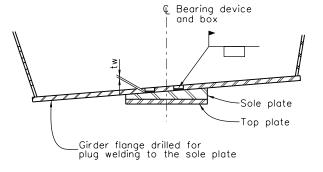


SOLE PLATE TO GIRDER CONNECTION (CONCRETE GIRDER)



 $\underline{\textbf{SECTION}}$ Bearing stiffener and diaphragm not shown

TOP PLATE OF GIRDER CONNECTION (STEEL GIRDER)

Designer/Detailer:
Add 2" to the Theoretical value for dimension B in guided and non-guided bearings and add 2" to the theoretical value for dimension A in non-guided bearings to provide a design and construction tolerance.

Designer shall specify grade of steel required

NOTES:

1. All structural steel for the bearing devices, including sole plates, top plates, and masonry plates, shall be AASHTO M270 (ASTM A709) Grade ___ unless otherwise shown. A588 or A572 may be substituted for Grade 36 at no additional cost to the project.

B-512-3B (Use with B-512-3A)

- 2. Bearing seat elevations at abutments and piers shall be checked and adjusted according to the final dimensions of bearing assemblies adopted.
- 3. Longitudinal structure movement due to temperature and shrinkage is based on a mid-range temperature of 40°F. If site temperature is not 40°, a longitudinal offset of top elements of the bearing (above sliding surface) shall be made in the field based on the 10° temperature increment in the table. In addition, longitudinal one way structure movement due to prestress shortening and creep shall be accommodated for all temperature ranges with the initial offset in the table away from the fixed bearing.
- 4. Anchor bolts may be set in wet concrete of bearing seat, or placed within a formed cylindrical void 4" in diameter and then grouted with high strength epoxy grout.
- 5. The internal surfaces of the pot cavity and the bottom surface of the piston shall be polished after zinc metalizing.

Gd = Guided expansion bearing Exp = Non-guided (free floating) expansion bearing

Top Connections Horiz Load Per Brg Longit Top Plate Masonry Zinc X-Slope Range of Vertical Load Field Plug Total Grade 10° Initial Concrete Guide ixed (Kip) (Sole Plate Bearing Plate Plated Rotation <u>% +</u>_ Offset Per Brg (Kip) <u>% +</u>_ Structure Height Girde Anchor Angle Location Quant Гетр Welds similar) Anchor (Radians) Movement Looking Service Strength (Steel Str) Studs Incr Rolts Ah Sta Ah Sta Service Strength (In) ID No Ø(In) (In) Trans Long Trans Long Α В $C \mid D$ No Size Abut 1

ACCEPTABLE ALTERNATES

D. S. Brown Company North Baltimore, Ohio

Cosmec, Inc. Walpole, MA

Con-Serv, Inc. Georgetown, SC

R. J. Watson, Inc. Amherst, NY (Disk Bearing Alternate)

Mageba New York, NY

All seals for this set of drawings are applied to	int Date: \$DATE\$		Sheet Revisions			Colorado Department of Transportation		As Constructed	BEARING DEVICE			Project No./Code
	File Name: Sheet_B-512-3B.dgn		Date:	Comments	Init.	2820 West Haward Di	2829 West Howard Place, 3rd Floor		(TYPE III)			Project Number
	Horiz. Scale: As Noted Vert. Scale: As Noted	$\overline{}$				Denver, CD 80204	ice, 3rd Floor					
	Unit Information Unit Leader Initials					Phone: 303-512-4079		Revised:	Designer: XXXXXXX	Structure	X-XX-XX	Code
						1700: 303 737 3137			Detailer: XXXXXXX	Numbers	X-XX-XX	
	l (~					Staff Bridge Branch	Initials	Void:	Sheet Subset: BRIDGE	F Subset Sheets: BXX of XXX		Sheet Number