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SHEET NUM.										PART.	ITEM	ITEM	GRAND	UNIT	DESCRIPTION	SEE SHEET NO.
6	6A					42	43			01/STR/BR		EXT	TOTAL			
STRUCTURE OVER 20 FOOT SPAN (MAD-62-2.79, SFN 4902131)																
							LS			LS	202	11003	LS		STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN	42
							84			84	202	22900	84	SY	APPROACH SLAB REMOVED	
							875			875	202	23500	875	SY	WEARING COURSE REMOVED	
							LS			LS	503	11100	LS		COFFERDAMS AND EXCAVATION BRACING	
							LS			LS	503	21300	LS		UNCLASSIFIED EXCAVATION	
							LS			LS	505	11100	LS		PILE DRIVING EQUIPMENT MOBILIZATION	
							800			800	507	00500	800	FT	12" CAST-IN-PLACE REINFORCED CONCRETE PILES, DRIVEN	
							960			960	507	00550	960	FT	12" CAST-IN-PLACE REINFORCED CONCRETE PILES, FURNISHED	
							1,080			1,080	507	00700	1,080	FT	16" CAST-IN-PLACE REINFORCED CONCRETE PILES, DRIVEN	
							1,200			1,200	507	00750	1,200	FT	16" CAST-IN-PLACE REINFORCED CONCRETE PILES, FURNISHED	
							107,043			107,043	509	10000	107,043	LB	EPOXY COATED REINFORCING STEEL	
							301			301	511	21522	301	CY	CLASS QC2 CONCRETE WITH QC/QA, SUPERSTRUCTURE	
							73			73	511	33418	73	CY	CLASS QC2 CONCRETE WITH QC/QA, SUPERSTRUCTURE	
							174			174	511	40512	174	CY	CLASS QC1 CONCRETE WITH QC/QA, PIER ABOVE FOOTINGS	
							145			145	511	43512	145	CY	CLASS QC1 CONCRETE WITH QC/QA, ABUTMENT INCLUDING FOOTING	
							88			88	511	46510	88	CY	CLASS QC1 CONCRETE, FOOTING	
							950			950	512	10050	950	SY	SEALING OF CONCRETE SURFACES (NON-EPOXY)	
							31			31	512	10300	31	SY	SEALING CONCRETE BRIDGE DECKS WITH HMWM RESIN	
							12			12	515	15080	12	EACH	DRAPED STRAND PRESTRESSED CONCRETE BRIDGE I-BEAM MEMBERS, LEVEL 3, TYPE WF42-49, L=93'-8"	
							27			27	515	20000	27	EACH	INTERMEDIATE DIAPHRAGMS	
							131			131	516	13200	131	SF	1/2" PREFORMED EXPANSION JOINT FILLER	
							242			242	516	13600	242	SF	1" PREFORMED EXPANSION JOINT FILLER	
							93			93	516	14014	93	FT	INTEGRAL ABUTMENT EXPANSION JOINT SEAL	
							24			24	516	44101	24	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE) 2.88" X 14" X 20" WITH 15" X 21" LOAD PLATE, AS PER PLAN	54
							579			579	517	70000	579	FT	RAILING (TWIN STEEL TUBE)	
							86			86	518	21200	86	CY	POROUS BACKFILL WITH GEOTEXTILE FABRIC	
							706			706	SPECIAL	51822300	706	FT	STEEL DRIP STRIP	
							115			115	518	40000	115	FT	6" PERFORATED CORRUGATED PLASTIC PIPE	
							53			53	518	40010	53	FT	6" NON-PERFORATED CORRUGATED PLASTIC PIPE, INCLUDING SPECIALS	
							2			2	523	20000	2	EACH	DYNAMIC LOAD TESTING	
							178			178	526	25000	178	SY	REINFORCED CONCRETE APPROACH SLABS (T=15")	
							69			69	526	90010	69	FT	TYPE A INSTALLATION	
							645			645	601	32110	645	CY	ROCK CHANNEL PROTECTION, TYPE B WITH AGGREGATE FILTER	
															MAINTENANCE OF TRAFFIC	
															NON-TRACKING TACK COAT	
							530			530	407	20000	530	GAL		
							260			260	441	50000	260	CY	ASPHALT CONCRETE SURFACE COURSE, TYPE 1, (448), PG64-22	
		16								16	614	11110	16	HOUR	LAW ENFORCEMENT OFFICER WITH PATROL CAR FOR ASSISTANCE	
							LS			LS	614	12420	LS		DETOUR SIGNING	
							41			41	614	13000	41	CY	ASPHALT CONCRETE FOR MAINTAINING TRAFFIC	
		7								7	616	10000	7	MGAL	WATER	
							150			150	617	10100	150	CY	COMPACTED AGGREGATE	
							2			2	617	25000	2	MGAL	WATER	
							2.12			2.12	642	00300	2.12	MILE	CENTER LINE, TYPE 1	
							LS			LS	103	05000	LS		INCIDENTALS	
															PREMIUM FOR CONTRACT PERFORMANCE BOND AND FOR PAYMENT BOND	
							LS			LS	614	11000	LS		MAINTAINING TRAFFIC	
							9			9	619	16010	9	MNTH	FIELD OFFICE, TYPE B	
							LS			LS	623	10000	LS		CONSTRUCTION LAYOUT STAKES AND SURVEYING	
							LS			LS	624	10000	LS		MOBILIZATION	

GENERAL SUMMARY

MAD-62-2.79

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ESTIMATED QUANTITIES										
CALC BY: <u>AJM</u>				CHK'D BY: <u>MMP</u>						
ITEM	ITEM EXT.	TOTAL	UNIT	DESCRIPTION	ABUTMENTS	PIERS	SUPER- STRUCTURE	GENERAL	AS PER PLAN SHEET NUMBERS	
202	11003	LUMP		STRUCTURE REMOVED, OVER 20 FOOT SPAN, AS PER PLAN				LUMP	2	
202	22900	84	SY	APPROACH SLAB REMOVED				84		
202	23500	875	SY	WEARING COURSE REMOVED			875			
503	11100	LUMP		COFFERDAMS AND EXCAVATION BRACING				LUMP		
503	21300	LUMP		UNCLASSIFIED EXCAVATION	267 CY *	247 CY *				
505	11100	LUMP		PILE DRIVING EQUIPMENT MOBILIZATION				LUMP		
507	00500	800	FT	12" CAST-IN-PLACE REINFORCED CONCRETE PILES, DRIVEN	800					
507	00550	960	FT	12" CAST-IN-PLACE REINFORCED CONCRETE PILES, FURNISHED	960					
507	00700	1080	FT	16" CAST-IN-PLACE REINFORCED CONCRETE PILES, DRIVEN		1080				
507	00750	1200	FT	16" CAST-IN-PLACE REINFORCED CONCRETE PILES, FURNISHED		1200				
509	10000	107,043	POUND	EPOXY COATED REINFORCING STEEL	9,967	19,883	77,193			
511	21522	301	CY	CLASS QC2 CONCRETE WITH QC/QA, SUPERSTRUCTURE			301			
511	33418	73	CY	CLASS QC2 CONCRETE WITH QC/QA, SUPERSTRUCTURE			73			
511	40512	174	CY	CLASS QC1 CONCRETE WITH QC/QA, PIER ABOVE FOOTING		174				
511	43512	145	CY	CLASS QC1 CONCRETE WITH QC/QA, ABUTMENT INCLUDING FOOTING	145					
511	46510	88	CY	CLASS QC1 CONCRETE, FOOTING		88				
512	10050	950	SY	SEALING CONCRETE SURFACES (NON-EPOXY)	34	260	656			
512	10300	31	SY	SEALING CONCRETE BRIDGE DECKS WITH HMWM RESIN			31			
515	15080	12	EACH	DRAPED STRAND PRESTRESSED CONCRETE BRIDGE I-BEAM MEMBERS, LEVEL 3, TYPE WF42-49, L=93'-8"			12			
515	20000	27	EACH	INTERMEDIATE DIAPHRAGMS			27			
516	13200	131	SF	1/2" PREFORMED EXPANSION JOINT FILLER	131					
516	13600	242	SF	1" PREFORMED EXPANSION JOINT FILLER	242					
516	14014	93	FT	INTEGRAL ABUTMENT EXPANSION JOINT SEAL			93			
516	44101	24	EACH	ELASTOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE) 2.88" X 14" X 20" WITH 15" X 21" LOAD PLATE, AS PER PLAN	8	16			14	
517	70000	579	FT	RAILING (TWIN STEEL TUBE)			579			
518	21200	86	CY	POROUS BACKFILL WITH GEOTEXTILE FABRIC				86		
SPECIAL	51822300	706	FT	STEEL DRIP STRIP			706			
518	40000	115	FT	6" PERFORATED CORRUGATED PLASTIC PIPE	115					
518	40010	53	FT	6" NON-PERFORATED CORRUGATED PLASTIC PIPE, INCLUDING SPECIALS	53					
523	20000	2	EACH	DYNAMIC LOAD TESTING				2		
526	25000	178	SY	REINFORCED CONCRETE APPROACH SLABS (T=15')				178		
526	90010	69	FT	TYPE A INSTALLATION				69		
601	32110	645	CY	ROCK CHANNEL PROTECTION, TYPE B WITH AGGREGATE FILTER				645		

* UNCLASSIFIED EXCAVATION QUANTITIES ARE INCLUDED FOR INFORMATIONAL PURPOSES ONLY.

DESIGN AGENCY
EUTHEMICS INC.
CONSULTING ENGINEERS

DATE
06/20/19
REVIEWED
RAB
STRUCTURE FILE NUMBER
4902131

DRAWN
VMB
REVISOR
MMP

DESIGNED
LAB
CHECKED
AJM

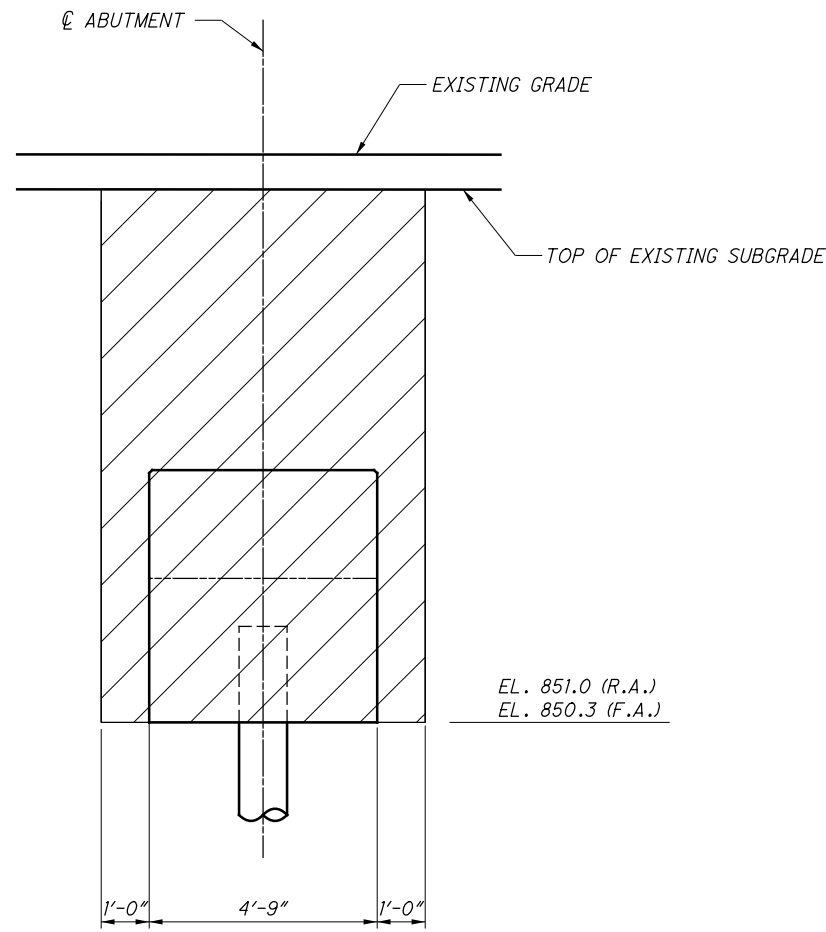
ESTIMATED QUANTITIES
MAD-62-02.79 BRIDGE
OVER DEER CREEK

MAD-62-2.79
PID No. 102577

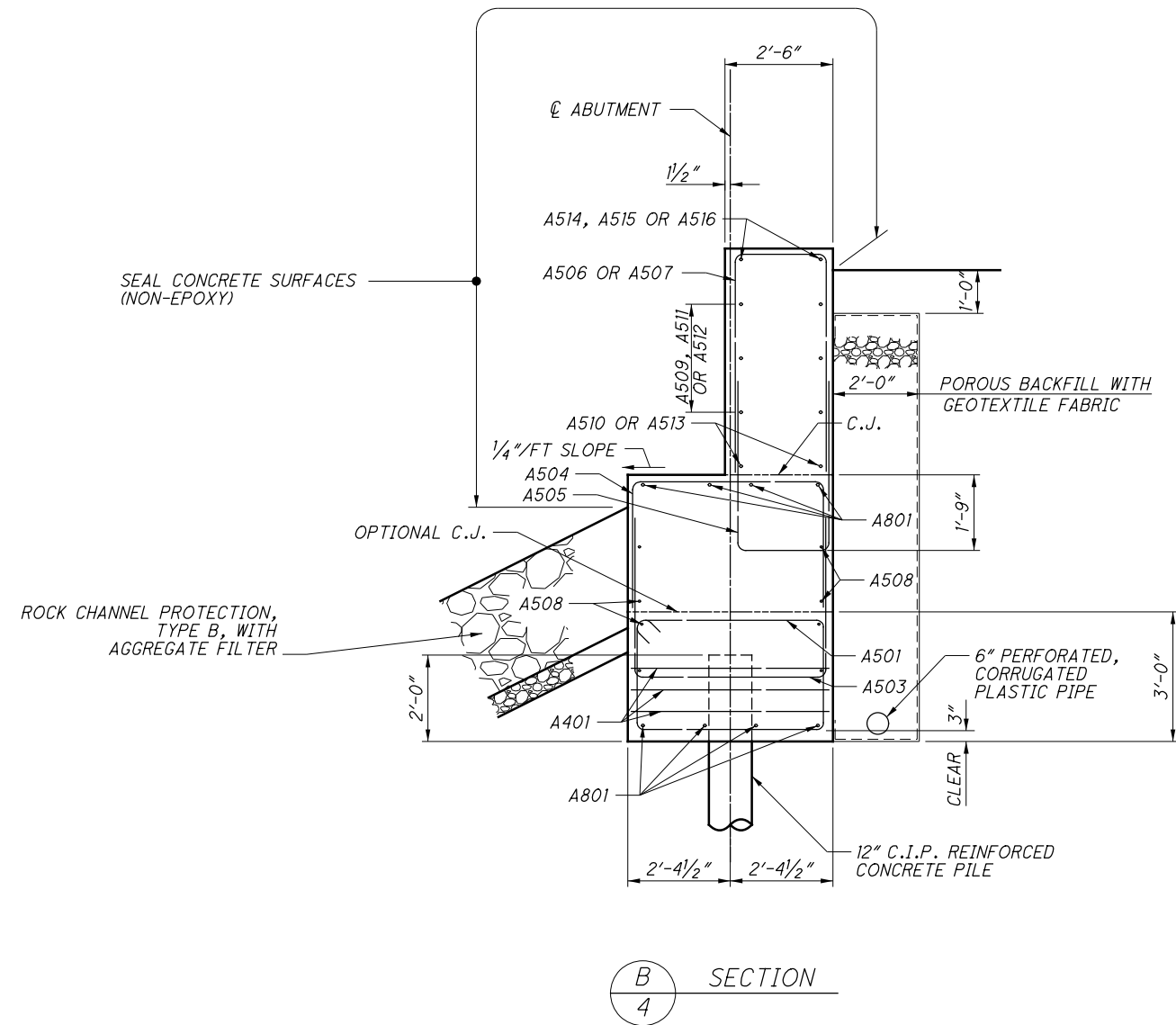
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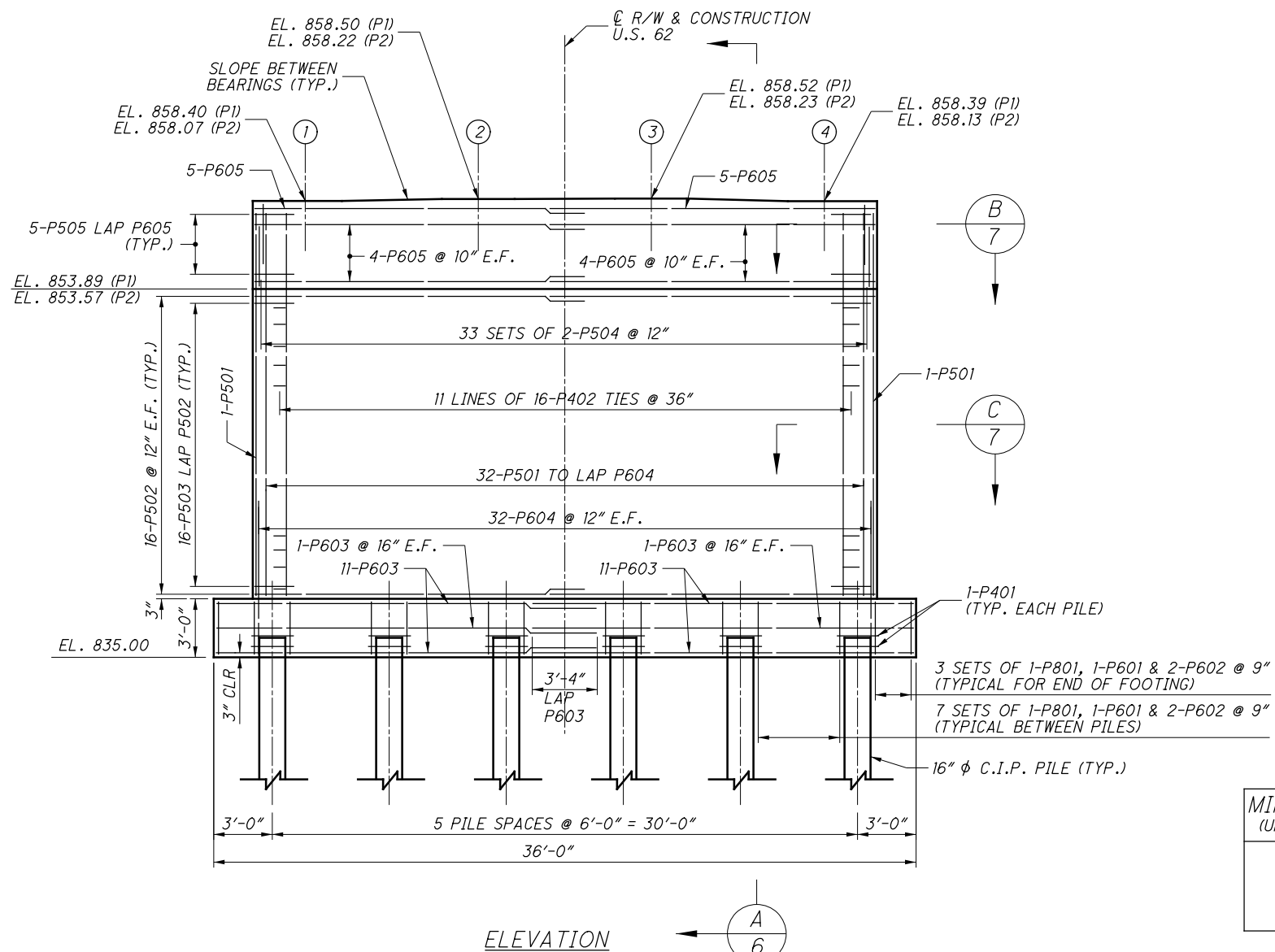
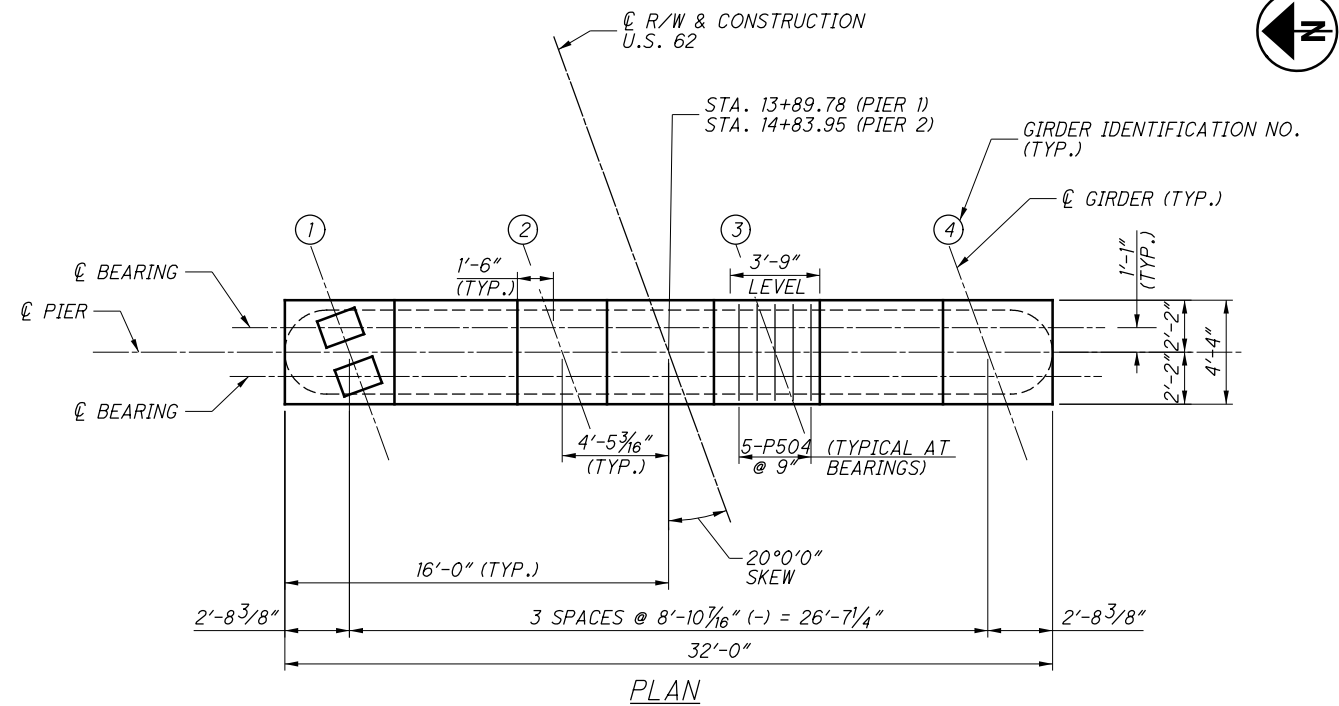
LIMITS OF UNCLASSIFIED EXCAVATION



NOTES:

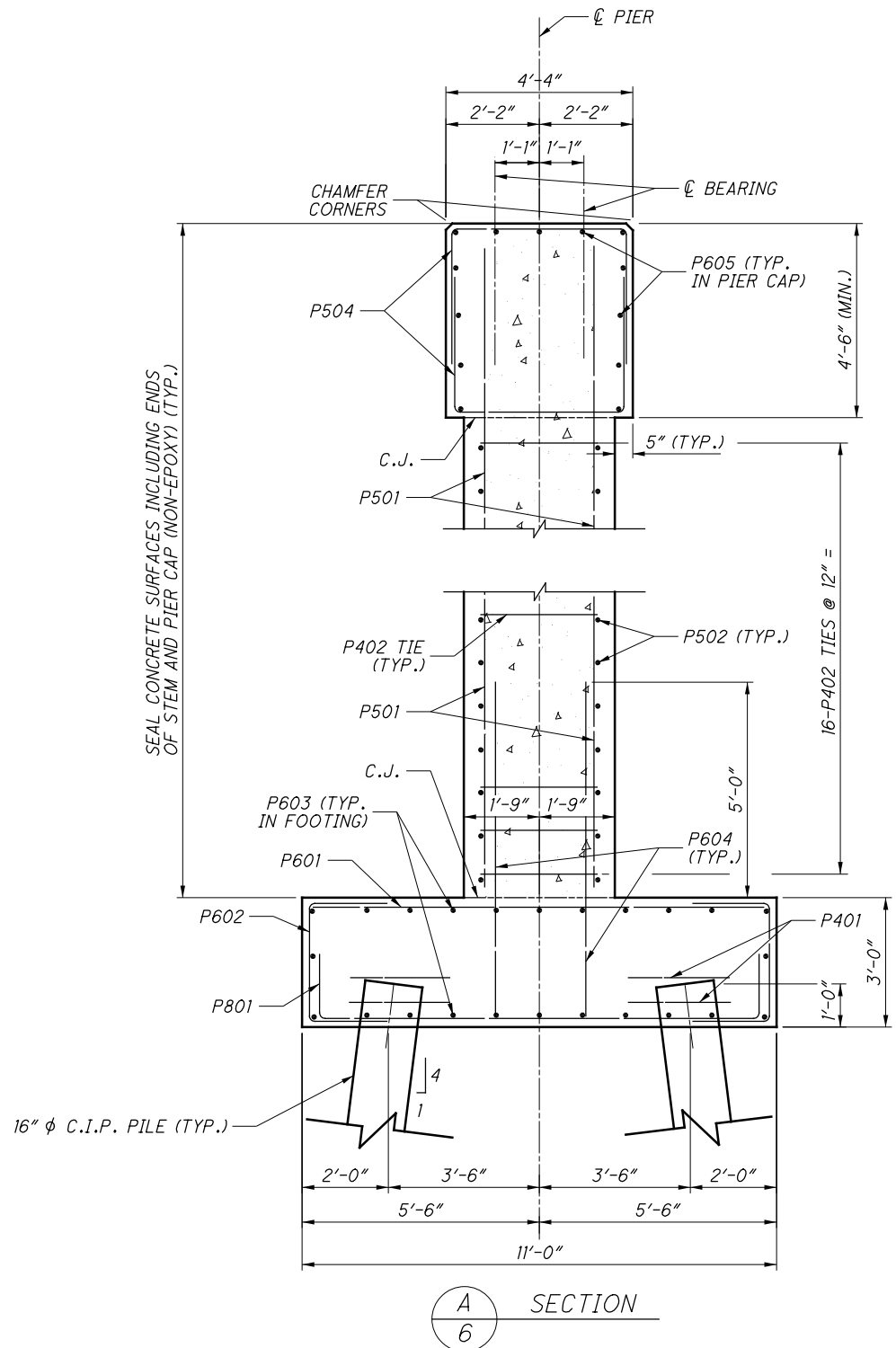
1. ALL ABUTMENT PILES ARE 12" ϕ C.I.P. REINFORCED CONCRETE PILES.
2. FOR REINFORCING SCHEDULE SEE SHEET 16/16.
3. POROUS BACKFILL WITH GEOTEXTILE FABRIC, 2 FEET THICK, SHALL EXTEND FROM THE BOTTOM OF THE FOOTING UP TO THE PLANE OF THE SUBGRADE, TO 1 FOOT BELOW THE EMBANKMENT SURFACE AND Laterally TO THE ENDS OF THE WINGWALLS.
5. FOR ADDITIONAL NOTES AND DETAILS SEE ODOT STANDARD DWG ICD-1-82.

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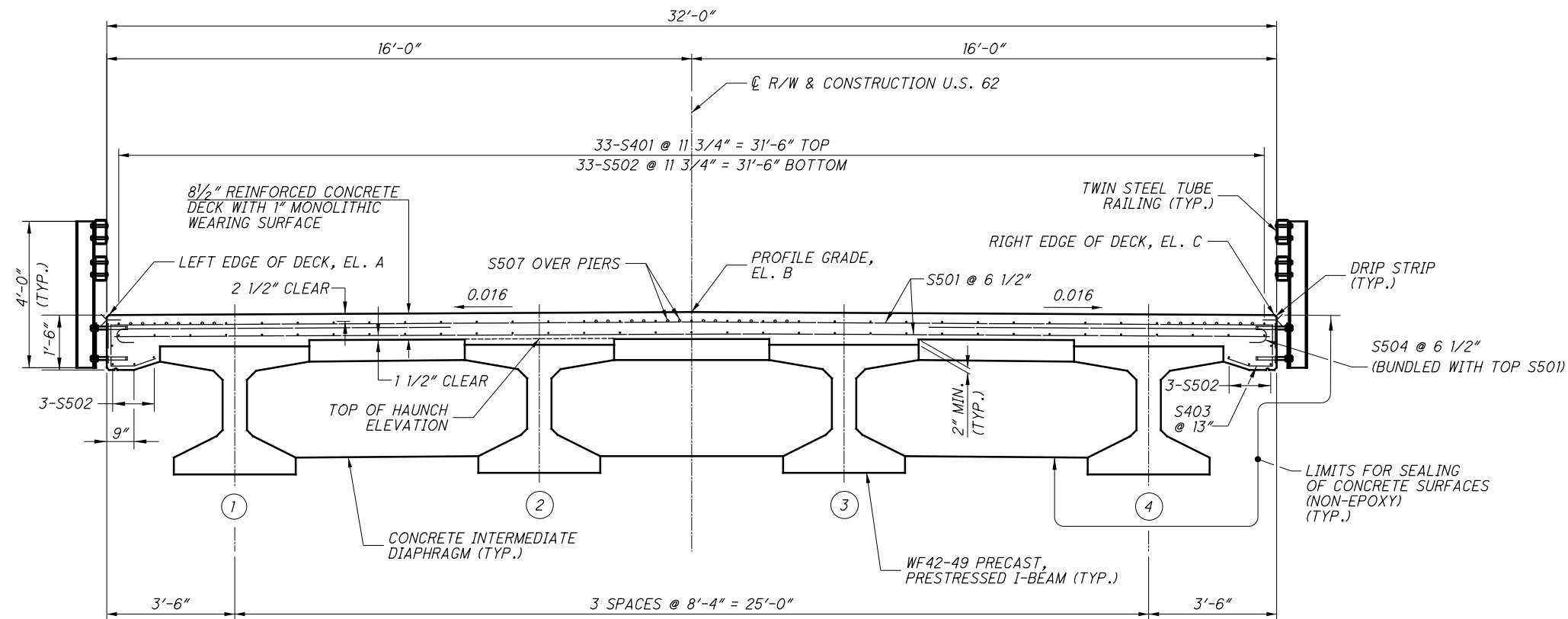
MINIMUM LAP LENGTH (UNLESS OTHERWISE NOTED)

#5 BAR	= 2'-4"
#6 BAR	= 2'-4"
#8 BAR	= 5'-10"

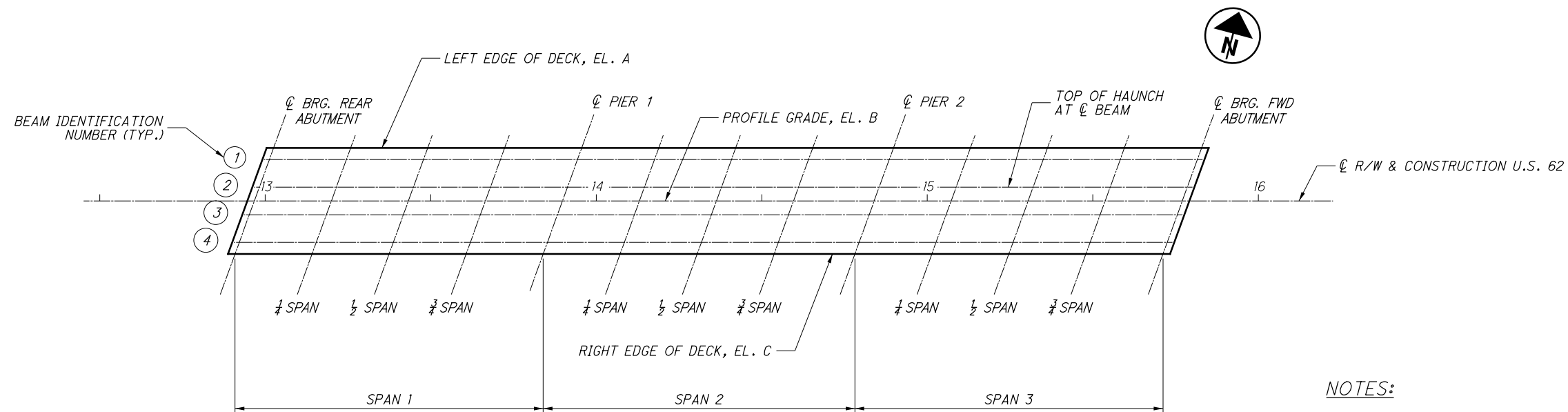


- NOTES:
- ALL PIER PILES ARE 16" φ C.I.P. REINFORCED CONCRETE PILES.
 - FOR REINFORCING SCHEDULE SEE SHEET 16/16.
 - ELEVATIONS SHOWN ARE LOCATED ON THE CL OF THE PIER.
 - FOR FRAMING PLAN SEE SHEET 8/16.

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TRANSVERSE SECTION

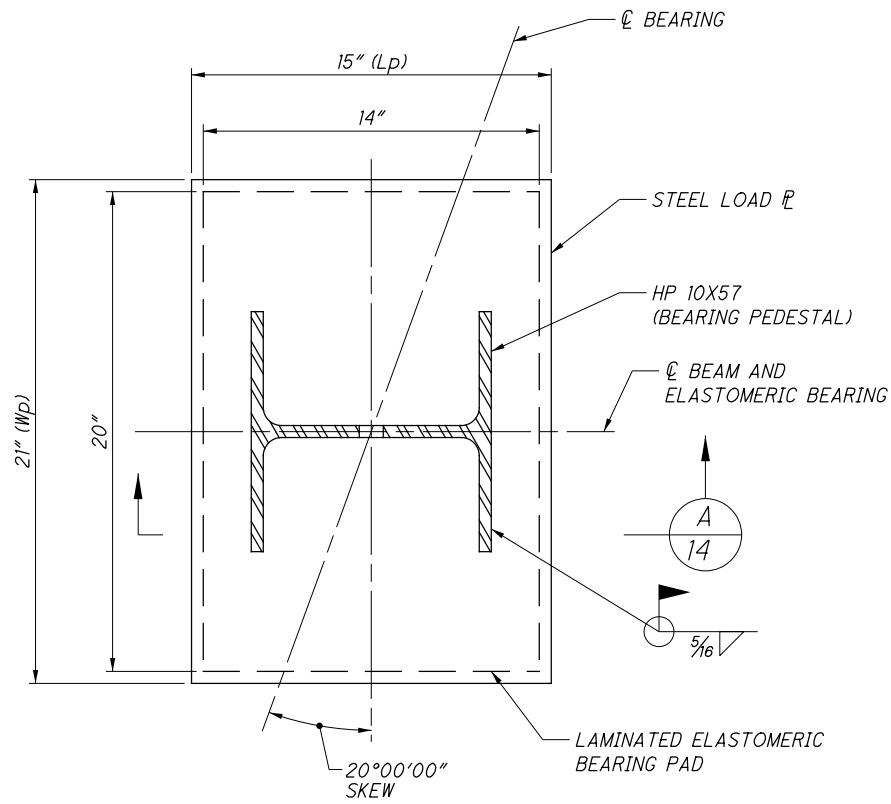


LOCATION OF DECK ELEVATIONS PLAN

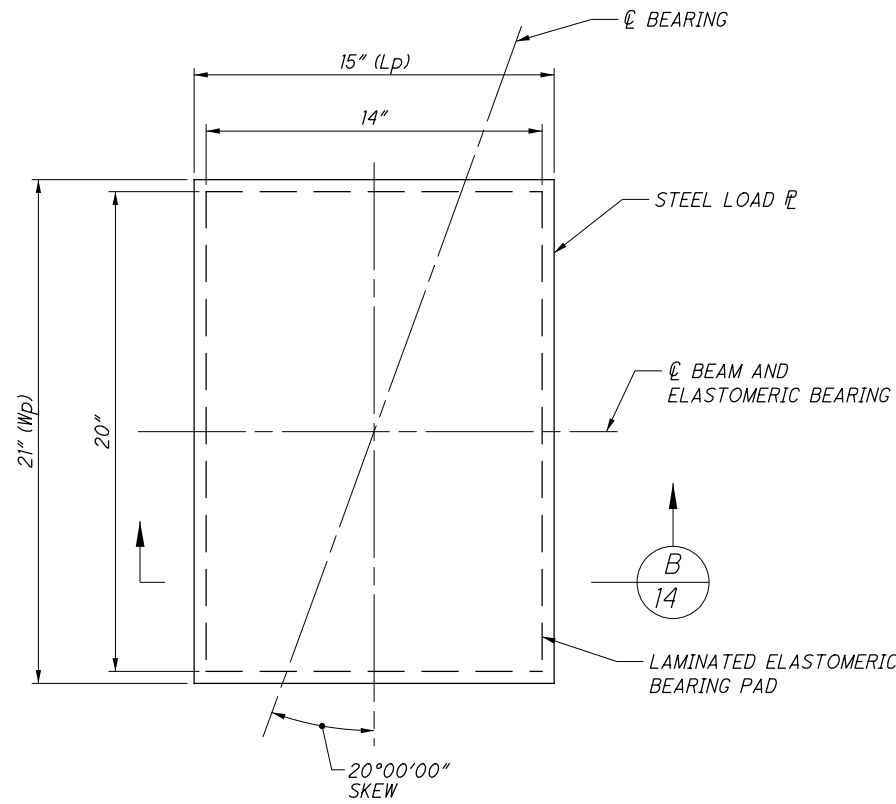
NOTES:

1. FOR REINFORCING SCHEDULE, SEE SHEET 16/16 .
2. FOR INTERMEDIATE DIAPHRAGM DETAILS, SEE SHEET 9/16 .
3. FOR TWIN STEEL RAILING DETAILS, SEE ODOT STANDARD DRAWING TST-1-99.
4. FOR FINAL DECK ELEVATIONS, SCREED ELEVATIONS, AND TOP OF HAUNCH ELEVATIONS, SEE SHEET 11/16 .
5. FOR DIP STRIP DETAILS, SEE ODOT STANDARD DWG. DS-1-92.

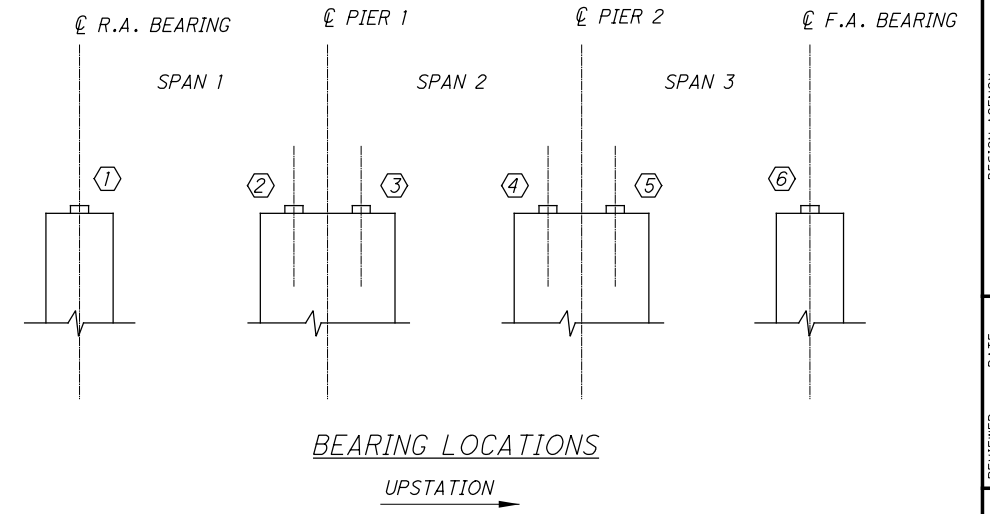
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ABUTMENT BEARINGS



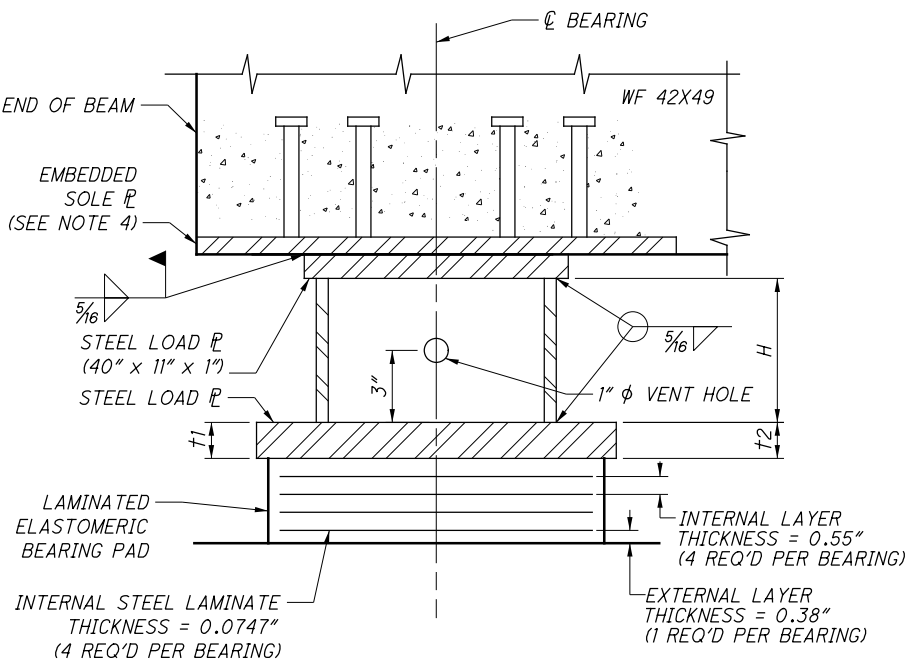
PIER BEARINGS



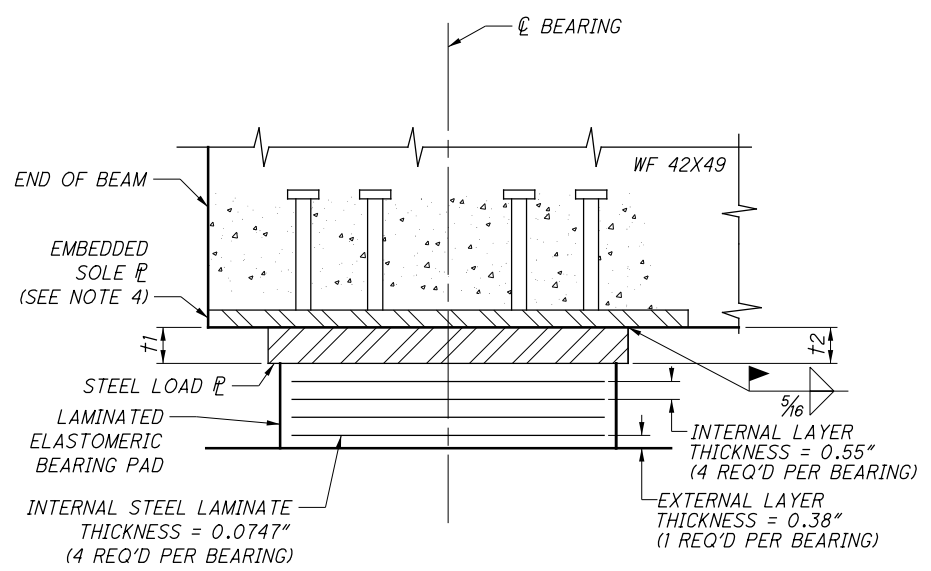
LOCATION	BEAM	Lp (in)	Wp (in)	t1 (in)	t2 (in)
①	1-4	15	21	1.50	1.50
②	1-4	15	21	1.50	1.50
③	1	15	21	1.50	1.50
	2	15	21	1.875	1.875
	3	15	21	1.6875	1.6875
	4	15	21	1.6875	1.6875
④	1	15	21	2.3125	2.25
	2	15	21	2.3125	2.25
	3	15	21	2.4375	2.375
	4	15	21	2.1875	2.125
⑤	1-4	15	21	1.5625	1.50
⑥	1-4	15	21	1.5625	1.50

BEAM	REAR ABUTMENT	FORWARD ABUTMENT
1	6 7/8"	6 1/2"
2	8 5/16"	8 7/16"
3	8 3/16"	8 3/4"
4	6 1/2"	7 1/2"

DEAD LOAD	LIVE LOAD (NO IMPACT)	TOTAL LOAD
122.8	79.2	202.0



A
14 SECTION
(END DIAPHRAGM CONCRETE NOT SHOWN)



B
14 SECTION
(PIER DIAPHRAGM CONCRETE NOT SHOWN)

- NOTES:
- ELASTOMERIC BEARINGS: THE ELASTOMER SHALL HAVE A HARDNESS OF 50 DUROMETER. THE BEARINGS WERE DESIGNED IN ACCORDANCE WITH SECTION 14.7.6 (METHOD A) OF THE AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS. THE LONG-TERM COMPRESSION PROOF LOAD TEST (AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES, DIVISION II, SECTION 18.7.2.6) IS NOT REQUIRED.
 - LOAD PLATE: THE STEEL LOAD PLATE (A572) SHALL BE BONDED BY VULCANIZATION TO THE ELASTOMER DURING THE MOLDING PROCESS.
 - BASIS OF PAYMENT: THE UNIT BID PRICE SHALL INCLUDE ALL MATERIALS, LABOR, TESTING, STEEL SUPPORT POST AND INCIDENTALS NECESSARY TO FURNISH AND INSTALL LAMINATED ELASTOMERIC BEARINGS. PAYMENT WILL BE MADE AT THE CONTRACT PRICE FOR THE APPROPRIATE ITEM 516, ELASOMERIC BEARING WITH INTERNAL LAMINATES AND LOAD PLATE (NEOPRENE).
 - FOR ADDITIONAL DETAILS OF EMBEDDED STEEL SOLE PLATE, SEE ODOT STANDARD DRAWING PSID-1-13, SHEET 5 OF 10.
 - ALL BEARINGS SHALL BE MARKED PRIOR TO SHIPPING. THE MARKS SHALL INCLUDE THE BEARING LOCATION ON THE BRIDGE AND A DIRECTION ARROW THAT POINTS UP-STATION. ALL MARKS SHALL BE PERMANENT AND BE VISIBLE AFTER THE BEARING IS INSTALLED.