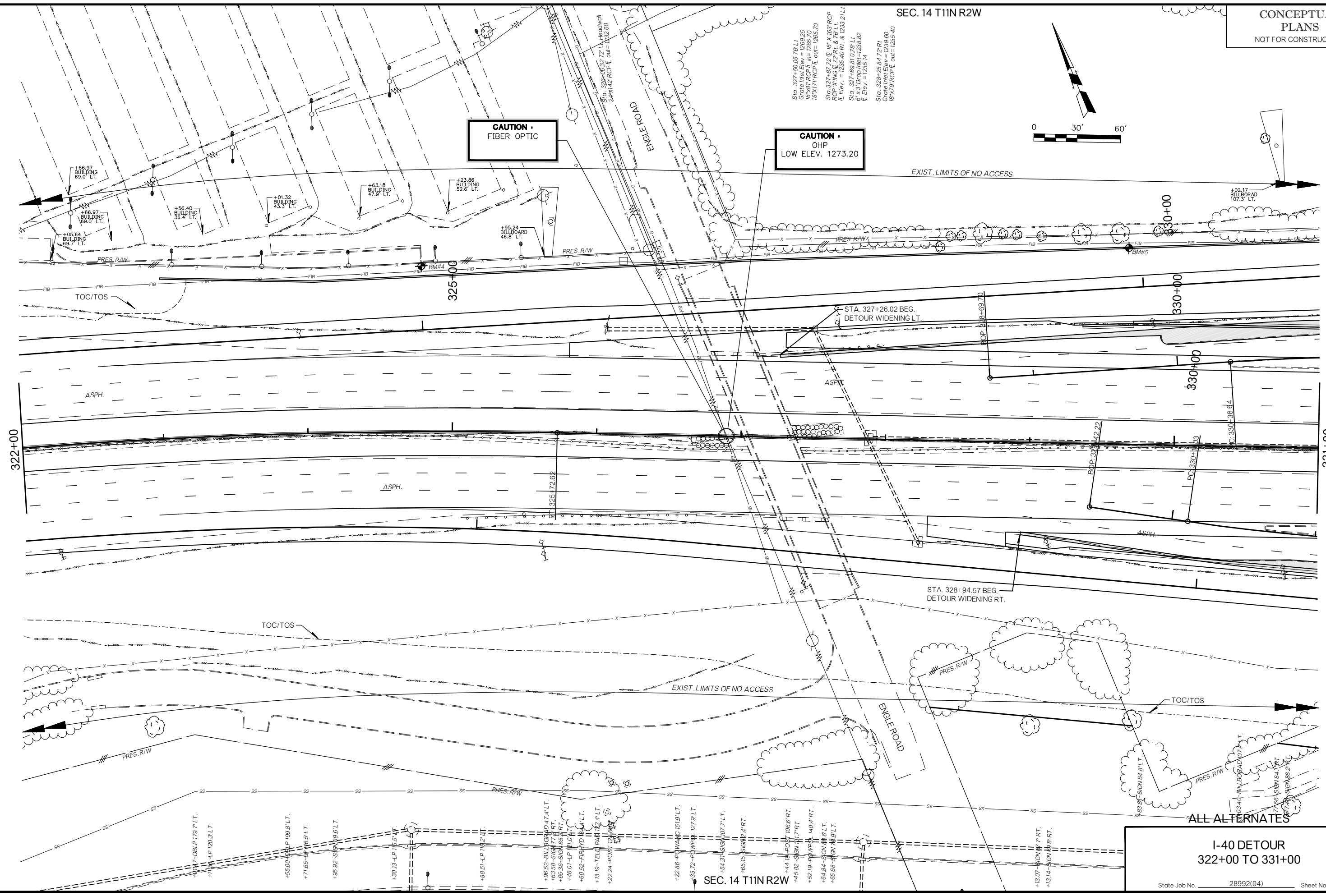


Sta. 327+50.05 76' LT
Grade Inlet Elev = 1269.25
18' x 17' RCP L. In = 1265.70
18' x 17' RCP L. Out = 1265.70
Sta. 327+87.72 0.88' x 16.83' RCP
RCP X'ING @ 72° RT. & 76' LT.
In Elev. = 1235.40 Rt. & 1233.21 Lt.
Sta. 327+89.81 0.78' LT
6' x 3' Drop Inlet = 1238.82
In Elev. = 1235.14
Sta. 328+25.84 72' RT
Grade Inlet Elev = 1239.60
18' x 19' RCP L. Out = 1235.40

CAUTION
FIBER OPTIC

CAUTION
OHP
LOW ELEV. 1273.20

EXIST. LIMITS OF NO ACCESS



STA. 327+26.02 BEG.
DETOUR WIDENING LT.

STA. 328+94.57 BEG.
DETOUR WIDENING RT.

ALL ALTERNATES

I-40 DETOUR
322+00 TO 331+00

SEC. 14 T11N R2W

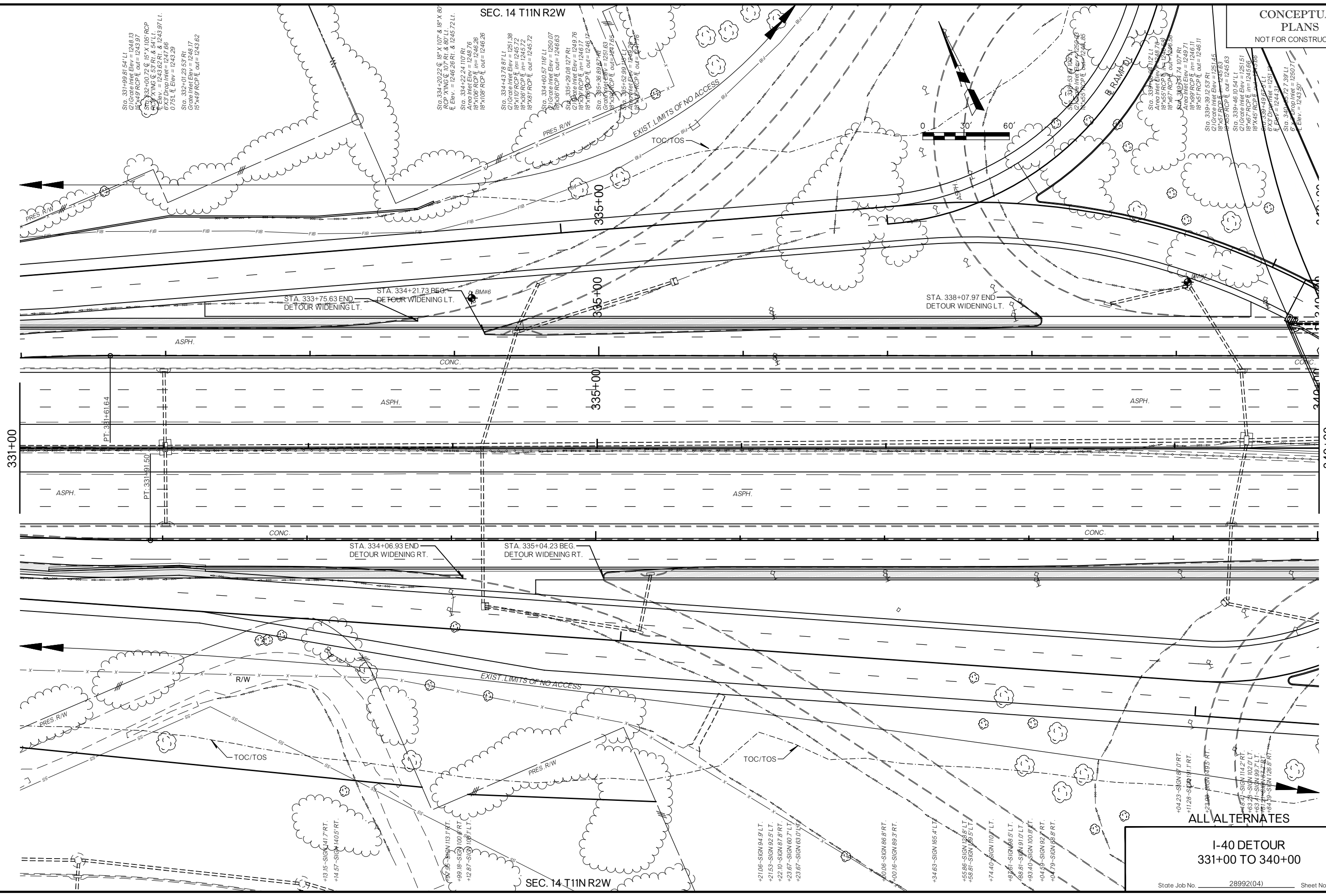
SEC. 14 T11N R2W

Sta. 331+09.81 54' LT.
2) Gate Inlet Elev = 1248.13
15'x45' RCP I, out = 1243.97
Sta. 332+00.73 C. 15'x105' RCP
RCP KING @ 53' RT. & 54' LT.
I. Elev. = 1243.62 RT. & 1243.97 LT.
6'x3' Drop Inlet = 1247.66
0.75' I. Elev = 1243.29
Sta. 332+01.23 53' RT.
Gate Inlet Elev = 1248.17
15'x45' RCP I, out = 1243.62

Sta. 334+20.22 @ 18'x107' & 18'x80'
RCP KING @ 107' RT. & 80' LT.
I. Elev. = 1246.26 RT. & 1245.72 LT.
Sta. 334+22.24 110' RT.
Area Inlet Elev = 1248.76
18'x106' RCP I, in = 1246.26
18'x108' RCP I, out = 1246.26

Sta. 334+43.78 81' LT.
2) Gate Inlet Elev = 1251.38
18'x110' RCP I, in = 1245.72
18'x36' RCP I, in = 1245.72
18'x81' RCP I, out = 1245.72
Sta. 334+60.57 116' LT.
2) Gate Inlet Elev = 1250.07
18'x66' RCP I, out = 1246.63
Sta. 335+29.08 127' RT.
2) Gate Inlet Elev = 1249.76
18'x33' RCP I, in = 1246.17
18'x105' RCP I, out = 1246.17
Sta. 335+36.89 87' RT.
2) Gate Inlet Elev = 1251.63
18'x34' RCP I, out = 1247.65
Sta. 335+52.99 141' LT.
2) Gate Inlet Elev = 1249.23
18'x108' RCP I, out = 1246.16

Sta. 339+53.87 105' RT.
2) Gate Inlet Elev = 1248.69
18'x55' RCP I, in = 1246.69
18'x67' RCP I, out = 1248.85
Sta. 339+54.74 107' RT.
Area Inlet Elev = 1249.71
18'x99' RCP I, in = 1246.11
18'x51' RCP I, out = 1246.11
Sta. 339+59.12 53' RT.
2) Gate Inlet Elev = 1251.45
18'x51' RCP I, in = 1245.63
18'x55' RCP I, out = 1245.63
Sta. 339+46.10 54' LT.
2) Gate Inlet Elev = 1251.51
18'x45' RCP I, in = 1245.68
18'x45' RCP I, out = 1245.68
Sta. 340+04.40 140' RT.
2) Gate Inlet Elev = 1251.18
18'x37' RCP I, in = 1244.31
I. Elev. = 1244.31
Sta. 340+07.73 81' LT.
2) Gate Inlet Elev = 1250.71
I. Elev. = 1243.50



ALL ALTERNATES
I-40 DETOUR
331+00 TO 340+00
State Job No. 28992(04) Sheet No. 41

SEC. 13 T11N R2W

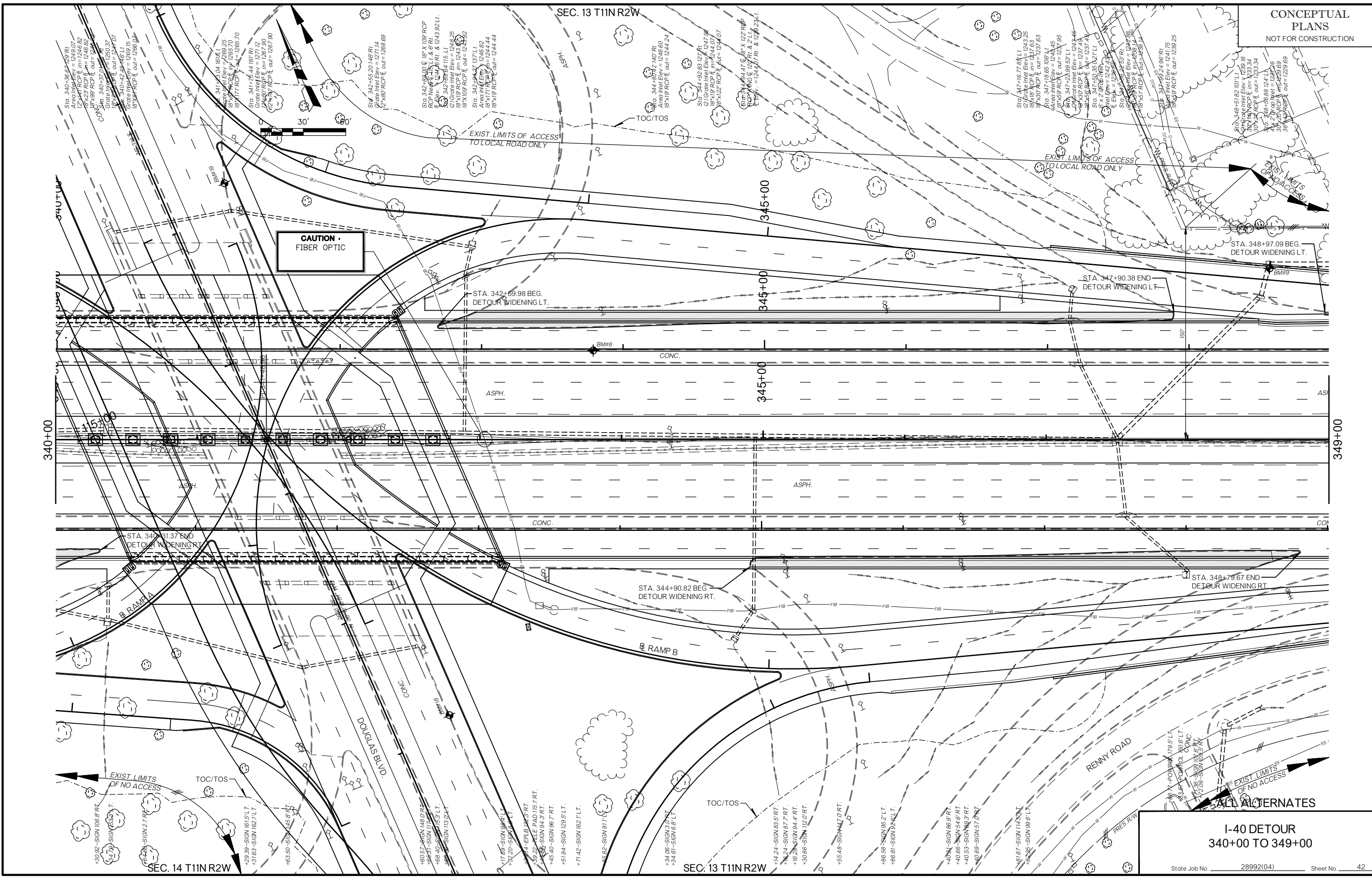
SEC. 14 T11N R2W

SEC. 13 T11N R2W

I-40 DETOUR
340+00 TO 349+00

CAUTION
FIBER OPTIC

ALL ALTERNATES



SEC. 13 T11N R2W

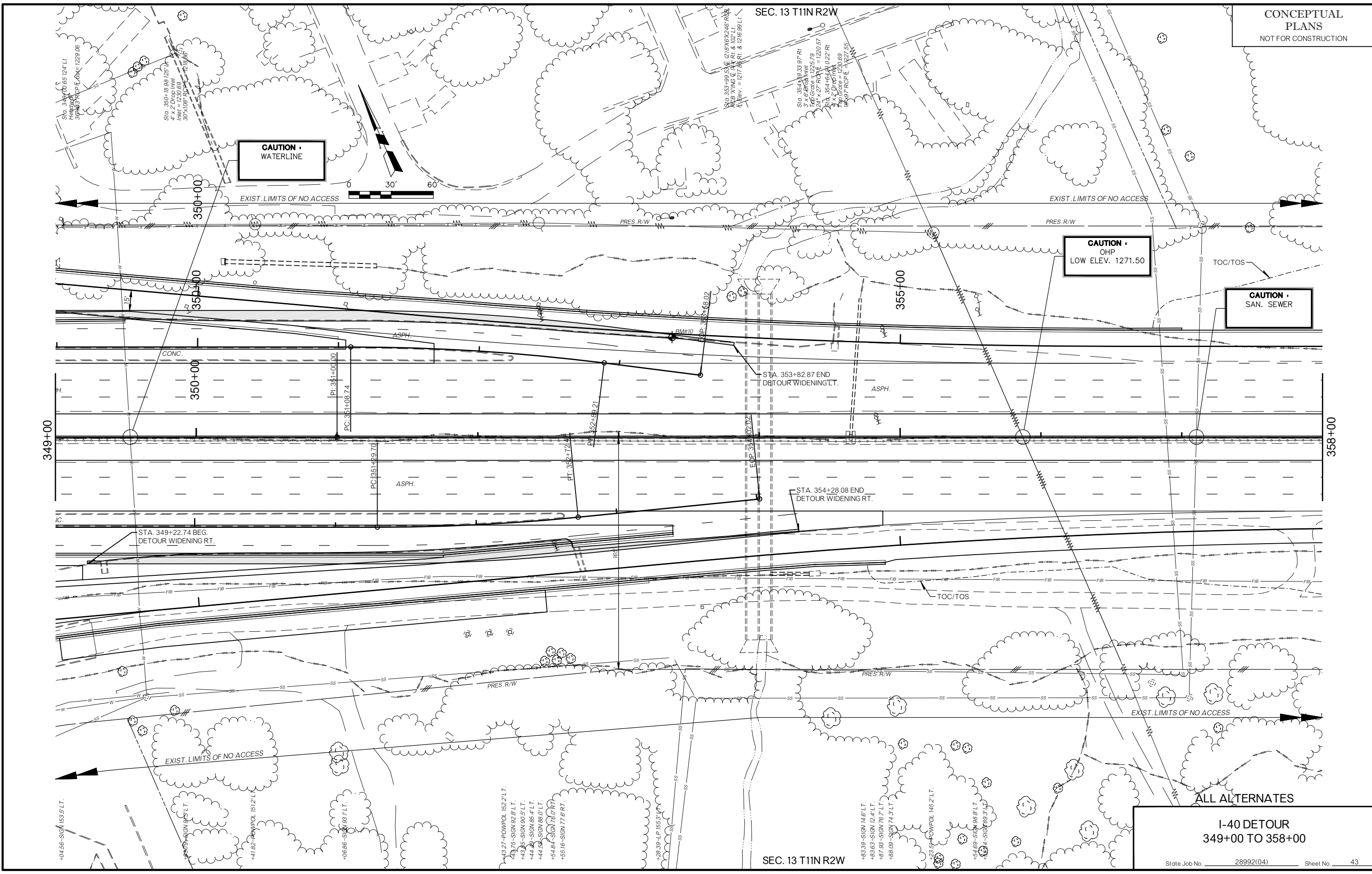
SEC. 13 T11N R2W

CAUTION
WATERLINE

CAUTION
OHP
LOW ELEV. 1271.50

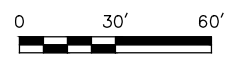
CAUTION
SAN. SEWER

ALL ALTERNATES
I-40 DETOUR
349+00 TO 358+00



CONCEPTUAL PLANS
NOT FOR CONSTRUCTION

SEC. 14 T11N R2W



CURVE DATA
 CURVE NO. C1
 P.I. STA. 110+86.91
 $\Delta = 017^{\circ}41'45.87''$
 $R = 521.0000'$
 $D = 010^{\circ}59'50.17''$
 $T = 81.1024'$
 $L = 160.9133'$
 $Ch = 60.2745'$
 $e = 6\%$
 $S = NC$
 $V = 35MPH$

CURVE DATA
 CURVE NO. C2
 P.I. STA. 112+57.86
 $\Delta = 019^{\circ}50'37.18''$
 $R = 521.0000'$
 $D = 010^{\circ}59'50.17''$
 $T = 91.1336'$
 $L = 180.4417'$
 $Ch = 179.5412'$
 $e = 6\%$
 $S = NC$
 $V = 35MPH$

SIG 112+74.08 15' SLOPE
 RCP 1/2" DIA. 10' LONG
 ELEV. = 1268.40 RT. & 1262.90 LL

EXIST. LIMITS
OF NO ACCESS

TOC/TOS

CONCRETE DETOUR
 N00°12'16.57" W

115+00

SEC. 13 T11N R2W

SURVEY DOUGLAS

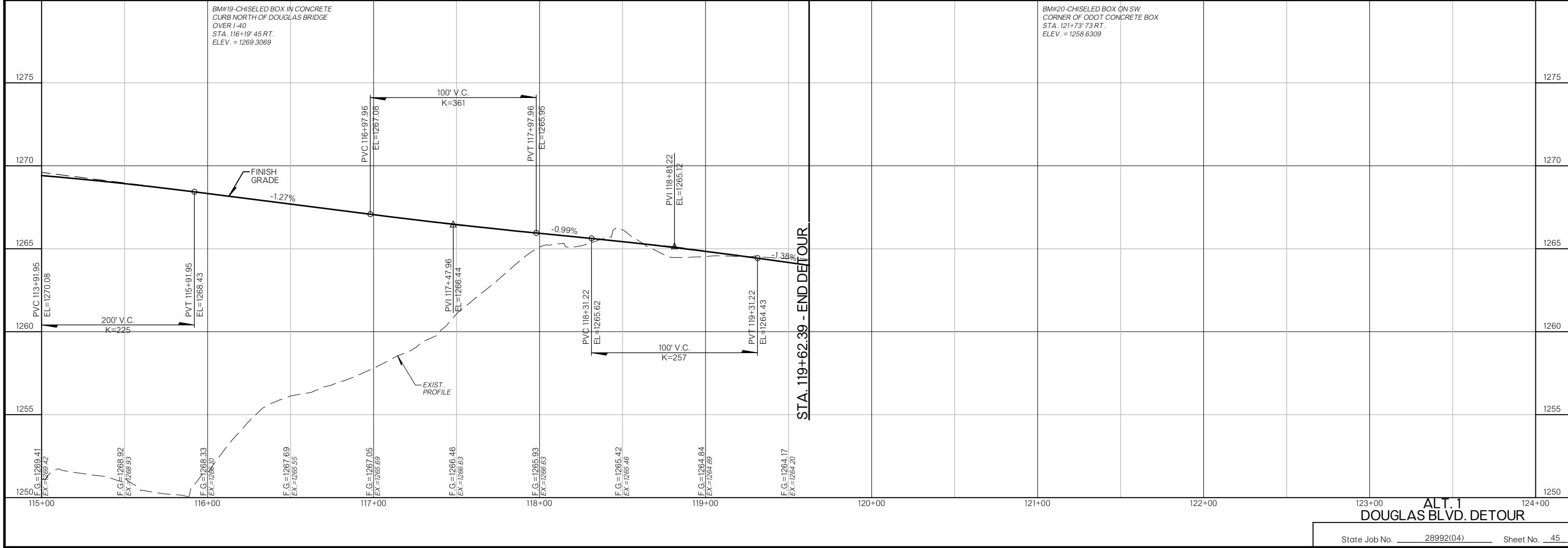
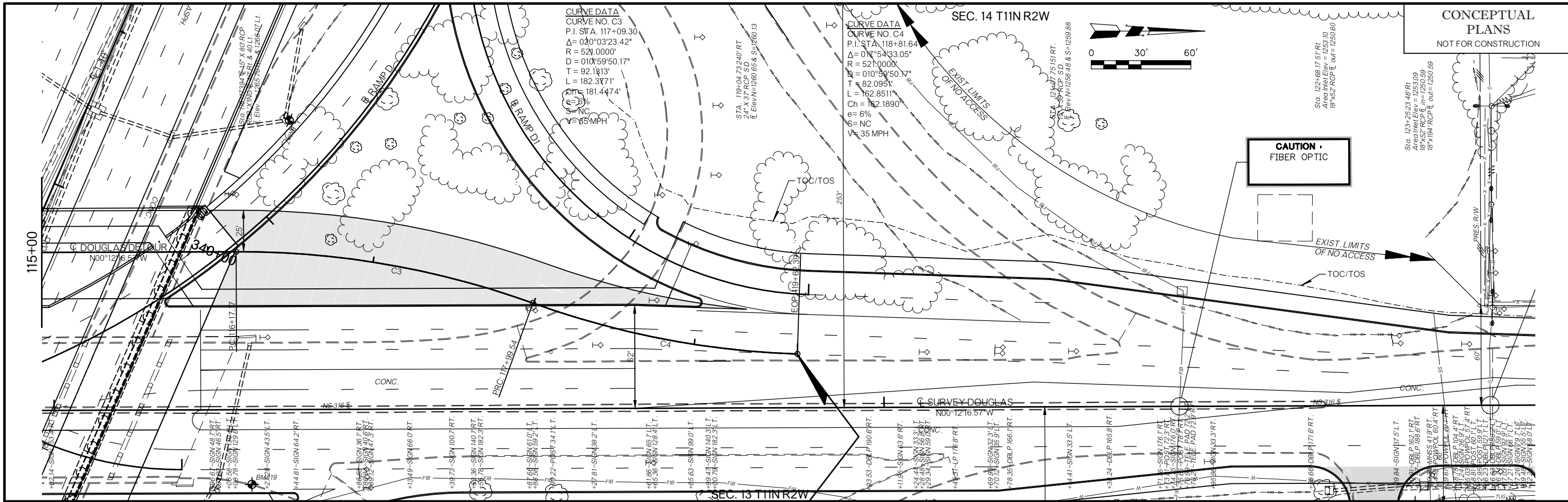
BM#17-SET 100D VERTICAL IN THE ROOT OF A
 10" CYPRESS
 STA. 108+86.60' RT.
 ELEV. = 1268.6684

BM#18-CHISELED BOX IN CONCRETE
 CURB SOUTH OF DOUGLAS BRIDGE
 OVER I-40
 STA. 112+11'41" RT.
 ELEV. = 1271.5729



STA. 110+05.81 - BEGIN DETOUR

ALT. 1
DOUGLAS BLVD. DETOUR



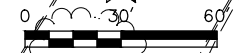
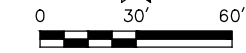
SEC. 14 T11N R2W

SEC. 13 T11N R2W

CONCEPTUAL PLANS
NOT FOR CONSTRUCTION

CURVE DATA
CURVE NO. P-1
P.I. STA. 344+10.65
 $\Delta = 033^{\circ}14'55.89''$
 $R = 200.0000'$
 $D = 028^{\circ}38'52.40''$
 $T = 59.7155'$
 $L = 116.0664'$
 $Ch = 114.4388'$
 $e =$
 $V =$

CURVE DATA
CURVE NO. U-1
P.I. STA. 343+50.95
 $\Delta = 056^{\circ}45'05.58''$
 $R = 200.0000'$
 $D = 028^{\circ}38'52.40''$
 $T = 108.0303'$
 $L = 198.1003'$
 $Ch = 190.1009'$



STA. 342+42.92 - BEGIN DETOUR RAMP U

STA. 344+92.09 - END DETOUR RAMP U

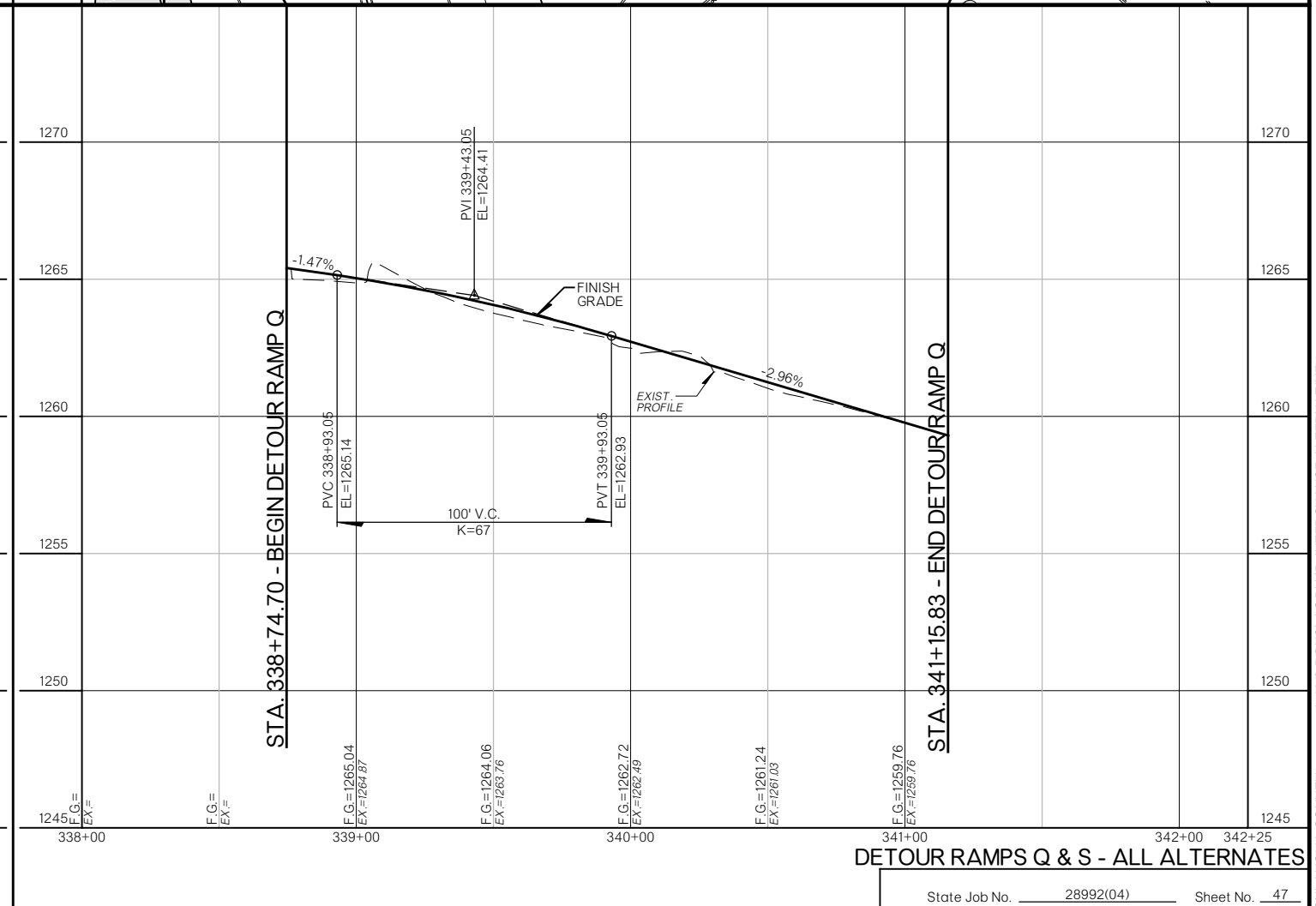
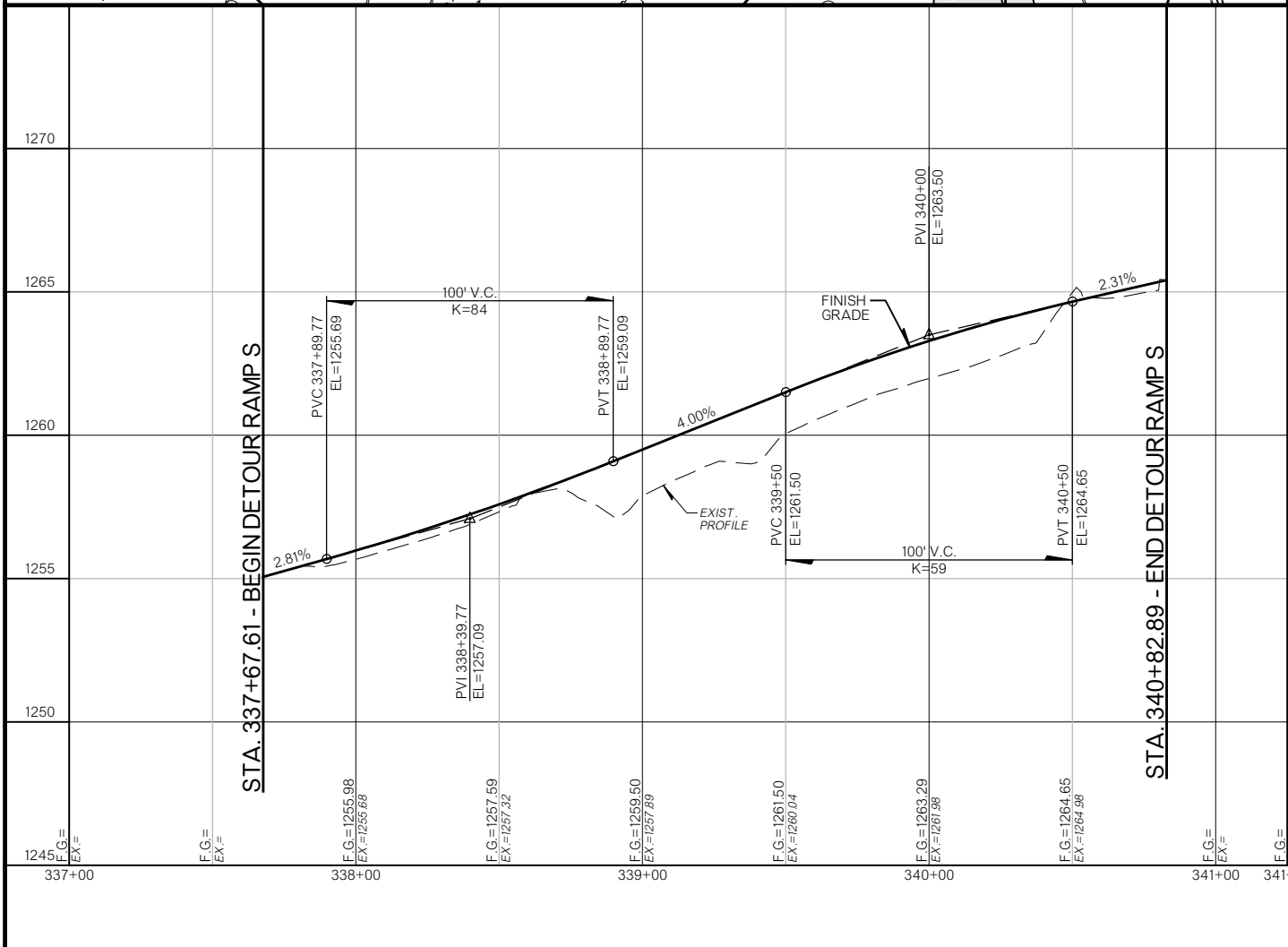
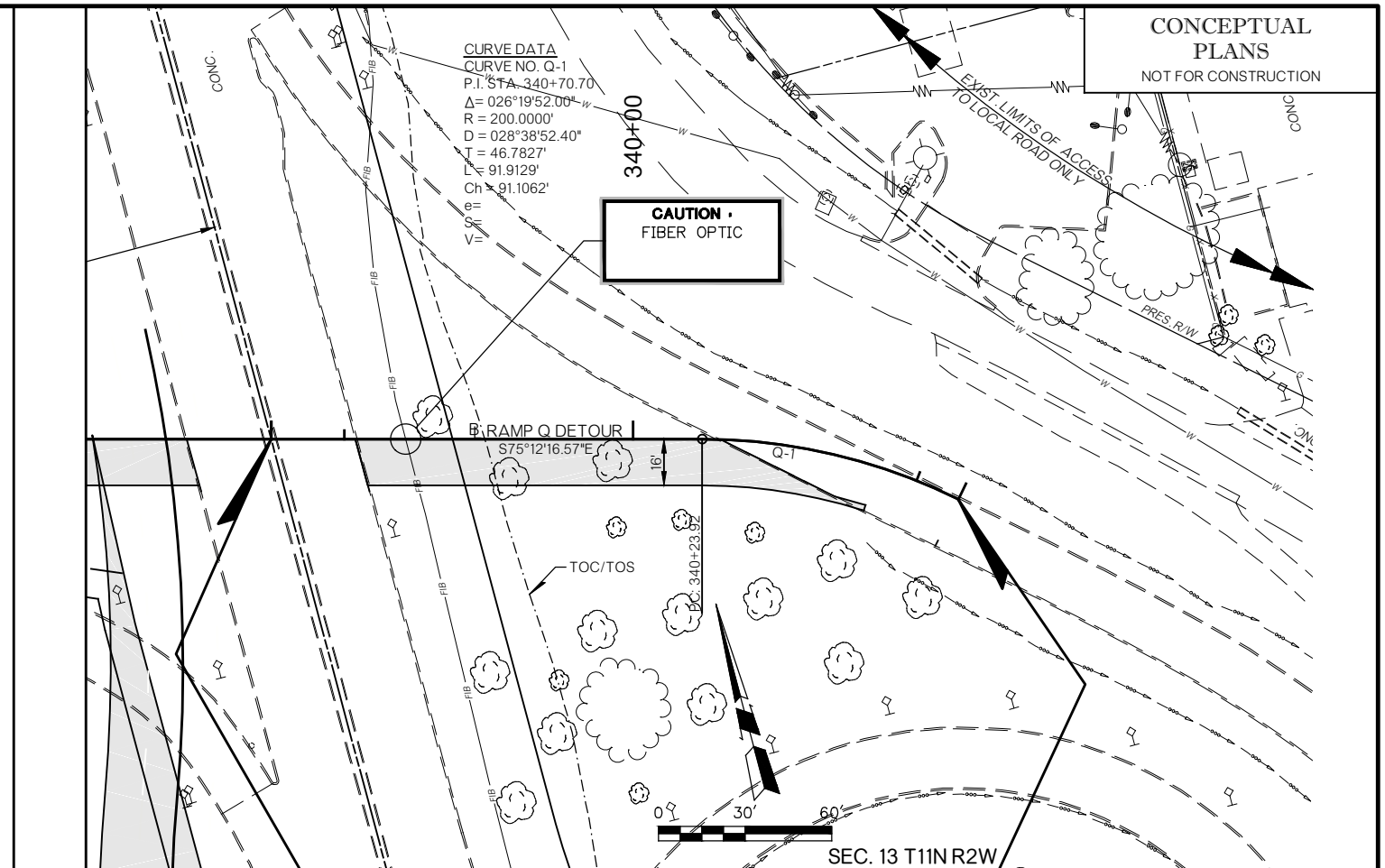
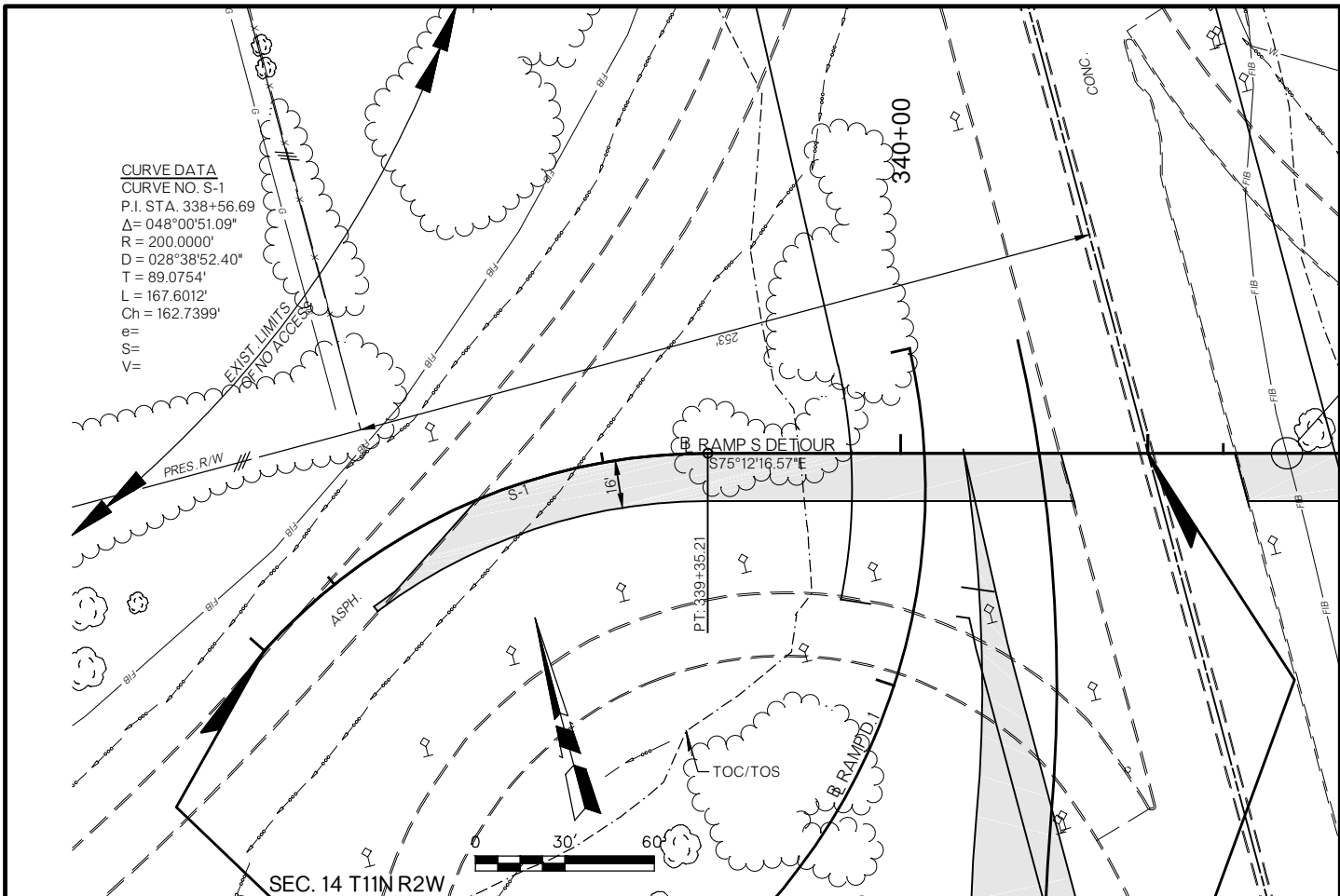
STA. 342+10.01 - BEGIN DETOUR RAMP P

STA. 344+66.99 - END DETOUR RAMP P

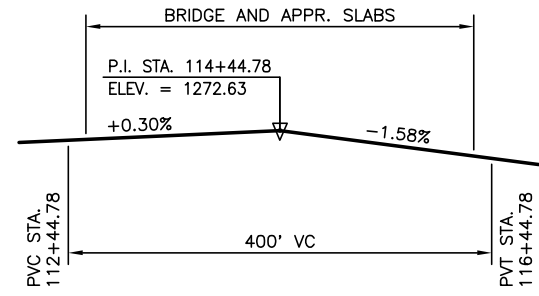
BM#17-SET 100D VERTICAL IN THE ROOT OF A 10" CYPRESS
STA. 108+86.60 RT.
ELEV. = 1268.6684



DETOUR RAMPS P & U - ALL ALTERNATES

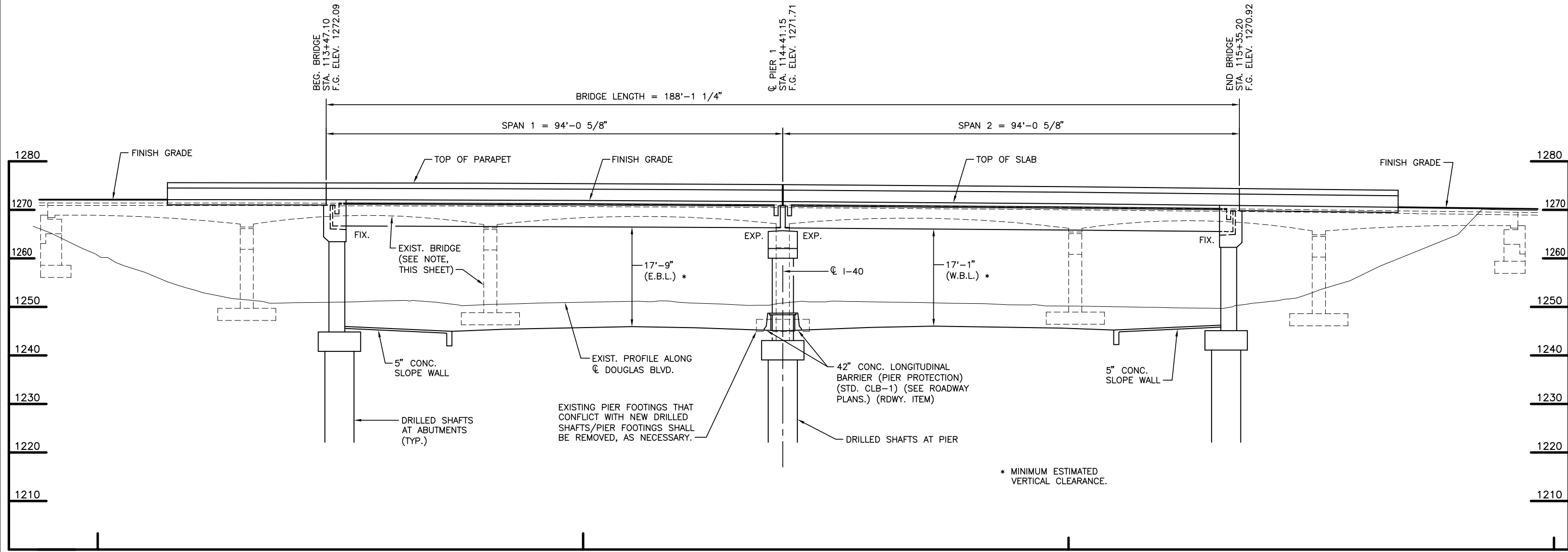


DETOUR RAMPS Q & S - ALL ALTERNATES



FINISH GRADE DATA
 ☉ DOUGLAS BLVD.

EXISTING BRIDGE NOTE:
 ☉ DOUGLAS BLVD. STA. 114+41.15, TWIN-SIX (6)
 SPAN (41'-50'-60'-60'-50'-41') x 43.90' WIDE
 CONCRETE SLAB SPAN BRIDGES, SKEWED 23'30" LF
 REMOVE FOLLOWING PHASE 1 BRIDGE
 CONSTRUCTION.



113+00

114+00

115+00

116+00

ELEVATION
 SCALE 1"=20'

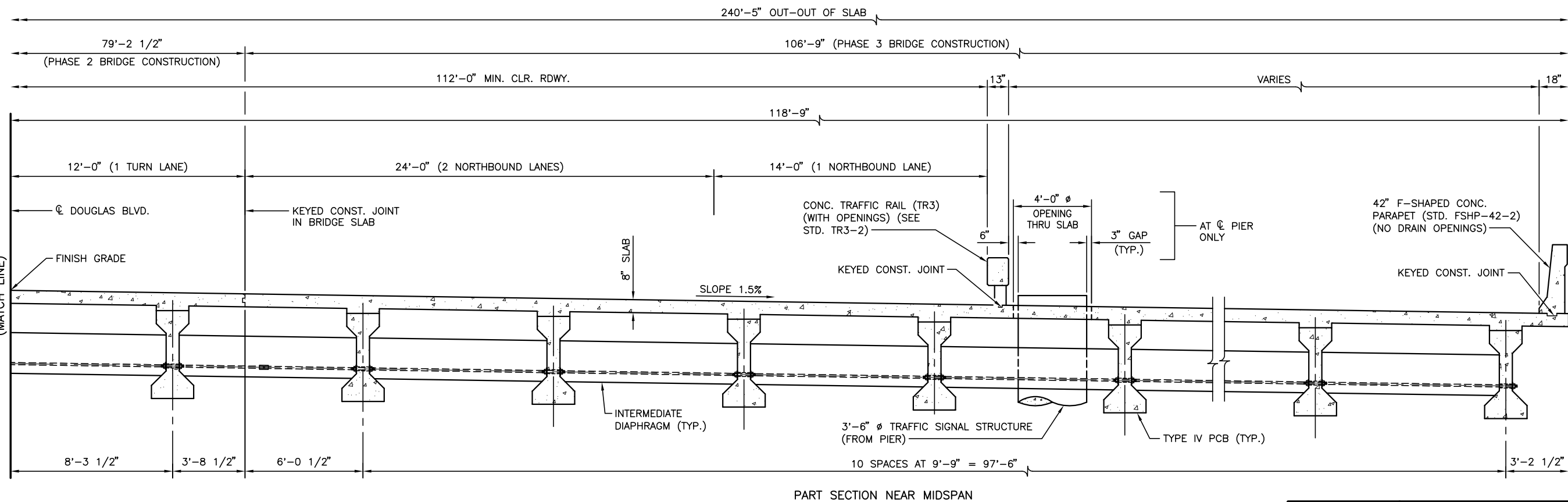
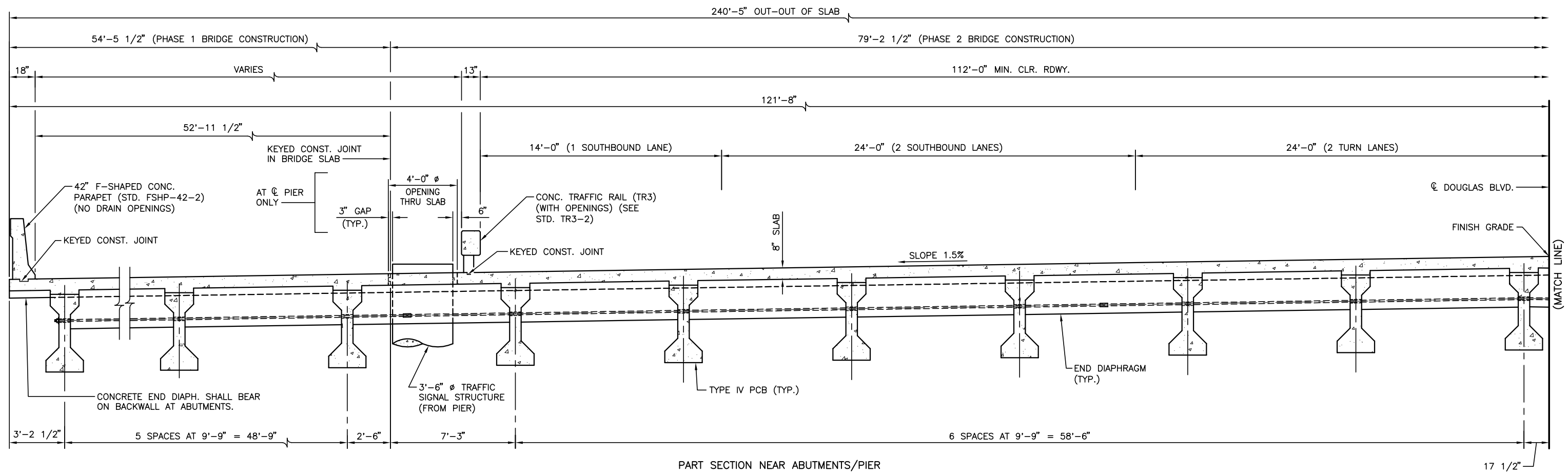
NOTE: FOR PLAN VIEW OF BRIDGE, SEE SHEET NO. B1.

CONST. TWO (2) 94' PRESTRESSED CONCRETE BEAM SPANS;
 112'-0" MIN. CLR. RDWY. W/ CONC. PARAPETS (FSHP-42)
 AND CONC. TRAFFIC RAILS (TR3) SKEWED 23'30"13.06" LF

Design	.		I-40/DOUGLAS BOULEVARD INTERCHANGE	OKLAHOMA COUNTY
Drawn	PKW	07/16	GENERAL PLAN AND ELEVATION (BRIDGE "A") (ALTERNATE 1)	
Checked	.		(SHEET 2 OF 2)	
Approved			☉ STA. 114+41.15	
Squad			State Job No. 28992(04)	Sheet No. B2

"CONCEPTUAL PLANS - NOT FOR CONSTRUCTION"

M:\W2M Projects\Project Files\M160\Conceptual Plans_Alt 1 Typical Section.dwg 7/27/2016 10:10:42 AM



TYPICAL BRIDGE CROSS SECTION

Design	.	1-40/DOUGLAS BOULEVARD INTERCHANGE	OKLAHOMA COUNTY
Drawn	PKW 06/16	TYPICAL BRIDGE CROSS SECTION (BRIDGE "A") (ALTERNATE 1)	
Checked	.		
Approved	.		
Squad	.	State Job No. 28992(04)	Sheet No. B3

"CONCEPTUAL PLANS - NOT FOR CONSTRUCTION"



Oklahoma Department of Transportation

Project Management Division (405)522-7601 Fax (405) 522-7612 Room 3C9

DATE: May 5, 2012
TO: Distribution List
FROM: Project Management Division
SUBJECT: Draft - Project Initiation

J/P Number: 28992(04) County: Oklahoma Highway: I-40 Division: 4
PS&E Date: 05/2017 R/W Date : N/A Drive-out Date:
Programmed Estimate: \$ 18,000,000.00
Project Description: Douglas Blvd. Bridge Replacement & Interchange Reconstruction 6.5 Miles East of I-35 (Includes removal of Engle Rd. bridge).

Drive-out Attendees:
Kyle McKinley – Project Management Division

FUNCTIONAL CLASSIFICATION

Area Type: Urban Suburban Rural
Terrain Type: Flat Rolling Mountainous
Access Control: Full Partial None
Highway Type: Freeway Principal Arterial Minor Arterial Collector
 NHS Non-NHS STRAHNET Scenic Hwy

EXISTING INFORMATION

Current ADT: 51,200 % Trucks: Number of Lanes: 4 Lane Width: 12'
Outside Shoulder Width: 10' Inside Shoulder Width: 4'
 Open Section Curb & Gutter Divided, median width: 40', Cable Barrier
 Other (describe):
Pavement Type: Asphalt Pavement Condition: Good Fair Poor
Shoulder Type: Paved Shoulder Condition: Good Fair Poor
Storm Sewer No Yes Storm Sewer Condition: Good Fair Poor
Sidewalks No Yes Sidewalk Width:
Bridge One Description: 41'-55'-60'-60'-50'-41' Cont. Concrete Slab Spans with 2-3' Sidewalks
Bridge Two Description: 41'-62'-62'-41' Cont. Concrete Slab Spans with 2-3' Sidewalks
Bridge Three Description:

	Bridge One	Bridge Two	Bridge Three
Feature Intersected:	I-40	I-40	
NBI Number(s):	15573	15560	
Location Number(s):	5568 0634X	5568 0608X	
Sufficiency Rating(s):	77.0	79.6	
Year(s) Built:	1962	1962	
Bridge Width(s):	88'	33.9'	
Bridge Length(s):	303'	206'	

Posted Clearance(s): 17'00" 15'06"
Posted: Open, no restrictions Open, no restrictions
Health Index: 67.61 79.31

ENVIRONMENTAL CONSIDERATIONS

- Historic Properties, list:
- Archeological Sites, list:
- Cemeteries, list:
- Hazardous Waste / LUST Sites, list:
- Endangered Species, list:
- Section 4F or 6F Properties, list:
- Farmland Wetlands Scenic and Protected Aquifers 100 Year Flood Plain

ALTERNATIVE IMPACTS

- Other Agencies List:
- Turnpike Involvement
- Metropolitan Planning Organizations List:

PERMIT INFORMATION

Design Exception Anticipated: No As required by design Yes, type:
Maintenance Agreements (Lighting, Signals, etc.): No Yes, type:
Permits required: FAA USACE OWRB Railroad Other, type:
Additional:

PROPOSED IMPROVEMENT

Project Intent: Replace 2 functionally obsolete bridges.

Special Considerations: None

Description of Proposed Improvements:

Design Speed:

Project Termini

Beginning of Project:

End of Project:

Limits of Survey:

Limits of NEPA Survey Area:

Typical Section

- Open Section Curb & Gutter Divided, median width:
- Other (describe):
- Number of Lanes: Lane Width: 12'
- Outside Shoulder Width: 10' Inside Shoulder Width: 4'
- Storm Sewer No Yes Sidewalks No Yes, width:
- Overlay No Yes, thickness:
- Coldmill No Yes, thickness:
- Add Shoulders No Yes, width:

Bridge Width:

Alignment

- Existing
- New, located North or South or East or West of existing
- Parallel Lanes, located North or South or East or West of existing
- Spot Improvements
- Horizontal, Description:
- Vertical, Description:

Detour

- Shoo-fly, located North or South or East or West of existing
- Widening, located North or South or East or West of existing
- Crossovers
- Close Road
- Signed Detour, Route Description:
- Phased Construction, Description:

Traffic Items

- Traffic Management Plan No Yes
- Median Barrier No Yes
- New Guardrail No Yes
- End Treatment No Type:
- Highway Lighting No Outside or Median
- Traffic Signals No Location(s):

Right-of-Way

- Additional RW Required No Yes, describe:
- Utility Conflicts No Yes, describe:

Miscellaneous

- Channel Re-Alignment No Yes, describe:

INITIATION ESTIMATE

Roadway:	\$	Total Construction:	\$
Bridge:	\$		
Traffic Control:	\$	Right-of-Way:	\$
Signing and Striping:	\$	Utility:	\$
Highway Lighting:	\$		
Traffic Signals:	\$	Total Estimate:	\$
Mobilization:	\$		
Staking:	\$		
E & C:	\$		

PROGRAM REVISIONS

Estimate: \$
Work Type:
Description:

Letting Date:

Project Length:

Attachments (Aerial with Preliminary RW & County Map)

Distribution List:

- Director of Engineering
- Director of Capital Projects and Information Management
- Bridge Division
- Environmental Programs Division
- FHWA
- Field Division
- Project Management Division
- Right-of-Way Division
- Roadway Design
- Survey Division
- Traffic Engineering

PUBLIC MEETING SUMMARY AND RESPONSES TO COMMENTS

**I-40/Douglas Boulevard Bridge Replacement
and Interchange Reconstruction**

**Oklahoma County, Oklahoma
JP 28992(04)**

Prepared for:



**Oklahoma Department of Transportation
200 N.E. 21st Street
Oklahoma City, OK 73105**

Prepared by:

**Triad Design Group
Oklahoma Certificate of Authority No. 1759
3020 Northwest 149th Street
Oklahoma City, OK 73134
405-752-1122**

March 2017



PUBLIC MEETING SUMMARY AND RESPONSES TO COMMENTS

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March 2017



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3 PUBLIC MEETING	1
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3.2 MEETING INFORMATION AND FORMAT	1
3.3 SUMMARY OF COMMENTS	2
3.3.1 AGENCY COMMENTS	2
3.3.2 PUBLIC COMMENTS	3
3.4 RESPONSE TO PUBLIC COMMENTS	4

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APPENDIX B: OFFICIALS NOTICE LETTER AND MAILING LIST
APPENDIX C: LANDOWNER AND UTILITY NOTICE LETTER AND MAILING LIST
APPENDIX D: PUBLIC MEETING SIGN-IN SHEETS
APPENDIX E: PUBLIC MEETING PRESENTATION
APPENDIX F: PUBLIC MEETING HANDOUT AND DISPLAYS
APPENDIX G: AGENCY RESPONSE LETTERS
APPENDIX H: PUBLIC RESPONSE LETTERS

EXECUTIVE SUMMARY

This document summarizes the public meeting conducted for the I-40/Douglas Boulevard Bridge replacement and interchange reconstruction project in Oklahoma County, Oklahoma. The purpose of the public meeting was to present information about the proposed alternatives to the public and obtain input. The public meeting was held on January 17, 2017 at 6:00 p.m. in the Bill Atkinson Center Raider Room, Rose State College. Fifty-four attendees signed in for the meeting. The meeting included a presentation on the project from the Oklahoma Department of Transportation's (ODOT) engineering consultant, Triad Design Group (Triad). Representatives from ODOT and Triad were available for discussion before and after the presentation. The comment period was open until February 14, 2017 with a total of 22 written comments received, including 10 from agencies and 13 from members of the public (1 of the public comments was received by telephone). Agency comments and ODOT responses are summarized in Table ES.1.

TABLE ES.1: AGENCY COMMENT AND RESPONSE SUMMARY

Agency	Response
Bureau of Indian Affairs	No tribal or individual Indian trust lands; no concerns
National Park Service	No comments.
Natural Resources Conservation Service	No considerations or permits needed from the agency.
Oklahoma Aeronautics Commission	Recommends determining if a Form 7460-1 should be submitted.
Oklahoma Conservation Commission	<ul style="list-style-type: none"> • No comments specific to the alternatives. • Concerns: <ul style="list-style-type: none"> ○ Disturbance of riparian areas ○ Siltation problems ○ Mechanical disturbance in the stream ○ Reduction of cross-sectional area needed for adequate drainage • Recommendations: <ul style="list-style-type: none"> ○ Reduce disturbance ○ Develop sufficient erosion control plans to minimize sedimentation ○ Minimize changes in stream configuration, or mitigate through conservation easement • Suggests sufficient cross-sectional drainage area through any modified bridge crossings. • Requests streams remain free flowing after construction.
Oklahoma Corporation Commission	No records of oil and gas wells located within Project Area.
Oklahoma Department of Commerce	<ul style="list-style-type: none"> • Supports alternative that supports the most traffic volume, including semi-trucks and trailers, due to TAFB projected growth. • Consider impact of construction of the Eastern Oklahoma County turnpike. • Before construction begins at I-40/Douglas, review interchanges at I-240/Douglas and I-240/Air Depot for maintenance needed to accommodate diverted commercial traffic.
Oklahoma Department of Environmental Quality	<ul style="list-style-type: none"> • Storm Water Permit required for construction disturbing >1 acre. • Recommends contacting TAFB Environmental Restoration Branch re: monitoring wells in the Project Area, and potential for interaction with the perched aquifer in the Project Area.
Oklahoma Tourism and Recreation Department	No adverse impacts on federally-funded parks, recreation areas, or state parks.
Oklahoma Water Resources Board	Recommends contacting the local floodplain administrator (i.e., Oklahoma County) for possible permit requirements. Also notes that if development falls on state owned or operated property, a floodplain development permit is required from OWRB.

Most of the public comments expressed support for one (or in some cases two) of the three alternatives presented at the public meeting. In addition to expressing support for an alternative, several other miscellaneous questions or comments were expressed. Table ES.2 summarizes the comments received. Note that the total number of comments is greater than the number of comments received, as several people made multiple comments.

TABLE ES.2: PUBLIC COMMENT SUMMARY

Comment	# of Comments
Expressed support for Alternative 1	8
Expressed support for Alternative 2	4
Expressed support for Alternative 3	1
Against Alternative 2, with questions about the Future Flyover	2
Against Alternative 3 - various reasons (i.e., dislike weaving and ramp loops, not pedestrian friendly)	2
Requested detail of SPUI phased traffic movements	1
Suggested truck traffic be considered in design process	1
Suggested placing the rest of the road in front of Tinker underground	1
Supports pedestrian accommodations	2
Requested more visible lane striping	1
Requested better media coverage of public meetings	1
Expressed concerns regarding St. Anthony Healthplex access	1
Expressed concerns regarding traffic operations at S.E. 29th Street/Douglas Boulevard	2

1 PROJECT INTRODUCTION

This document summarizes the public meeting conducted for the I-40/Douglas Boulevard Bridge replacement and interchange reconstruction project in Oklahoma County, JP 28992(04). The purpose of the public meeting was to present information about the proposed alternatives to the public and to obtain public input.

2 AGENCY SOLICITATION

Initial agency solicitation letters were sent to federal and state resource agencies. These letters presented a short project description and the purpose of the proposed project, and included enclosures consisting of a project location map and graphics of the three alternatives. The letter, dated December 22, 2016, also invited recipients to the public meeting and requested input be provided by February 14, 2017. Copies of the letter and mailing list are included in Appendix A.

3 PUBLIC MEETING

3.1 MEETING NOTIFICATION

Notice of the public meeting was sent by letter dated December 22, 2016 to elected officials (federal and state), the Governor's office, Oklahoma County Commissioners, the Cities of Midwest City and Oklahoma City, local school districts, emergency service providers, and medical facilities in the study area. The officials letter provided a brief description of the purpose and need for the project, and an invitation to the public meeting. The officials letter was accompanied by a project location map. Copies of the letter and list are included in Appendix B.

Notice of the public meeting was also sent by letter dated December 22, 2016 to all utility companies and to all property owners in the study area, based upon Oklahoma County Assessor information. Copies of this letter and mailing list are included in Appendix C.

3.2 MEETING INFORMATION AND FORMAT

The public meeting was held on January 17, 2017 at 6:00 p.m. in the Bill Atkinson Center Raider Room, Rose State College. Fifty-four people signed in for the meeting, including representatives from ODOT, Triad, City of Midwest City, City of Oklahoma City, Tinker Air Force Base, Rose State College, St. Anthony Healthplex, several business owners, and members of the public. Copies of the sign-in-sheets are included in Appendix D.

Mr. Brian Taylor, ODOT Division 4 Engineer, opened the meeting with some general remarks. Triad then gave a presentation about the project, providing detailed information on the three (3) alternatives under consideration:

- Alternative 1 – Single Point Urban Interchange (SPUI)
- Alternative 2 – Tight Urban Diamond Interchange (TUDI) with Future Flyover Ramp
- Alternative 3 – Cloverleaf Interchange

The presentation was followed by an open question and answer period, after which ODOT and Triad staff were available for one-on-one and small group discussions. Display boards showing the three alternatives under consideration and environmental constraints were available for public viewing.

A handout with project information and a map of the proposed alternative was provided to attendees. A copy of the presentation is included in Appendix E. Copies of the handouts and displays are included in Appendix F.

The presentation covered:

- Purpose of the Meeting
- Existing Facility
- Collision History
- Purpose and Need for the Project
- Proposed Project Description
- Description of Three (3) Alternatives Considered
- Constraints in the Area
- Comparison Matrix of the Alternatives
- Request for Public Input
- Next Steps

3.3 SUMMARY OF COMMENTS

Nine (9) written comments from agencies, and 1 telephone and 12 written comments from the public were received both before and after the public meeting.

3.3.1 AGENCY COMMENTS

The nine written agency comments are summarized in the following text, and copies of the agency response letters are included in Appendix G.

- The National Park Service had no comments on the project.
- The Natural Resources Conservation Services stated no considerations or permits are needed from the agency.
- The Oklahoma Aeronautics Commission recommends determining if a Form 7450-1 should be submitted, due to the proximity of Tinker Air Force Base.
- The Oklahoma Conservation Commission (OCC) listed several general concerns including disturbance and siltation of streams and riparian areas and changes to stream channels that may constrict flows and result in flooding.
- The Oklahoma Corporation Commission had no records of oil and gas wells located within the Project Area.

- The Oklahoma Department of Commerce supports the alternative that supports the most traffic volume, including semi-trucks and trailers, due to Tinker Air Force Base projected growth. The agency also suggested that ODOT consider the impact of construction of the Eastern Oklahoma County turnpike, and recommended that the interchanges at I-240/Douglas and I-240/Air Depot be evaluated for any maintenance which may be needed to accommodate commercial traffic which may be diverted during construction at I-40/Douglas.
- The Oklahoma Department of Environmental Quality (ODEQ) noted that construction projects disturbing greater than 1 acre require storm water permitting. The ODEQ also attached a list of recommendations for general construction/improvement projects which addressed items such as plumbing codes, lead-based paint, asbestos, fugitive dust, solid waste, and OPDES permitting. Lastly, the ODEQ recommended contacting Tinker Air Force Base Environmental Restoration Branch regarding monitoring wells in the Project Area and the potential for interaction with the perched aquifer in the Project Area.
- The Oklahoma Tourism and Recreation Department responded that no adverse impacts were anticipated on federally-funded parks, recreation areas, or state parks.
- The Oklahoma Water Resources Board recommended contacting the Oklahoma County floodplain administrator for possible permit requirements, and noted that if development falls on state owned or operated property, a floodplain development permit is required from OWRB.

3.3.2 PUBLIC COMMENTS

Most of the public comments expressed support for one (or in some cases two) of the three alternatives presented at the public meeting. In addition to expressing support for an alternative, several other miscellaneous questions or comments were expressed. Table 3.1 summarizes the comments received. Note that the total number of comments is greater than the number of comments received, as several people made multiple comments. Copies of the public comments received are included in Appendix H.

TABLE 3.1: PUBLIC COMMENT SUMMARY

Comment	# of Comments
Expressed support for Alternative 1	8
Expressed support for Alternative 2	4
Expressed support for Alternative 3	1
Against Alternative 2, with questions about the Future Flyover	2
Against Alternative 3 - various reasons (i.e., dislike weaving and ramp loops, not pedestrian friendly)	2
Requested detail of SPUI phased traffic movements	1
Suggested truck traffic be considered in design process	1
Suggested placing the rest of the road in front of Tinker underground	1
Supports pedestrian accommodations	2
Requested more visible lane striping	1
Requested better media coverage of public meetings	1
Expressed concerns regarding St. Anthony Healthplex access	1
Expressed concerns regarding traffic operations at S.E. 29th Street/Douglas Boulevard	2

3.4 RESPONSE TO PUBLIC COMMENTS

ODOT’s responses to the general comment topics are summarized in the following sections of text.

- **Support for Alternative 1, Alternative 2, and/or Alternative 3**

ODOT thanks you for your input.

- **Purpose of Alternative 2 Future Flyover**

Alternative 2 includes construction of a northbound Douglas to westbound I-40 flyover ramp in the future because traffic analysis forecasts the traffic volumes associated with that movement to increase in the future, primarily due to an increase in Tinker Air Force Base traffic.

- **Against Alternative 3**

Traffic analysis predicts that traffic operations for Alternative 3 – Cloverleaf will degrade to an unacceptable level in the future. Therefore, ODOT considered two additional interchange design solutions, i.e., Alternative 1 – SPUI and Alternative 2 – TUDI with Future Flyover.

- **Clarification of SPUI Phased Traffic Movements**

The SPUI design will include signalization that controls traffic moving through both the northwest quadrant (i.e., northbound and southbound Douglas traffic destined to WB I-40) and the southeast quadrant (i.e., northbound and southbound Douglas traffic destined to EB I-40). This signalization will ensure that both left-turning and right-turning Douglas traffic destined to I-40 within the same quadrant will move in separate, sequential phases of the traffic light, thus avoiding the need for either traffic movement to yield to the other.

- **Consideration of Truck Traffic in Design**

ODOT agrees that truck traffic on this bridge and through this interchange must be considered in the design process. In fact, truck traffic is one of the chief reasons this project (which includes additional lanes on I-40) is needed.

- **Suggestions Relating to Tinker Air Force Base**

ODOT recognizes that Tinker Air Force Base (TAFB) is a vital stakeholder in any proposed improvement to this area. Because the TAFB mission is of the utmost importance, ODOT has coordinated extensively with TAFB staff and considered their input in the design process.

- **Pedestrian Accommodations**

ODOT considers all modes of transportation (i.e., including pedestrian) in the planning process.

- **More Visible Lane Striping**

ODOT is continuously evaluating more durable paints, and anticipates that the visibility of lane striping will continue to improve in the future.

- **Better Media Coverage of Meetings**

ODOT provides notice of all public meetings to the local news outlets, who then determine if and/or how to disseminate the notice.

- **St. Anthony Healthplex Access**

St. Anthony Healthplex representatives expressed concerns that access to the full-service emergency room be maintained throughout construction, and pointed out a traffic conflict that exists for eastbound I-40 traffic exiting at Douglas Boulevard, destined for the Healthplex. ODOT has incorporated these concerns into the design development and selection process.

- **S.E. 29TH Street/Douglas Boulevard Traffic Operations**

ODOT's traffic analysis has shown this area is currently in need of improvement and that traffic conditions will worsen in the future unless improvements are made. ODOT will work with the Cities of Midwest City and Oklahoma City to identify and implement improvements to this intersection.