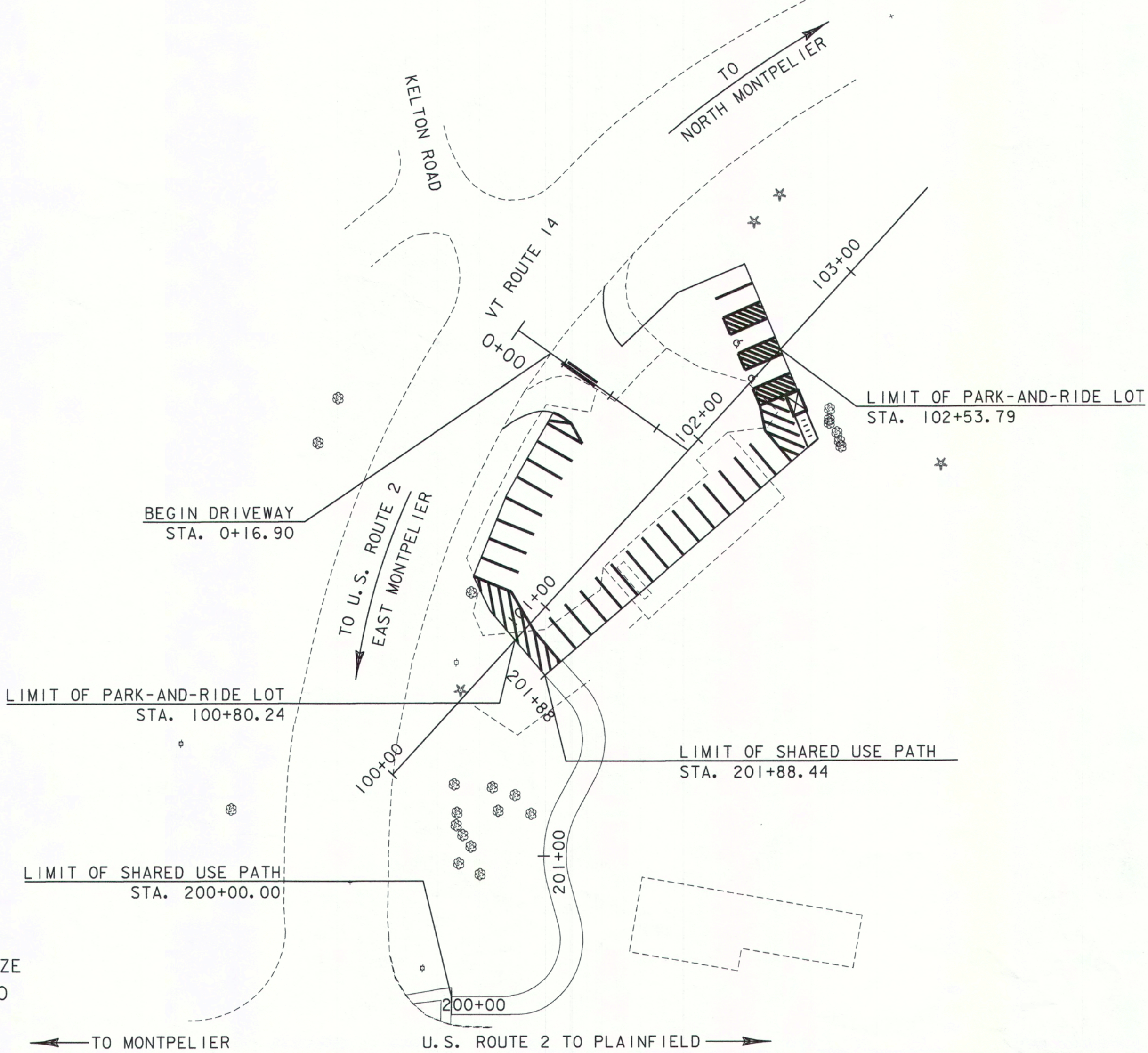
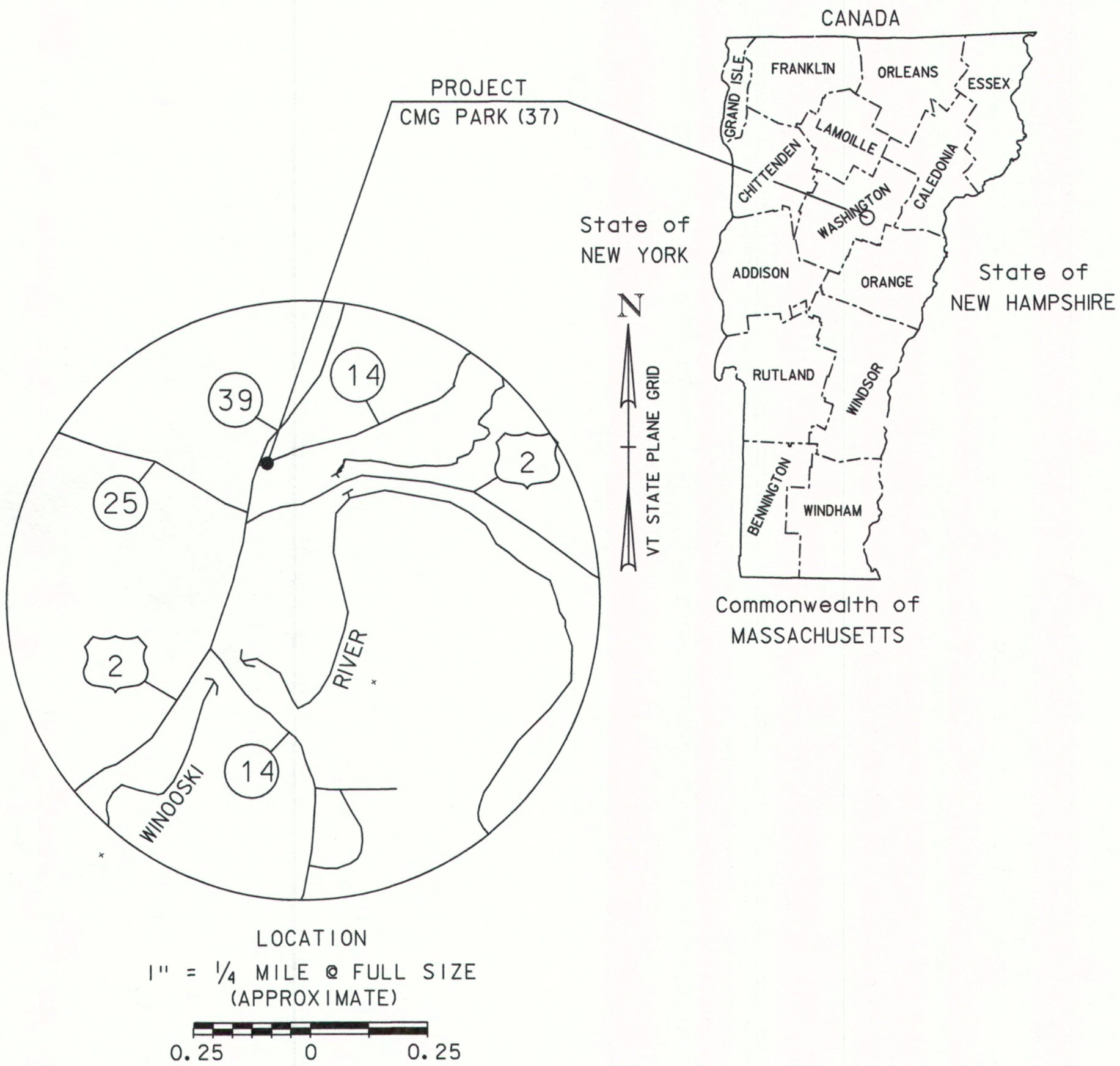


STATE OF VERMONT
AGENCY OF TRANSPORTATION



PROPOSED IMPROVEMENT
TOWN OF EAST MONTPELIER
COUNTY OF WASHINGTON
COMMUTER PARK-AND-RIDE LOT

THIS PROJECT IS LOCATED ON THE EAST SIDE OF VT ROUTE 14 IN THE TOWN OF
EAST MONTPELIER NEAR THE INTERSECTION OF VT ROUTE 14 AND U.S. ROUTE 2
WORK TO BE PERFORMED UNDER THIS PROJECT INCLUDES CONSTRUCTION OF A NEW PARK-AND-RIDE LOT
WITH 27 SPACES, SHARED USE PATH, CONSTRUCTING A BUS SHELTER, SIGNING, PAVEMENT MARKINGS,
LIGHTING AND OTHER HIGHWAY RELATED ITEMS.



CONSTRUCTION IS TO BE CARRIED ON IN ACCORDANCE
WITH THESE PLANS AND THE STANDARD SPECIFICATIONS
FOR CONSTRUCTION DATED 2011, AS APPROVED BY THE
FEDERAL HIGHWAY ADMINISTRATION ON JULY 20, 2011
FOR USE ON THIS PROJECT, INCLUDING ALL SUBSEQUENT
REVISIONS AND SUCH REVISED SPECIFICATIONS AND
SPECIAL PROVISIONS AS ARE INCORPORATED IN THESE
PLANS.

QUALITY ASSURANCE PROGRAM : LEVEL 3	
SURVEYED BY : VT SURVEY & ENGINEERING	
SURVEYED DATE : 3/12	
DATUM	
VERTICAL	NAVD 88 FT
HORIZONTAL	NAD 83 (CORS) SPC (4400 VT) SFT



<p>May 01, 2017</p>	<p>Stantec</p> <p>Stantec Consulting Services Inc. 55 Green Mountain Drive South Burlington VT U.S.A. 05403 Phone: (802) 864-0223 Fax: (802) 864-0165 www.stantec.com</p>	DIRECTOR OF PROJECT DELIVERY
		APPROVED _____ DATE _____
		PROJECT MANAGER : WAYNE L. DAVIS
		PROJECT NAME : E. MONTPELIER PARK-AND-RIDE PROJECT NUMBER : CMG PARK (37) SHEET 1 OF 42 SHEETS

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GENERAL INFORMATION

SYMBOLGY LEGEND NOTE

THE SYMBOLGY ON THIS SHEET IS INTENDED TO COVER STANDARD CONVENTIONAL SYMBOLGY. THE SYMBOLGY IS USED FOR EXISTING & PROPOSED FEATURES WITH HEAVIER LINEWEIGHT, IN COMBINATION WITH PROJECT ANNOTATION, AS NOTED ON PROJECT PLAN SHEETS. THIS LEGEND SHEET COVERS THE BASICS. SYMBOLGY ON PLANS MAY VARY, PLAN ANNOTATIONS AND NOTES SHOULD BE USED TO CLARIFY AS NEEDED.

R. O. W. ABBREVIATIONS (CODES) & SYMBOLS

POINT	CODE	DESCRIPTION
	CH	CHANNEL EASEMENT
	CONST	CONSTRUCTION EASEMENT
	CUL	CULVERT EASEMENT
	D&C	DISCONNECT & CONNECT
	DIT	DITCH EASEMENT
	DR	DRAINAGE EASEMENT
	DRIVE	DRIVEWAY EASEMENT
	EC	EROSION CONTROL
	HWY	HIGHWAY EASEMENT
	I&M	INSTALL & MAINTAIN EASEMENT
	LAND	LANDSCAPE EASEMENT
	R&RES	REMOVE & RESET
	R&REP	REMOVE & REPLACE
	SR	SLOPE RIGHT
	UE	UTILITY EASEMENT
	(P)	PERMANENT EASEMENT
	(T)	TEMPORARY EASEMENT
■	BNDNS	BOUND SET
▣	BNDNS	BOUND TO BE SET
●	IPNS	IRON PIN SET
⊙	IPNS	IRON PIN TO BE SET
⊠	CALC	EXISTING ROW POINT
○	PROW	PROPOSED ROW POINT
[LENGTH]		LENGTH CARRIED ON NEXT SHEET

COMMON TOPOGRAPHIC POINT SYMBOLS

POINT	CODE	DESCRIPTION
⊕	APL	BOUND APPARENT LOCATION
▣	BM	BENCH MARK
▣	BND	BOUND
▣	CB	CATCH BASIN
⊕	COMB	COMBINATION POLE
▣	DITHR	DROP INLET THROATED DNC
⊕	EL	ELECTRIC POWER POLE
⊙	FPOLE	FLAGPOLE
⊙	GASFIL	GAS FILLER
⊙	GP	GUIDE POST
⊗	GSO	GAS SHUT OFF
⊙	GUY	GUY POLE
⊙	GUYW	GUY WIRE
⊗	GV	GATE VALVE
⊕	H	TREE HARDWOOD
△	HCTRL	CONTROL HORIZONTAL
△	HVCTRL	CONTROL HORIZ. & VERTICAL
◇	HYD	HYDRANT
⊙	IP	IRON PIN
⊙	IPIPE	IRON PIPE
⊕	LI	LIGHT - STREET OR YARD
⊕	MB	MAILBOX
○	MH	MANHOLE (MH)
▣	MM	MILE MARKER
⊙	PM	PARKING METER
▣	PMK	PROJECT MARKER
⊙	POST	POST STONE/WOOD
⊕	RRSIG	RAILROAD SIGNAL
⊕	RRSL	RAILROAD SWITCH LEVER
⊕	S	TREE SOFTWOOD
⊕	SAT	SATELLITE DISH
⊕	SHRUB	SHRUB
⊕	SIGN	SIGN
⊕	STUMP	STUMP
⊕	TEL	TELEPHONE POLE
⊙	TIE	TIE
⊕	TSIGN	SIGN W/DOUBLE POST
⊕	VCTRL	CONTROL VERTICAL
⊙	WELL	WELL
⊗	WSO	WATER SHUT OFF

THESE ARE COMMON VAOT SURVEY POINT SYMBOLS FOR EXISTING FEATURES, ALSO USED FOR PROPOSED FEATURES WITH HEAVIER LINEWEIGHT, IN COMBINATION WITH PROPOSED ANNOTATION.

PROPOSED GEOMETRY CODES

CODE	DESCRIPTION
PC	POINT OF CURVATURE
PI	POINT OF INTERSECTION
CC	CENTER OF CURVE
PT	POINT OF TANGENCY
PCC	POINT OF COMPOUND CURVE
PRC	POINT OF REVERSE CURVE
POB	POINT OF BEGINNING
POE	POINT OF ENDING
STA	STATION PREFIX
AH	AHEAD STATION SUFFIX
BK	BACK STATION SUFFIX
D	CURVE DEGREE OF (100FT)
R	CURVE RADUIS OF
T	CURVE TANGENT LENGTH
L	CURVE LENGTH OF
E	CURVE EXTERNAL DISTANCE

UTILITY SYMBOLGY

UNDERGROUND UTILITIES

— UT —	· · · · ·	TELEPHONE
— UE —	· · · · ·	ELECTRIC
— UC —	· · · · ·	CABLE (TV)
— UEC —	· · · · ·	ELECTRIC+CABLE
— UET —	· · · · ·	ELECTRIC+TELEPHONE
— UCT —	· · · · ·	CABLE+TELEPHONE
— UECT —	· · · · ·	ELECTRIC+CABLE+TELEP.
— G —	· · · · ·	GAS LINE
— W —	· · · · ·	WATER LINE
— S —	· · · · ·	SANITARY SEWER (SEPTIC)

ABOVE GROUND UTILITIES (AERIAL)

— T —	· · · · ·	TELEPHONE
— E —	· · · · ·	ELECTRIC
— C —	· · · · ·	CABLE (TV)
— EC —	· · · · ·	ELECTRIC+CABLE
— ET —	· · · · ·	ELECTRIC+TELEPHONE
— AER E&T —	· · · · ·	ELECTRIC+TELEPHONE
— CT —	· · · · ·	CABLE+TELEPHONE
— ECT —	· · · · ·	ELECTRIC+CABLE+TELEP.
—	· · · · ·	UTILITY POLE GUY WIRE

PROJECT CONSTRUCTION SYMBOLGY

PROJECT DESIGN & LAYOUT SYMBOLGY

— · · · · · —	CLEAR ZONE
—————	PLAN LAYOUT MATCHLINE

PROJECT CONSTRUCTION FEATURES

△ — △ — △ — △	TOP OF CUT SLOPE
○ — ○ — ○ — ○	TOE OF FILL SLOPE
⊗ ⊗ ⊗ ⊗ ⊗ ⊗	STONE FILL
-----	BOTTOM OF DITCH 'L
=====	CULVERT PROPOSED
-----	STRUCTURE SUBSURFACE
PDF — PDF —	PROJECT DEMARCATION FENCE
BF — × × × × BF — × ×	BARRIER FENCE
xxxxxxxxxxxxxxxxxxxx	TREE PROTECTION ZONE (TPZ)
//////	STRIPING LINE REMOVAL
~~~~~	SHEET PILES

CONVENTIONAL BOUNDARY SYMBOLGY

BOUNDARY LINES

—————	TOWN LINE	TOWN BOUNDARY LINE
—————	COUNTY LINE	COUNTY BOUNDARY LINE
—————	STATE LINE	STATE BOUNDARY LINE
——— / — / —		PROPOSED STATE R.O.W. (LIMITED ACCESS)
——— / —		PROPOSED STATE R.O.W.
——— / —		STATE ROW (LIMITED ACCESS)
——— —		STATE ROW
——— —		TOWN ROW
— · · · · · —		PERMANENT EASEMENT LINE (P)
- - - - -		TEMPORARY EASEMENT LINE (T)
+ ——— +		SURVEY LINE
· · · · ·		PROPERTY LINE (P/L)
△ SR ○ SR △ SR ○		SLOPE RIGHTS
6f ——— 6f ———		6F PROPERTY BOUNDARY
4f ——— 4f ———		4F PROPERTY BOUNDARY
HAZ ——— HAZ ———		HAZARDOUS WASTE

EPSC LAYOUT PLAN SYMBOLGY

EPSC MEASURES

ONNOONNOONNO	FILTER CURTAIN
— — — — —	SILT FENCE
— × — × — × —	SILT FENCE WOVEN WIRE
▶ —▶ —▶ —	CHECK DAM
▣	DISTURBED AREAS REQUIRING RE-VEGETATION
⊗	EROSION MATTING

ENVIRONMENTAL RESOURCES

———	WETLAND BOUNDARY
-----	RIPARIAN BUFFER ZONE
-----	WETLAND BUFFER ZONE
-----	SOIL TYPE BOUNDARY
———	THREATENED & ENDANGERED SPECIES
HAZ — HAZ —	HAZARDOUS WASTE AREA
———	AGRICULTURAL LAND
———	FISH & WILDLIFE HABITAT
———	FLOOD PLAIN
———	ORDINARY HIGH WATER (OHW)
———	STORM WATER
———	USDA FOREST SERVICE LANDS
———	WILDLIFE HABITAT SUIT/CONN

ARCHEOLOGICAL & HISTORIC

———	ARCHEOLOGICAL BOUNDARY
———	HISTORIC DISTRICT BOUNDARY
———	HISTORIC AREA
Ⓜ	HISTORIC STRUCTURE

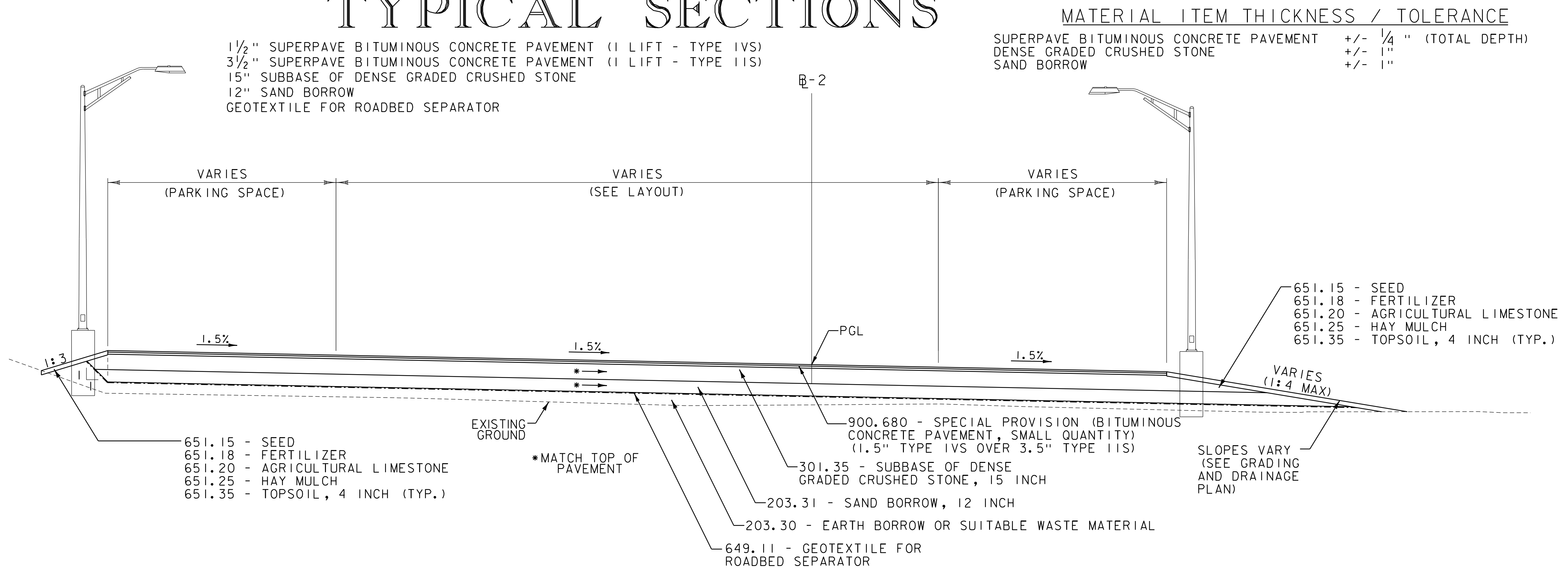
CONVENTIONAL TOPOGRAPHIC SYMBOLGY

EXISTING FEATURES

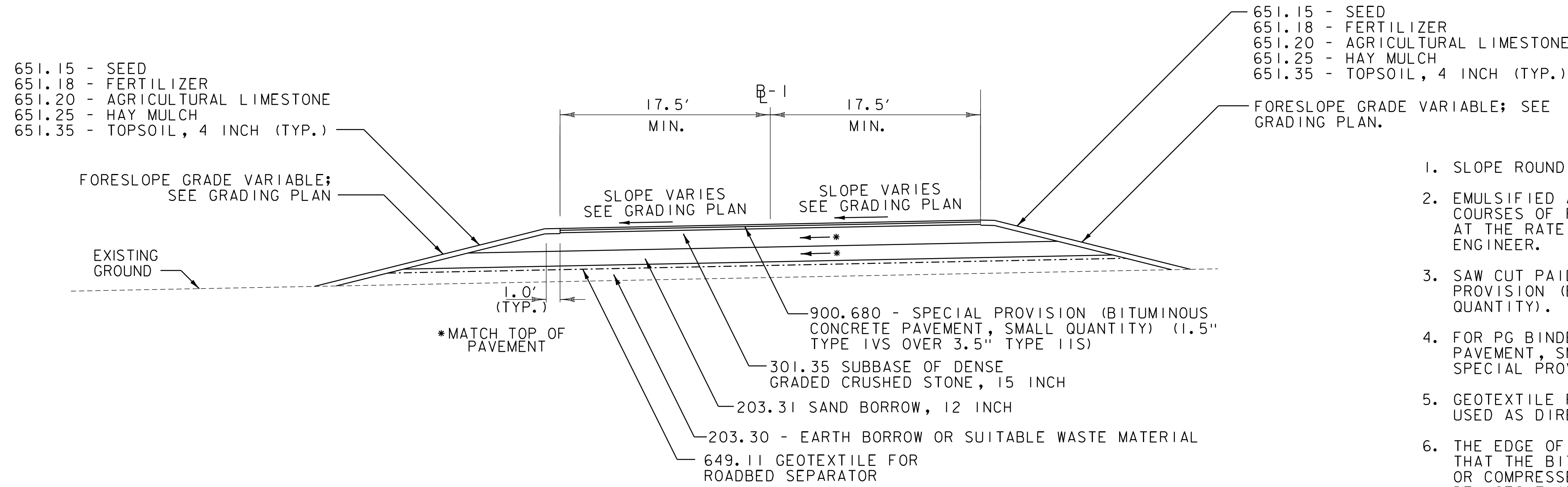
-----	ROAD EDGE PAVEMENT
-----	ROAD EDGE GRAVEL
-----	DRIVEWAY EDGE
-----	DITCH
———	FOUNDATION
× — × — × — × —	FENCE (EXISTING)
□ — □ — □ — □ —	FENCE WOOD POST
○ — ○ — ○ — ○ —	FENCE STEEL POST
~~~~~	GARDEN
○ — ○ — ○ — ○ —	ROAD GUARDRAIL
	RAILROAD TRACKS
-----	CULVERT (EXISTING)
○○○○○○○○○○○○○○○○	STONE WALL
-----	WALL
~~~~~	WOOD LINE
~~~~~	BRUSH LINE
~~~~~	HEDGE
———	BODY OF WATER EDGE
	LEDGE EXPOSED

PROJECT NAME:	EAST MONTEPELIER PARK-AND-RIDE
PROJECT NUMBER:	CMG PARK(37)
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: VTRANS	DRAWN BY: VTRANS
DESIGNED BY: VTRANS	CHECKED BY: VTRANS
CONVENTIONAL SYMBOLGY & LEGEND SHEET SHEET 3 OF 42	

# TYPICAL SECTIONS



PARK-AND-RIDE TYPICAL SECTION  
(PERPENDICULAR TO BASELINE 2, SEE LAYOUT PLAN)  
NOT TO SCALE



PARK-AND-RIDE DRIVEWAY ENTRANCE TYPICAL SECTION (ALONG BASELINE 1)  
NOT TO SCALE

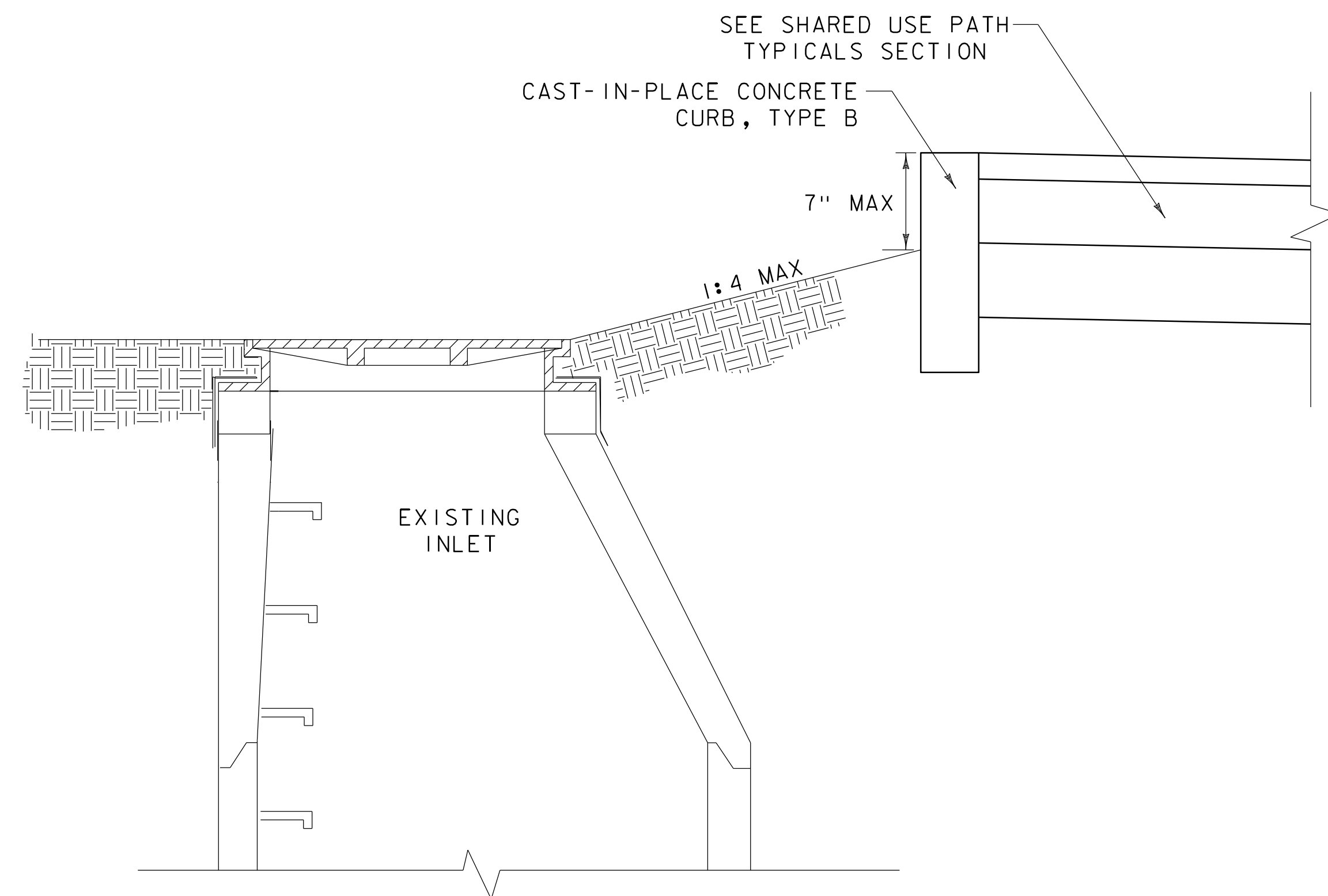
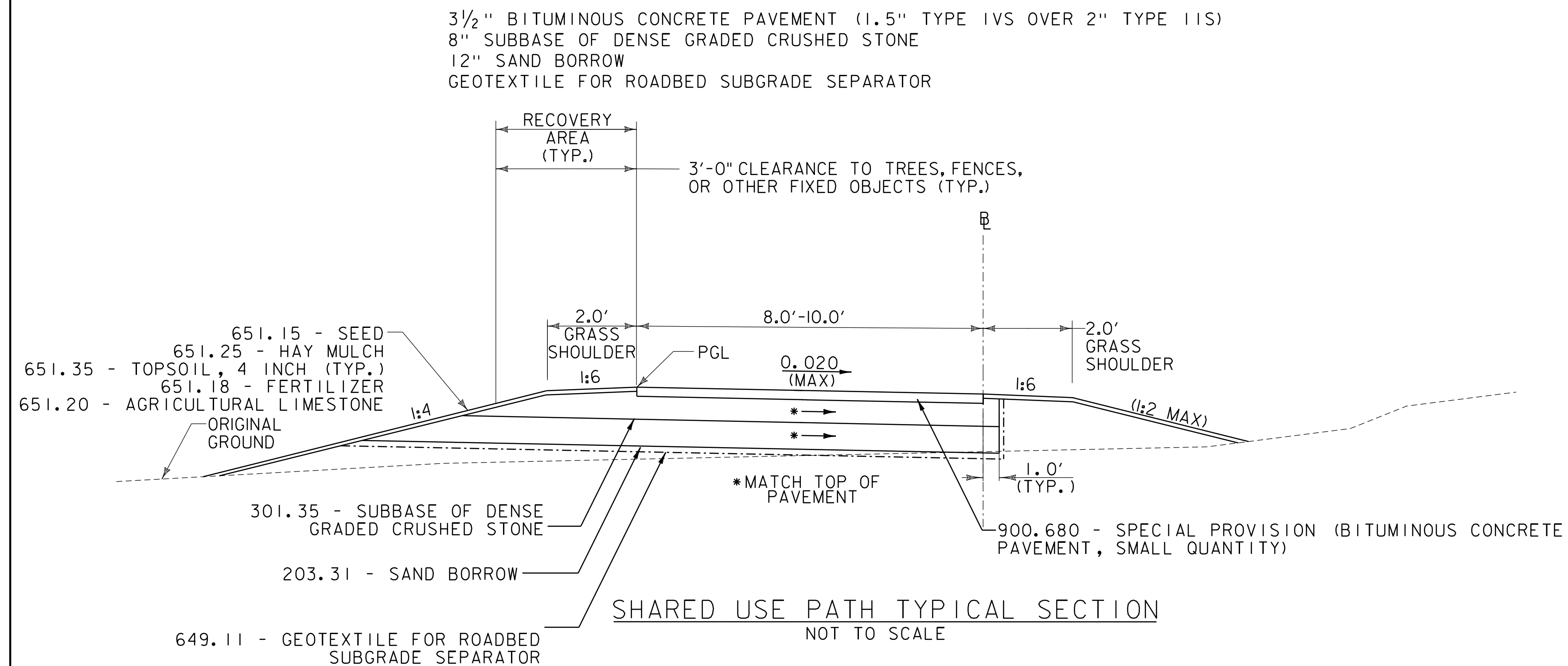
1 1/2" SUPERPAVE BITUMINOUS CONCRETE PAVEMENT (1 LIFT - TYPE IVS)  
3 1/2" SUPERPAVE BITUMINOUS CONCRETE PAVEMENT (1 LIFT - TYPE IIS)  
15" SUBBASE OF DENSE GRADED CRUSHED STONE  
12" SAND BORROW  
GEOTEXTILE FOR ROADBED SEPARATOR

## GENERAL NOTES

1. SLOPE ROUNDING: CUT SLOPES WILL NOT BE ROUNDED.
2. EMULSIFIED ASPHALT SHALL BE APPLIED BETWEEN ALL COURSES OF PAVEMENT AND ON ALL COLD PLANED SURFACES AT THE RATE OF 0.025 GAL/SY OR AS DIRECTED BY THE ENGINEER.
3. SAW CUT PAID INCIDENTAL TO ITEM 900.680 SPECIAL PROVISION (BITUMINOUS CONCRETE PAVEMENT, SMALL QUANTITY).
4. FOR PG BINDER GRADE SEE BITUMINOUS CONCRETE PAVEMENT, SMALL QUANTITY OF SECTION 900 OF THE SPECIAL PROVISIONS.
5. GEOTEXTILE FOR ROADBED SEPARATOR TO BE USED AS DIRECTED BY THE ENGINEER.
6. THE EDGE OF PAVEMENT SHALL BE FORMED IN SUCH A WAY THAT THE BITUMINOUS CONCRETE PAVEMENT IS EXTRUDED OR COMPRESSED TO FORM THE 30 TO 35 DEGREE ANGLE. DEVICES THAT SIMPLY STRIKE-OFF THE MIX WITHOUT PROVIDING ANY COMPACTIVE EFFORT WILL NOT BE ALLOWED. SEE VTRANS SAFETY EDGE DETAILS SHEET HSD-400.01.

PROJECT NAME:	EAST MONTPELIER PARK-AND-RIDE
PROJECT NUMBER:	CMG PARK(37)
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P.ARMATA
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
TYPICAL SECTIONS SHEET 1	SHEET 4 OF 42

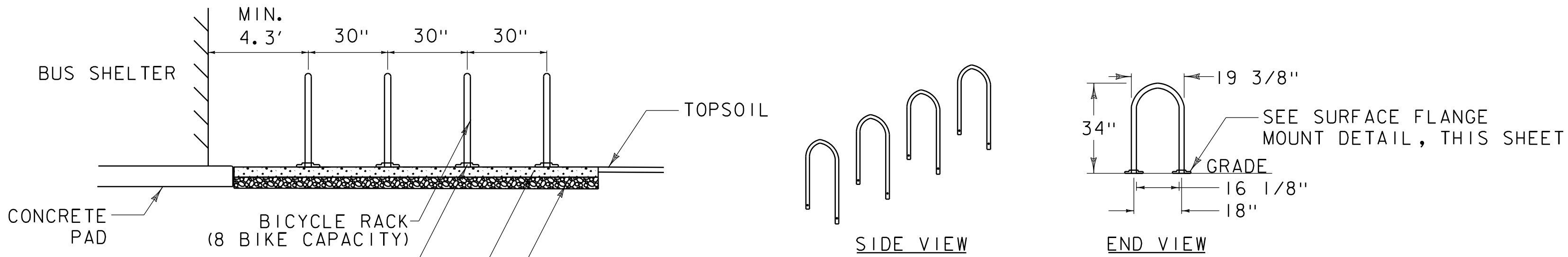




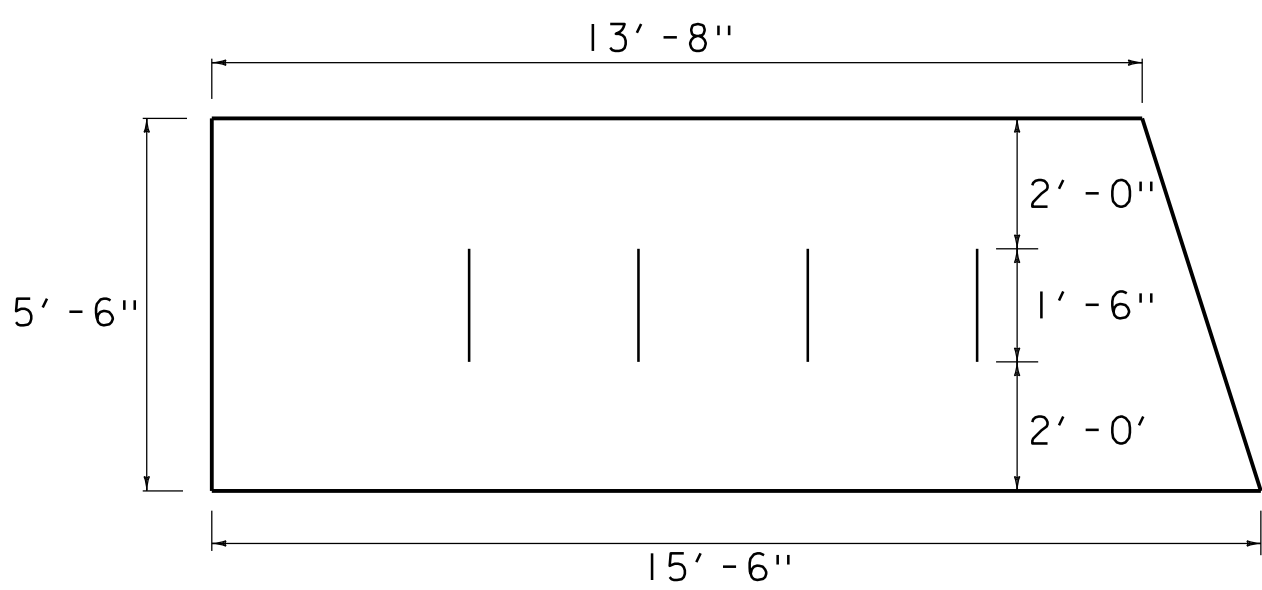
**CURB REVEAL SHARED USE PATH DETAIL**  
 STA. 200+04, LT. - 200+12, LT  
 NOT TO SCALE



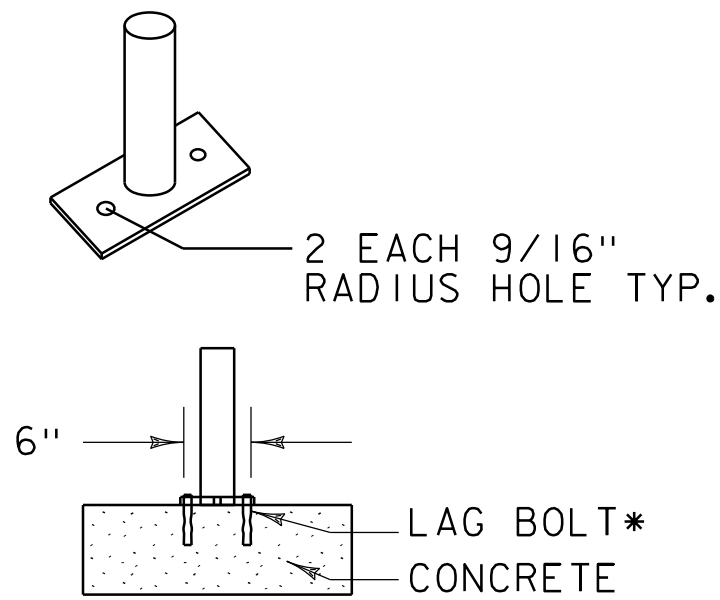
PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P.ARMATA
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
TYPICAL SECTIONS SHEET 2	SHEET 5 OF 42



SPECIAL PROVISION (BICYCLE RACK) DETAIL  
NOT TO SCALE



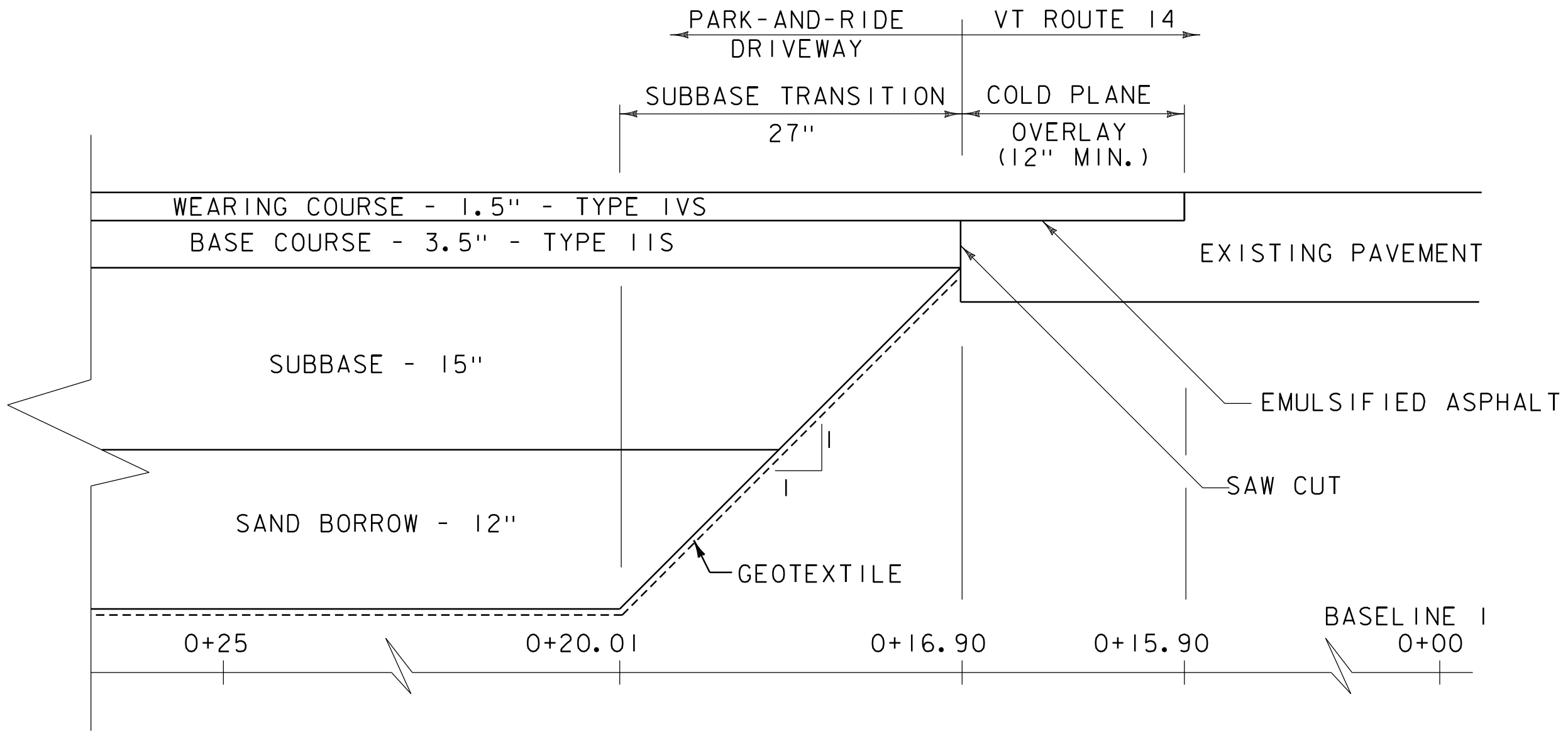
PLAN VIEW



* DIAMETER, LENGTH & MATERIAL  
PER MANUFACTURER'S RECOMMENDATIONS

SURFACE FLANGE MOUNT DETAIL  
NOT TO SCALE

NOTE: BICYCLE RACK, SURFACE FLANGE MOUNT, AND  
LAG BOLTS TO BE PAID UNDER ITEM 900.620  
SPECIAL PROVISION (BICYCLE RACK).



PAVEMENT & SUBBASE TRANSITION (DRIVEWAY)  
NOT TO SCALE

SEEDING FORMULA: LOW GROW / FINE FESCUE				
	LBS/AC			
% WEIGHT	BROADCAST	HYDROSEED	NAME	GERM %
37.6%	75.2	94	CREeping RED FESCUE/DEN	90%
28.4%	56.8	71	SPARTAN HARD FESCUE	85%
14.4%	28.8	36	AZAY SHEEPS FESCUE	87%
14.2%	28.4	35.5	ANNUAL RYEGRASS	90%
1.0%	2	2.5	CROP	
4.3%	8.6	10.8	INERT	
0.1%	0.2	0.2	WEED	
100%	200	250		

PERCENT OF SEED, CROP, WEED OR INERT MAY VARY +/- 2%. VARIETIES OF  
GRASSES MAY BE SUBSTITUTED ONLY WITH APPROVAL FROM RESIDENT ENGINEER.

MOWING: RECOMMENDED EARLY MOWING ONCE OR TWICE WHEN GRASS REACHES 6  
INCHES HEIGHT MAXIMUM TO PREVENT BROADLEAF WEED COMPETITION DURING  
ESTABLISHMENT PERIOD.

FERTILIZER AND LIMESTONE: SHALL FOLLOW RATES SHOWN ON PLAN OR AS  
DIRECTED BY THE ENGINEER

HAY MULCH: TO BE PLACED ON EARTH SLOPES AT THE RATE OF 2 TONS/ACRE,  
ACHIEVE 90% GROUND COVER OR AS DIRECTED BY THE ENGINEER.

TOPSOIL: TO BE USED WITH SEED AS INDICATED ON THE PLANS, OR AS  
DIRECTED BY THE ENGINEER.

HYDROSEEDING: ALTHOUGH GUIDANCE IS GIVEN ABOVE THE SITE CONDITIONS  
AND THE TYPE OF HYDROSEED WILL ULTIMATELY DICTATE THE AMOUNTS AND  
TYPES OF SOIL AMENDMENTS TO BE APPLIED

TURF ESTABLISHMENT: PLACING SEED, FERTILIZER, LIME AND MULCH PRIOR  
TO SEPTEMBER 15 AND AFTER APRIL 15 CAN BETTER ENSURE A VIGOROUS  
GROWTH OF GRASS.

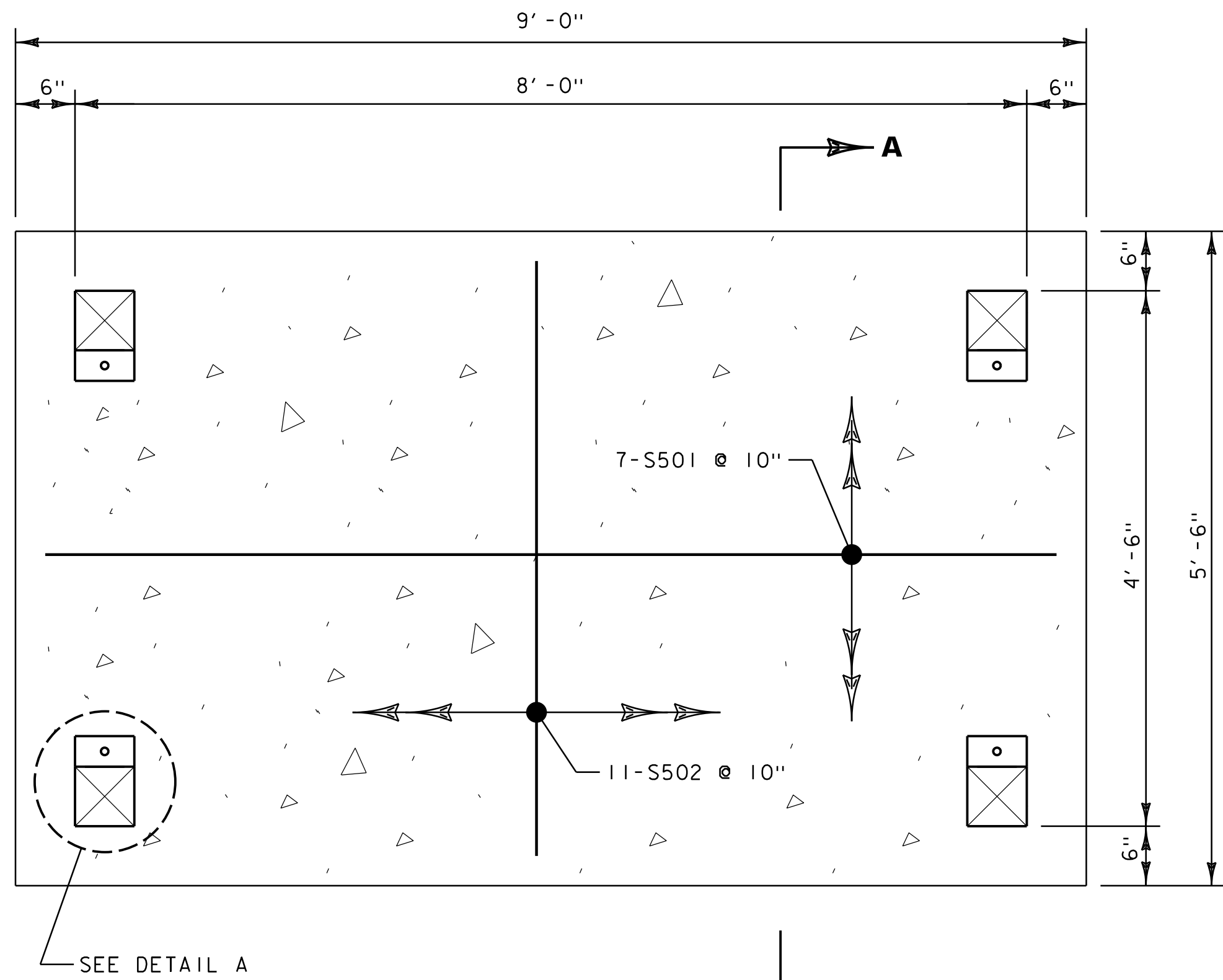
PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
PROJECT NUMBER: CMG PARK(37)

FILE NAME: ...drawing\zllk350+yp.dgn  
PROJECT LEADER: G. SANTY  
DESIGNED BY: G. BURGMEIER  
DETAILS SHEET

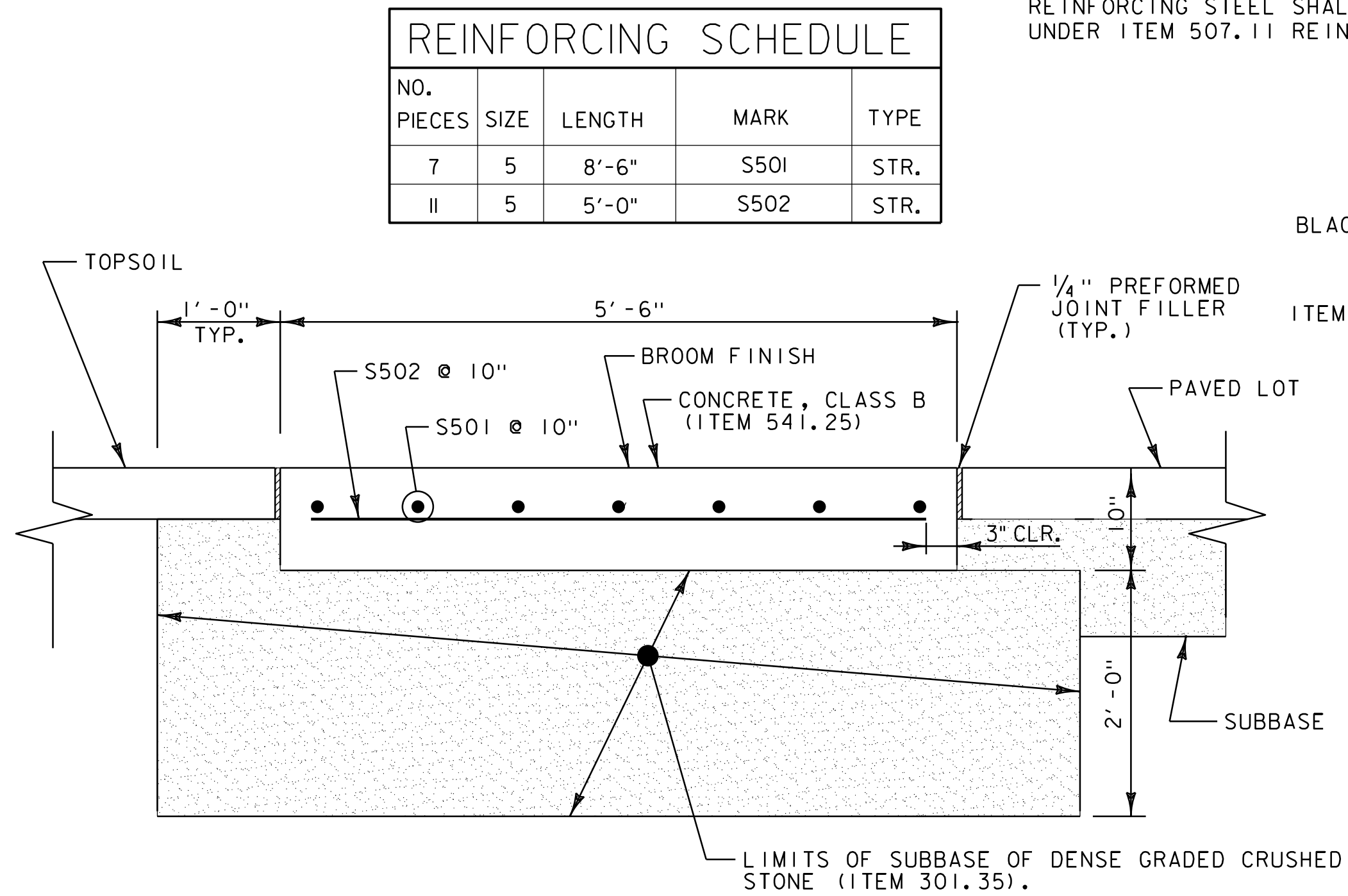
PLOT DATE: 5/2/2017  
DRAWN BY: P.ARMATA  
CHECKED BY: G. SANTY  
SHEET 6 OF 42







PLAN  
SCALE: 1" = 1'-0"



SECTION A-A  
SCALE: 1" = 1'-0"

BUS SHELTER SLAB DETAIL

NOTES:  
REINFORCING STEEL SHALL BE PAID  
UNDER ITEM 507.11 REINFORCING STEEL, LEVEL 1.

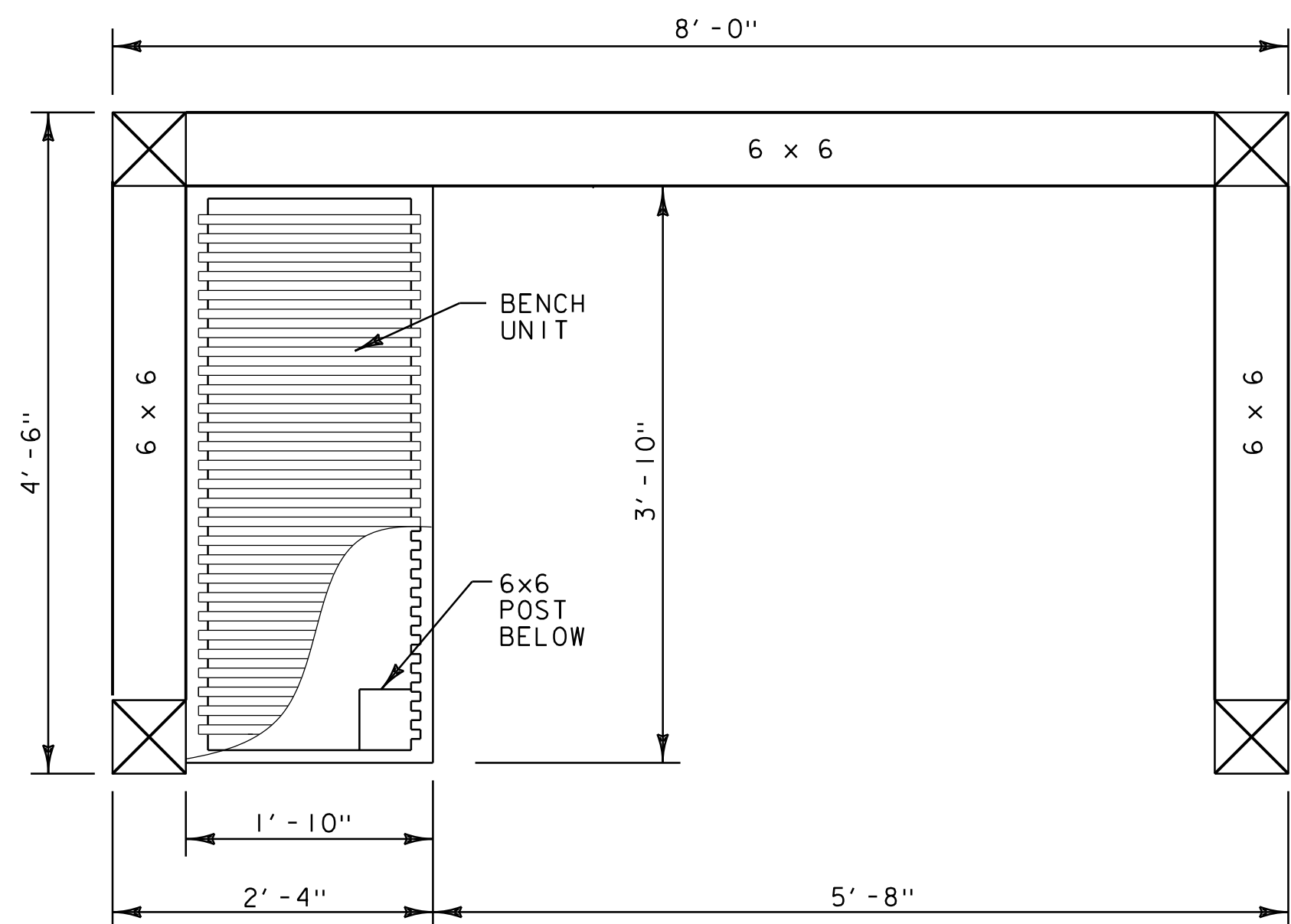
BLACK GALVANIZED POST CONNECTION PLATE WITH  
A 3/4" BLACK GALVANIZED BOLT AND NUT AND  
A 3" SQUARE BLACK GALVANIZED WASHER  
INCLUDED IN THE UNIT PRICE BID FOR  
ITEM 900.645 SPECIAL PROVISION (BUS SHELTER)

3/4" BLACK GALVANIZED WASHER  
3/8" BLACK GALVANIZED  
STEEL PLATE (TYP.)

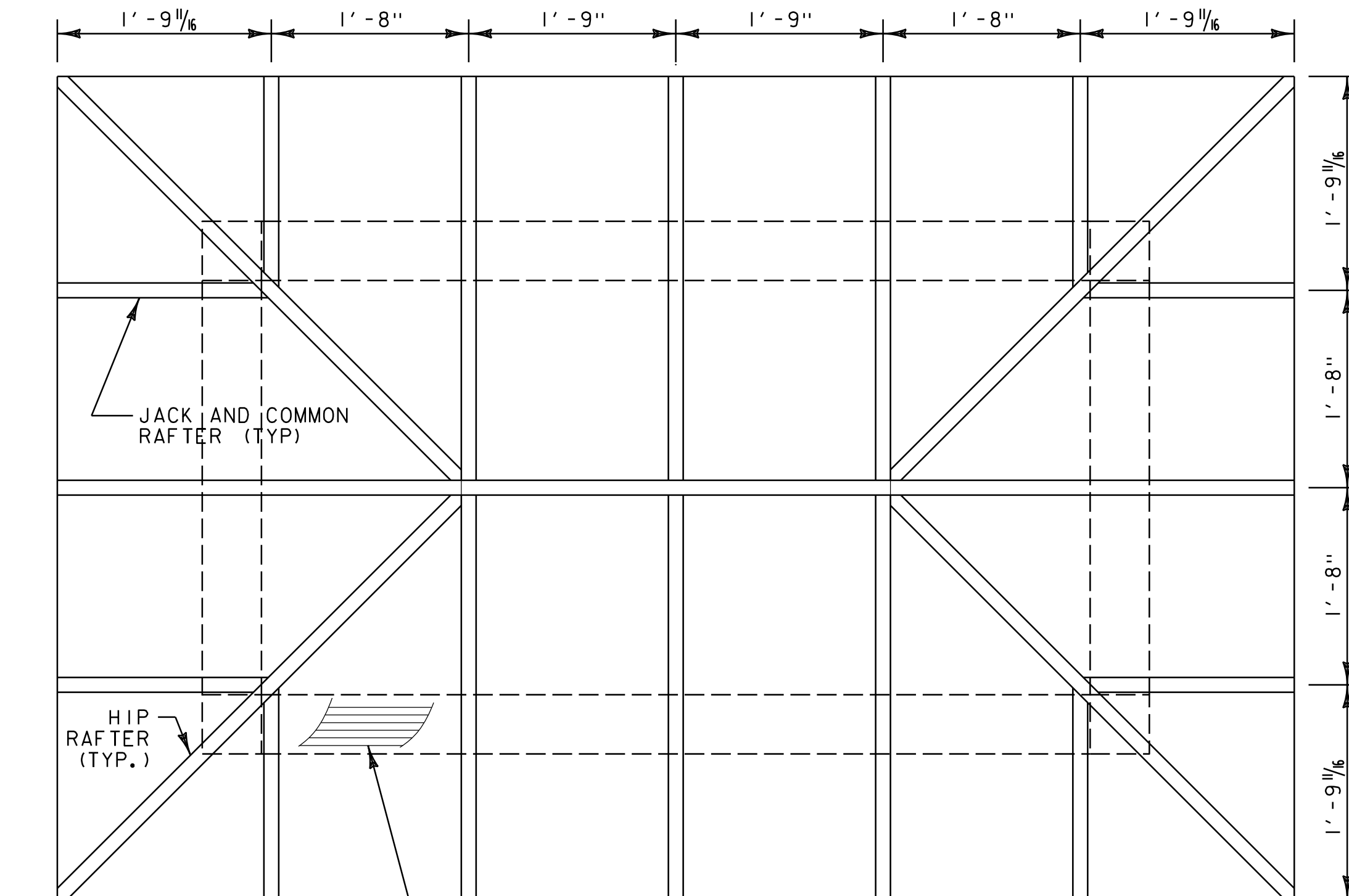
3/4" BLACK GALVANIZED ANCHOR BOLT MEETING  
ASTM F1554, GRADE 55 OR EQUAL, & ANCHOR 7"  
BOLTS, BEARING DEVICES ITEM NO 714.08 2"  
INCIDENTAL TO ITEM 541.25

NOTE: DRILL AND EPOXY ANCHORING WILL  
BE PERMITTED. MINIMUM 3/4" ANCHOR ROD  
EMBEDMENT INTO CONCRETE SHALL BE 6" AND  
HAVE A MINIMUM PULL OUT STRENGTH OF  
3,000 LBS.

DETAIL A  
NOT TO SCALE



PLAN VIEW  
SCALE: 1" = 1'-0"



ROOF DECKING TO BE NOMINAL  
2x6 V-GROOVE, T&G ROOF DECK.

NOTES:  
1. JACK AND COMMON RAFTERS ARE 2x6.  
2. HIP RAFTERS ARE 2x7  
3. RIDGE BEAM IS 2x8

ROOF FRAMING  
SCALE: 1" = 1'-0"

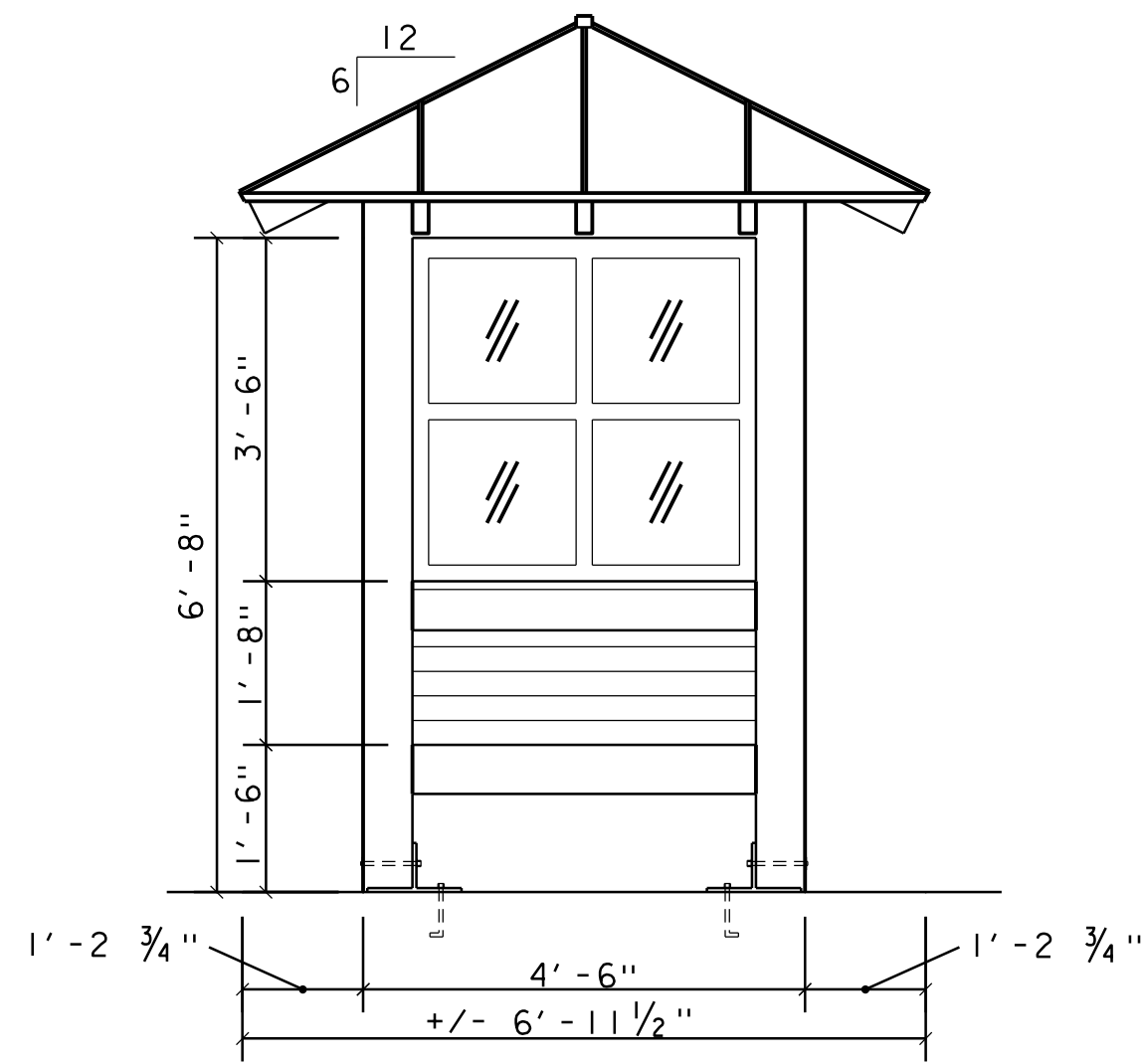
- NOTES:
- ALL MATERIALS AND CONSTRUCTION SHALL CONFORM TO STATE OF VERMONT AGENCY OF TRANSPORTATION, 2011 STANDARD SPECIFICATIONS FOR HIGHWAY AND BRIDGE CONSTRUCTION, ITS LATEST REVISIONS, AND THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS, DATED 2010, AND ITS LATEST REVISIONS.
  - REINFORCING PLACEMENT TOLERANCES SHALL BE:  
SPACING +/- 1"  
CLEARANCE +/- 1/4"
  - ALL EXPOSED EDGES OF CONCRETE SHALL BE CHAMFERED 1/2" BY 1/2"
  - WATER REPELLENT SILANE (ITEM 514.10) SHALL BE APPLIED TO ALL EXPOSED CONCRETE.
  - ALL MATERIALS AND WORK DETAILED ON THIS SHEET SHALL BE INCLUDED UNDER ITEM 900.645 SPECIAL PROVISION (BUS SHELTER) UNLESS OTHERWISE NOTED.
  - ALL WOODEN PEGS SHALL BE 1" DIAMETER OAK.
  - THE STRUCTURE WAS DESIGNED FOR THE FOLLOWING LOADS:  
GROUND SNOW LOAD = 100 psf  
BASIC WIND SPEED = 90 mph  
CATEGORY I
  - ALL DIMENSIONS ARE NOMINAL. MEMBERS SHALL BE SURFACED ON FOUR SIDES.
  - TIMBER FRAMING SHALL BE APPEARANCE GRADE WHITE OAK (NO. 1).  
ROOF SHEATHING SHALL BE NO. 1 OR NO. 2 SPF.  
BENCH FRAMING SHALL BE APPEARANCE GRADE WHITE OAK (NO. 1).
  - SEE BUS SHELTER SPECIAL PROVISION IN CONTRACT DOCUMENTS FOR ADDITIONAL REQUIREMENTS.

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
PROJECT NUMBER: CMG PARK(37)

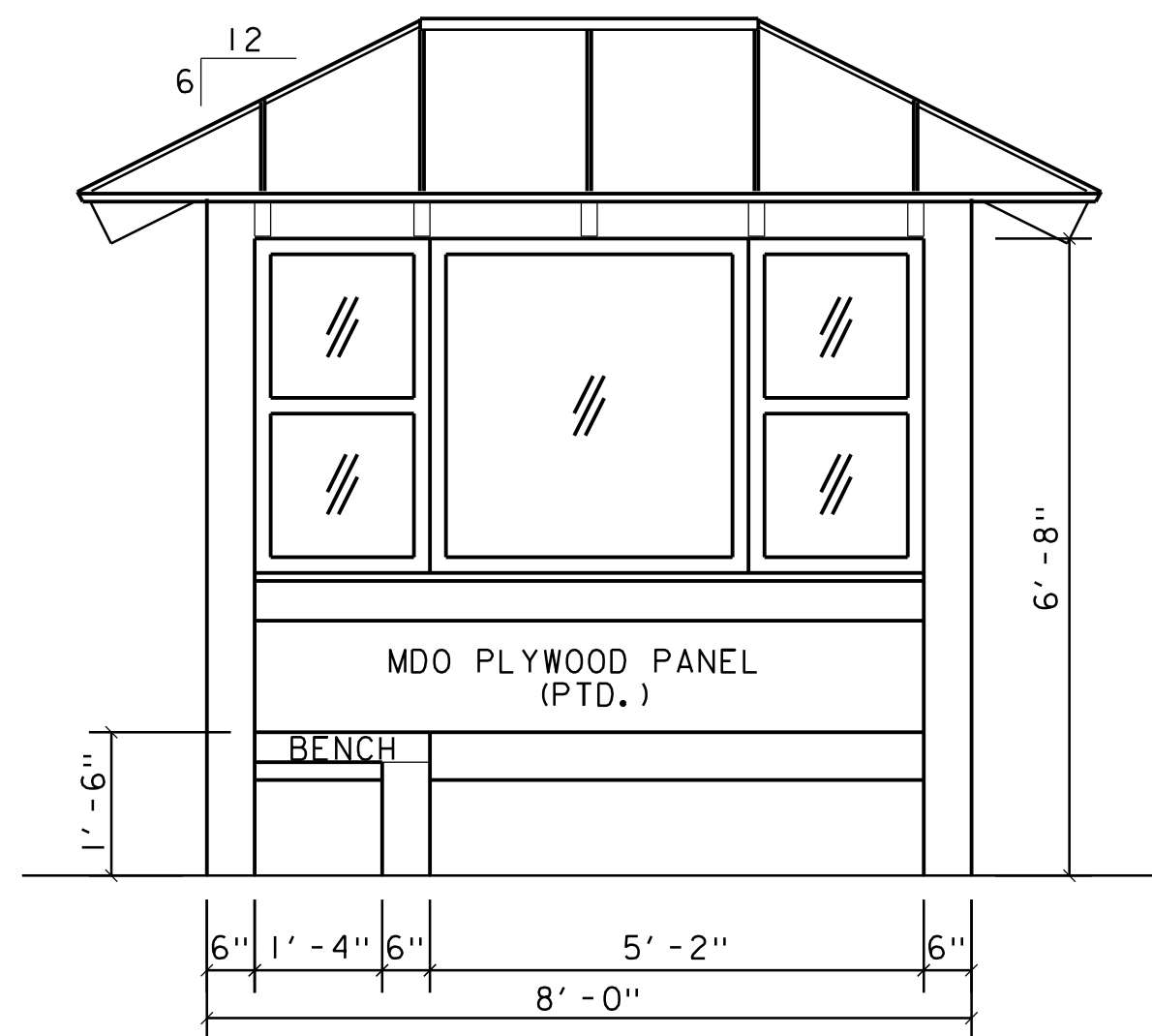
FILE NAME: zlk350shltr_det.dgn  
PROJECT LEADER: G. SANTY  
DESIGNED BY: G. BOGUE  
BUS SHELTER DETAILS I

PLOT DATE: 5/2/2017  
DRAWN BY: L. BUXTON  
CHECKED BY: G. BOGUE  
SHEET 7 OF 42

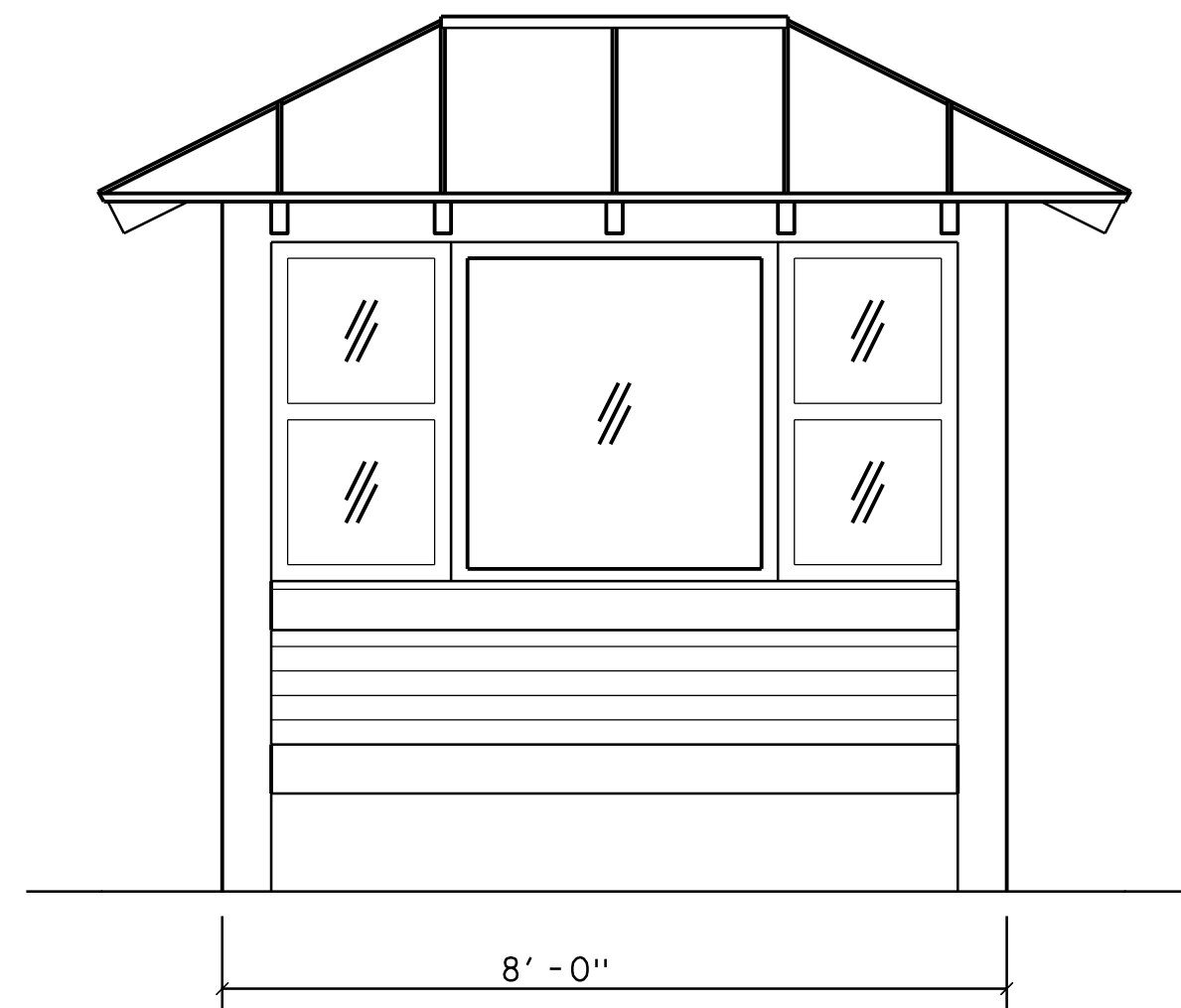




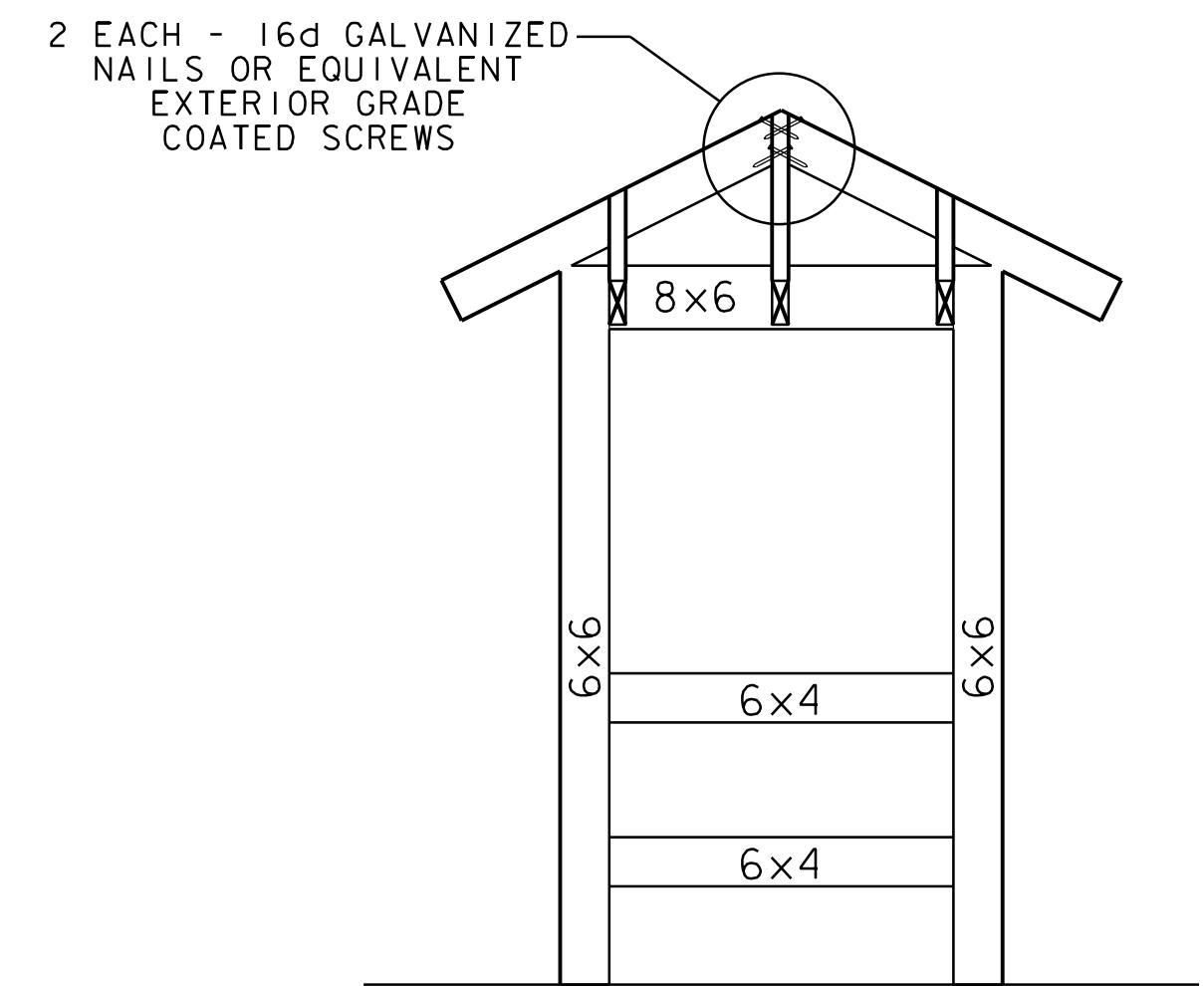
**END ELEVATION (TYP.)**  
SCALE: 1/2" = 1'-0"



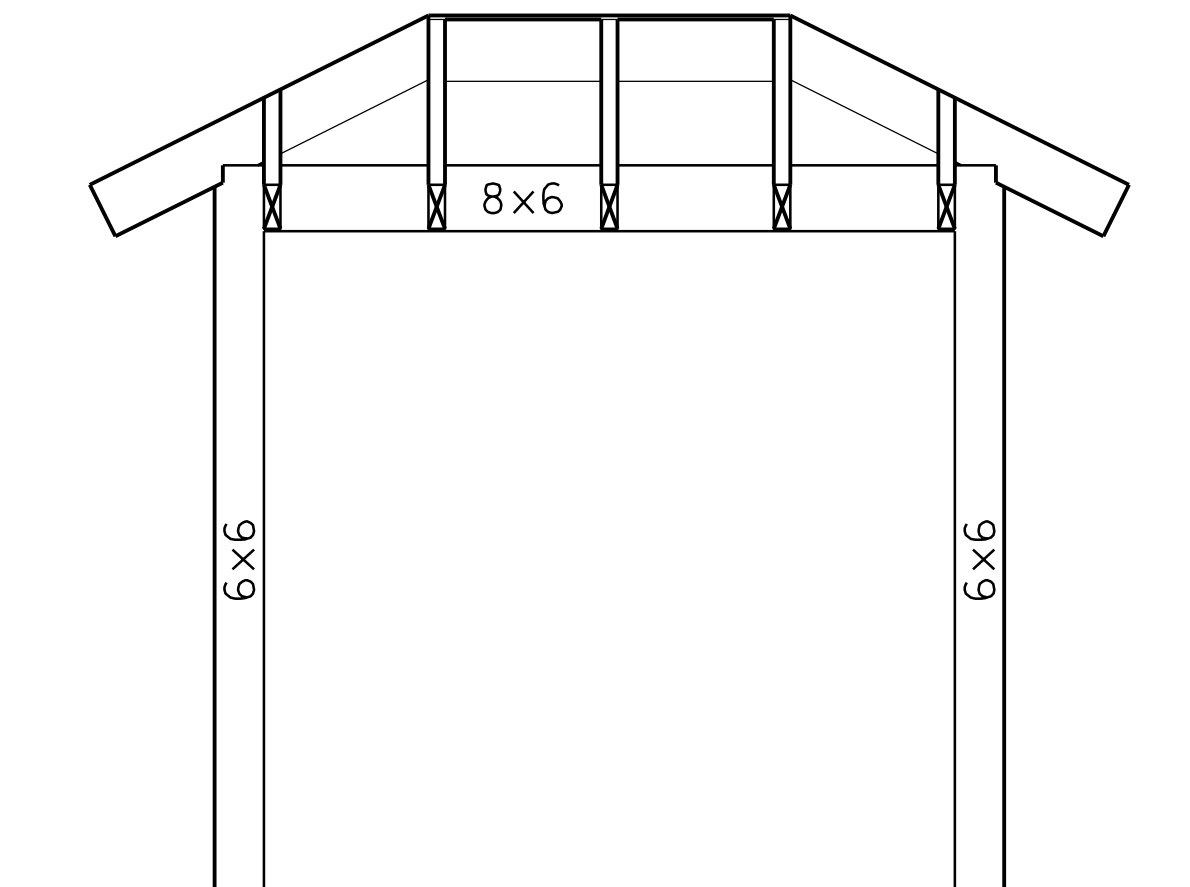
**FRONT/INTERIOR ELEVATION**  
SCALE: 1/2" = 1'-0"



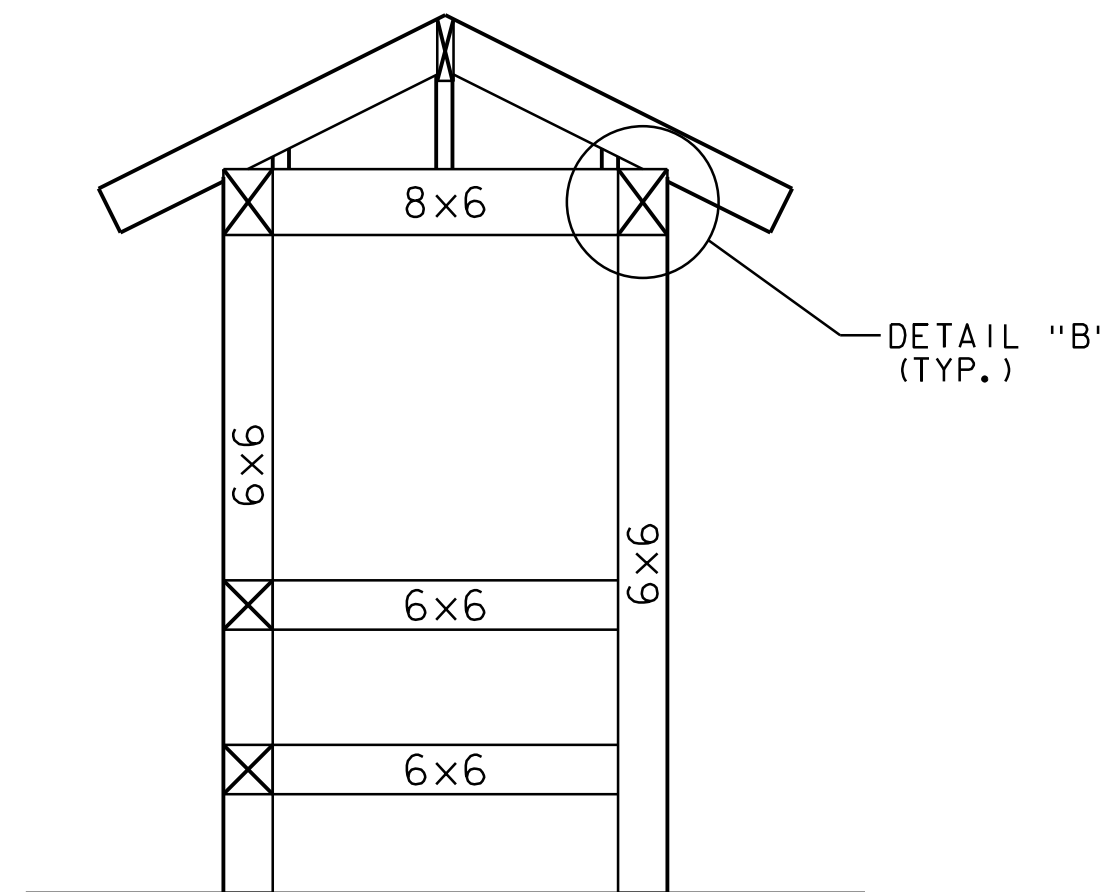
**REAR ELEVATION**  
SCALE: 1/2" = 1'-0"



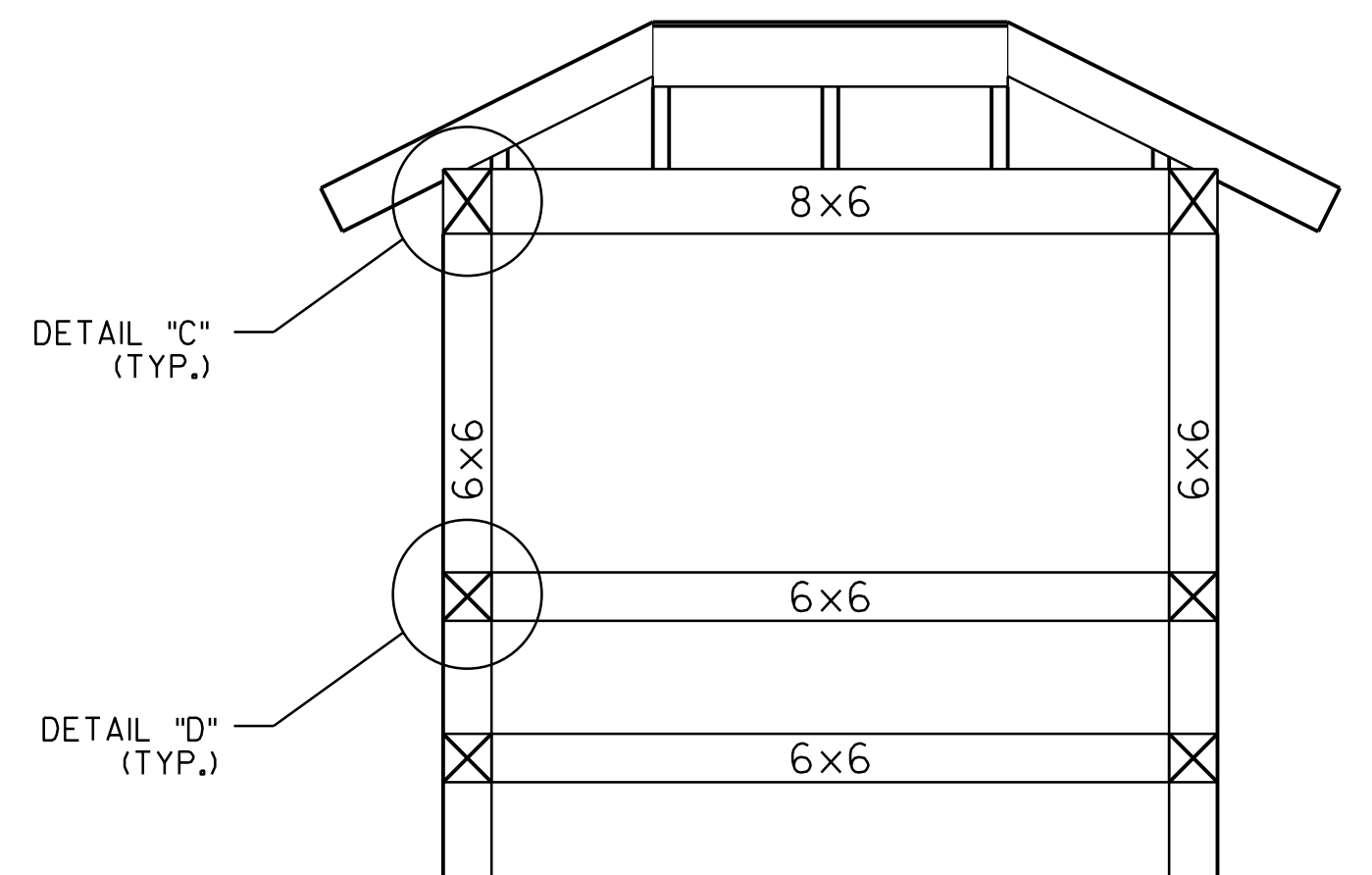
**END FRAMING - ELEVATION**  
SCALE: 1/2" = 1'-0"



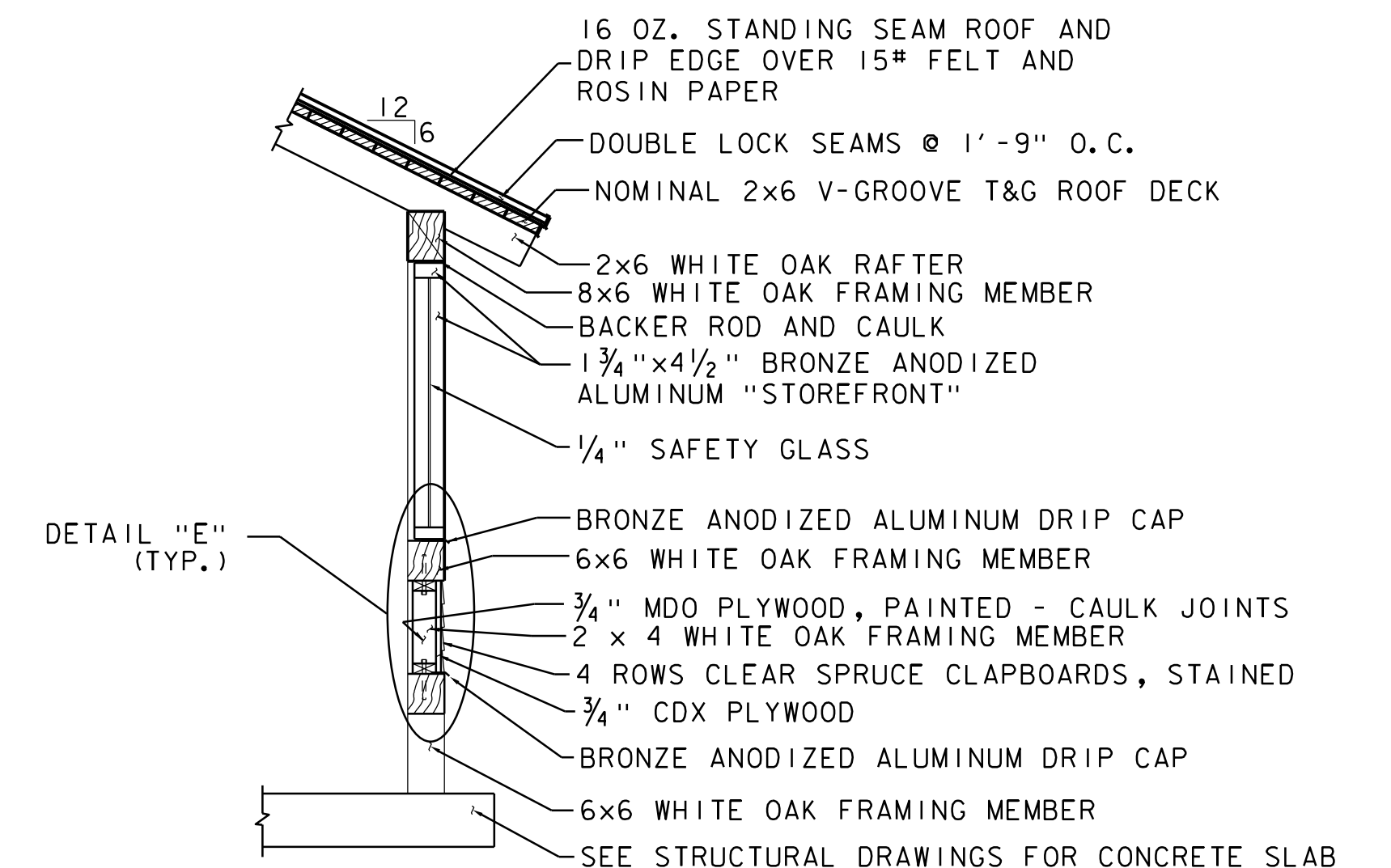
**FRONT/REAR FRAMING - ELEVATION**  
SCALE: 1/2" = 1'-0"



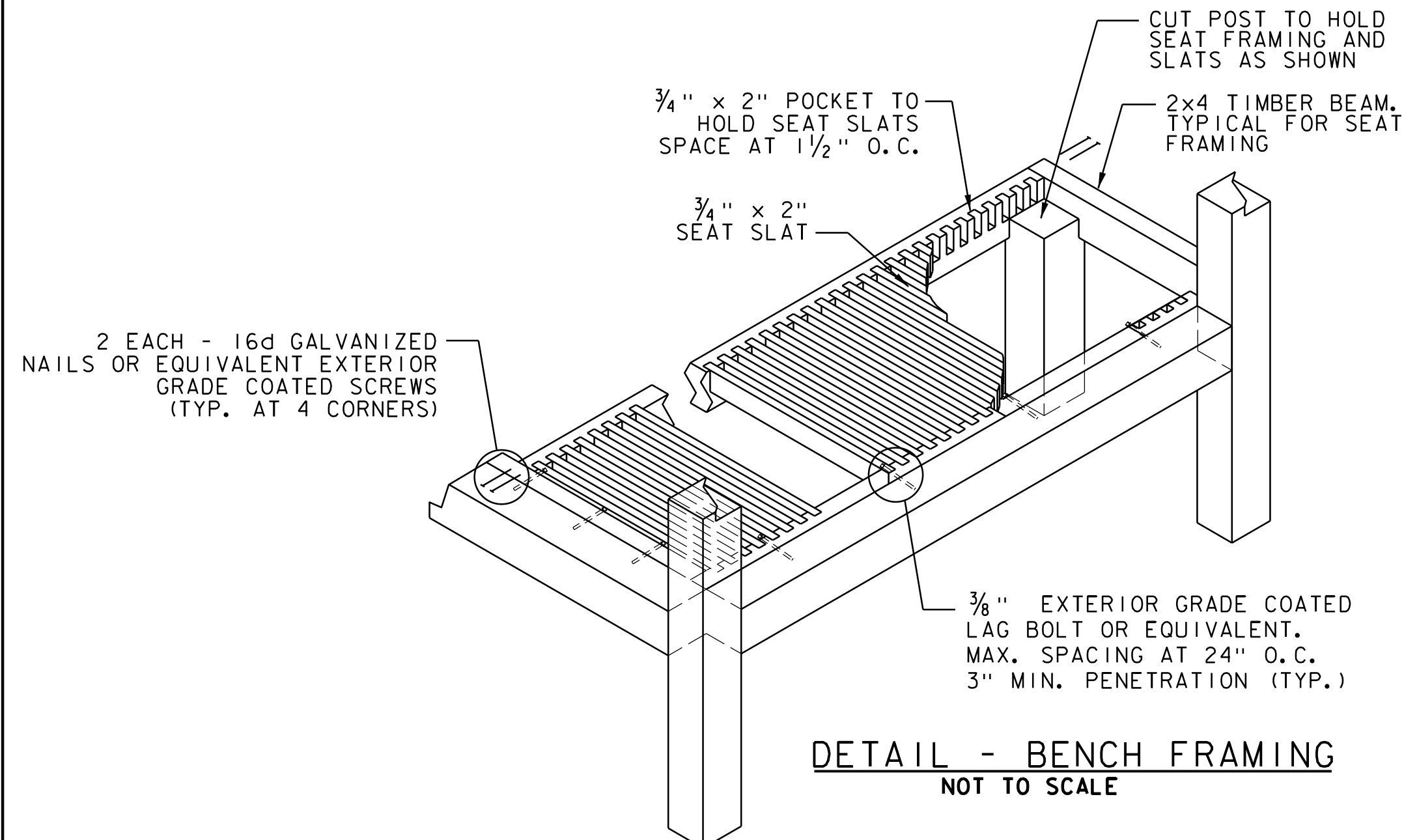
**END FRAMING - SECTION**  
SCALE: 1/2" = 1'-0"



**FRONT/REAR FRAMING - SECTION**  
SCALE: 1/2" = 1'-0"



**TYPICAL WALL SECTION**  
SCALE: 1/2" = 1'-0"



**DETAIL - BENCH FRAMING**  
NOT TO SCALE

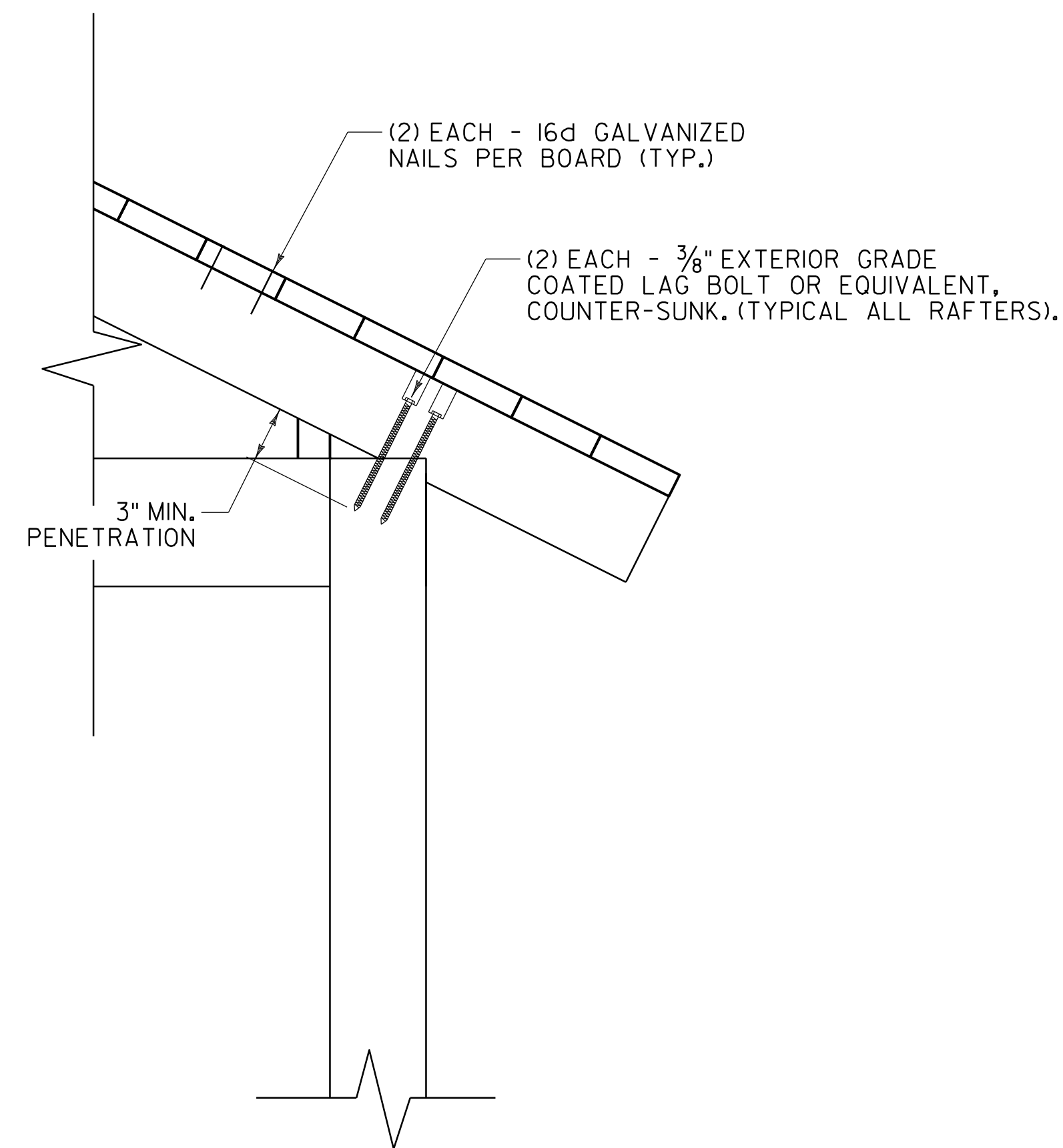
- NOTES**
1. JACK AND COMMON RAFTERS ARE 2x6.
  2. HIP RAFTERS ARE 2x7
  3. RIDGE BEAM IS 2x8

**NOTE:**  
FOR DETAILS B & C, SEE BUS SHELTER DETAILS 3.  
FOR DETAILS D & E, SEE BUS SHELTER DETAILS 4.  
ALL DIMENSIONS IN INCHES UNLESS OTHERWISE NOTED.

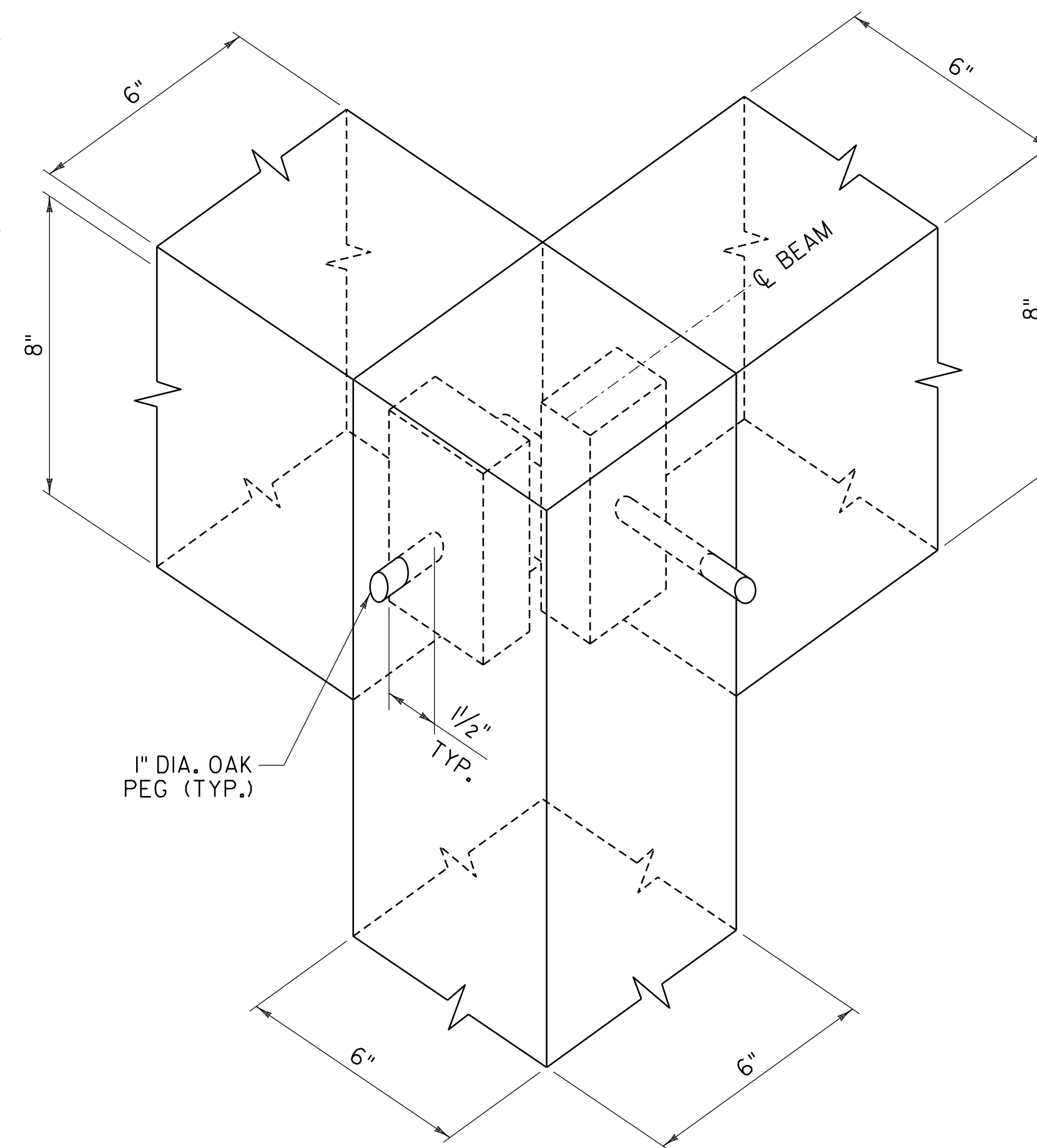
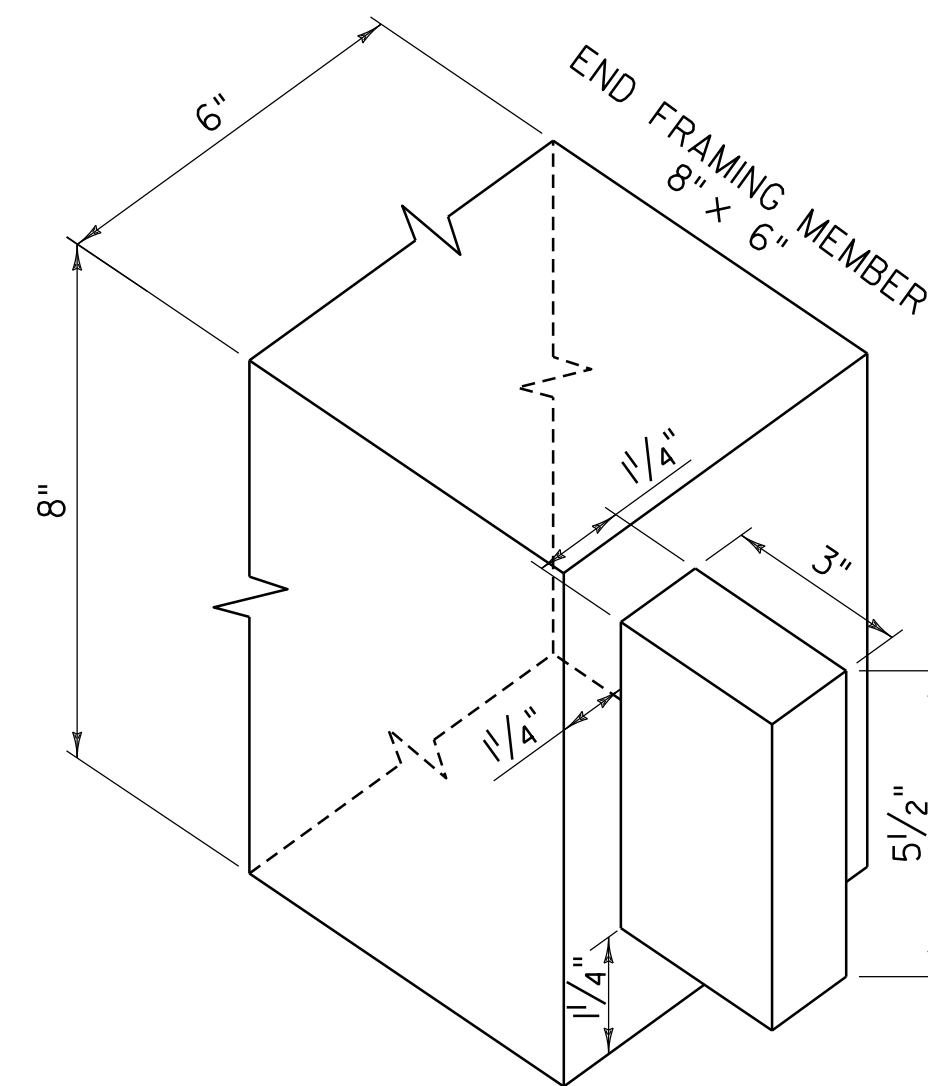
PROJECT NAME: EAST MONTEPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350shltr_det.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: L. BUXTON
DESIGNED BY: G. BOGUE	CHECKED BY: G. BOGUE
BUS SHELTER DETAILS 2	SHEET 8 OF 42



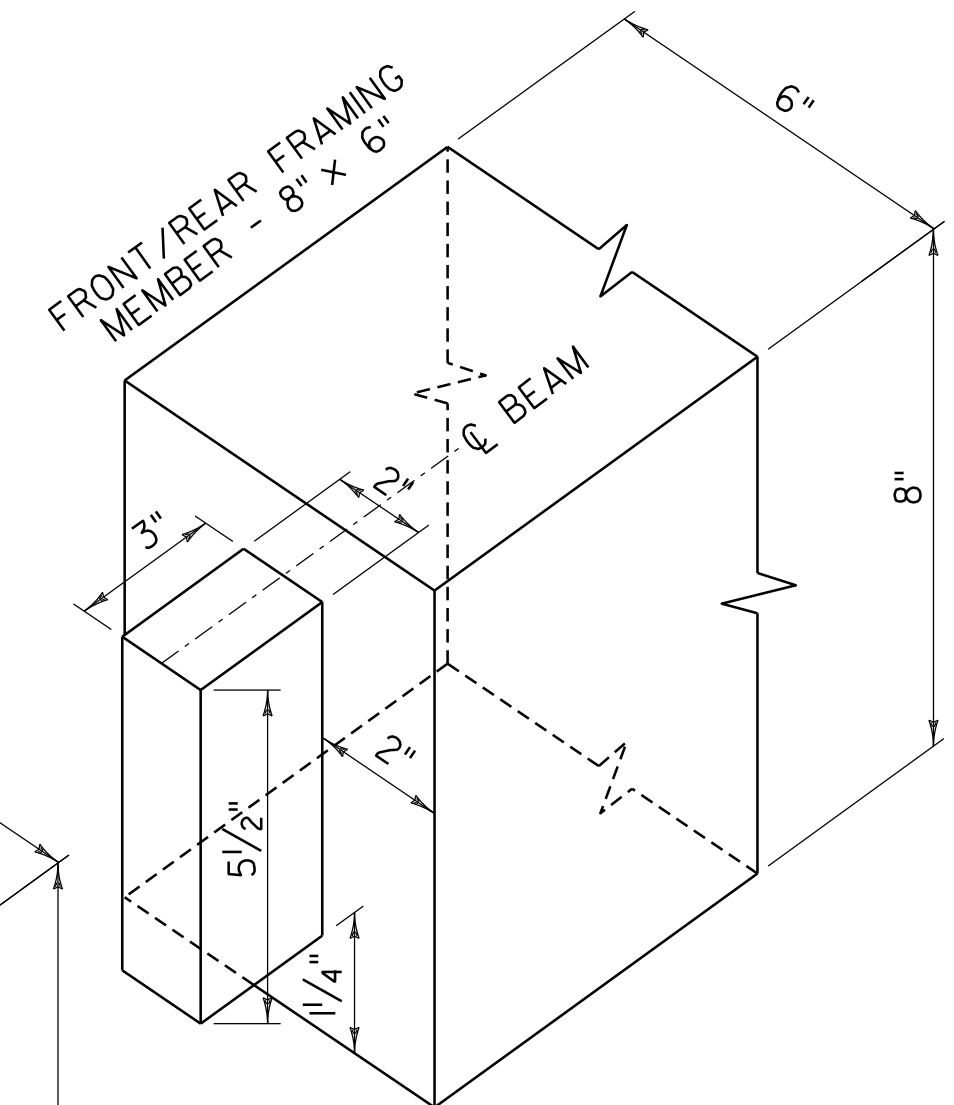




SCALE 1 1/2" = 1'-0"



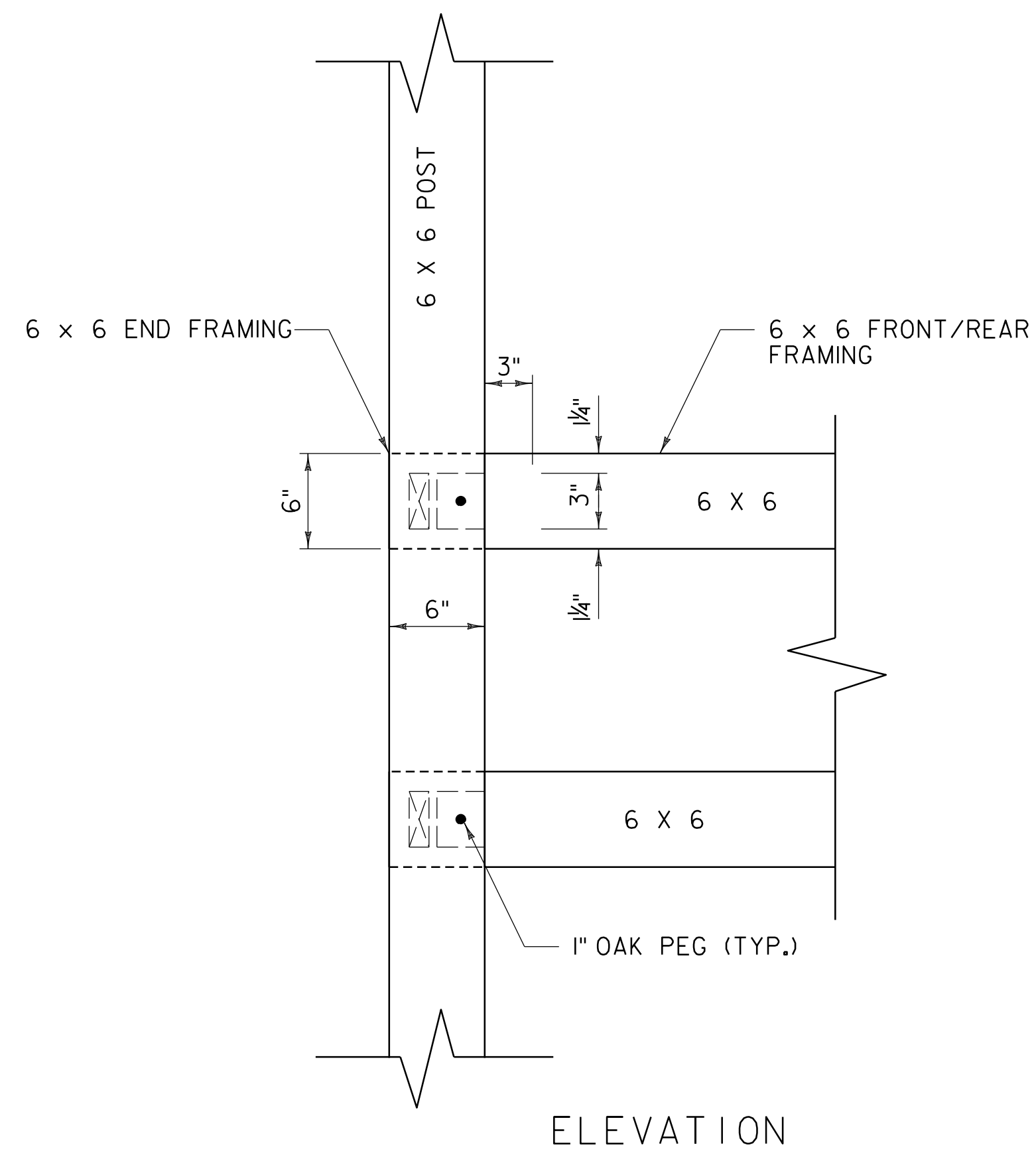
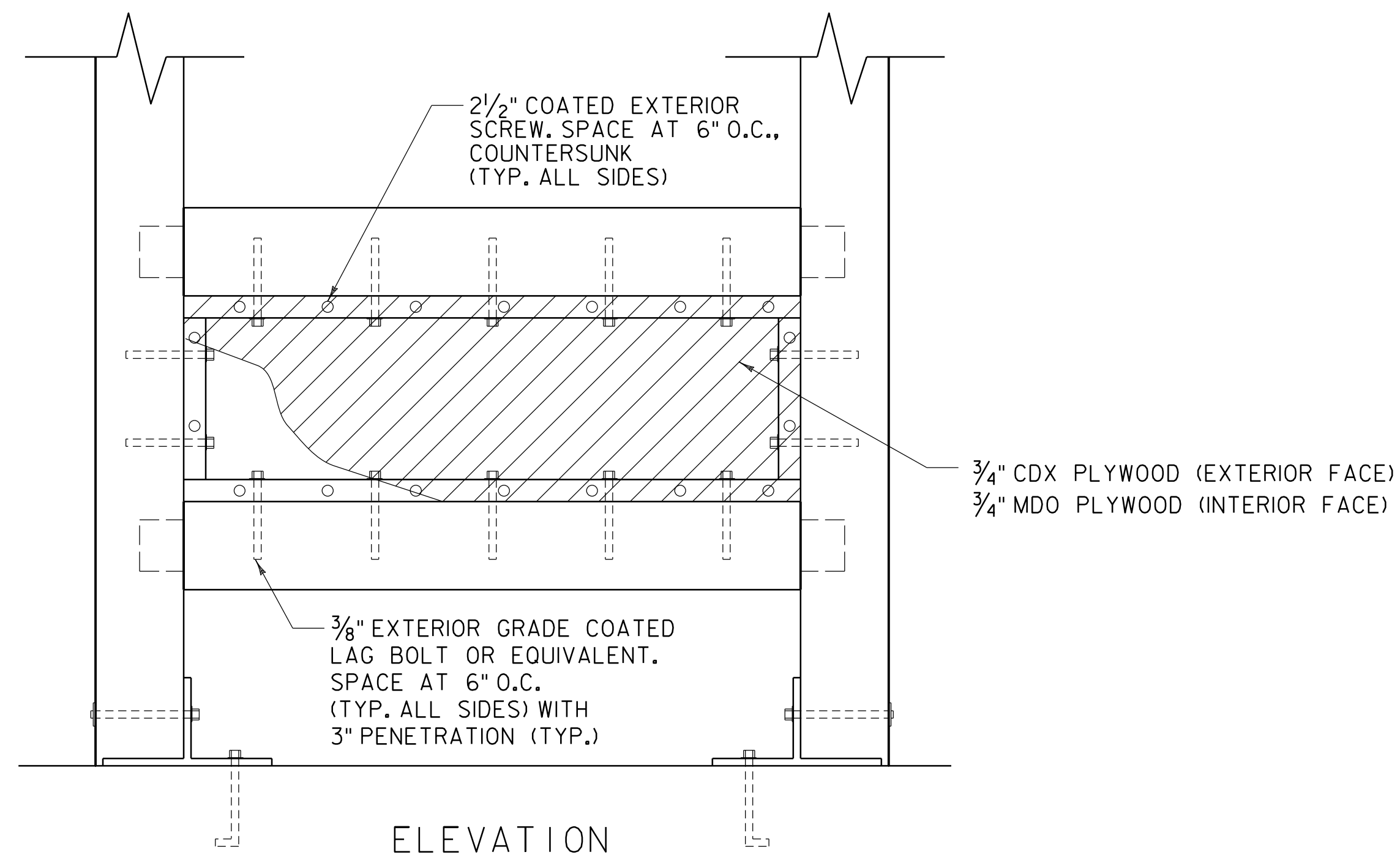
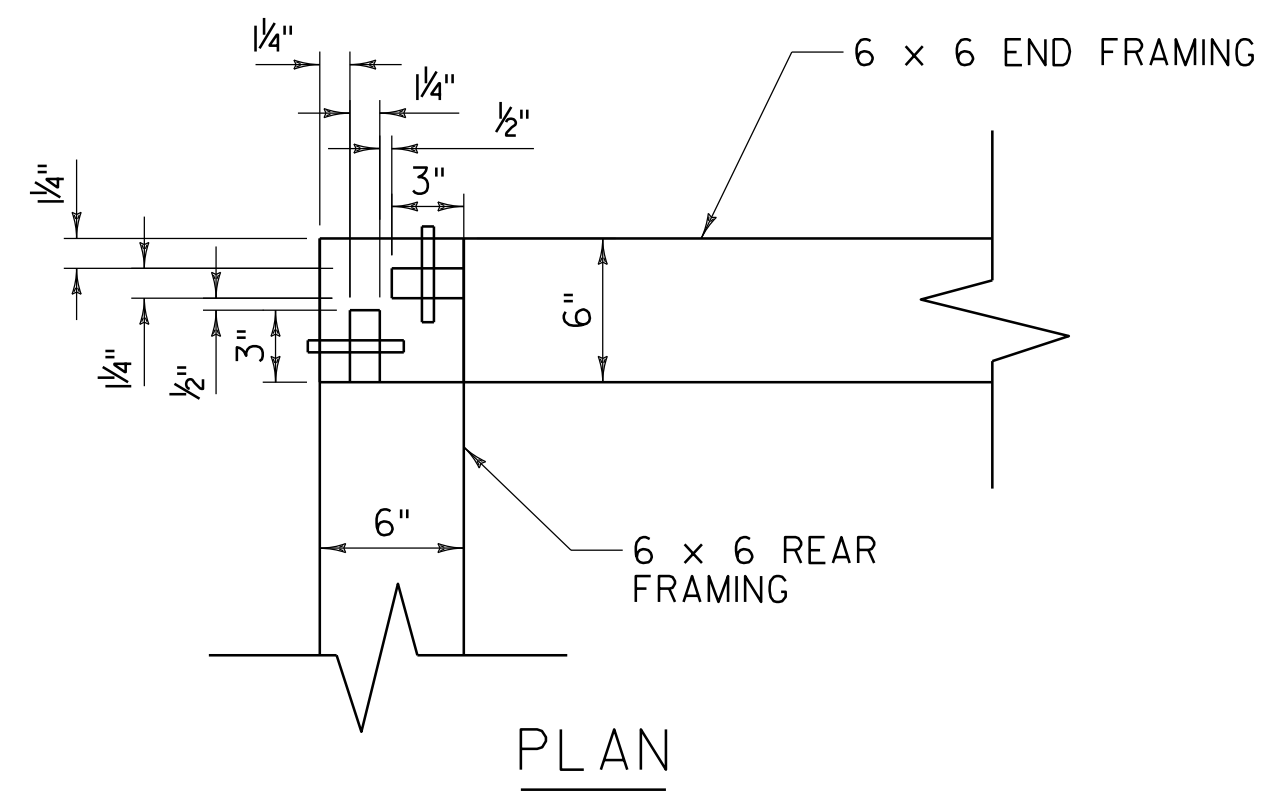
SCALE 1 1/2" = 1'-0"



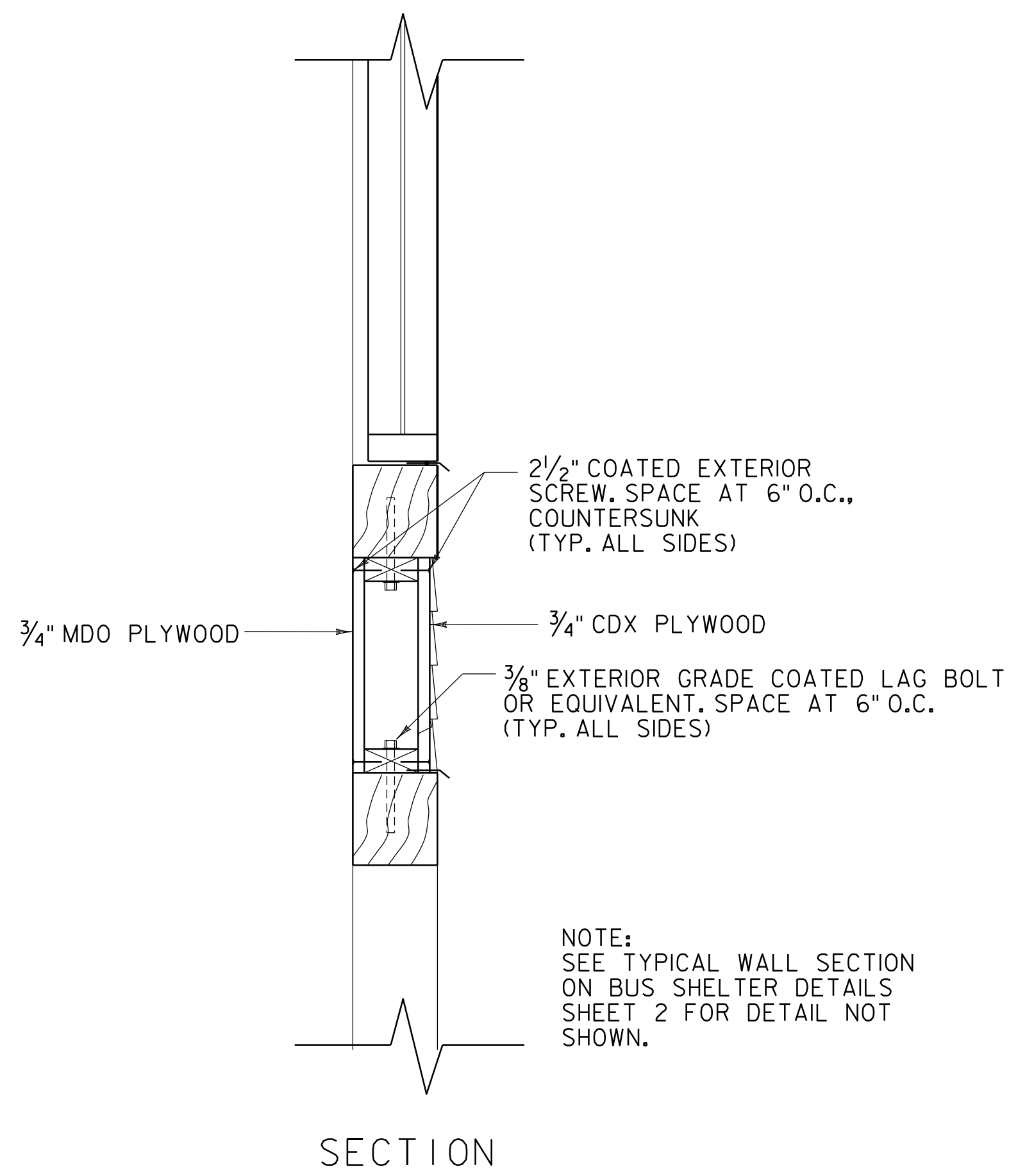
ALL DIMENSIONS IN INCHES UNLESS OTHERWISE NOTED.

PROJECT NAME: EAST MONTEPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350shltr_det.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: L. BUXTON
DESIGNED BY: G. BOGUE	CHECKED BY: G. BOGUE
BUS SHELTER DETAILS 3	SHEET 9 OF 42





DETAIL "D"  
SCALE 1 1/2" = 1'-0"



DETAIL "E"  
SCALE 1 1/2" = 1'-0"

ALL DIMENSIONS IN INCHES UNLESS OTHERWISE NOTED.



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350shltr_det.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: L. BUXTON
DESIGNED BY: G. BOGUE	CHECKED BY: G. BOGUE
BUS SHELTER DETAILS 4	SHEET 10 OF 42



DISK MM 5

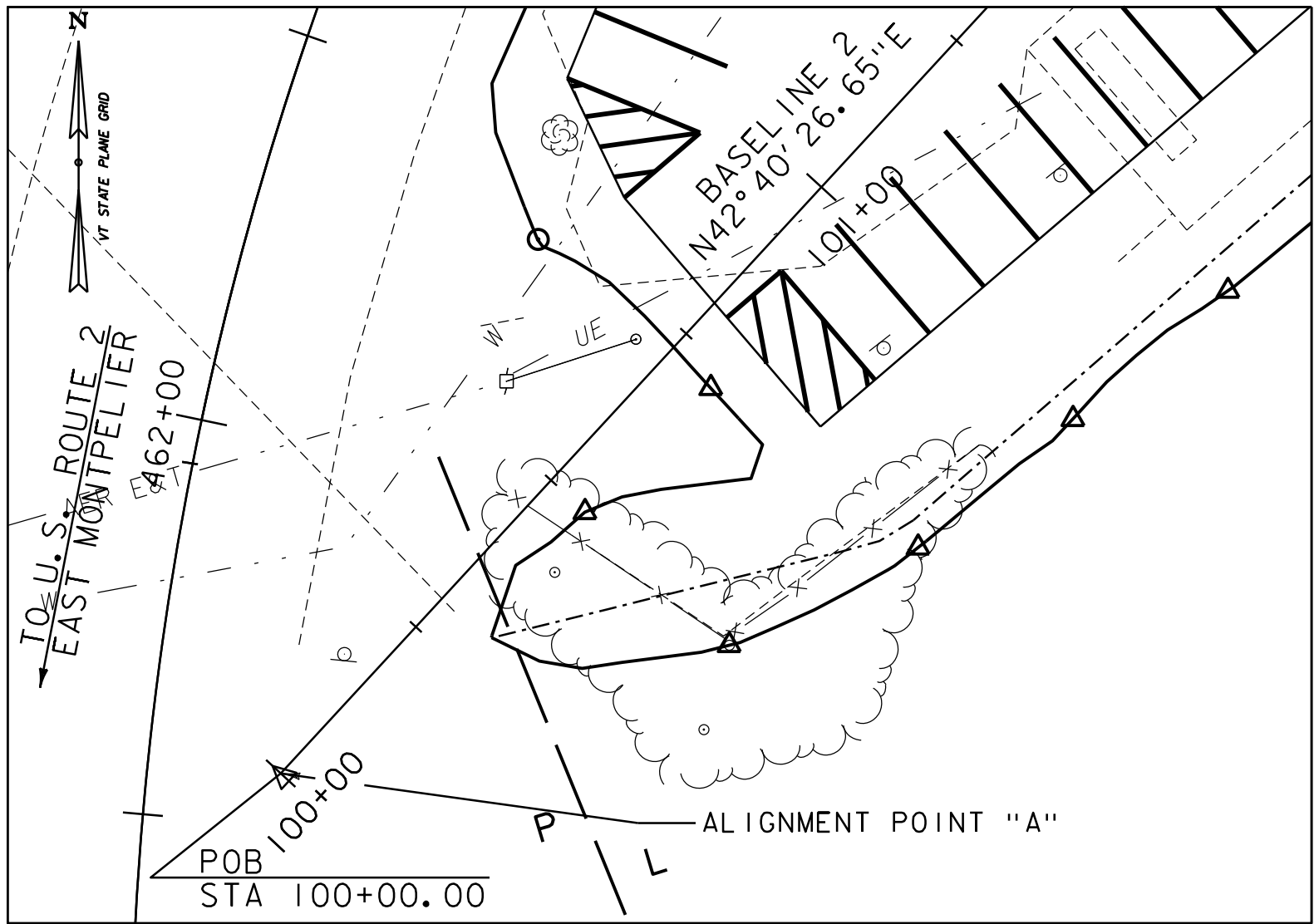
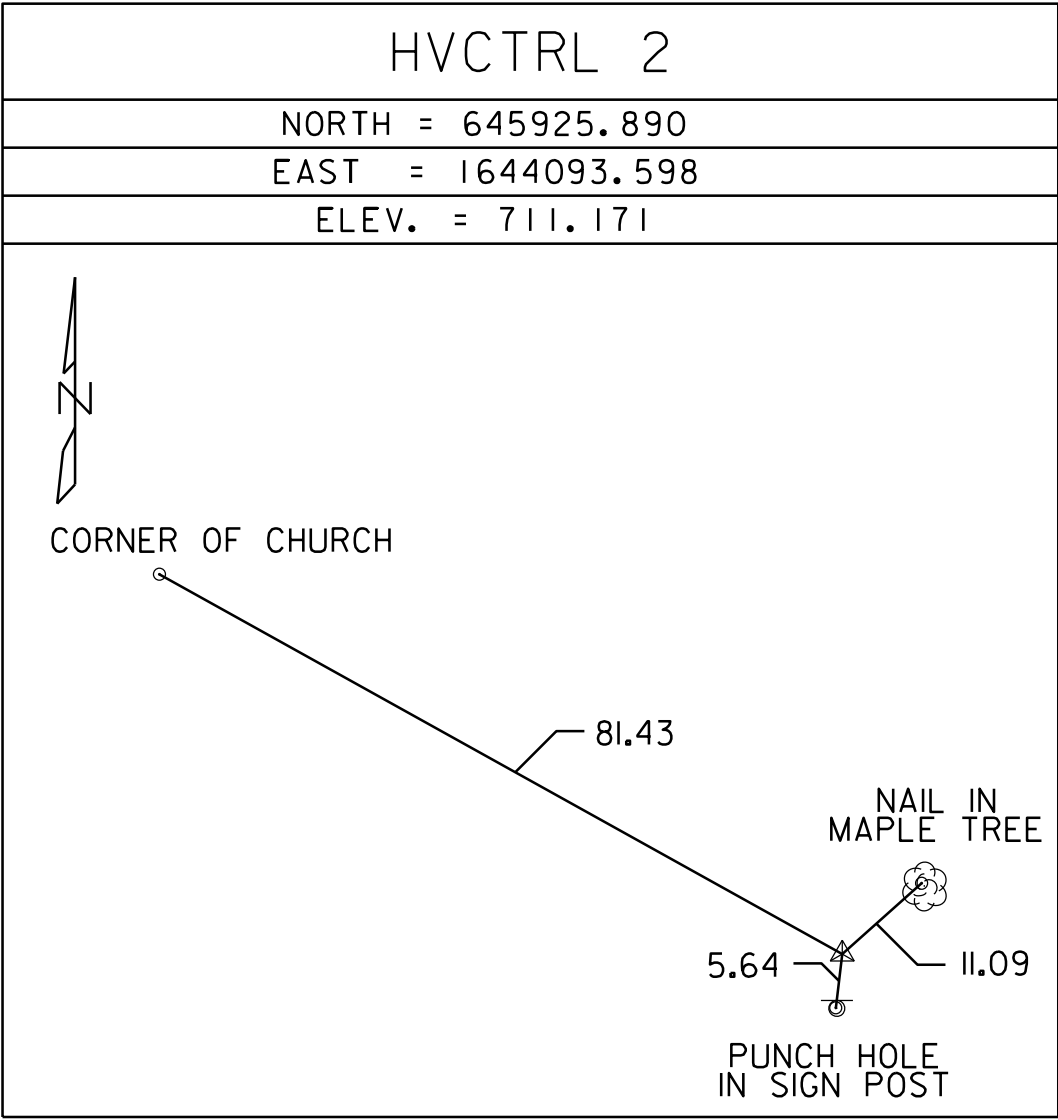
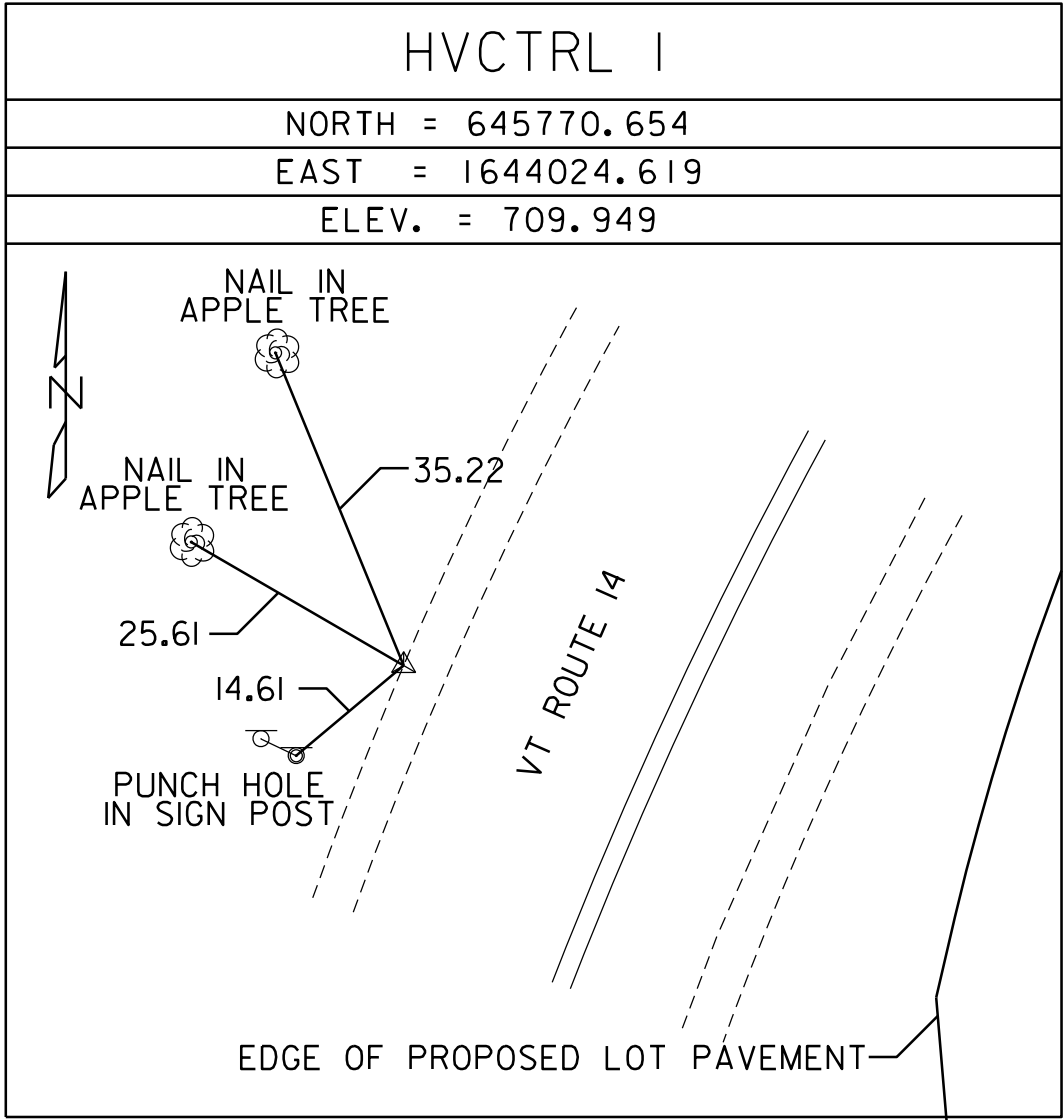
DIRECTION	ACTUAL GRID POINTS	PROJECT SPECIFIC COORDINATE POINTS
	ENGLISH	
N	646062.992 FT	646038.863 FT
E	1643996.063 FT	1644023.552 FT
Z	727.780 FT	727.611 FT

GENERAL LOCATION, EAST MONTPELIER, VT.

DESCRIBED BY COAST AND GEODETIC SURVEY 1936 0.3 MINORTHEAST FROM EAST MONTPELIER.0.3 MINORTHEAST ALONG U.S.HIGHWAY 2 FROM A COVERED BRIDGE AT EAST MONTPELIER, WASHINGTON COUNTY, ABOUT 175 YARDS NORTHEAST OF THE JUNCTION OF STATE HIGHWAY 12, 75 YARDS NORTHEAST OF A BRICK CHURCH, 70 FEET WEST OF THE JUNCTION OF A COUNTY ROAD, IN THE TOP OF A ROCK OUTCROP, AND ABOUT 20 FEET HIGHER THAN THE HIGHWAY. A UNITED STATES GEOLOGICAL SURVEY STANDARD DISK, STAMPED MM 5 1928.

RECOVERY NOTE BY NATIONAL GEODETIC SURVEY 1979 TO REACH THE MARK FROM THE JUNCTION OF U.S. HIGHWAY 2 AND STATE HIGHWAY 14, IN EAST MONTPELIER GO EAST ON HIGHWAY 14 FOR 0.05 MILE TO THE MARK ON THE LEFT. THE MARK IS A U.S. GEOLOGICAL SURVEY DISK CEMENTED IN A DRILL HOLE IN ROCK OUTCROP THAT PROJECTS 4 FEET ON THE SOUTH SIDE. IT IS 92 FEET EAST OF THE SOUTHEAST CORNER OF THE WASHINGTON ELECTRIC COOP BUILDING AND 76 FEET NORTH OF THE CENTER OF HIGHWAY 14.

DESCRIPTIONS PROVIDED BY VERMONT AGENCY OF TRANSPORTATION GEODETIC SURVEY UNIT.





# QUANTITY SHEET 1

[illegible]

PROJECT NAME:	EAST MONTPELIER PARK-AND-RIDE
PROJECT NUMBER:	CMG PARK(37)

FILE NAME: ...\\drawing\\zllk350frm.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
QUANTITY SHEET 1	SHEET 12 OF 42





# QUANTITY SHEET 2

[illegible]

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zilk350frm.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
QUANTITY SHEET 2	SHEET 13 OF 42





# EARTHWORKS

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zilk350frm.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
<b>EARTHWORKS SHEET</b>	SHEET 14 OF 42



# RIGHT - OF - WAY DETAIL SHEET

## TABLE OF PROPERTY ACQUISITION

[illegible]

## TABLE OF REVISIONS

[illegible]

APPROVED: RYAN CLOUTIER DATE: SEPT 29, 2014  
CHIEF, PLANS & TITLES

PROJECT NAME:	<b>E. MONTPELIER PARK AND RIDE</b>		
PROJECT NUMBER:	<b>CMG PARK (37)</b>		
FILE NAME:	PLOT DATE: 5/2/2017		
PROJECT LEADER: <b>G. SANTY</b>	DRAWN BY: <b>D. HARRINGTON</b>		
DESIGNED BY: <b>D. HARRINGTON</b>	CHECKED BY: <b>H. PETROV</b>		
<b>R.O.W. DETAIL SHEET 1</b>	SHEET	15	OF 42



NOTES:  
1. R.O.W. LIMITS SHOWN ARE BASED ON PROJECT E. MONTPELIER STPG 028-3 (35) S.  
2. THE ABOVE REFERENCED PROJECT WAS A METRIC PROJECT. THE CURRENT PARK AND RIDE PROJECT IS IN ENGLISH UNITS. A CONVERSION WAS MADE FROM METRIC TO ENGLISH IN ORDER TO CORRELATE THE PRIOR PROJECT'S ROW INFORMATION INTO THE PARK AND RIDE PROJECT.

3. THE WASHINGTON ELECTRIC PARCEL SHOWN BELOW WAS PARCEL 15A OF THE ABOVE MENTIONED PROJECT.

4. PARCEL 3 PROPERTY LINES AND SURVEY INFORMATION WERE SUPPLIED FROM VTRANS AS USED IN PROJECT STPG 028-3 (35) S AND FROM DEED INFORMATION.

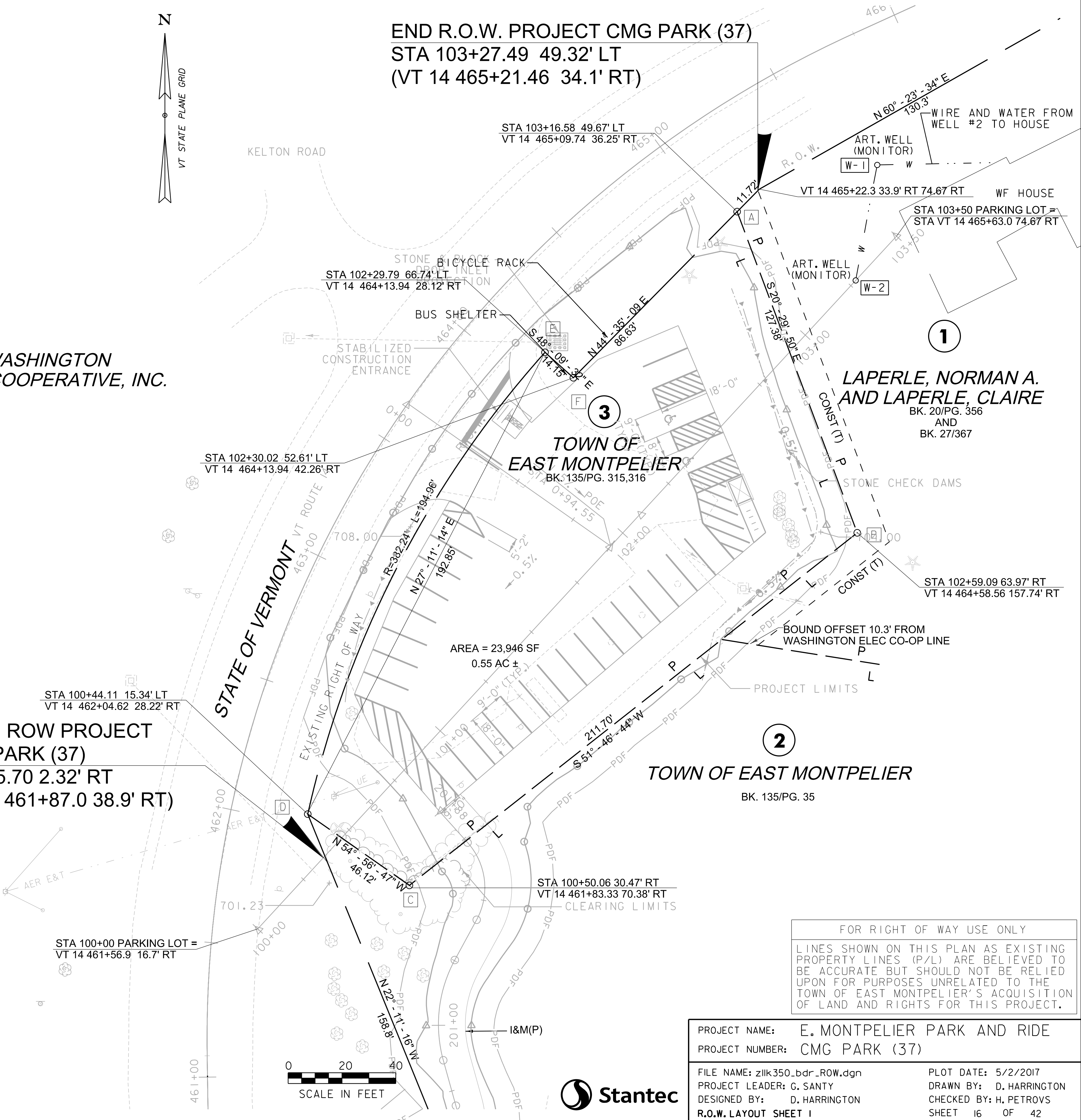
PARCEL 3 STATION AND OFFSET REFERENCE

	PROJECT BASELINE	RT 14 BASELINE ENGLISH UNITS	RT 14 BASELINE METRIC UNITS
A	103+16.58 49.70' LT	465+09.74 36.25' RT	14+176.17 11.05M RT
B	102+59.09 63.97' RT	464+58.56 (BND) 157.74' RT	14+160.57 48.08M RT
C	100+50.06 30.47' RT	461+83.33 (IP) 70.38' RT	14+076.68 21.45M RT
D	100+43.94 15.24' LT	462+04.62 28.22' RT	14+083.17 8.60M RT
E	102+29.79 66.74' LT	464+13.94 28.12' RT	14+146.97 8.57M RT
F	102+30.00 52.59' LT	464+13.94 42.26' RT	14+146.97 12.88M RT

N/F WASHINGTON  
ELECTRIC COOPERATIVE, INC.

BEGIN ROW PROJECT  
CMG PARK (37)  
100+35.70 2.32' RT  
(VT 14 461+87.0 38.9' RT)

END R.O.W. PROJECT CMG PARK (37)  
STA 103+27.49 49.32' LT  
(VT 14 465+21.46 34.1' RT)



FOR RIGHT OF WAY USE ONLY  
LINES SHOWN ON THIS PLAN AS EXISTING PROPERTY LINES (P/L) ARE BELIEVED TO BE ACCURATE BUT SHOULD NOT BE RELIED UPON FOR PURPOSES UNRELATED TO THE TOWN OF EAST MONTPELIER'S ACQUISITION OF LAND AND RIGHTS FOR THIS PROJECT.

PROJECT NAME:	E. MONTPELIER PARK AND RIDE
PROJECT NUMBER:	CMG PARK (37)
FILE NAME:	zlik350.bdr_ROW.dgn
PROJECT LEADER:	G. SANTY
DESIGNED BY:	D. HARRINGTON
R.O.W. LAYOUT SHEET 1	
PLOT DATE:	5/2/2017
DRAWN BY:	D. HARRINGTON
CHECKED BY:	H. PETROVS
SHEET	16 OF 42





N/F WASHINGTON  
ELECTRIC COOPERATIVE, INC.

LAPERLE, NORMAN A.  
AND LAPERLE, CLAIRE  
BK. 20/PG. 356  
AND  
BK. 27/367

TOWN OF  
EAST MONTPELIER  
BK. 135/PG. 315,316

TOWN OF EAST MONTPELIER  
BK. 135/PG. 35


BEGIN ROW PROJECT  
CMG PARK (37)  
100+35.70 2.32' RT  
(VT 14 461+87.0 38.9' RT)

LIMIT OF SHARED USE PATH  
CMG PARK (37)  
200+00.00 CL  
(VT 14 460+56.47 44.16' RT)

FOR RIGHT OF WAY USE ONLY

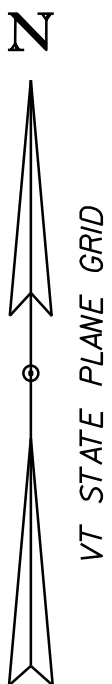
LINES SHOWN ON THIS PLAN AS EXISTING  
PROPERTY LINES (P/L) ARE BELIEVED TO  
BE ACCURATE BUT SHOULD NOT BE RELIED  
UPON FOR PURPOSES UNRELATED TO THE  
TOWN OF EAST MONTPELIER'S ACQUISITION  
OF LAND AND RIGHTS FOR THIS PROJECT.

0 20 40  
SCALE IN FEET

 Stantec

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
PROJECT NUMBER: CMG PARK(37)

FILE NAME: ...\\drawing\\zilk350_bdr_ROW.dgn PLOT DATE: 5/2/2017  
PROJECT LEADER: G. SANTY DRAWN BY: G. BURGMEIER  
DESIGNED BY: G. BURGMEIER CHECKED BY: G. SANTY  
R.O.W. LAYOUT SHEET 2 SHEET 17 OF 42



## LAYOUT POINT SUMMARY

LEGEND: LP#X = LAYOUT POINT #X

PT OF 15' RADIUS			
LAYOUT POINT	DESCRIPTION	COORDINATES	BASELINE 2 STATION
1	WEST END OF PARKING LOT	N: 645851.76 E: 1644159.12	STA. 100+80.24, 00.00' LT/RT
2	EAST END OF PARKING LOT	N: 645979.37 E: 1644276.77	STA. 102+53.79, 00.00' LT/RT
3	CORNER OF LOT	N: 645864.96 E: 1644147.80	STA. 100+82.25, 17.26' LT
4	CORNER OF LOT	N: 645879.95 E: 1644140.65	STA. 100+88.43, 32.69' LT
5	CORNER OF LOT	N: 645915.85 E: 1644155.40	STA. 101+24.82, 46.18' LT
6	CORNER OF LOT	N: 645951.72 E: 1644175.96	STA. 101+65.13, 55.37' LT
7	PCC OF 40' & 15' RADIUS	N: 645951.84 E: 1644167.47	STA. 101+59.46, 61.69' LT
8	PC OF 40' RADIUS	N: 645944.66 E: 1644153.42	STA. 101+44.66, 67.16' LT
9	CORNER OF LOT	N: 645980.86 E: 1644206.38	STA. 102+07.17, 52.75' LT
10	PC OF 30' RADIUS	N: 646007.08 E: 1644198.69	STA. 102+21.24, 76.19' LT
11	CORNER OF LOT	N: 646016.89 E: 1644260.90	STA. 102+70.62, 37.09' LT
12	CORNER OF LOT	N: 646004.29 E: 1644231.12	STA. 102+41.17, 50.45' LT
13	CORNER OF LOT	N: 645940.03 E: 1644293.40	STA. 102+36.14, 38.90' RT
14	CORNER OF LOT	N: 645836.27 E: 1644172.39	STA. 100+77.83, 20.26' RT

## DEMOLITION AND DISPOSAL OF BUILDING

STA. 101+30, RT TO 102+11, RT

### REMOVAL OF EXISTING CURB

STA. 100+46.68, 6.47' RT - 100+89.62, 36.45' RT

STA. 101+18.34, 33.71' RT - 101+27.43, 34.61' RT

### REMOVAL OF EXISTING FENCE

STA. 100+45.16, 3.05' LT - 100+89.62, 36.45' RT

## REMOVAL AND DISPOSAL OF GUIDE POSTS

STA. 100+40.00, 35.28' RT

STA. 100+41.83, 8.16' RT

GENERAL NOTES:

1. FOR A SUMMARY OF CONTROL POINTS AND TRAVERSE TIES SEE PROJECT TIE SHEET. FOR ALIGNMENT LAYOUT POINTS SEE LAYOUT POINT SUMMARY TABLE ABOVE.
2. FOR SIGNS AND PAVEMENT MARKINGS SEE SIGNING AND PAVEMENT MARKING PLAN.
3. FOR PARK-AND-RIDE LIGHTING SEE LIGHTING PLAN.
4. DURING CONSTRUCTION THE EXISTING PARK-AND-RIDE SHALL BE CLOSED TO ALL TRAFFIC.
5. THE BUS SHELTER SHALL BE PAID UNDER ITEM 900.645. SPECIAL PROVISION (BUS SHELTER). SEE DETAILS ON BUS SHELTER DETAIL SHEETS. FOR DETAIL OF PAY LIMITS UNDER THE SPECIAL PROVISION (BUS SHELTER) ITEM, REFER TO BUS SHELTER DETAIL SHEETS.
6. THE BICYCLE RACK SHALL BE PAID FOR AS 900.620 SPECIAL PROVISION (BICYCLE RACK). FOR BICYCLE RACK DETAILS, SEE DETAILS SHEET.
7. EXISTING BUILDING:  
FOUNDATION WALLS TO BE REMOVED TO EXISTING GROUND LEVEL. CONCRETE SLAB SHALL BE FRACTURED, COMPACTED AND LEFT IN PLACE. NO EXCAVATION OF THE FOUNDATION AND SLAB IS PERMITTED. MAXIMUM DIAMETER FRACTURED CONCRETE 6 INCH.

SPECIAL PROVISION (BICYCLE RACK)

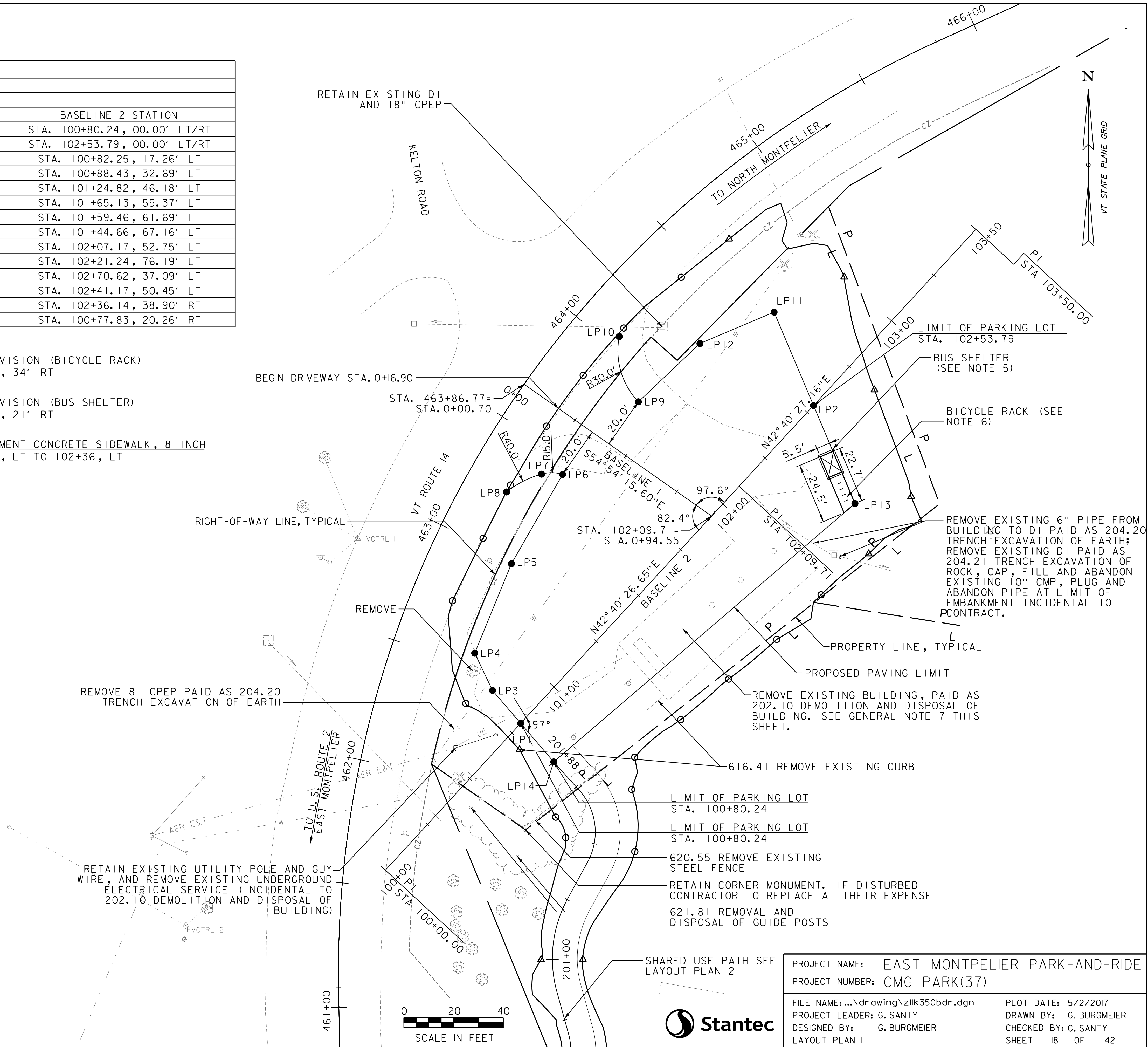
STA. 102+35, 34' RT

SPECIAL PROVISION (BUS SHELTER)

STA. 102+41, 21' RT

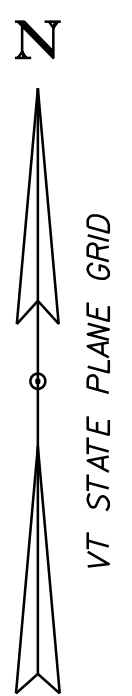
PORTLAND CEMENT CONCRETE SIDEWALK, 8 INCH

STA. 102+29, LT TO 102+36, LT





SPECIAL PROVISION (RELOCATE EXISTING PEDESTRIAN SIGNAL)  
STA. 200+02, RT



PROJECT NAME: EAST MONTEPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zilk350bdr.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
LAYOUT PLAN 2	SHEET 19 OF 42







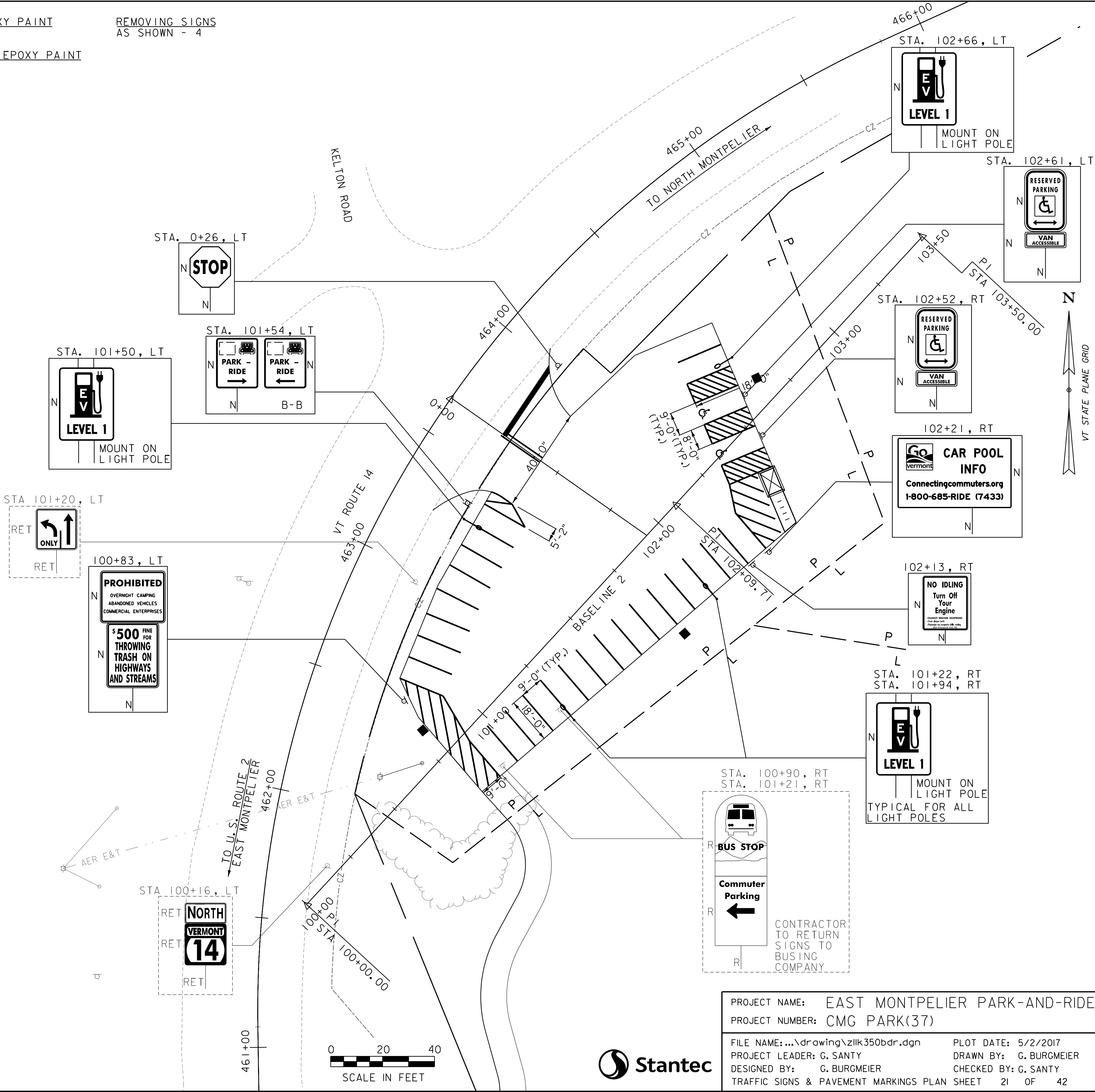
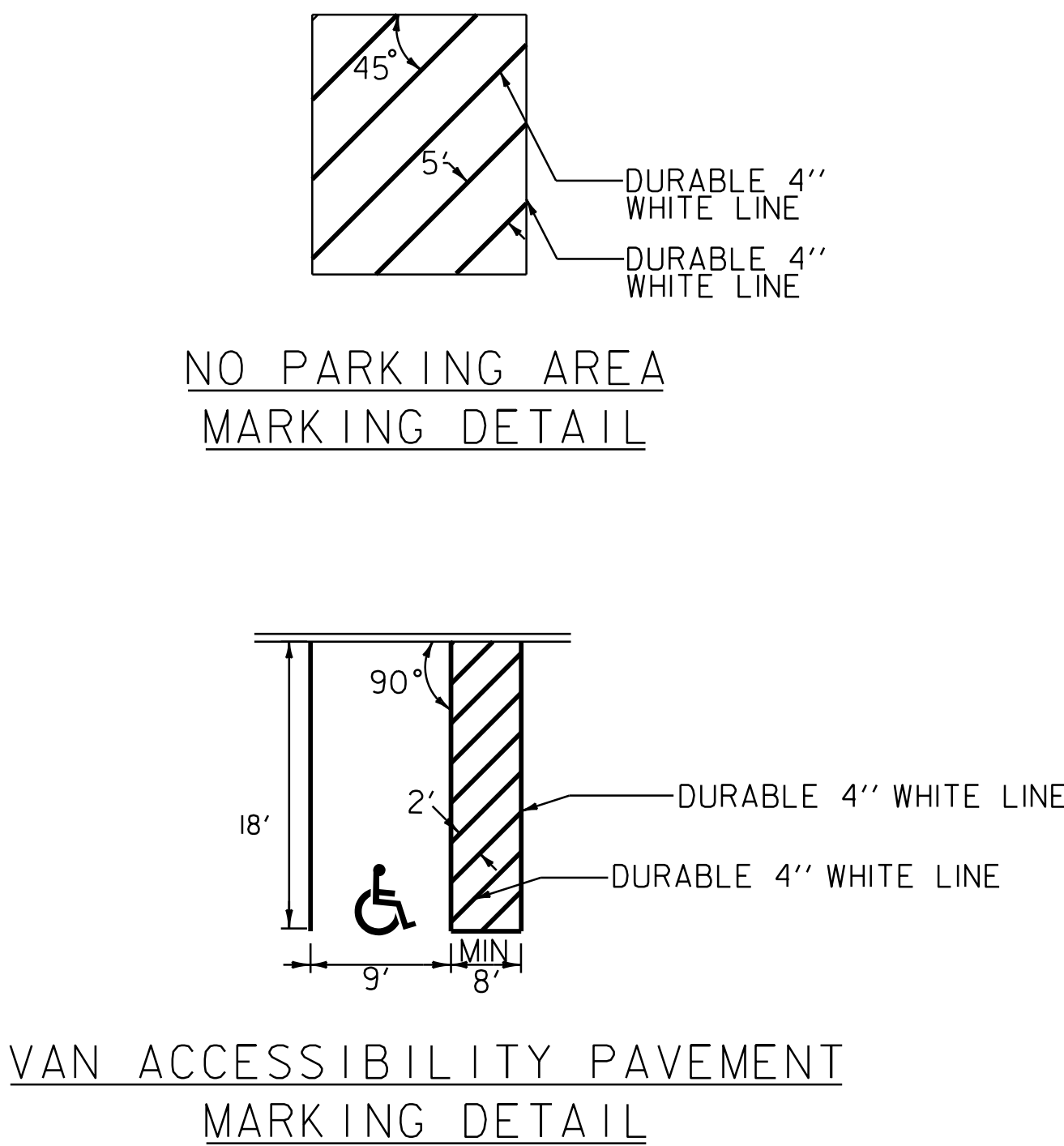
DURABLE 4" WHITE LINE, EPOXY PAINT  
STA. 100+83 TO 102+75, SOLID LT & RT  
(PARKING SPACES AND DIAGONALS)

DURABLE 4" YELLOW LINE, EPOXY PAINT  
STA. 0+26 TO 0+42, LT (DOUBLE CENTERLINE)

DURABLE 24" STOP BAR, EPOXY PAINT  
STA. 0+25, LT (26 FEET)

DURABLE LETTER OR SYMBOL, EPOXY PAINT  
STA. 102+36, LT &  
STA. 102+43, LT &

REMOVING SIGNS  
AS SHOWN - 4



NOTES

1. FOR ANY TOWN HIGHWAY OR STREET DETAILS, SEE VAOT STANDARD E-193.

2. FOR PAVEMENT MARKING DETAILS, SEE VAOT STANDARDS E-191, E-192, & E-193.

SIGN LEGEND

N = NEW  
R = REMOVE  
RET = RETAIN  
B-B = BACK-TO-BACK

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
PROJECT NUMBER: CMG PARK(37)

FILE NAME: ...\\drawing\\zlik350bdr.dgn  
PROJECT LEADER: G. SANTY  
DESIGNED BY: G. BURGMEIER  
TRAFFIC SIGNS & PAVEMENT MARKINGS PLAN SHEET 21 OF 42

PLOT DATE: 5/2/2017  
DRAWN BY: G. BURGMEIER  
CHECKED BY: G. SANTY

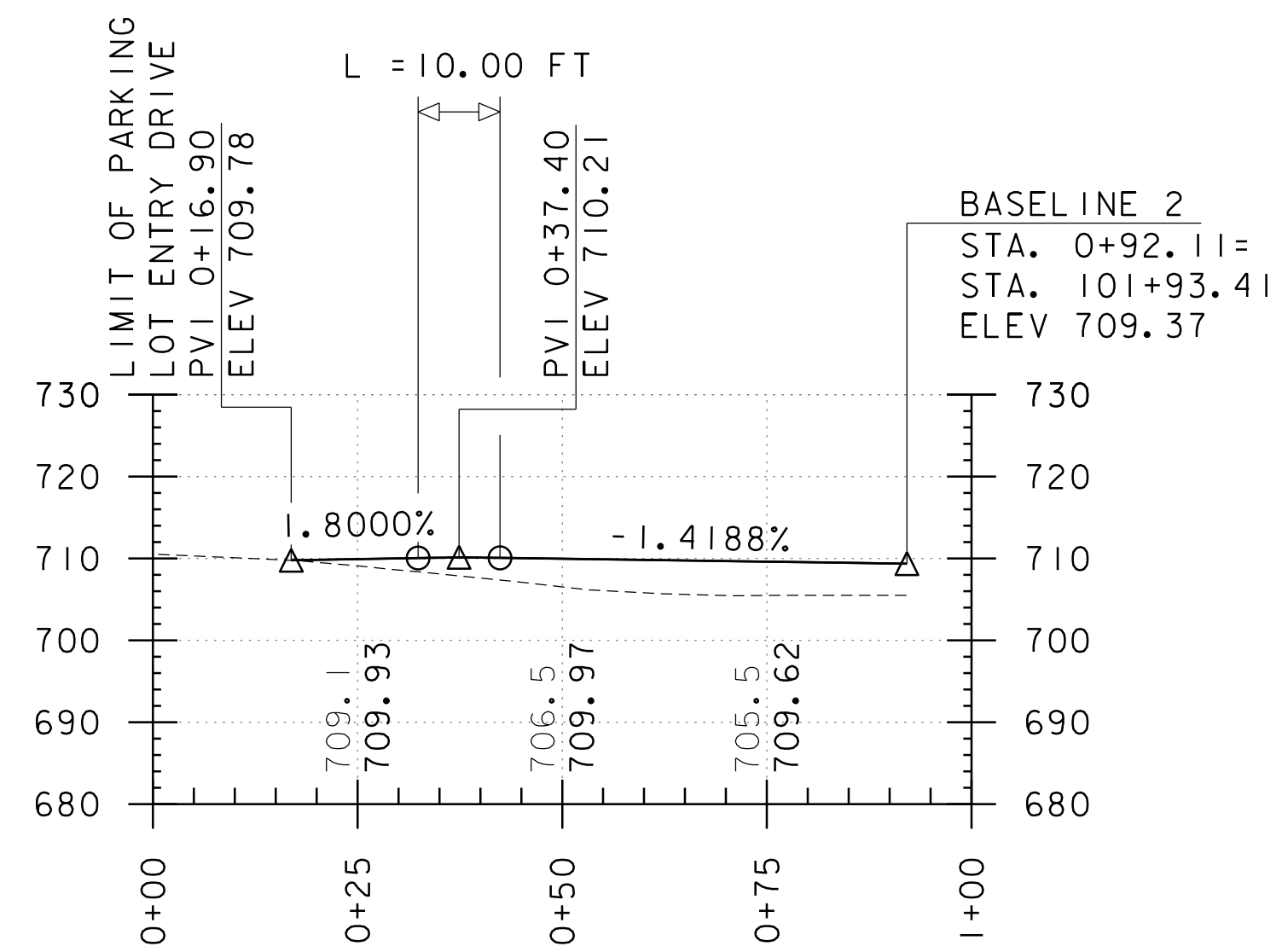


# TRAFFIC SIGN SUMMARY SHEET

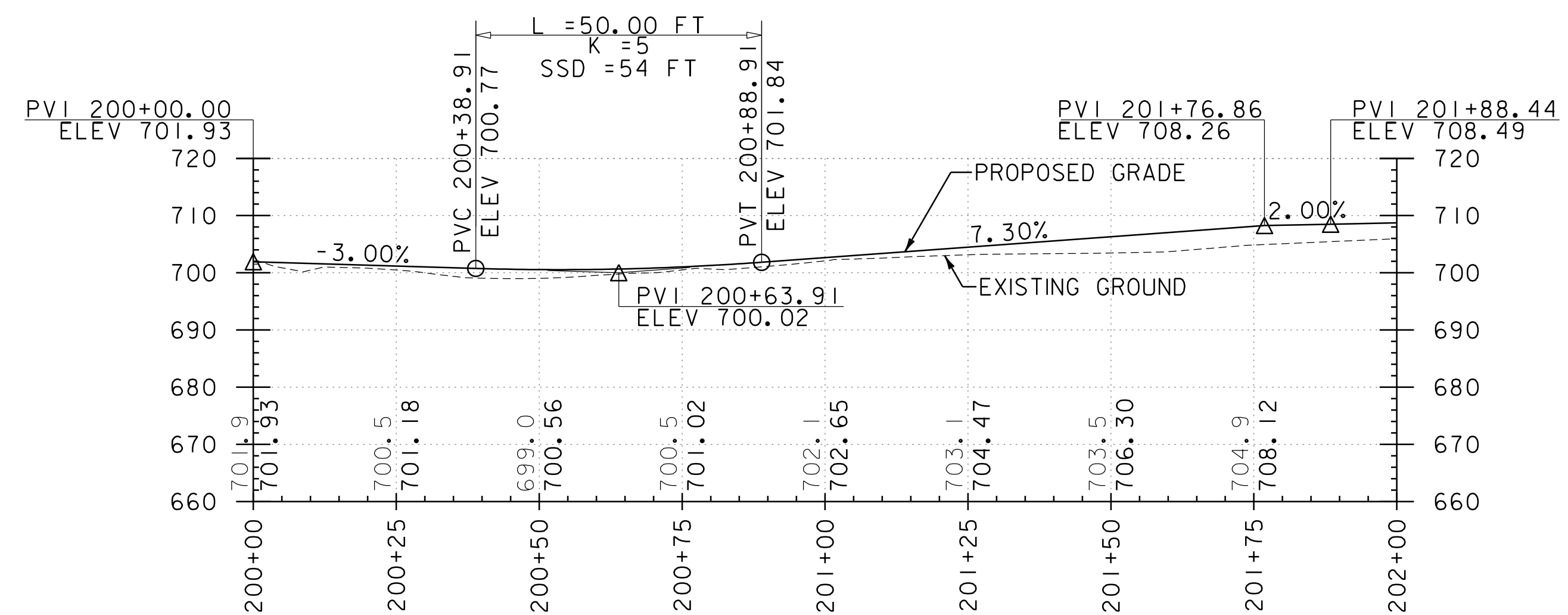




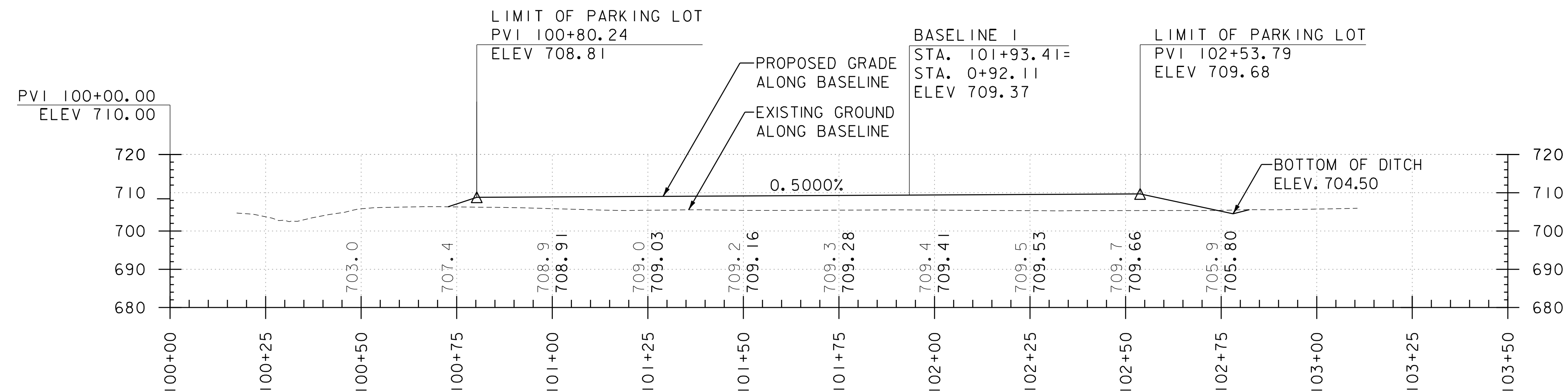




PARK & RIDE BASELINE 1



SHARED USE PATH BASELINE



PARK & RIDE BASELINE 2

- NOTES:
1. ELEVATIONS SHOWN TO THE NEAREST TENTH ARE EXISTING GROUND ALONG PROFILE GRADE LINE.
  2. ELEVATIONS SHOWN TO THE NEAREST HUNDRETH ARE FINISH GRADE ALONG PROFILE GRADE LINE.
  3. ELEVATIONS AND STATIONS ARE IN FEET.

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
PROJECT NUMBER: CMG PARK (37)

FILE NAME: zlk350pro.dgn  
PROJECT LEADER: G. SANTY  
DESIGNED BY: G. BURGMEIER  
PROFILE SHEET

PLOT DATE: 5/2/2017  
DRAWN BY: P.ARMATA  
CHECKED BY: G. SANTY  
SHEET 24 OF 42





EPSC PLAN NARRATIVE

1.1 PROJECT DESCRIPTION

THIS PROJECT IS LOCATED ON VT ROUTE 14 IN THE TOWN OF EAST MONTPELIER, NEAR THE INTERSECTION OF ROUTE 14 NORTH AND U.S. ROUTE 2. WORK TO BE PERFORMED ON THIS PROJECT INCLUDES THE CONSTRUCTION OF A NEW 27 SPACE PARK-AND-RIDE LOT, SHARED USE PATH, SUBBASE, PAVEMENT, PAVEMENT MARKINGS, LIGHTING, LANDSCAPING, BUS SHELTER AND MISCELLANEOUS APPURTENANCES.

NOTE: AREA OF DISTURBANCE SHALL INCLUDE LIMITS OF EARTH DISTURBANCE WITHIN THE PROJECT AREA, INCLUDING ANY WASTE, STAGING AND BORROW AREAS WITHIN OR DIRECTLY ADJACENT TO THE PROJECT LIMITS.

TOTAL AREA OF DISTURBANCE IS APPROXIMATELY 0.76 ACRES.

IT IS ANTICIPATED THAT THIS PROJECT WILL LAST ONE CONSTRUCTION SEASON.

1.2 SITE INVENTORY

1.2.1 OFF SITE DRAINAGE CHARACTERISTICS (UP AND DOWN-GRADIENT)

THE SITE SLOPES AWAY FROM VT ROUTE 14 AT GRADES RANGING FROM 2-15%. VEGETATION CONSISTS OF GRASS AND SCRUB BRUSH. THE SITE RECEIVES MINIMAL RUNOFF FROM OFFSITE AREAS. STORM WATER RUNOFF FROM THE PROJECT WILL FLOW IN A SOUTHERLY DIRECTION THROUGH OPEN SWALES AND ACROSS A NATURALLY VEGETATED AREA BEFORE CROSSING THROUGH AN EXISTING CULVERT UNDER ROUTE 2 AND INTO THE WINOOSKI RIVER. ONE EXISTING CATCH BASIN AT THE NORTH END OF THE SITE DRAIN UNDER ROUTE 14 AND DISCHARGE TO THE WINOOSKI RIVER. THIS CATCH BASIN DRAINS MOSTLY OFF-SITE FLOW, BUT MAY RECEIVE RUNOFF FROM THE WORKZONE.

1.2.2 DRAINAGE, WATERWAYS, BODIES OF WATER, AND PROXIMITY TO NATURAL OR MAN-MADE WATER FEATURES

WINOOSKI RIVER IS LOCATED APPROXIMATELY 700’ SOUTH EAST OF THE SITE, AND FLOWS NORTH TO THE SOUTH.

1.2.3 TOPOGRAPHY, EXISTING ROADS, BUILDINGS, UTILITIES

VT ROUTE 14 BORDERS THE PROJECT TO THE WEST AND RANGES IN GRADE FROM 0.5% TO 2.0%. THERE IS EXISTING UTILITY POLE ON THE SOUTH END OF THE SITE WHICH WILL BE THE POWER SOURCE FOR THE PROJECT LIGHTING.

1.2.4 VEGETATION

THE VEGETATION IN THE PROJECT AREA CONSISTS MAINLY OF BRUSH AND GRASS, WITH SOME AREAS OF LAWN BORDERING ROUTE 14 AND ROUTE 2.

DISTURBED VEGETATION OUTSIDE OF THE PROPOSED PAVED PARKING AREA WILL BE REESTABLISHED WITH LANDSCAPING AND STANDARD SEED AND MULCH/EROSION MATTING PRACTICES.

1.2.5 SOILS

ALL SOIL DATA CAME FROM THE U.S. DEPARTMENT OF AGRICULTURE SOIL CONSERVATION SERVICE FOR THE COUNTY OF WASHINGTON, VERMONT. SOILS ON THE PROJECT SITE ARE AS FOLLOWS:

CABOT SILT LOAM, 0% TO 3% SLOPES, “K FACTOR” = 0.32 (54.7%) AND SALMON VERY FINE SANDY LOAM 8-15% SLOPES, ‘K FACTOR” = 0.49. THE SOILS ARE CONSIDERED MODERATELY ERODIBLE, AND HIGHLY ERODABLE RESPECTIVELY.

NOTE: K-VALUES GENERALLY INDICATE THE FOLLOWING: 0.0-0.23 = LOW EROSION POTENTIAL; 0.24-0.36 = MODERATE EROSION POTENTIAL: 0.37 AND HIGHER = HIGH EROSION POTENTIAL.

1.2.6 SENSITIVE RESOURCE AREAS

CRITICAL HABITATS: NO  
HISTORICAL OR ARCHEOLOGICAL AREAS: NO  
PRIME AGRICULTURAL LAND: NO  
THREATENED AND ENDANGERED SPECIES: NORTHERN LONG EARED BAT  
WATER RESOURCE: WINOOSKI RIVER  
WETLANDS: NO

1.3 RISK EVALUATION

THIS PROJECT DOES NOT FALL UNDER THE JURISDICTION OF GENERAL PERMIT 3-9020 FOR STORMWATER RUNOFF FROM CONSTRUCTION SITES. SHOULD CHANGES PRIOR TO OR DURING CONSTRUCTION RESULT IN ONE OR MORE ACRES OF EARTH DISTURBANCE OR SHOULD THE PROJECT BECOME PART OF A LARGER PLAN OF DEVELOPMENT, THE CONTRACTOR WILL BE RESPONSIBLE FOR ANY ADDITIONAL PERMITTING.

1.4 EROSION PREVENTION AND SEDIMENT CONTROL

THE EROSION CONTROL PLANS ARE MEANT AS A GUIDELINE FOR PREVENTING EROSION AND CONTROLLING SEDIMENT TRANSPORT. THE PRINCIPLES OUTLINED IN THIS NARRATIVE CONSIST OF APPLYING MEASURES THROUGHOUT CONSTRUCTION OF THE PROJECT IN ORDER TO MINIMIZE SEDIMENT TRANSPORT TO THE RECEIVING WATERS. THE MEASURES INCLUDE STABILIZATION AND STRUCTURAL PRACTICES, STORM WATER CONTROLS AND OTHER POLLUTION PREVENTION PRACTICES. THEY HAVE BEEN PROPOSED BY THE DESIGNER AS A BASIS FOR PROTECTING RESOURCES AND WILL NEED TO BE BUILT UPON BASED ON THE SPECIFIC MEANS AND METHODS OF THE CONTRACTOR. REFER TO THE LOW RISK SITE HANDBOOK AND APPROPRIATE DETAIL SHEETS FOR SPECIFIC GUIDANCE AND CONSTRUCTION DETAILING.

ALL MEASURES SHALL BE REGULARLY MAINTAINED AND SHALL BE CHECKED FOR SEDIMENT BUILD-UP. SEDIMENT SHALL BE DISPOSED OF AT AN APPROVED SITE WHERE IT WILL NOT BE SUBJECT TO EROSION.

1.4.1 MARK SITE BOUNDARIES

SITE BOUNDARIES AND AREAS CONSTRUCTION EQUIPMENT CAN ACCESS SHALL BE DELINEATED.

PROJECT DEMARCATION FENCING (PDF) SHALL BE USED TO PHYSICALLY MARK SITE BOUNDARIES. BECAUSE THIS PROJECT FALLS UNDER THE CGP 3-9020, BARRIER FENCE SHALL BE USED INSTEAD OF PROJECT DEMARCATION FENCE WITHIN 100 FEET OF A WATER RESOURCE (STREAM, BROOK, LAKE, POND, WETLAND, ETC). BARRIER FENCE IS NOT ANTICIPATED TO BE NEEDED AS THERE ARE NO WATER RESOURCES OR WETLANDS WITHIN 100’ OF PROJECT DISTURBANCE.

1.4.2 LIMIT DISTURBANCE AREA

PREVENTING INITIAL SOIL EROSION BY MINIMIZING THE EXPOSED AREA IS MUCH MORE EFFECTIVE THAN TREATING ERODED SEDIMENT. EARTH DISTURBANCE CAN BE MINIMIZED THROUGH CONSTRUCTION PHASING BY ONLY OPENING UP EARTH AS NECESSARY. THIS CAN LIMIT THE AREA THAT WILL BE DISTURBED AND EXPOSED TO EROSION. EMPLOY TEMPORARY CONSTRUCTION STABILIZATION PRACTICES IN INCREMENTAL STAGES AS PHASES CHANGE. FOR PROJECTS WHICH FALL UNDER THE CONSTRUCTION GENERAL PERMIT, ONLY THE ACREAGE LISTED ON THE PERMIT AUTHORIZATION MAY BE EXPOSED AT ANY GIVEN TIME.

MAINTAINING VEGETATED BUFFERS ALONG STREAM BANKS, WETLANDS OR OTHER SENSITIVE AREAS IS A CRUCIAL EROSION AND SEDIMENT CONTROL MEASURE THAT SHOULD BE ESTABLISHED WHEREVER POSSIBLE. PDF SHALL BE INSTALLED TIGHT TO THE CONSTRUCTION LIMITS NEAR THE EXISTING DRAINAGE DITCH IN THE SOUTHEAST CORNER OF THE SITE.

1.4.3 SITE ENTRANCE/EXIT STABILIZATION

TRACKING OF SEDIMENT ONTO PUBLIC HIGHWAYS SHALL BE MINIMIZED TO REDUCE THE POTENTIAL FOR RUNOFF ENTERING RECEIVING WATERS. INSTALLATION SHALL COINCIDE WITH THE CONTRACTORS PROGRESS SCHEDULE.

STABILIZED CONSTRUCTION ENTRANCES SHALL BE INSTALLED AS PROPOSED ON THE EPSC PLAN AND ANYWHERE EQUIPMENT WILL BE GOING FROM AREAS OF EXPOSED SOILS TO PAVED SURFACES.

1.4.4 INSTALL SEDIMENT BARRIERS

SEDIMENT BARRIERS SHALL BE UTILIZED TO INTERCEPT RUNOFF AND ALLOW SUSPENDED SEDIMENT TO SETTLE OUT. THEY SHALL BE INSTALLED PRIOR TO ANY UP SLOPE WORK.

PDF FENCE WILL BE INSTALLED AS PROPOSED ON THE EPSC PLAN. STONE AND BLOCK INLET PROTECTION WILL BE INSTALLED ON EXISTING DROP INLET OFF ROUTE 14.

1.4.5 DIVERT UPLAND RUNOFF

DIVERSIONARY MEASURES SHALL BE USED TO INTERCEPT RUNOFF FROM ABOVE THE CONSTRUCTION AND DIRECT IT AROUND THE DISTURBED AREA SO THAT CLEAN WATER DOES NOT BECOME MUDDIED WHILE TRAVELING OVER EXPOSED SOILS ON THE CONSTRUCTION SITE.

THE PROJECT IS ADJACENT TO VT ROUTE 14, THEREFORE, IT IS NOT ANTICIPATED THAT DIVERSION MEASURES WILL BE NECESSARY.

1.4.6 SLOW DOWN CHANNELIZED RUNOFF

CHECK STRUCTURES SHALL BE UTILIZED TO REDUCE THE VELOCITY, AND THUS THE EROSIIVE POTENTIAL, OF CONCENTRATED FLOW IN CHANNELS.

STONE CHECK DAMS WILL BE INSTALLED AS PROPOSED ON THE EPSC PLAN, AT A MINIMUM.

1.4.7 CONSTRUCT PERMANENT CONTROLS

PERMANENT STORMWATER TREATMENT DEVICES SHALL BE INSTALLED AS SHOWN ON THE PLANS. THE PROJECT DOESN’T CURRENTLY REQUIRE AN OPERATIONAL STORMWATER PERMIT.

1.4.8 STABILIZE EXPOSED SOILS DURING CONSTRUCTION

ALL AREAS OF DISTURBANCE MUST HAVE TEMPORARY STABILIZATION IN PLACE WITHIN 48 HOURS OF DISTURBANCE OR IN ACCORDANCE WITH THE CONSTRUCTION GENERAL PERMIT 3-9020 AUTHORIZATION.

SURFACE ROUGHENING OF ALL EXPOSED SLOPES, COMBINED WITH TEMPORARY MULCHING, SHALL BE UTILIZED ON A REGULAR BASIS. BIODEGRADABLE EROSION CONTROL MATTING OR AN EQUIVALENT SHALL BE USED TO STABILIZE ALL SLOPES STEEPER THAN 1:3. THE FORECAST OF RAINFALL EVENTS SHALL TRIGGER IMMEDIATE PROTECTION OF EXPOSED SOILS.

1.4.9 WINTER STABILIZATION

VARIOUS MEASURES SPECIFIC TO WINTER MAY BE NECESSARY SHOULD THE PROJECT EXTEND INTO WINTER (OCTOBER 15 THROUGH APRIL 15). REFER TO THE LOW RISK SITE HANDBOOK FOR GUIDANCE.

IT IS ANTICIPATED THAT THIS PROJECT WILL NOT EXTEND INTO THE WINTER CONSTRUCTION SEASON.

1.4.10 STABILIZE SOIL AT FINAL GRADE

EXPOSED SOIL MUST BE STABILIZED WITHIN 48 HOURS OF REACHING FINAL GRADE.

SEED, MULCH, FERTILIZER AND LIME SHALL BE USED TO ESTABLISH PERMANENT VEGETATION. FOR SLOPES STEEPER THAN 1:3, BIODEGRADABLE EROSION CONTROL MATTING OR AN EQUIVALENT SHALL BE USED INSTEAD OF MULCH.

1.4.11 DE-WATERING ACTIVITIES

DISCHARGE FROM DEWATERING ACTIVITIES THAT FLOWS OFF OF THE CONSTRUCTION SITE MUST NOT CAUSE OR CONTRIBUTE TO A VIOLATION OF THE VERMONT WATER QUALITY STANDARDS.

DE-WATERING ACTIVITIES ARE NOT ANTICIPATED AS PART OF THIS PROJECT. IN THE EVENT DE-WATERING IS NECESSARY, THE CONTRACTOR SHALL DO SO AT NO ADDITIONAL COST TO THE PROJECT.

1.4.12 INSPECT YOUR SITE

INSPECT THE PROJECT SITE BASED ON SPECIAL PROVISION REQUIREMENTS OR CONSTRUCTION GENERAL PERMIT AUTHORIZATION STIPULATIONS.

1.5 SEQUENCE AND STAGING

THIS SECTION WILL BE DEVELOPED BY THE CONTRACTOR USING THE GUIDANCE OUTLINED IN THE VTRANS EPSC PLAN CONTRACTOR CHECKLIST.

1.5.1 CONSTRUCTION SEQUENCE BY CONTRACTOR

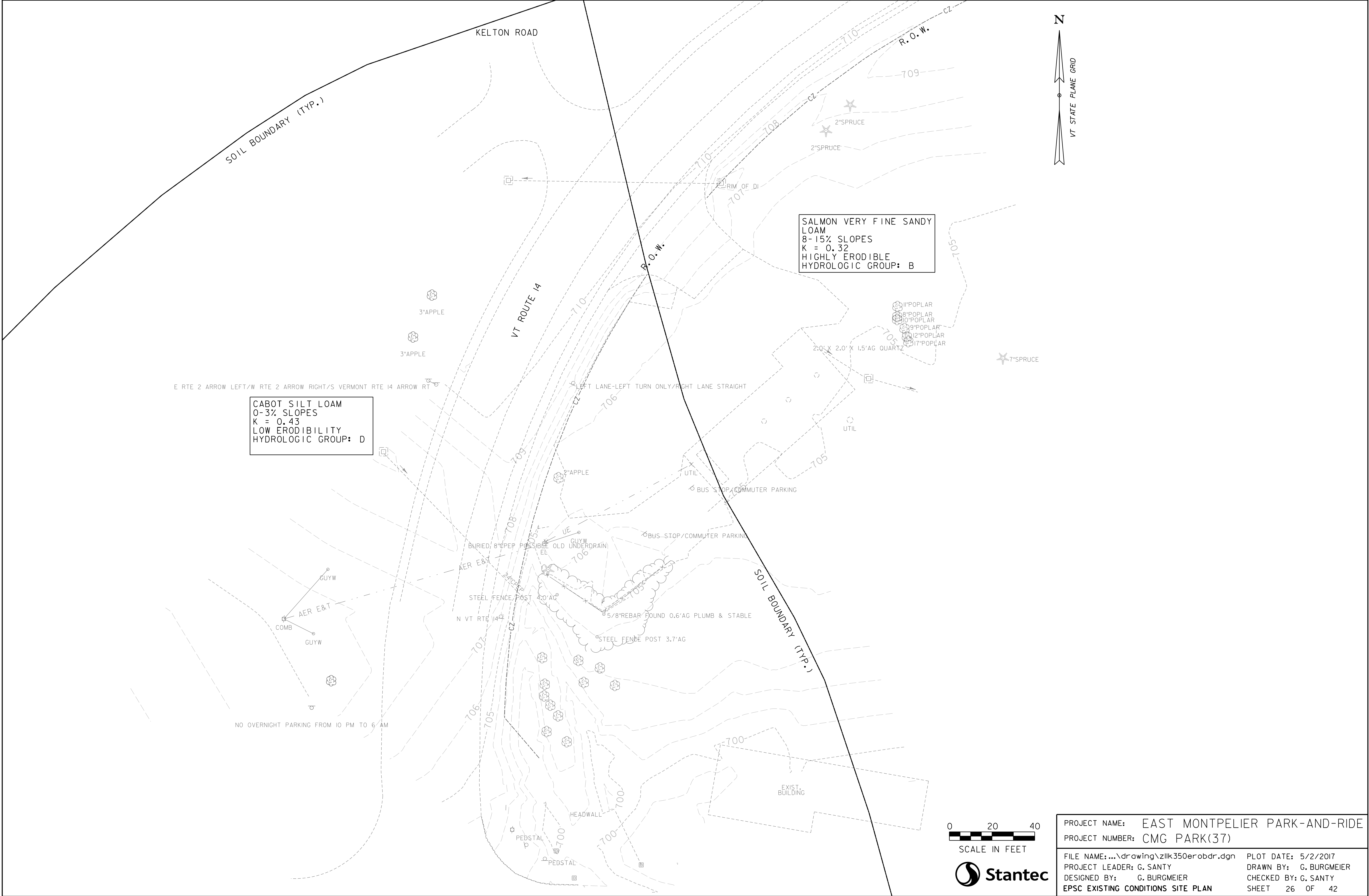
1.5.2 OFF-SITE ACTIVITIES

IN ADDITION TO THE CONTRACTOR CHECKLIST ANY ACTIVITIES OUTSIDE THE CONSTRUCTION LIMITS SHALL FOLLOW SUBSECTIONS 105.25- 105.29 OF THE STANDARD SPECIFICATIONS FOR CONSTRUCTION.

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P,ARMATA
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
EPSC NARRATIVE	SHEET 25 OF 42









653.20 - TEMPORARY EROSION MATTING  
STA. 100+30 LT & RT - STA. 103+14, LT & RT

653.25 - TEMPORARY STONE CHECK DAM, TYPE I  
STA. 100+29, LT - STA. 101+65, LT  
STA. 100+56, RT - STA. 103+00, LT

653.35 - VEHICLE TRACKING PAD  
STA. 102+03, LT

653.40 INLET PROTECTION DEVICE, TYPE I  
STA. 102+36, LT

653.55 - PROJECT DEMARCATION FENCE  
STA. 100+22, LT - STA. 103+35, LT

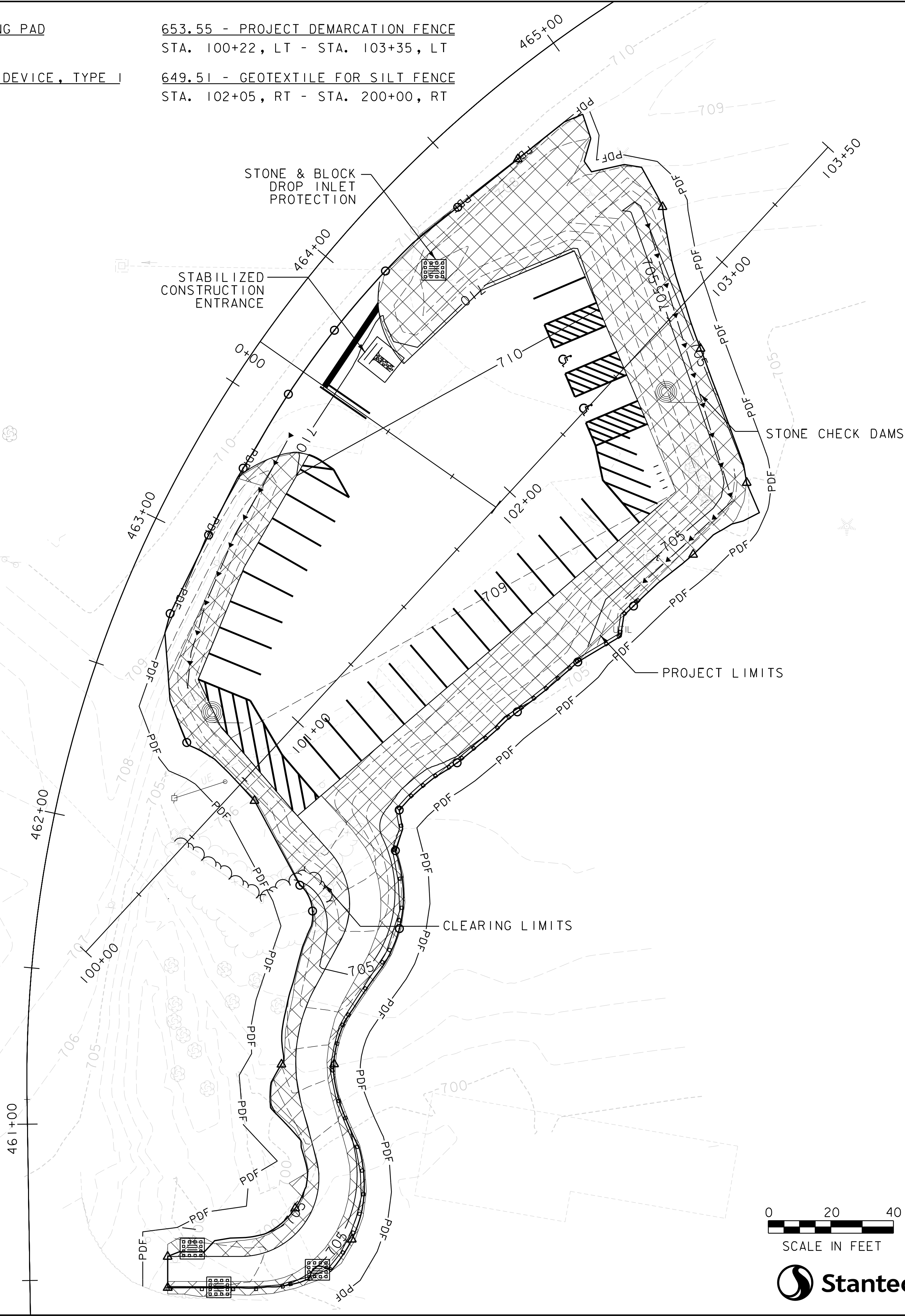
649.51 - GEOTEXTILE FOR SILT FENCE  
STA. 102+05, RT - STA. 200+00, RT

GENERAL CONSTRUCTION SEQUENCE

1. DEMARCATATE WORK ZONE WITH PROJECT DEMARCATION FENCE (PDF) OR BARRIER FENCE (BF) AS SHOWN ON THE PLANS. FENCE INSTALLED NO MORE THAN 10' BEYOND CONSTRUCTION LIMITS UNLESS APPROVED BY THE ENGINEER.
2. CLEAR AND GRUB THE SITE. DO NOT REMOVE STUMPS, EXCESS SOILS, AND OTHER WASTE MATERIALS UNTIL TEMPORARY E.P.S.C. MEASURES HAVE BEEN INSTALLED.
3. INSTALL TEMPORARY EROSION PREVENTION AND SEDIMENT CONTROL MEASURES, AS SHOWN, AS REQUIRED, OR AS DIRECTED BY THE ON-SITE PLAN COORDINATOR, IN THE FOLLOWING ORDER:
  - A. STABILIZED CONSTRUCTION ENTRANCE (VEHICLES ARE REQUIRED TO DRIVE OVER THE 50' SCE BEFORE EXITING THE CONSTRUCTION LIMITS.
  - B. INLET PROTECTION ON EXISTING DROP INLETS AND CATCH BASINS.
  - C. STONE CHECK DAMS (SEE EPSC DETAILS 1) FOR CONSTRUCTION NOTES AND DETAILS).
  - D. EROSION MATTING (SEE EPSC DETAILS 2) FOR CONSTRUCTION NOTES AND DETAILS).
4. DISPOSE OF STUMPS, EXCESS SOILS AND OTHER WASTE MATERIAL IN ACCORDANCE WITH SPECIFICATION 105.25 CONTROL OF WASTE, BORROW AND STAGING.
5. COMPLETE CONSTRUCTION OF NEW PARK-AND-RIDE LOT.
  - A. INSPECT AND MAINTAIN EROSION PREVENTION AND SEDIMENT CONTROL MEASURES IN ACCORDANCE WITH THE SPECIFICATIONS AND SPECIAL PROVISIONS.
  - B. DISPOSE OF COLLECTED SEDIMENT AND OTHER POLLUTANTS IN A MANNER APPROVED BY THE ENGINEER THAT WILL NOT RESULT IN SEDIMENTS AND POLLUTANTS ENTERING WATERS OF THE STATE.
6. PERMANENTLY STABILIZE ALL FINISHED GRADES AS EARTHWORK IS COMPLETED INCLUDING CHANNEL LININGS, SEEDING AND MULCHING (PERMANENT TURF ESTABLISHMENT).

EPSC GENERAL NOTES:

1. THESE PLANS SHOW A PROPOSED TEMPORARY EROSION CONTROL PLAN, THE CONTRACTOR MUST SUBMIT A TEMPORARY EROSION CONTROL PLAN FOR ACCEPTANCE.
2. TEMPORARY EROSION CONTROL MEASURES ARE CONCEPTUALLY SHOWN. THE CONTRACTOR MAY RELOCATE OR ADD TEMPORARY MEASURES TO IMPROVE EROSION CONTROL WITH APPROVAL OF THE ENGINEER AND ON-SITE PLAN COORDINATOR. SILT FENCE SHALL NOT BE INSTALLED ACROSS CONTOURS.
3. THE CONTRACTOR SHALL USE OTHER TEMPORARY EROSION CONTROL MEASURES AS NECESSITATED BY THE SEQUENCE OF CONSTRUCTION OR AS DIRECTED BY THE ENGINEER AND ON-SITE PLAN COORDINATOR.
4. REFER TO EPSC DETAILS AND EPSC NARRATIVE FOR ADDITIONAL REQUIREMENTS.



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zilk350erobdr.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
EPSC CONSTRUCTION SITE PLAN	SHEET 27 OF 42





NOTES:

1. SEE EPSC CONSTRUCTION SITE PLAN AND CROSS SECTIONS FOR PROPOSED TOPOGRAPHY.
2. THE TEMPORARY CONSTRUCTION LIMIT IS THE AREA WITHIN THE PROJECT DEMARCATION FENCE AS SHOWN ON THE EPSC CONSTRUCTION SITE PLAN.
3. DISTURBED AREAS SHALL BE RE-VEGETATED WITH 4" TOPSOIL, SEED, AND MULCH. FERTILIZER, LIMESTONE, SEED AND MULCHING SHALL BE APPLIED PER THE SEEDING FORMULA ON DETAIL SHEET 6.

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zilk350erobdr.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
EPSC FINAL CONDITIONS SITE PLAN	SHEET 28 OF 42





- | ADAPTED FROM DETAILS PROVIDED BY: NEW YORK STATE DEC<br>ORIGINALLY DEVELOPED BY USDA-NRCS<br>VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION                                          | CHECK DAM                                                                                                                                                                                                                                                      |           |  |                |     |                 |     |  |  |  |  |  |  |
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| NOTES:<br>REFER TO "THE VERMONT STANDARDS & SPECIFICATIONS FOR<br>EROSION PREVENTION & SEDIMENT CONTROL -2006- "FROM<br>THE VT AGENCY OF NATURAL RESOURCES FOR ADDITIONAL<br>GUIDANCE. | <table border="1"> <tr> <th colspan="2">REVISIONS</th></tr> <tr> <td>MARCH 21, 2008</td><td>WHF</td></tr> <tr> <td>JANUARY 8, 2009</td><td>WHF</td></tr> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> </table> | REVISIONS |  | MARCH 21, 2008 | WHF | JANUARY 8, 2009 | WHF |  |  |  |  |  |  |
| REVISIONS                                                                                                                                                                              |                                                                                                                                                                                                                                                                |           |  |                |     |                 |     |  |  |  |  |  |  |
| MARCH 21, 2008                                                                                                                                                                         | WHF                                                                                                                                                                                                                                                            |           |  |                |     |                 |     |  |  |  |  |  |  |
| JANUARY 8, 2009                                                                                                                                                                        | WHF                                                                                                                                                                                                                                                            |           |  |                |     |                 |     |  |  |  |  |  |  |
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| THIS WORK SHALL BE PERFORMED IN ACCORDANCE WITH<br>SECTION 653 FOR TEMPORARY STONE CHECK DAM, TYPE I(PAY<br>ITEM 653.25)                                                               | <table border="1"> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> </table>                                                                                                                                       |           |  |                |     |                 |     |  |  |  |  |  |  |
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- | ADAPTED FROM DETAILS PROVIDED BY: NEW YORK STATE DEC<br>ORIGINALLY DEVELOPED BY USDA-NRCS<br>VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION                                                                                                                                                                                                                                            | ROLLED EROSION<br>CONTROL PRODUCT<br>(RECP) DITCH                                                                                                                                                                                                                                                                            |           |  |  |               |     |  |                |     |  |                  |     |  |  |  |  |  |  |  |
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| REVISIONS                                                                                                                                                                                                                                                                                                                                                                                |                                                                                                                                                                                                                                                                                                                              |           |  |  |               |     |  |                |     |  |                  |     |  |  |  |  |  |  |  |
| MARCH 8, 2007                                                                                                                                                                                                                                                                                                                                                                            | JMF                                                                                                                                                                                                                                                                                                                          |           |  |  |               |     |  |                |     |  |                  |     |  |  |  |  |  |  |  |
| APRIL 16, 2007                                                                                                                                                                                                                                                                                                                                                                           | WHF                                                                                                                                                                                                                                                                                                                          |           |  |  |               |     |  |                |     |  |                  |     |  |  |  |  |  |  |  |
| JANUARY 13, 2009                                                                                                                                                                                                                                                                                                                                                                         | WHF                                                                                                                                                                                                                                                                                                                          |           |  |  |               |     |  |                |     |  |                  |     |  |  |  |  |  |  |  |
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- | ADAPTED FROM DETAILS PROVIDED BY: NEW YORK STATE DEC<br>ORIGINALLY DEVELOPED BY USDA-NRCS<br>VERMONT DEPARTMENT OF ENVIRONMENTAL CONSERVATION                                          | STABILIZED<br>CONSTRUCTION<br>ENTRANCE                                                                                                                                                                                                                          |           |  |                |     |                  |     |  |  |  |  |  |  |
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| REVISIONS                                                                                                                                                                              |                                                                                                                                                                                                                                                                 |           |  |                |     |                  |     |  |  |  |  |  |  |
| MARCH 24, 2008                                                                                                                                                                         | WHF                                                                                                                                                                                                                                                             |           |  |                |     |                  |     |  |  |  |  |  |  |
| JANUARY 13, 2009                                                                                                                                                                       | WHF                                                                                                                                                                                                                                                             |           |  |                |     |                  |     |  |  |  |  |  |  |
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| THIS WORK SHALL BE PERFORMED IN ACCORDANCE WITH<br>SECTION 653 FOR VEHICLE TRACKING PAD (PAY ITEM 653.35)<br>OR AS SPECIFIED IN THE CONTRACT.                                          | <table border="1"> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> <tr> <td> </td><td> </td></tr> </table>                                                                                                                                        |           |  |                |     |                  |     |  |  |  |  |  |  |
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|                                                                                                                                                                                        |                                                                                                                                                                                                                                                                 |           |  |                |     |                  |     |  |  |  |  |  |  |





WIRED CONDUIT (2") (PVC) (SCH. 80)

LOCATION	
100+55.3, LT - 100+79.7, LT	
100+79.7, LT - 101+50.3, LT	
100+79.7, LT - 101+22.2, RT	
101+22.2, RT - 101+93.7, RT	
101+22.2, RT - 101+93.7, RT	
101+93.7, RT - 102+66.1, LT	
100+79.7, LT - 101+75.0, RT	
101+75.0, RT - 102+66.0, LT	

DESCRIPTION	
METER TO SL-1 (FOR LEVEL 1 OUTLET)	
METER TO SL-2 (FOR LEVEL 1 OUTLET)	
SL-2 TO SL-3 (FOR LEVEL 1 OUTLET)	
SL-3 TO SL-4 (FOR LEVEL 1 OUTLET)	
METER TO JUNCTION BOX (FOR FUTURE LEVEL 2 OUTLET)	
JUNCTION BOX TO JUNCTION BOX (FOR FUTURE LEVEL 2 OUTLET)	

STREET LIGHT ASSEMBLY

POLE NO.	LOCATION	OFFSET
SL-1	101+56.5	57.5', LT
SL-2	101+22.2	27.7', RT
SL-3	101+93.7	36.4', RT
SL-4	102+66.1	22.4', LT

POWER DROP STANCHION, STREET LIGHTING

100+79.7, LT

SPECIAL PROVISION (JUNCTION BOX, HEAVY DUTY)




LOCATION	OFFSET
102+66.0	10.0', LT
101+75.0	35.0', RT

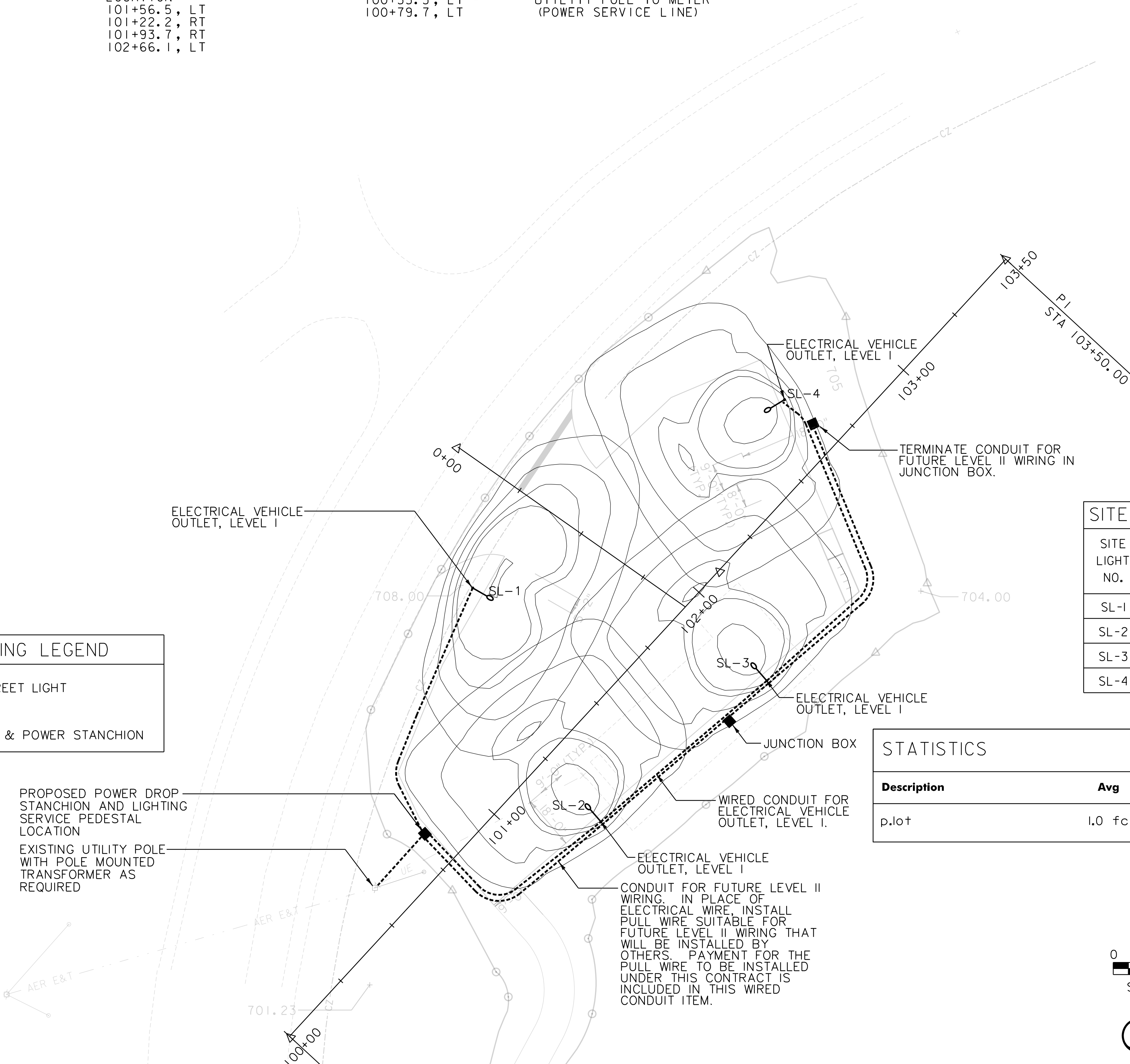
SPECIAL PROVISION (ELECTRIC VEHICLE OUTLET, LEVEL 1)

LOCATION	
101+56.5, LT	
101+22.2, RT	
101+93.7, RT	
102+66.1, LT	

WIRED CONDUIT (3") (PVC) (SCH. 80)

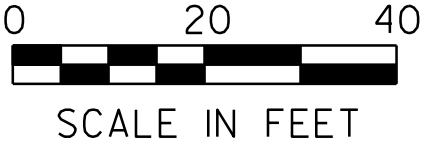
LOCATION	DESCRIPTION
100+55.3, LT - 100+79.7, LT	UTILITY POLE TO METER (POWER SERVICE LINE)

STREET LIGHTING LEGEND	
	TYPE A & B STREET LIGHT
	WIRED CONDUIT
	ELECTRIC METER & POWER STANCHION

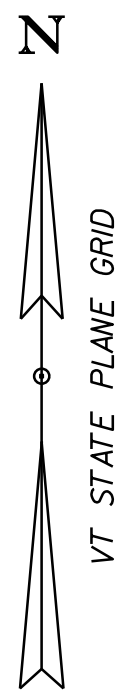


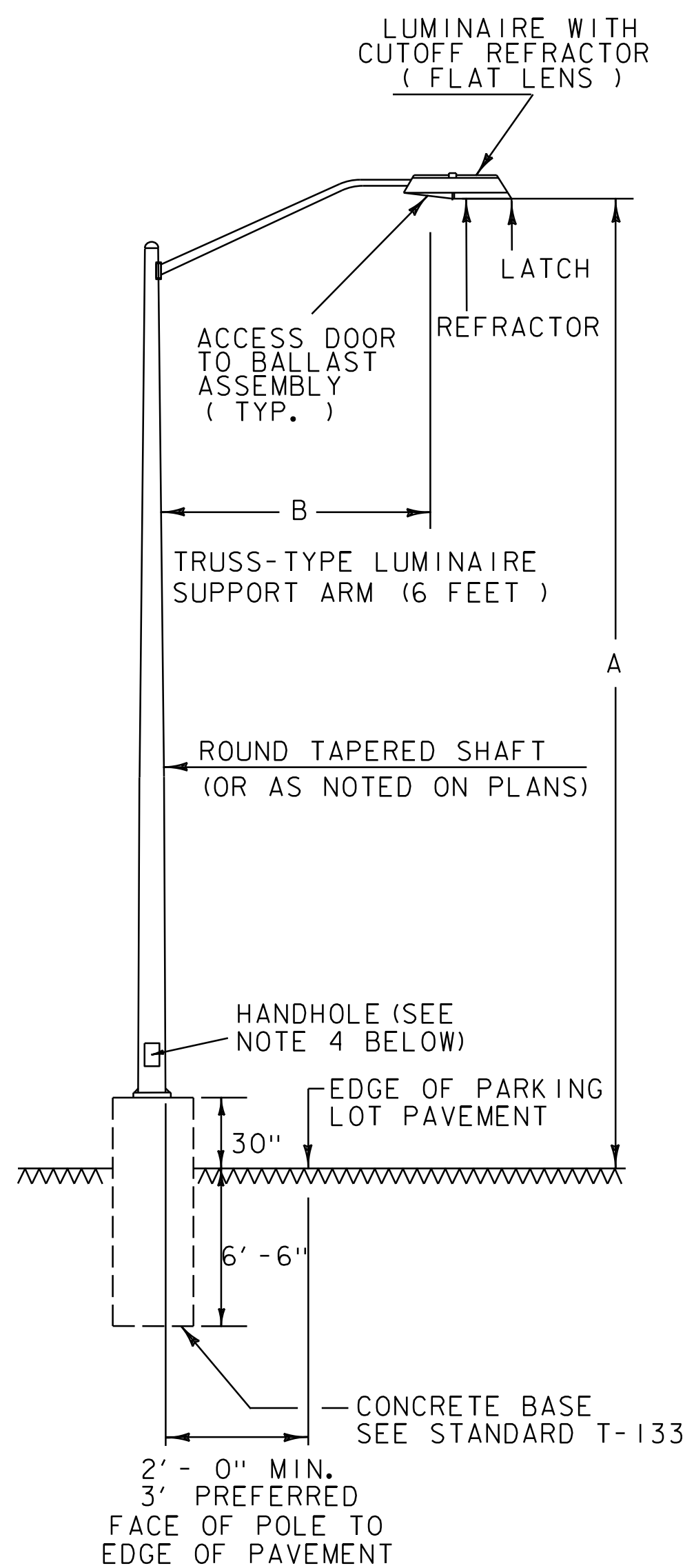
SITE LIGHTING SCHEDULE					
SITE LIGHT NO.	TYPE	LUMINAIRE		LUMINAIRE & ARM QUANTITY	ARM STYLE LENGTH OF ARM
		WATTS	TYPE		
SL-1	B	51	LED	1	6'
SL-2	A	51	LED	1	6'
SL-3	A	51	LED	1	6'
SL-4	A	51	LED	1	6'

STATISTICS					
Description	Avg	Max	Min	Max/Min	Avg/Min
p.lot	1.0 fc	2.7 fc	0.3 fc	9.0:1	3.3:1



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik3501tgbdr.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: M. CROWLEY
DESIGNED BY: M. CROWLEY	CHECKED BY: G. SANTY
LIGHTING AND PHOTOMETRIC PLAN	
SHEET 31 OF 42	





#### DIMENSIONS:

A = MOUNTING HEIGHT - 18.5'  
 B = LUMINAIRE SUPPORT ARM LENGTH - 6'  
 C = POLE HEIGHT - 16'

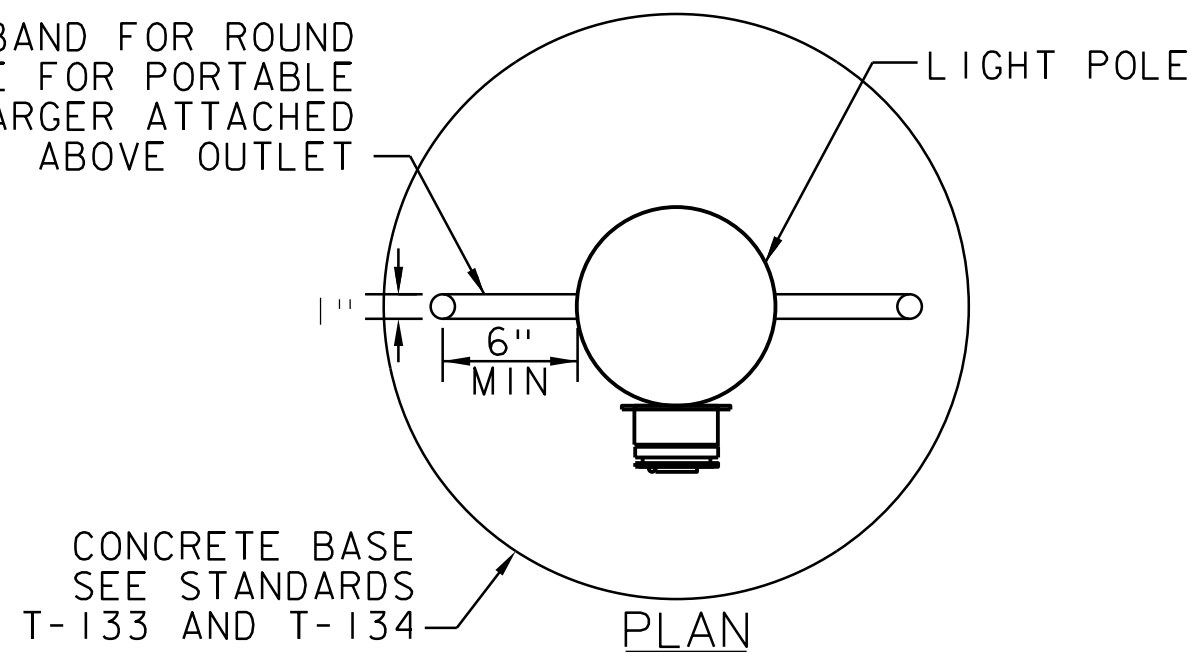
#### TYPE 'A' & 'B' SITE LIGHTS

NOT TO SCALE

#### GENERAL NOTES:

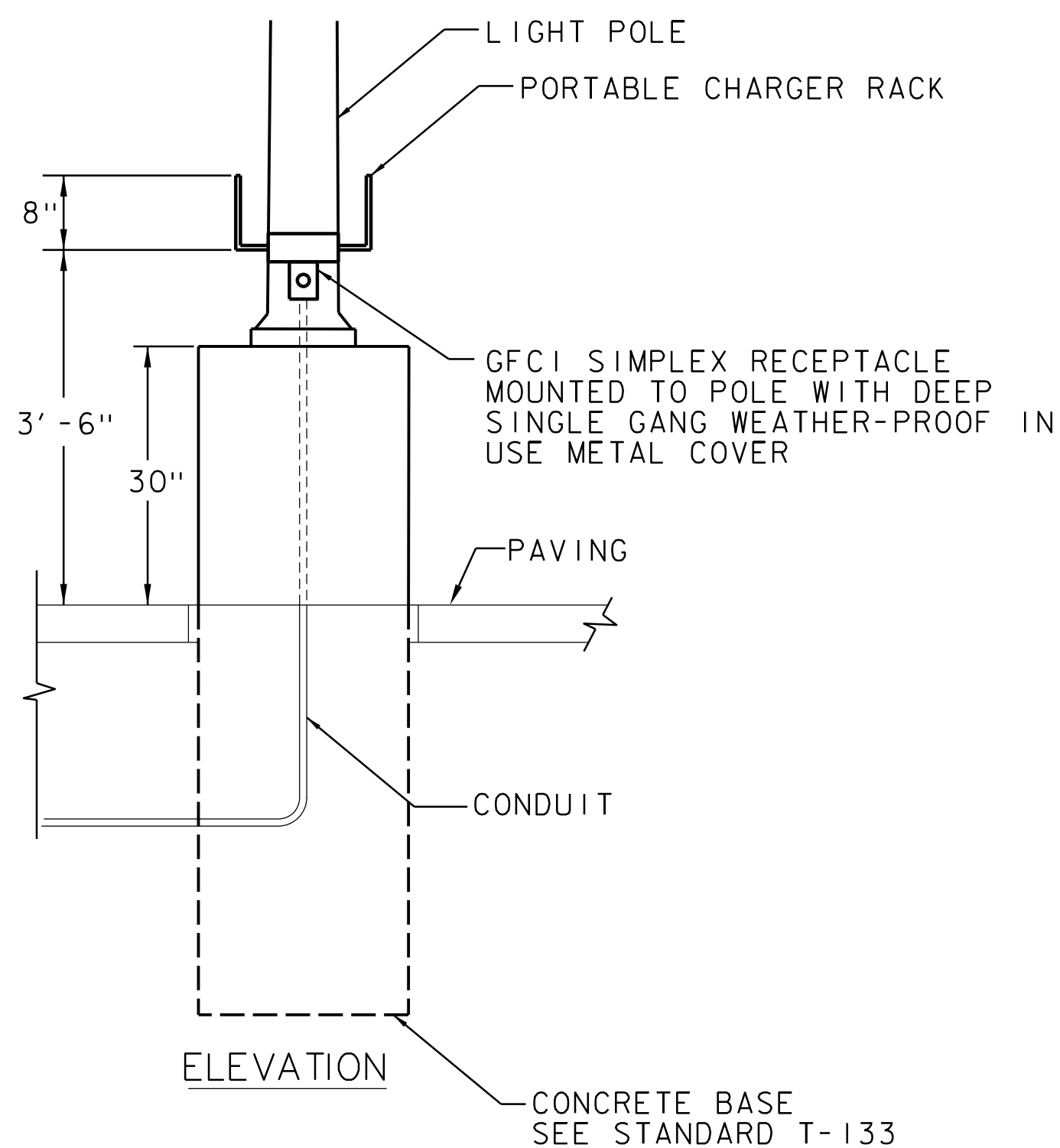
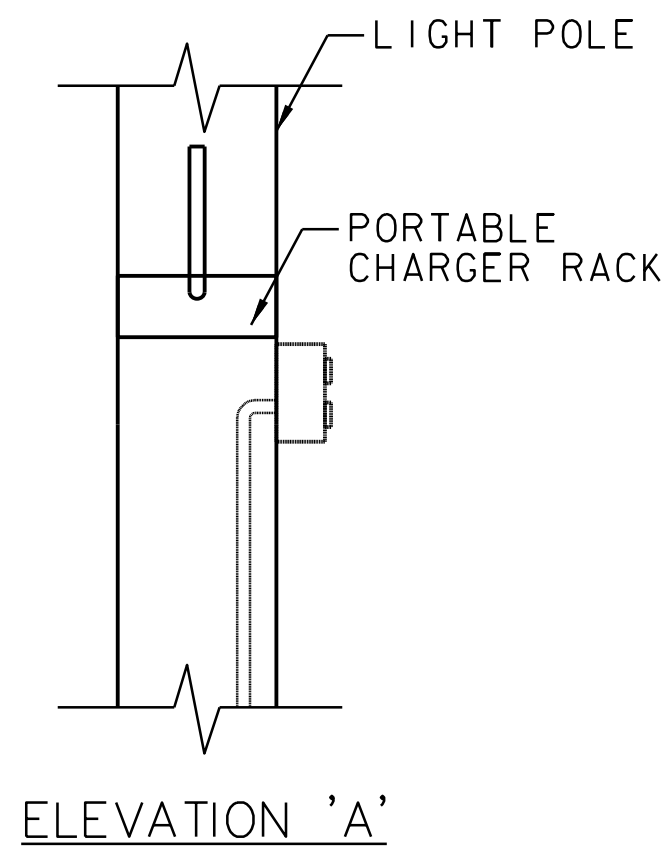
1. ALL WORK SHALL CONFORM TO THE NATIONAL ELECTRICAL CODE (N.E.C.) LATEST EDITION.
2. COORDINATE ALL LIGHTING FIXTURE LOCATIONS AND OTHER APPURTENANCES.
3. ALL ELECTRICAL WORK SHALL BE CAREFULLY COORDINATED WITH THE WORK OF OTHER TRADES.
4. LIGHT POLE HANDHOLE LOCATION MUST BE COORDINATED TO ACCOMMODATE THE PORTABLE CHARGER RACK AND RECEPTACLE.
5. FOR TYPICAL TRENCH SECTION SEE STANDARD E-175.

TENON BAND FOR ROUND POLE FOR PORTABLE CHARGER ATTACHED ABOVE OUTLET



#### SPECIAL PROVISION (EV LEVEL 1 - 120V 20A OUTLET)

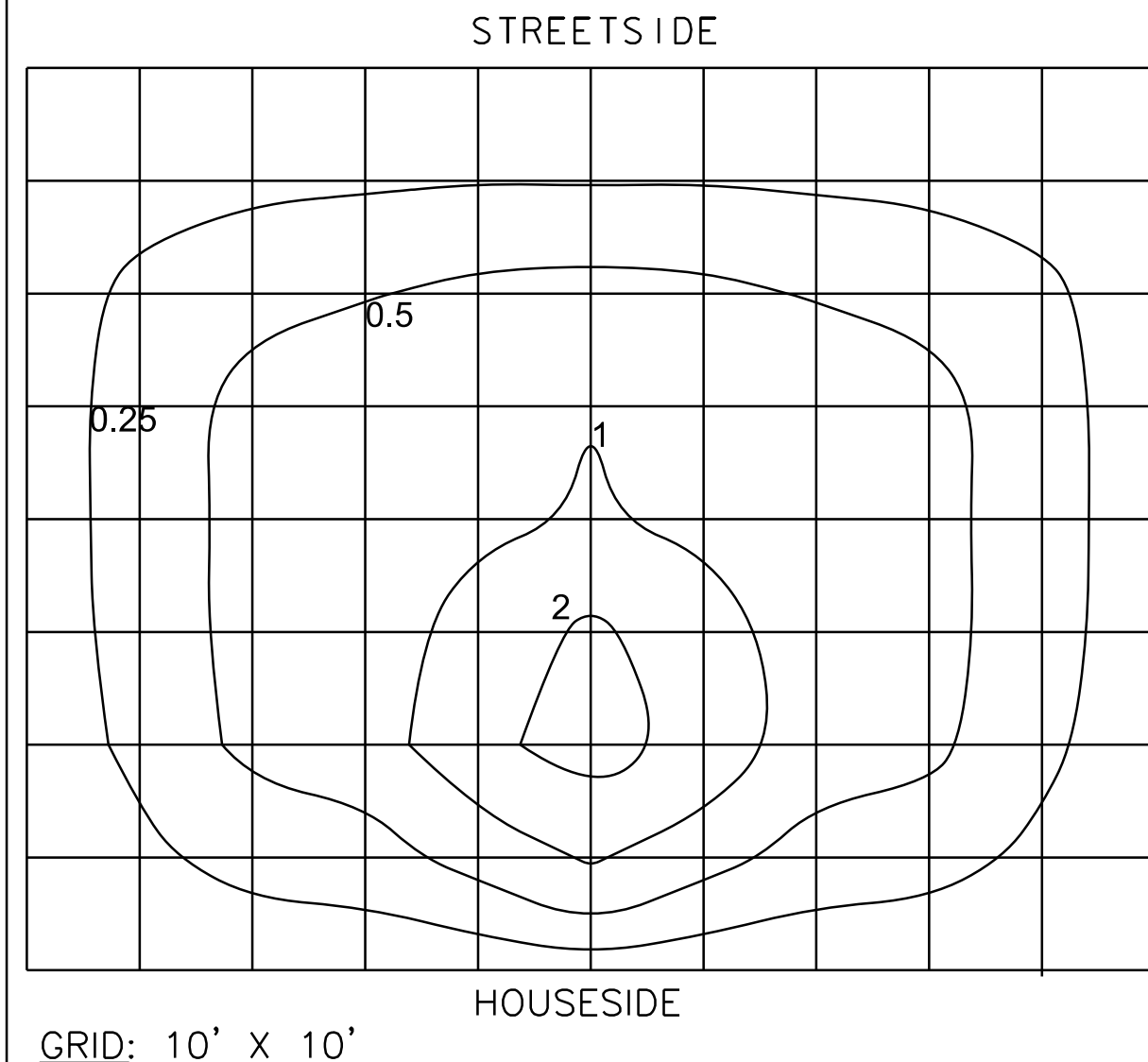
NOT TO SCALE



#### FIXTURE TYPE 'A'

#### ISO-FOOTCANDLE DATA

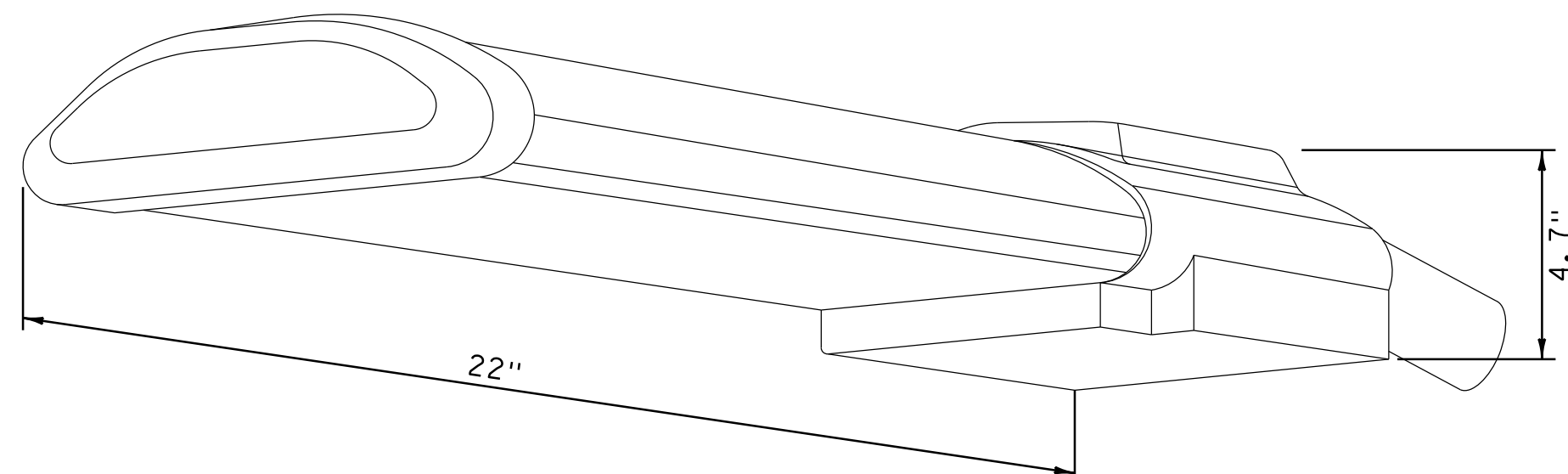
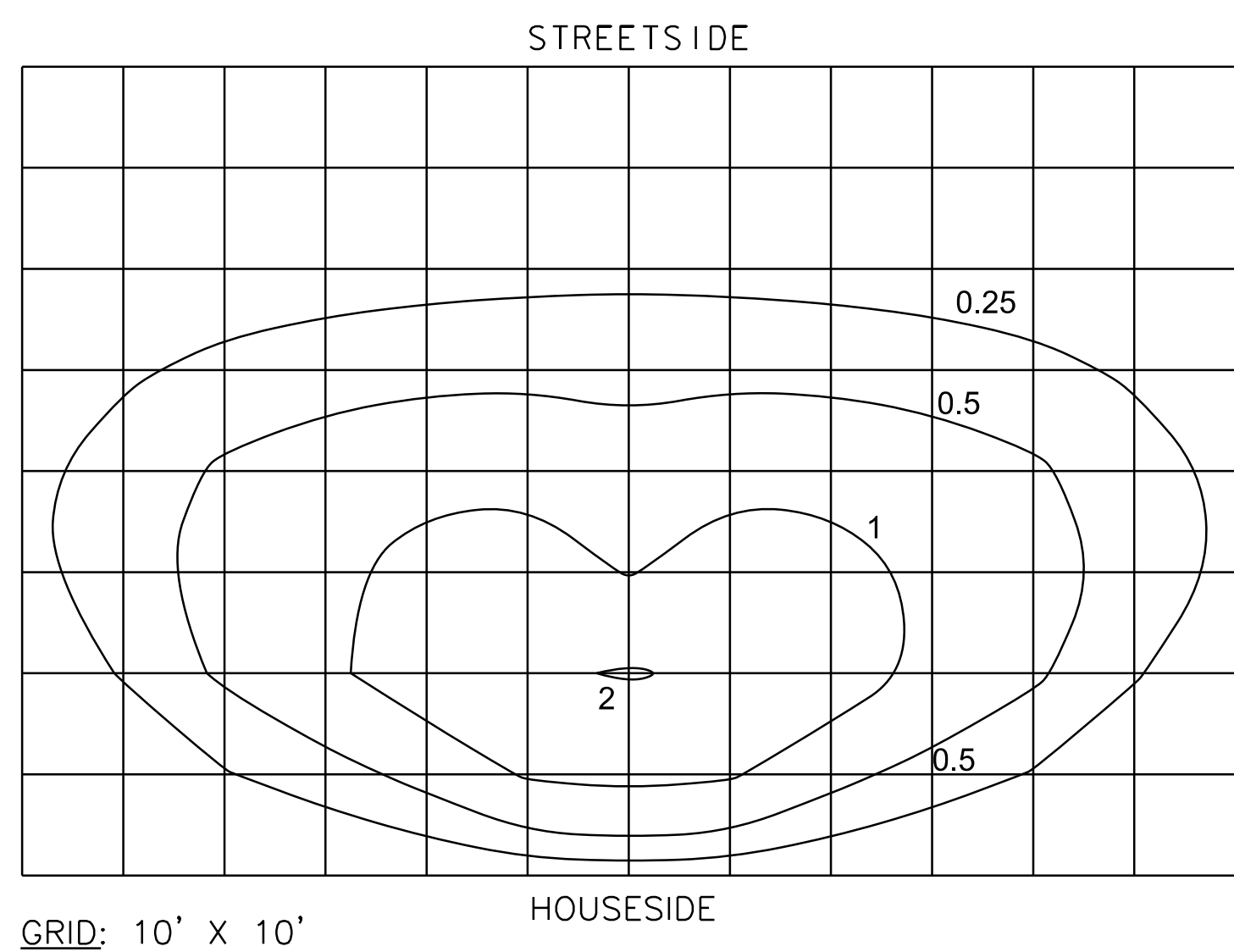
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#### FIXTURE TYPE 'B'

#### ISO-FOOTCANDLE DATA

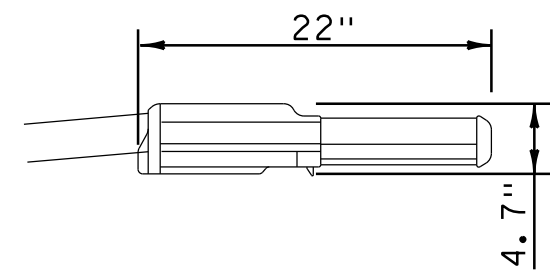
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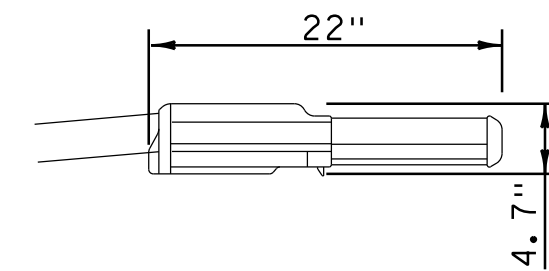
#### LUMINAIRE

NOT TO SCALE

LUMINAIRE:  
 LENS FINISH: CLEAR  
 FLAT GLASS  
 HOUSING: ALUMINUM  
 LAMP:  
 TYPE: 40 LEDS  
 ANSI/IES TYPE:  
 TYPE IV CUT-OFF OPTICS  
 WITH HOUSE SIDE SHIELD



LUMINAIRE:  
 LENS FINISH: CLEAR  
 FLAT GLASS  
 HOUSING: ALUMINUM  
 LAMP:  
 TYPE: 40 LEDS  
 ANSI/IES TYPE:  
 TYPE III CUT-OFF OPTICS  
 WITH HOUSE SIDE SHIELD



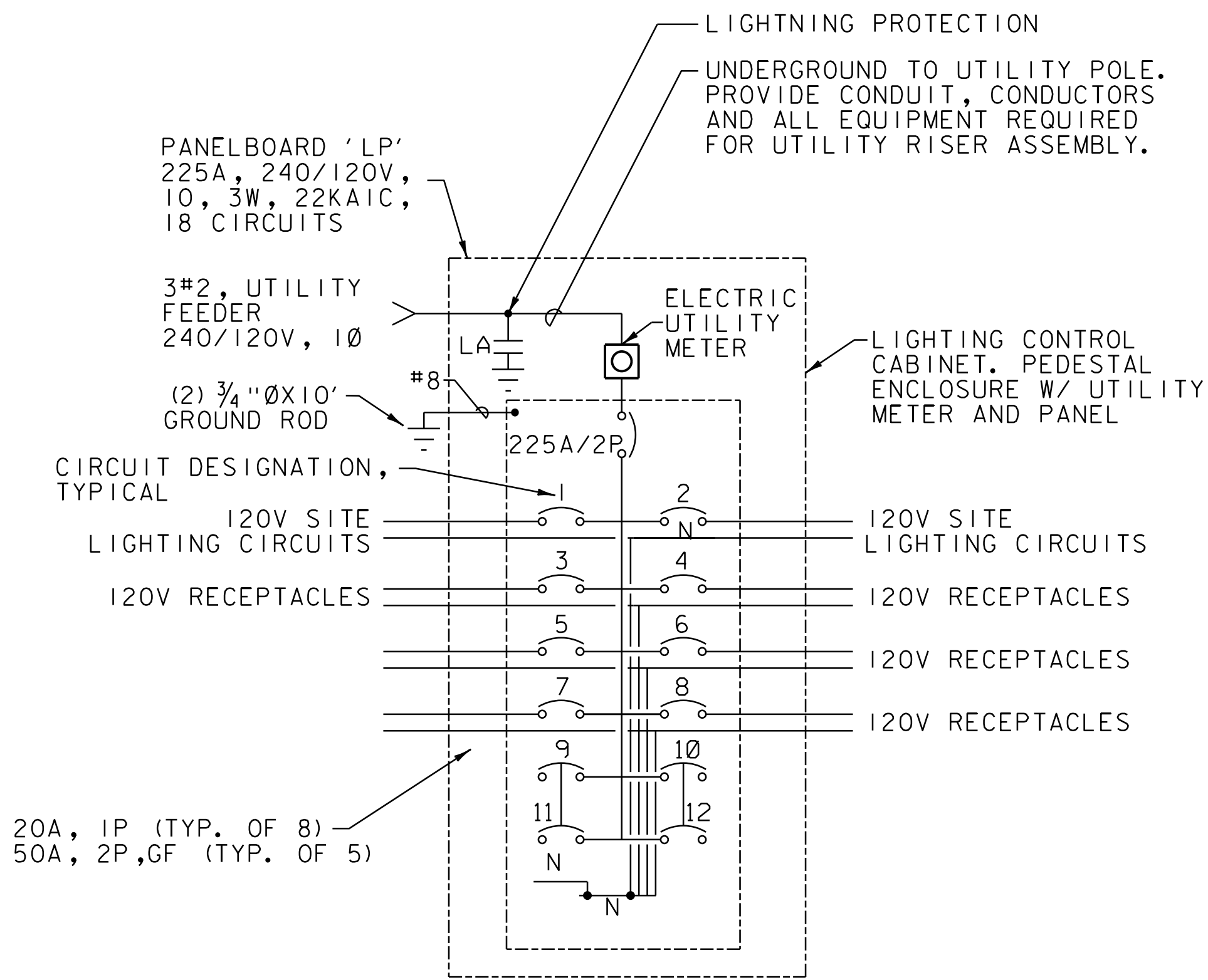
CREE: STR-LWY-4MB-HT-04-E-UL-BZ-525-40K-SC- (PR)

CREE: STR-LWY-3MB-HT-04-E-UL-BZ-525-40K-SC- (PR)

PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE  
 PROJECT NUMBER: CMG PARK(37)  
 FILE NAME: ...drawing\zllk350+yp.dgn  
 PROJECT LEADER: G. SANTY  
 DESIGNED BY: M. CROWLEY  
 LIGHTING DETAIL SHEET 1  
 PLOT DATE: 5/2/2017  
 DRAWN BY: P. ARMATA  
 CHECKED BY: G. SANTY  
 SHEET 32 OF 42

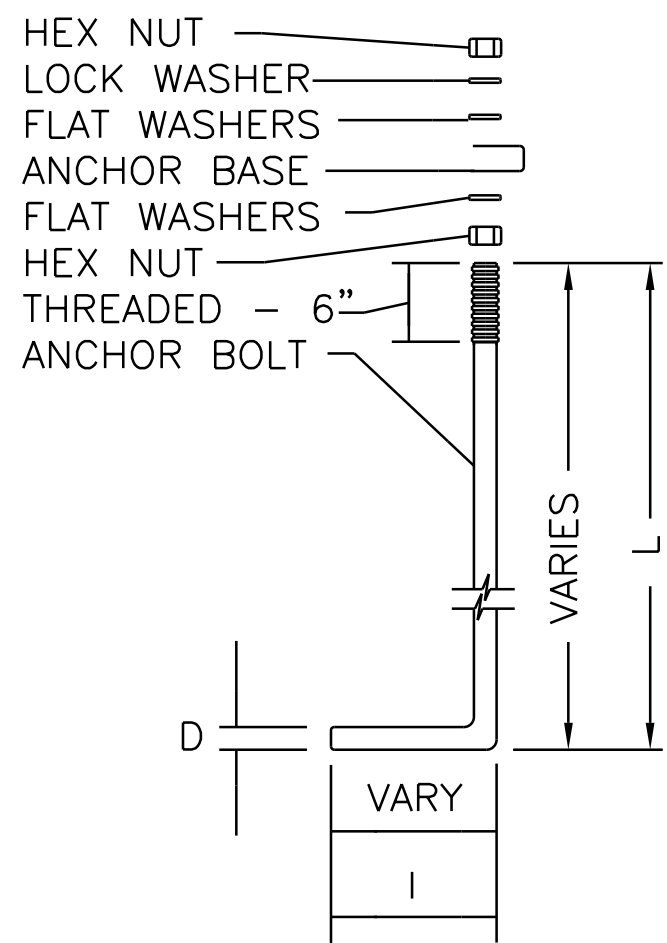






ONE-LINE DIAGRAM ROADWAY  
LIGHTING SERVICE PEDESTAL

NOT TO SCALE  
NOTE: NO RELAYS REQUIRED



DIMENSION TABLE									
MOUNTING HEIGHT	NO. OF ARMS	ANCHOR BASE				SLIP BASE			
		D	L	I	UNC	D	L	I	UNC
22'(MAX.)	1 2	1	36	4	8	1-1/4"	42	6	7

#### NOTES:

- ALL ANCHOR BOLTS, WASHERS AND NUTS TO BE STAINLESS STEEL.
- FOR MOUNTING HEIGHTS LESS THAN 30 FEET USE THE ANCHOR BOLT DIMENSIONS AS RECOMMENDED BY THE POLE MANUFACTURER, LENGTH, HOOK, DIAMETER AND BOLT PROJECTION.

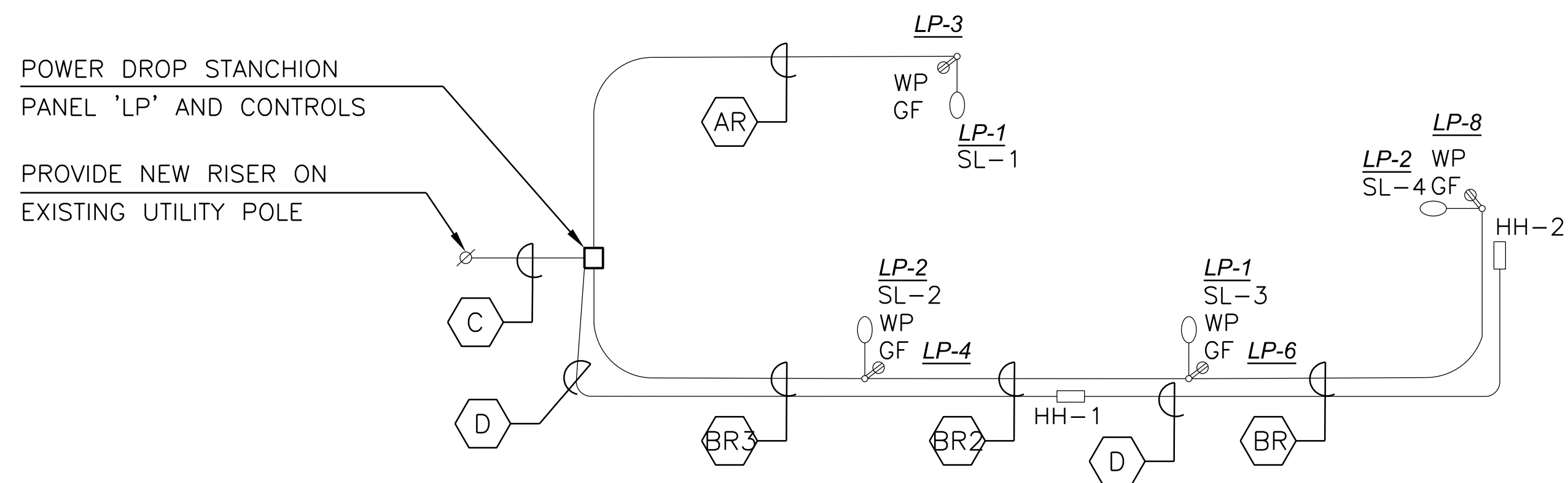
#### ANCHOR BOLT ASSEMBLY DETAIL

NOT TO SCALE

CONDUIT & CONDUCTOR SCHEDULE					
KEY	CONDUIT SIZE	CONDUCTORS			
		FOR FIXTURES	FOR RECEPTACLES	FOR SERVICE	FOR GROUND
AR	2"	2#10	2#8		1#8G
B	2"	2#10			1#8G
BR	2"	2#10	2#6		1#8G
BR2	2"	4#10	2#6, 2#8		1#8G
BR3	2"	4#10	2#6, 4#8		1#6G
C	2"			3#2	1#6G
D	3"	#500 PULLCORD			

#### GENERAL NOTES:

- MAXIMUM OF 270° IN TOTAL BENDS PERMITTED IN SINGLE RUN OF CONDUIT
- LIGHTS SHALL BE FUSED AT BASE WITH Y-TYPE FUSE KIT WITH WATERPROOF INSULATED SEAL. SIZE OF SHIELD SHALL MATCH WIRE AND HAVE A 10A FUSE.
- CIRCUIT CONDUCTORS INCLUDING NEUTRAL CONDUCTOR SHALL BE CLEARLY IDENTIFIED BY CORROSION RESISTANT TAGS INDICATING CIRCUIT NUMBER AND PANEL SOURCES AT EVERY POLE BASE AND HANDHOLE.
- UTILIZE APPROVED DUAL-RATED PARALLEL TAP CONNECTOR WITH INSULATED COVER FOR TAPS AT POLE BASE.
- UTILIZE APPROVED DUAL-RATED PARALLEL TAP CONNECTOR WITH WATERTIGHT CONNECTOR, SUITABLE FOR DIRECT BURIAL IN JUNCTION BOXES, HANDHOLES.



SITE LIGHTING ONE-LINE DIAGRAM



PROJECT NAME: EAST MONTEPIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P,ARMATA
DESIGNED BY: M. CROWLEY	CHECKED BY: G. SANTY
LIGHTING DETAIL SHEET 2	SHEET 33 OF 42

STREET LIGHTING GENERAL NOTES

1. BRACKET ARMS SHALL BE TRUSS-STYLE TYPE AND SHALL BE DESIGNED IN ACCORDANCE WITH THE 2013 AASHTO STANDARD SPECIFICATIONS FOR STRUCTURAL SUPPORTS FOR HIGHWAY SIGNS, LUMINAIRES AND TRAFFIC SIGNALS AND ITS LATEST REVISIONS.
2. STREET LIGHT ASSEMBLIES SHALL BE PAINTED FLAT BLACK AND HAVE FLAT BLACK HOUSINGS. FINISHES SHALL BE PER SECTION 679 OF THE LATEST SPECIFICATIONS FOR CONSTRUCTION.
3. LUMINAIRES
- A. LUMINAIRES SHALL BE ONE OF THE FOLLOWING ONLY:
1. BETA LEDWAY IP-SERIES
2. HOLOPHANE LEDGENDS SERIES
3. LRL LED SAT-96M SERIES
- B. NO SUBSTITUTIONS FOR LUMINAIRES SHALL BE ALLOWED.
- C. ALL LUMINAIRE HOUSINGS SHALL BE EQUIPPED WITH BIRD SPIKES.
4. WIRING AND GROUNDING
- A. CIRCUIT CONDUCTORS SHALL BE CLEARLY IDENTIFIED BY CORROSION RESISTANT TAGS INDICATING CIRCUIT NUMBER AND PANEL SOURCES AT EVERY LIGHT POLE AND HANDHOLE.
- B. ALL CONDUIT MUST INCLUDE A GROUNDING CONDUCTOR. RIGID STEEL CONDUIT SHALL BE PROPERLY CONNECTED AT THE JOINTS SO AS TO BE WATERTIGHT AND MAINTAIN ELECTRICAL CONTINUITY AND HAVE GROUNDING BUSHINGS SO AS TO ACT AS A GROUNDING CONDUCTOR.
- C. THE GROUNDING CONDUCTOR SHALL BE CONTINUOUS.
- D. ALUMINUM WIRE SHALL NOT BE USED FOR GROUND WIRE.
5. STREET LIGHTING CONTROL DEVICE
- A. ASTRONOMICAL CLOCKS SHALL BE ONE OF THE FOLLOWING OR APPROVED EQUAL:
1. TORK EWZ SERIES
2. INTERMATIC ET 800 SERIES
3. PARAGON EC SERIES
- B. STREET LIGHTING EQUIPMENT SHALL BE WIRED SUCH THAT ONE CONTROL DEVICE COMMANDS THE FUNCTIONS ASSOCIATED WITH POWERING UP AND DOWN ALL LUMINAIRES.
6. SEE STANDARD DRAWINGS T-133 AND T-134 FOR ADDITIONAL INFORMATION.

ILLUMINATION LEVELS

PARK AND RIDE SHALL HAVE AN AVERAGE OF 1.0 FC, MINIMUM OF 0.2 FC, AND UNIFORMITY OF 4:1.

CONDUIT

A 2 INCH (I.D.) MINIMUM CONDUIT SHALL BE USED AT ALL LOCATIONS UNLESS OTHERWISE NOTED ON THE PLANS, ALL CONDUIT SHALL BE SCHEDULE 80 PVC.

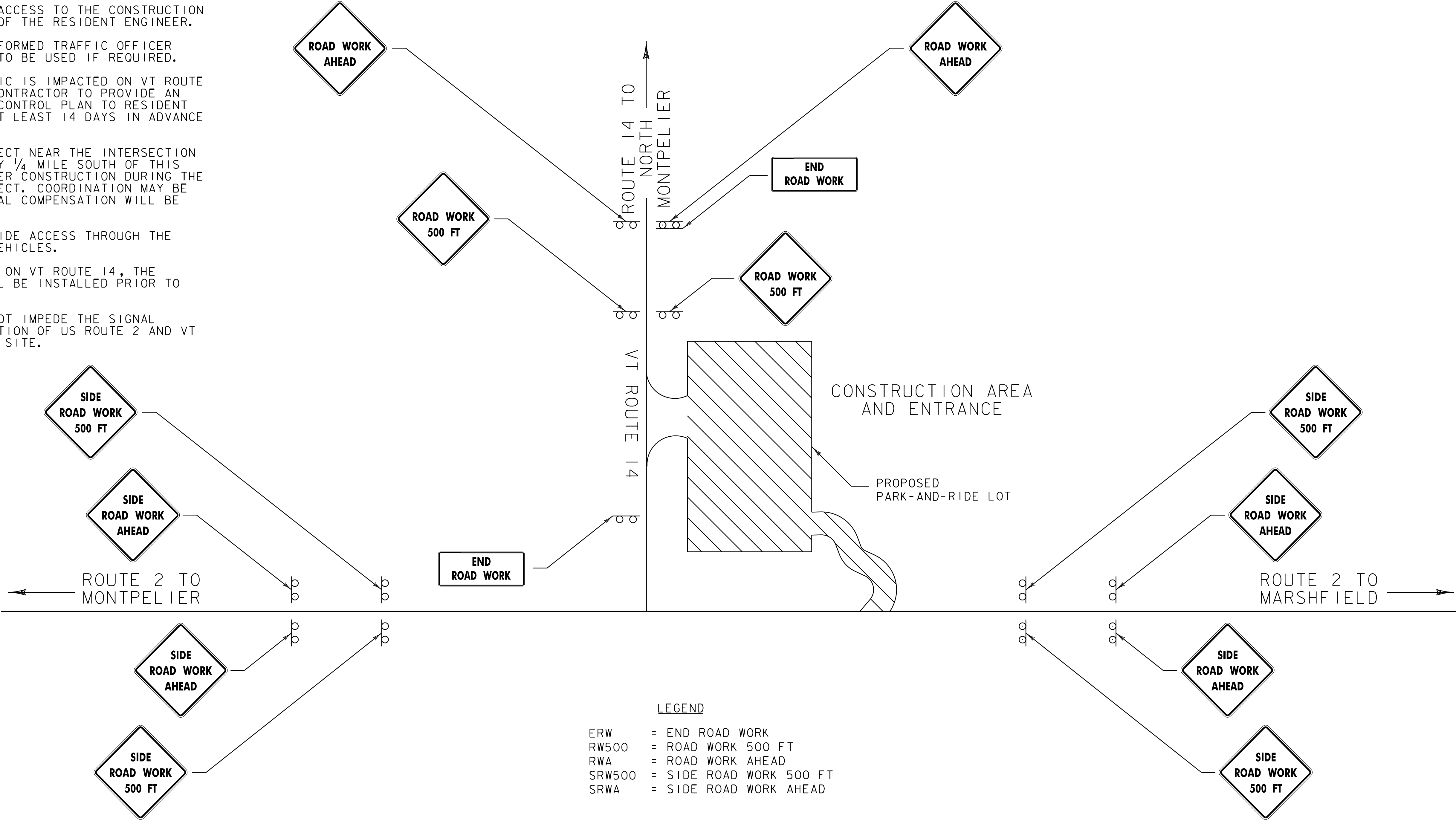
PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: ...\\drawing\\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P,ARMATA
DESIGNED BY: M. CROWLEY	CHECKED BY: G. SANTY
LIGHTING DETAIL SHEET 3	SHEET 34 OF 42





NOTES:

- 1.CONTRACTOR SHALL CONTROL ACCESS TO THE CONSTRUCTION SITE TO THE SATISFACTION OF THE RESIDENT ENGINEER.
- 2.ESTIMATED FLAGGER AND UNIFORMED TRAFFIC OFFICER HOURS HAVE BEEN INCLUDED TO BE USED IF REQUIRED.
- 3. IF THE FREE FLOW OF TRAFFIC IS IMPACTED ON VT ROUTE 14 DUE TO WORK ON SITE, CONTRACTOR TO PROVIDE AN MUTCD COMPLIMENT TRAFFIC CONTROL PLAN TO RESIDENT FOR REVIEW AND APPROVAL AT LEAST 14 DAYS IN ADVANCE OF THE WORK.
- 4. A BRIDGE REPLACEMENT PROJECT NEAR THE INTERSECTION OF ROUTE 14 (APPROXIMATELY ¼ MILE SOUTH OF THIS PROJECT AREA) WILL BE UNDER CONSTRUCTION DURING THE CONSTRUCTION OF THIS PROJECT. COORDINATION MAY BE NECESSARY AND NO ADDITIONAL COMPENSATION WILL BE PAID FOR COORDINATION.
- 5. THE CONTRACTOR SHALL PROVIDE ACCESS THROUGH THE WORK ZONE FOR EMERGENCY VEHICLES.
- 6. IF FLAGGERS ARE NECESSARY ON VT ROUTE 14, THE FLAGGER SIGN PACKAGE SHALL BE INSTALLED PRIOR TO FLAGGING OPERATIONS.
- 7. WORK ZONE TRAFFIC SHALL NOT IMPEDE THE SIGNAL OPERATION AT THE INTERSECTION OF US ROUTE 2 AND VT ROUTE 14 ADJACENT TO THIS SITE.



LEGEND

ERW	=	END ROAD WORK
RW500	=	ROAD WORK 500 FT
RWA	=	ROAD WORK AHEAD
SRW500	=	SIDE ROAD WORK 500 FT
SRWA	=	SIDE ROAD WORK AHEAD

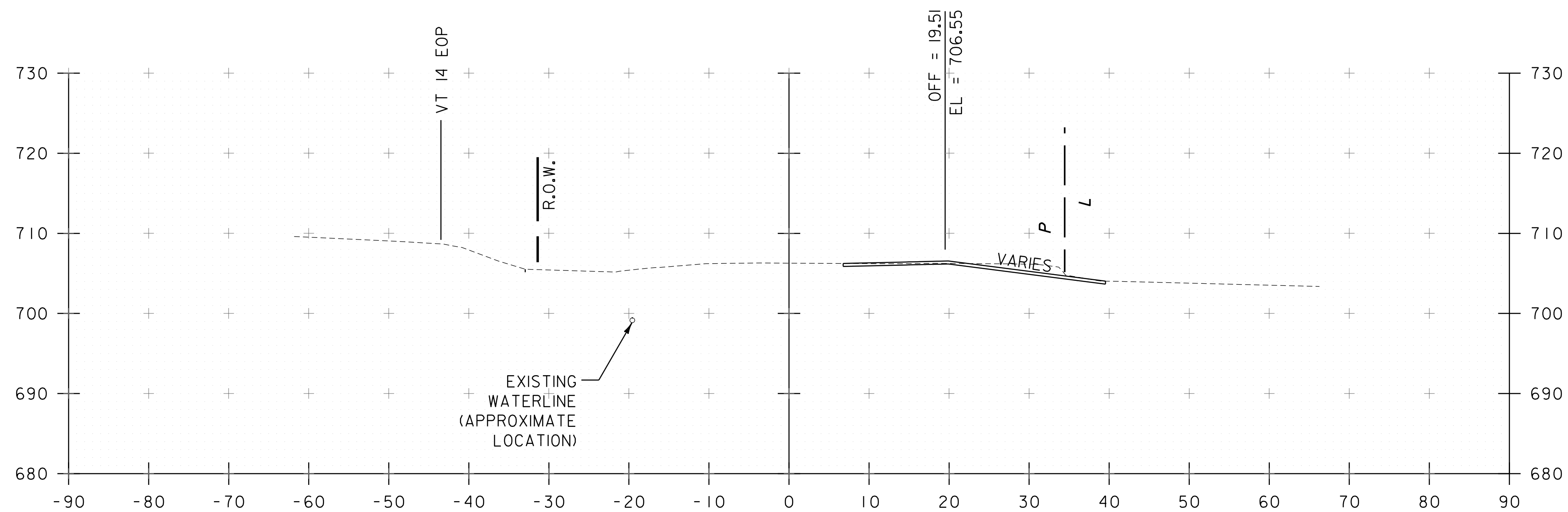
LOCATION	ERW	RW500	RWA	SRW500	SRWA	SIZE
ROUTE 2 NB				2	2	48"x48"
ROUTE 2 SB				2	2	48"x48"
ROUTE 14	2	2	2			48"x48"
TOTALS	2	2	2	4	4	

CONSTRUCTION APPROACH SIGNING

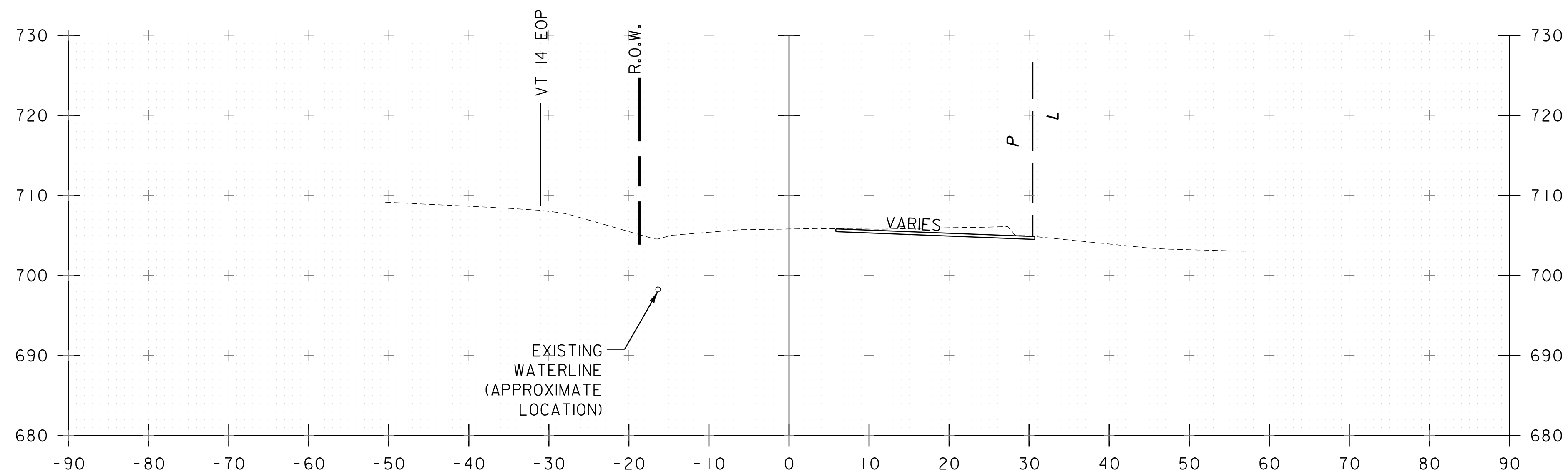
NOT TO SCALE  
SEE VTrans STANDARD T-1 FOR SIGN PLACEMENT.  
ALL TEMPORARY CONSTRUCTION SIGNING WILL BE INCLUDED  
IN THE UNIT PRICE BID FOR CONTRACT ITEM 641.10.

PROJECT NAME:	EAST MONTPELIER PARK-AND-RIDE
PROJECT NUMBER:	CMG PARK(37)
FILE NAME: ...drawing\zllk350+yp.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: P,ARMATA
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CONSTRUCTION APPROACH SIGNING	SHEET 35 OF 42





100+75



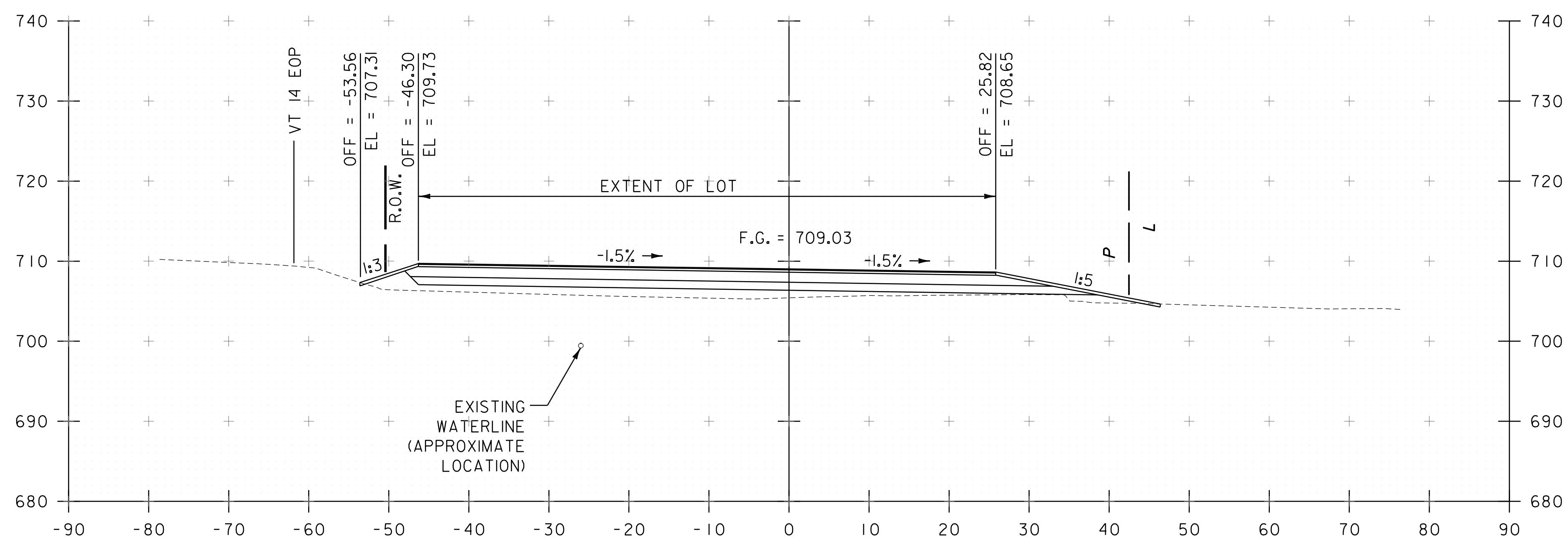
100+50

STA. 100+50 TO STA. 100+75

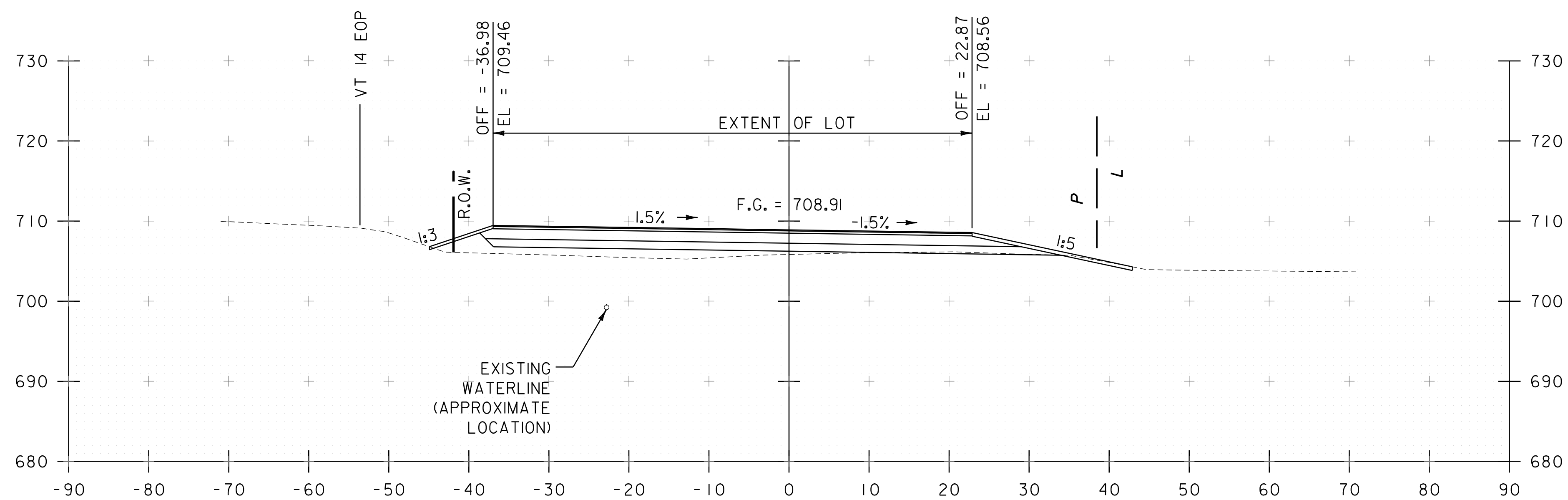


PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 1	SHEET 36 OF 42





101+25

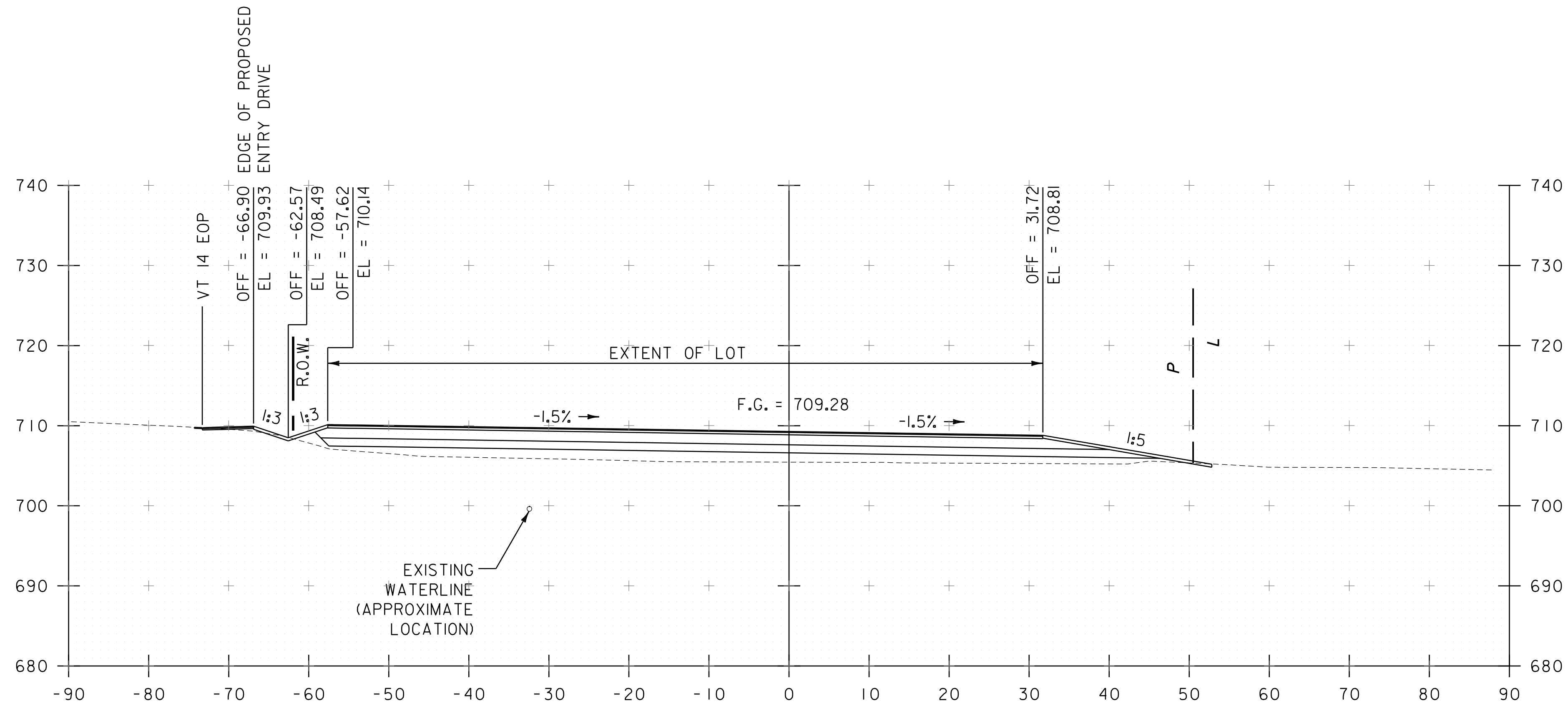


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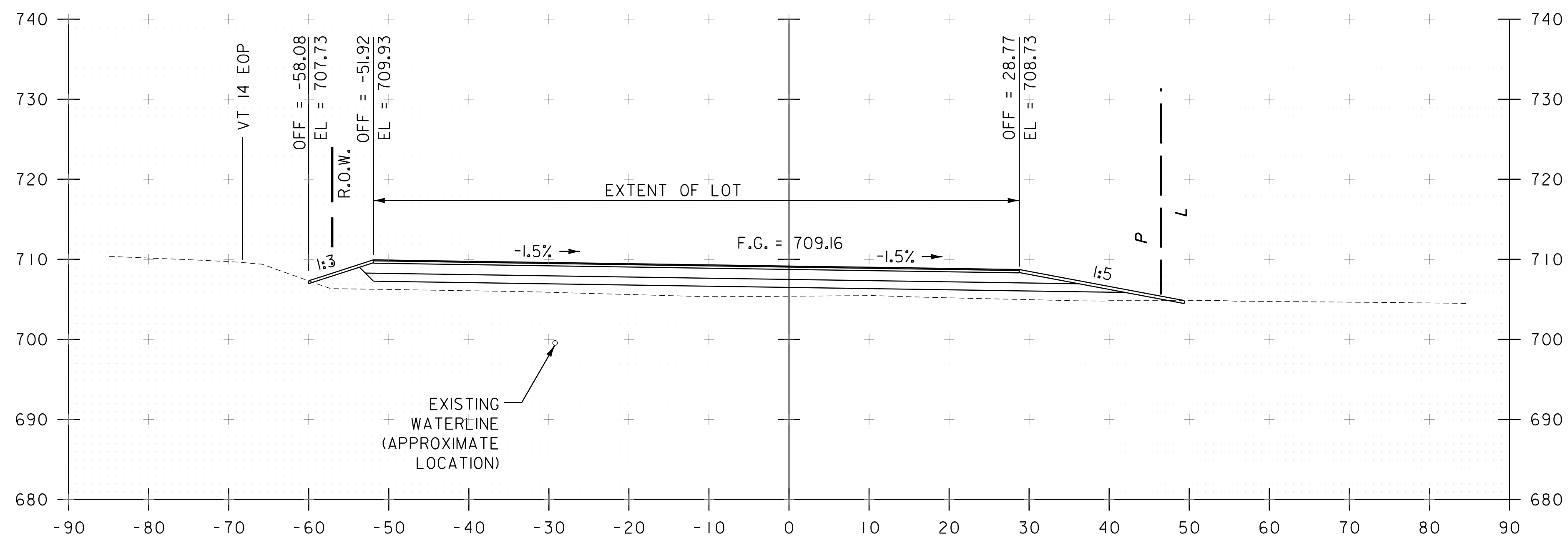
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PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 2	SHEET 37 OF 42



101+75



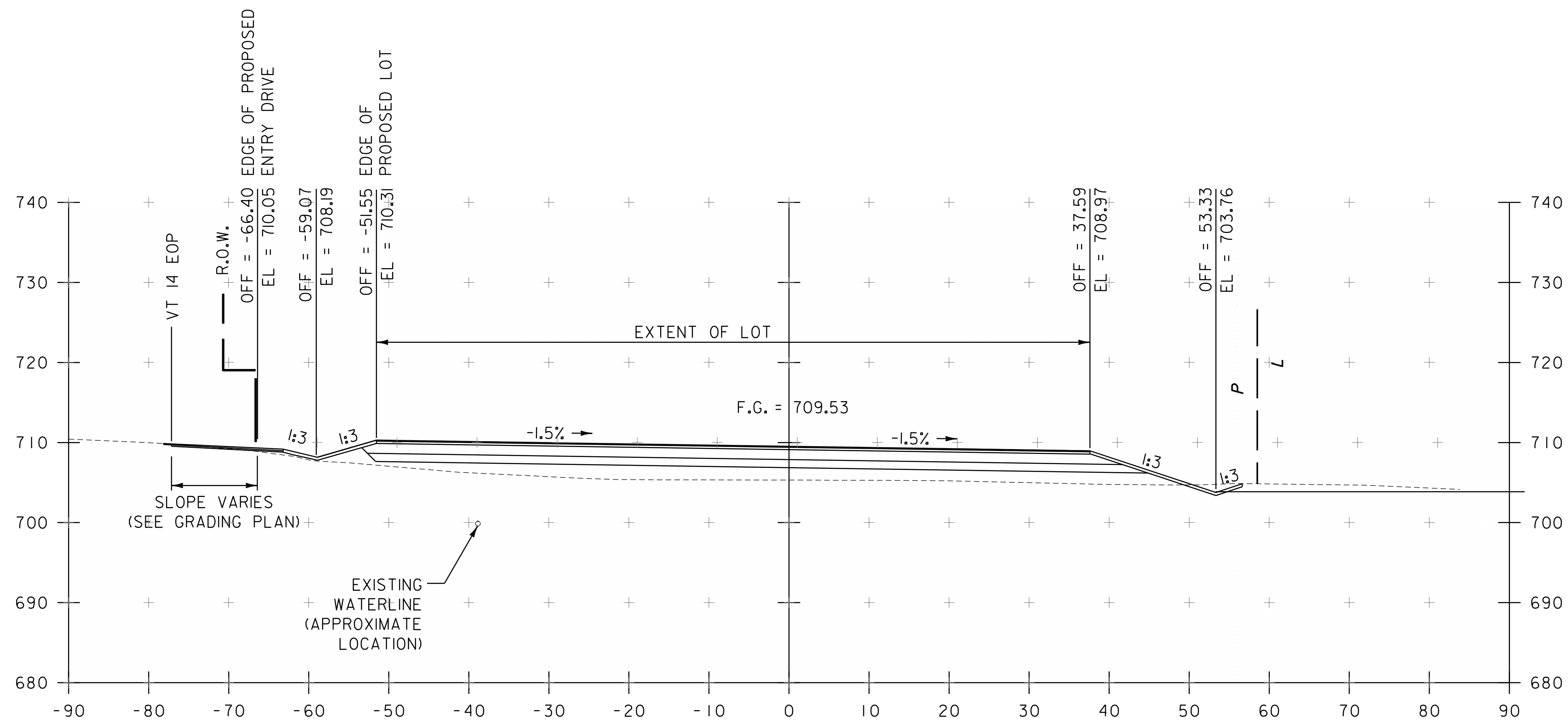
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STA. 101+50 TO STA. 101+75

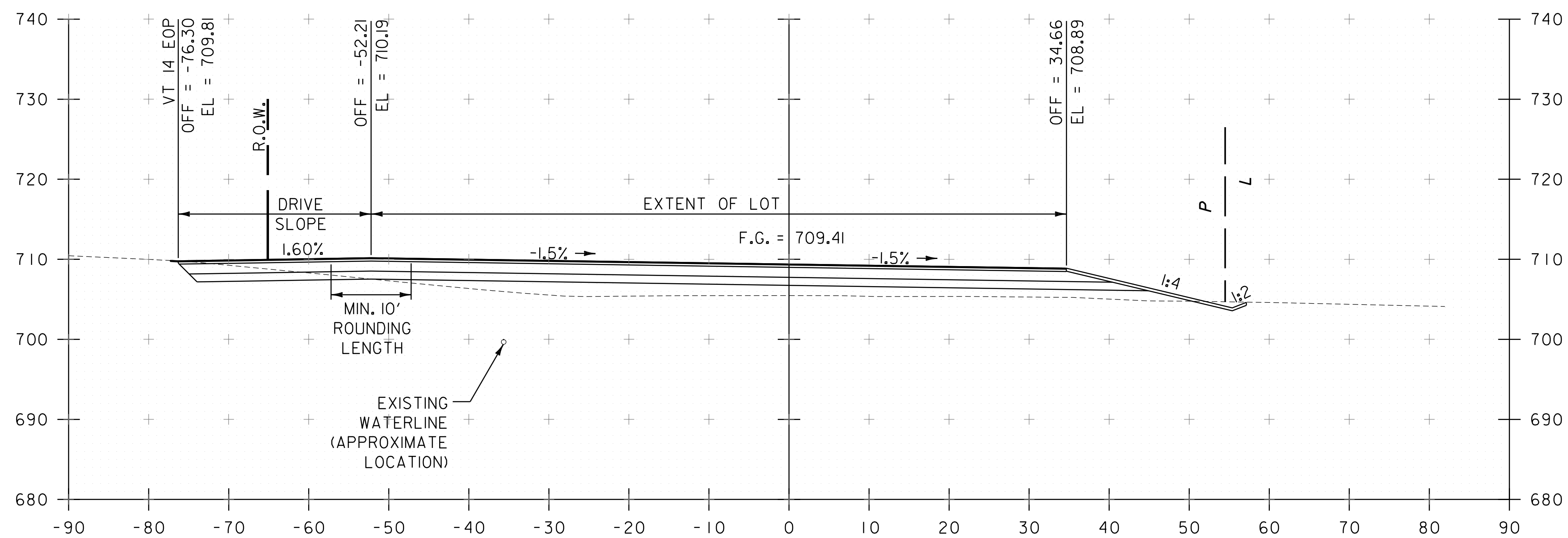


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PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 3	SHEET 38 OF 42





102+25

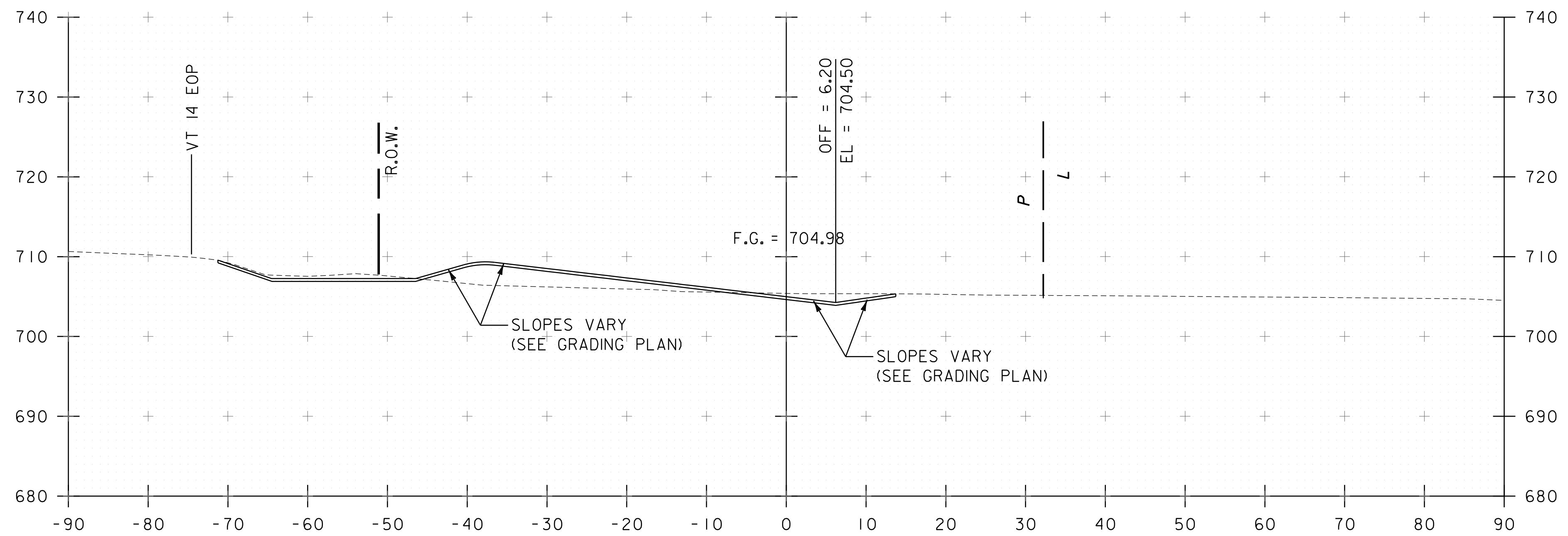


102+00

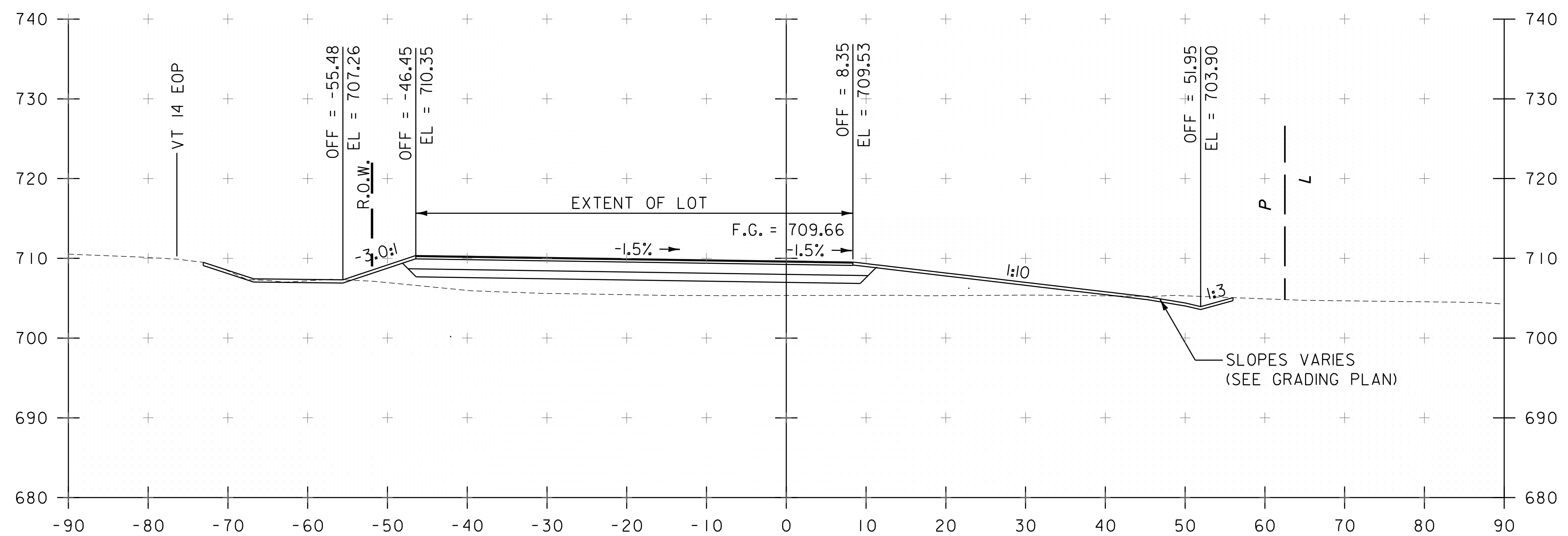
STA. 102+00 TO STA. 102+25



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 4	SHEET 39 OF 42



102+75

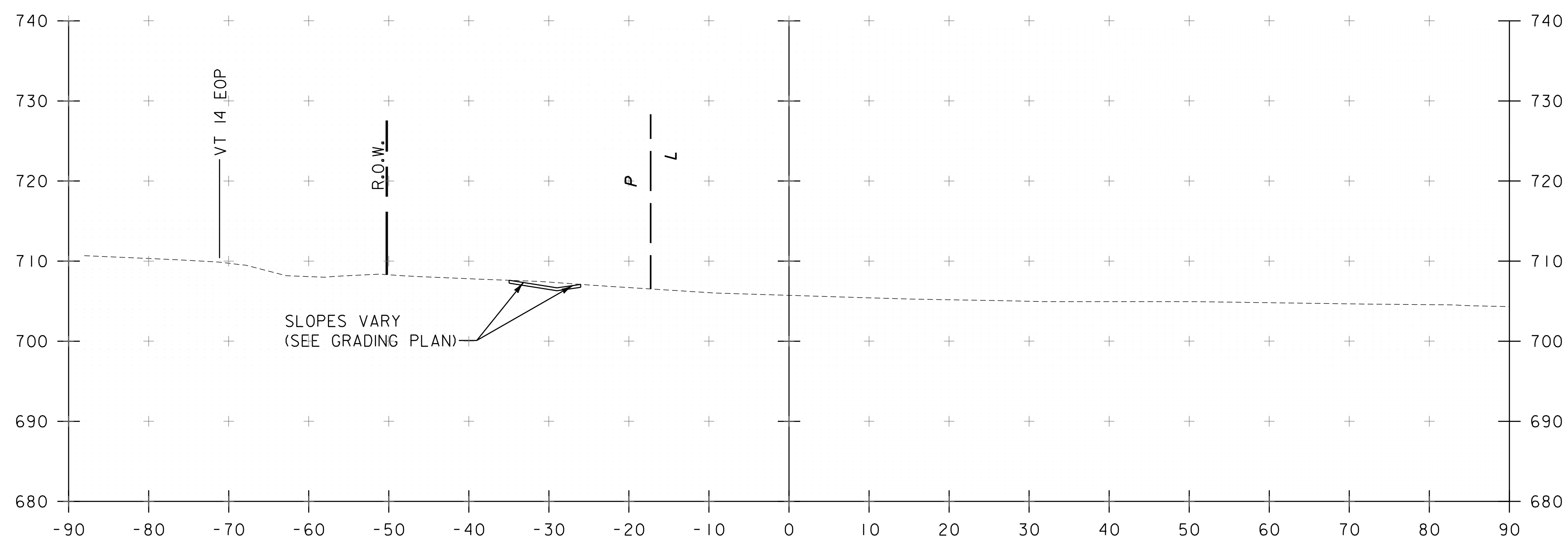


102+50

STA. 102+50 TO STA. 102+75



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 5	SHEET 40 OF 42



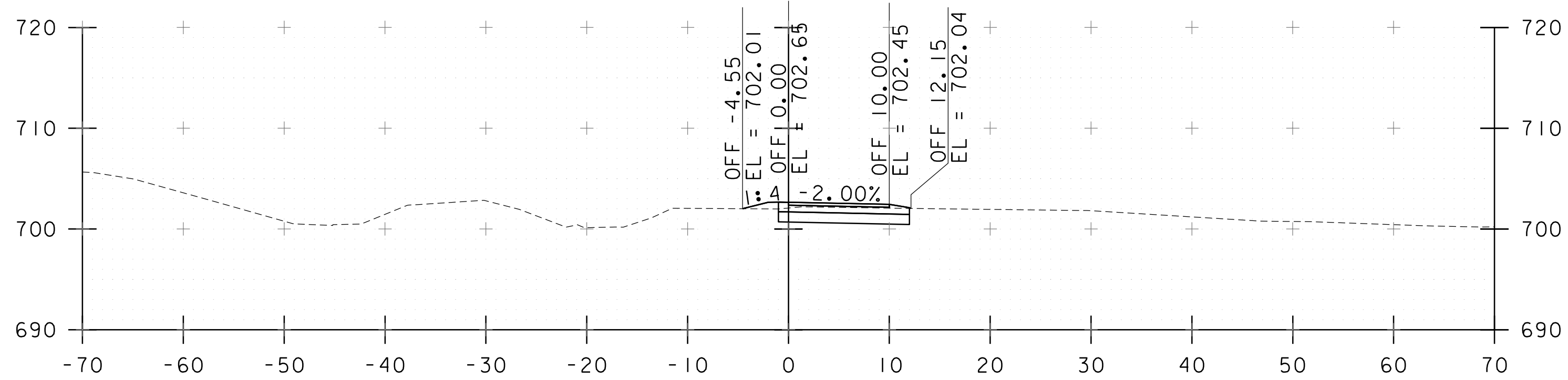
103+00

STA. 103+00

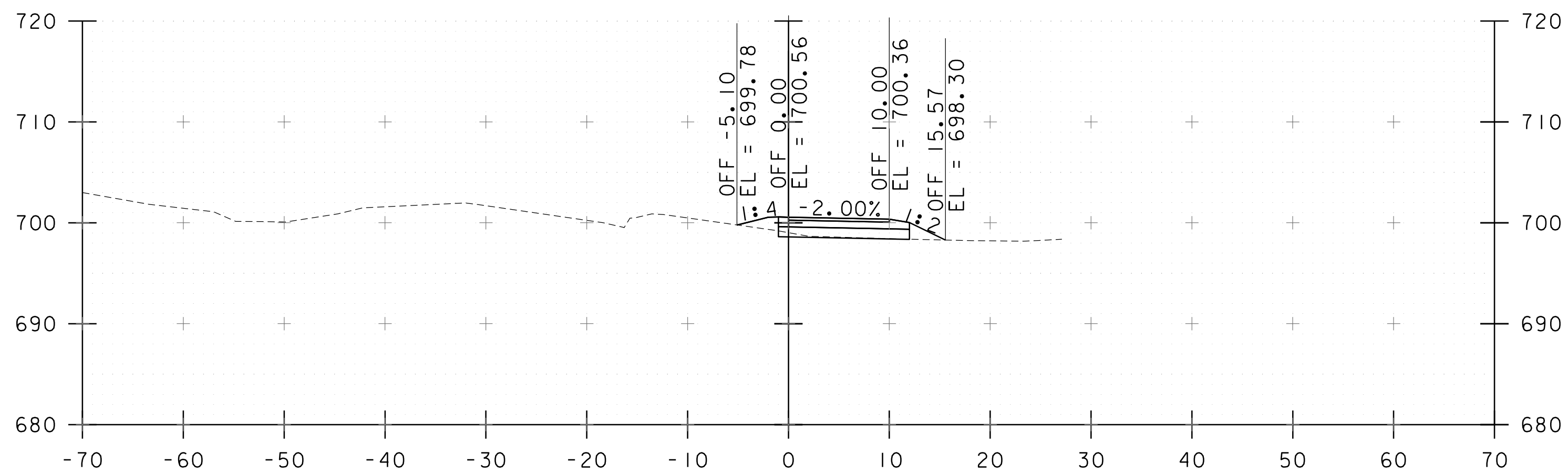


PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 6	SHEET 41 OF 42

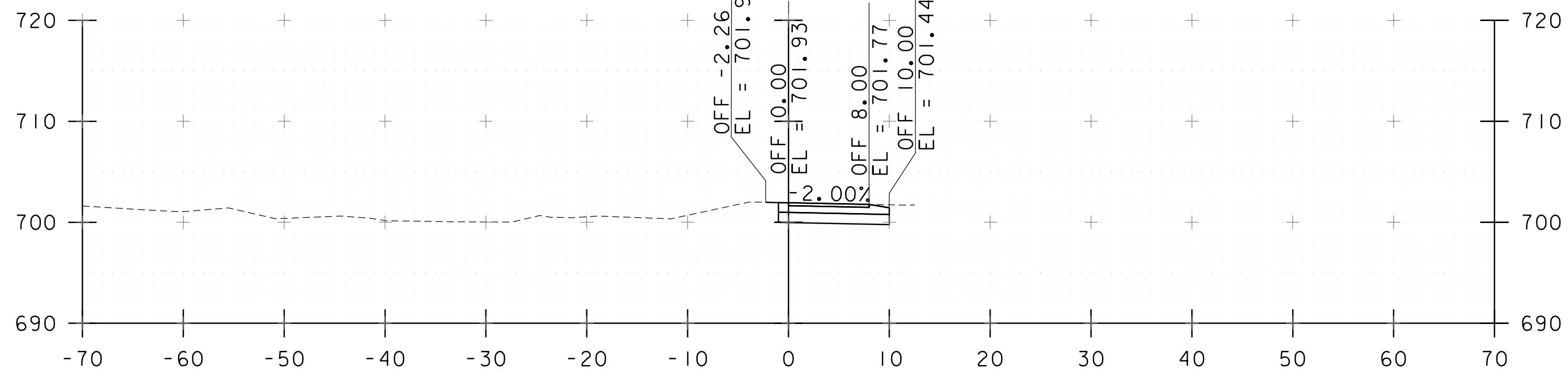




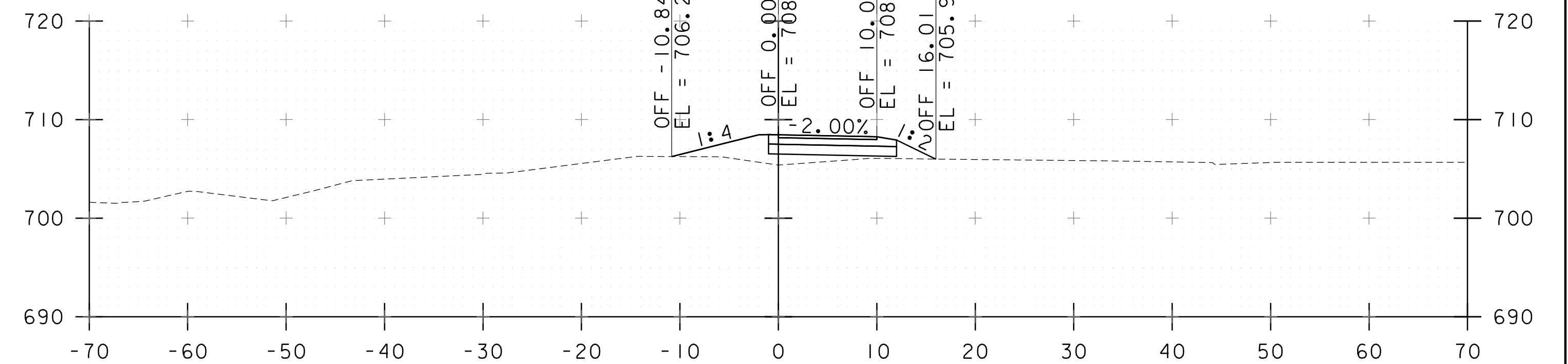
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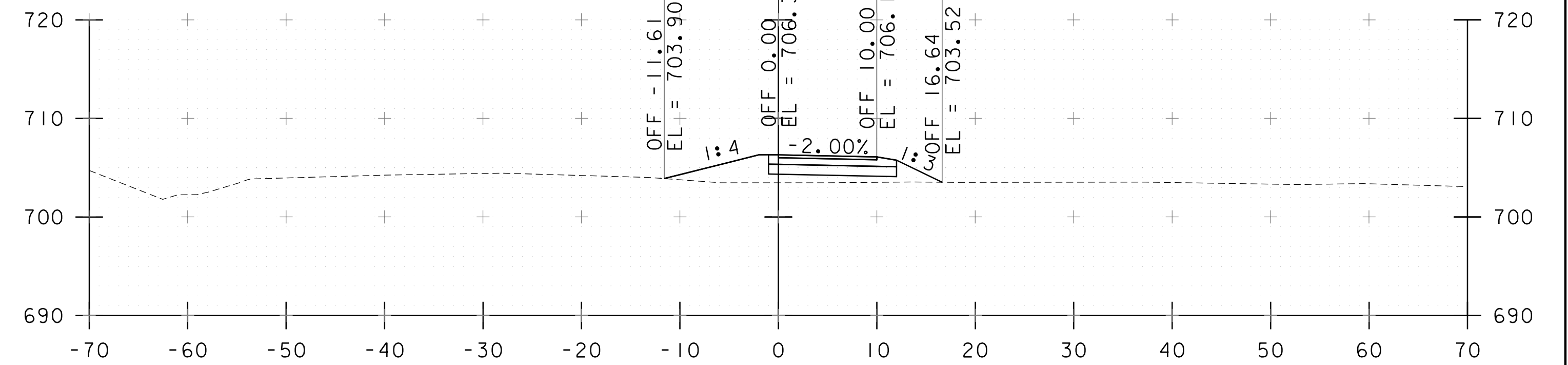
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200+00



201+87



201+50

STA. 200+00 TO STA. 201+88



PROJECT NAME: EAST MONTPELIER PARK-AND-RIDE	
PROJECT NUMBER: CMG PARK(37)	
FILE NAME: zlik350xs.dgn	PLOT DATE: 5/2/2017
PROJECT LEADER: G. SANTY	DRAWN BY: G. BURGMEIER
DESIGNED BY: G. BURGMEIER	CHECKED BY: G. SANTY
CROSS SECTIONS SHEET 7	SHEET 42 OF 42