

REV.	ECO/DDC	DESCRIPTION	DATE	DRAFT	CHECK	APV'D
A	----	RELEASED.	10-23-14	V.J.C.	N.H.S.	E.J.

LOAD POINT MODEL NUMBERS

CAPACITY LBS [KN]	MODEL NUMBER PLATED ALLOY STEEL	MODEL NUMBER STAINLESS STEEL	LOAD SENSOR MODEL NUMBER	CABLE LENGTH FT [M]
1125 LB [5KN]	HI HLPRE04-1125-45	HI HLPRE04-1125-43	HI SBH04-1125	20FT [6M]
2.25 KLB [10KN]	HI HLPRE04-2.25K-45	HI HLPRE04-2.25K-43	HI SBH04-2.25K	20FT [6M]
4.5 KLB [20KN]	HI HLPRE04-4.5K-45	HI HLPRE04-4.5K-43	HI SBH04-4.5K	20FT [6M]
11.25 KLB [50KN]	HI HLPRE04-11.25K-45	HI HLPRE04-11.25K-43	HI SBH04-11.25K	20FT [6M]
22.5 KLB [100KN]	HI HLPRE04-22.5K-45	HI HLPRE04-22.5K-43	HI SBH04-22.5K	20FT [6M]

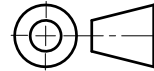

10. SHEET 2 FOR LOAD POINT DIMENSIONS.
9. LOAD POINT OPERATING TEMPERATURE RATING IS -20°C TO +70°C. USAGE OF LOAD POINT AT TEMPERATURES BELOW -20°C REQUIRES THAT THE LOAD POINT ASSEMBLY AND CABLE BE TEMPERATURE CONTROLLED.
8. DO NOT WELD LOAD POINT TO VESSEL/FOUNDATION WITH LOAD SENSOR INSTALLED.
7. LOAD POINT IS SUPPLIED WITH THE FOLLOWING:
 - HI SBH04 SERIES LOAD SENSOR
 - TOP RUBBER ELEMENT MOUNT
 - LOAD SENSOR BASE PLATE AND TWO MOUNTING BOLTS
 - GROUND STRAP AND TWO MOUNTING BOLTS [M8].
6. LOAD SENSOR IS STAINLESS STEEL 17-4PH (1.4548).
5. CABLE IS SHIELDED, 6 CONDUCTOR. CABLE SHIELD IS FLOATING. SEE TABLE FOR CABLE LENGTHS.
4. C2 WIRE COLOR CODE FLAG LABEL IS LOCATED APPROXIMATELY 10 INCHES [254MM] FROM END OF CABLE.
 - EXCITATION + RED
 - EXCITATION - BLACK
 - SIGNAL + GREEN
 - SIGNAL - WHITE
 - C2 + GRAY
 - C2 - VIOLET
 - SHIELD YELLOW
3. CABLE WIRE ENDS ARE STRIPPED BACK 0.5 INCHES [12.7MM] AND TINNED. CABLE JACKET IS STRIPPED BACK APPROXIMATELY 5 INCHES [127MM].
2. THIS DRAWING IS SUBJECT TO CHANGE WITHOUT NOTICE.
1. RATED OUTPUT: 2mV/V ±0.002.

NOTES: UNLESS OTHERWISE SPECIFIED

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LOAD POINT ACCESSORY MODEL NUMBERS (LOAD SENSOR NOT INCLUDED)

CAPACITY LBS [KN]	MOUNT SET MODEL NUMBER PLATED ALLOY STEEL	MOUNT SET MODEL NUMBER STAINLESS STEEL	MODEL NUMBER TOP RUBBER ELEMENT
1125 LB [5KN]	HI MSBRE-45-4.5KLB	HI MSBRE-43-4.5KLB	HI MSBRE-F-4.5KLB
2.25 KLB [10KN]			
4.5 KLB [20KN]			
11.25 KLB [50KN]	HI MSBRE-45-11.25KLB	HI MSBRE-43-11.25KLB	HI MSBRE-F-11.25KLB
22.5 KLB [100KN]	HI MSBRE-45-22.5KLB	HI MSBRE-43-22.5KLB	HI MSBRE-F-22.5KLB

		0588-0160	OUTLINE DRAWING, LOAD POINT, HI HLPRE04 SERIES		
ITEM	QTY	PART NUMBER	DESCRIPTION	COMMENTS	
PARTS LIST					
UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCH [MM] THIRD ANGLE PROJECTION 		CONTRACT NO.		 OUTLINE DRAWING, LOAD POINT, HI HLPRE04 SERIES	
		APPROVALS			
DRAWN V. CHULA		DATE 10-23-14			
CHECKED N. SCHERRER		DATE 10-23-14			
APPROVED E. JAMES		DATE 10-23-14		TITLE	
MATERIAL		ISSUED V. CHULA		DATE 10-23-14	
FINISH		PRODUCTION		DATE	
DO NOT SCALE DRAWING		SIZE D	FSCM 21316	DRAWING NO. 0588-0160	REV. A
		FILE NAME: 588160A1.DWG		SCALE: NONE	SHEET 1 OF 2

DIMENSIONS— INCHES & [mm]

TOLERANCES: ±0.015 [0.38] UNLESS OTHERWISE STATED

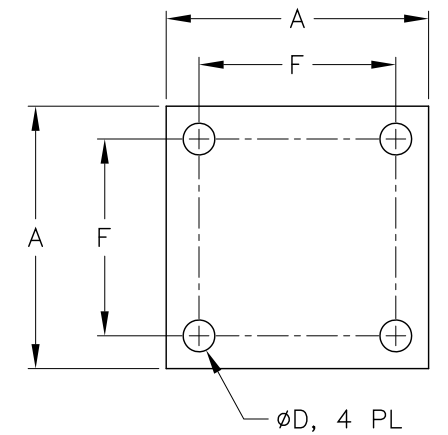
CAPACITY LBS [KN]	A	B	C	∅D	E	F	G	H*	L	∅M	Q TORQUE LB-FT [NM]	MOUNT SCREW	S MAX**	RF***
1125 LB [5KN]	3.15 [80.0]	7.09 [180.0]	3.66 [93.0]	0.354 [9.00]	2.91 [74.0]	2.28 [58.0]	0.83 [21.0]	0.47 [12.0]	1.18 [30.0]	0.591 [15.00]	65 LB-FT [70NM]	.312 OR M8	0.197 [5.00]	360 LB [1.6KN]
2.25 KLB [10KN]														
4.5 KLB [20KN]														
11.25 KLB [50KN]	3.94 [100.0]	8.62 [219.0]	4.65 [118.0]	0.433 [11.00]	4.02 [102.0]	2.99 [76.0]	1.14 [29.0]		1.57 [40.0]	0.709 [18.00]	295 LB-FT [400NM]	.375 OR M10		1124 LB [5KN]
22.5 KLB [100KN]	4.72 [120.0]	10.83 [275.0]	6.61 [168.0]	0.571 [14.50]	5.83 [148.0]	3.54 [90.0]	1.85 [47.0]		2.36 [60.0]	0.866 [22.00]	515 LB-FT [700NM]	.500 OR M12		

* RECOMMENDED MINIMUM THICKNESS OF VESSEL MOUNTING FOOT/PLATE

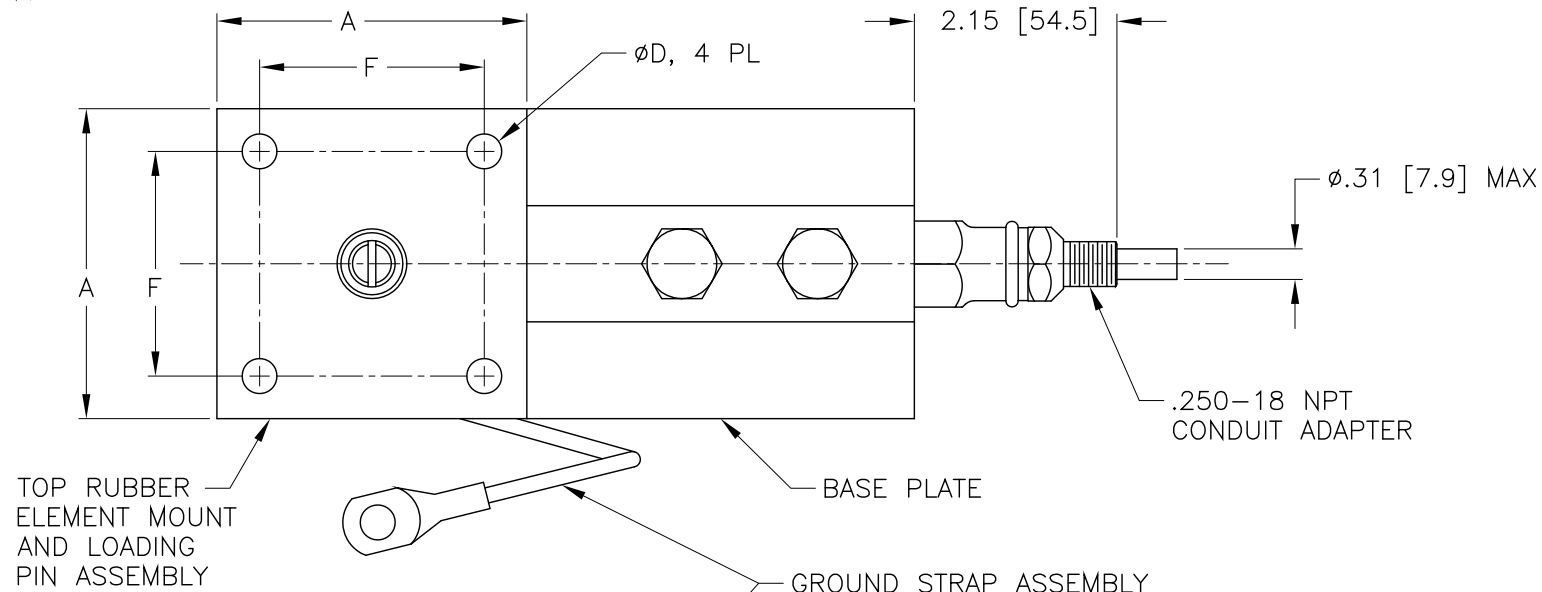
** SMAX = MAXIMUM LATERAL DISPLACEMENT OF LOAD INTRODUCTION

*** RF = RESTORING FORCE AT SMAX

IMPORTANT! USE BUMPER STOPS IF LATERAL FORCES EXCEED THE RF VALUE.
BUMPER STOP GAP TO BE APPROXIMATELY 2-3 MM.



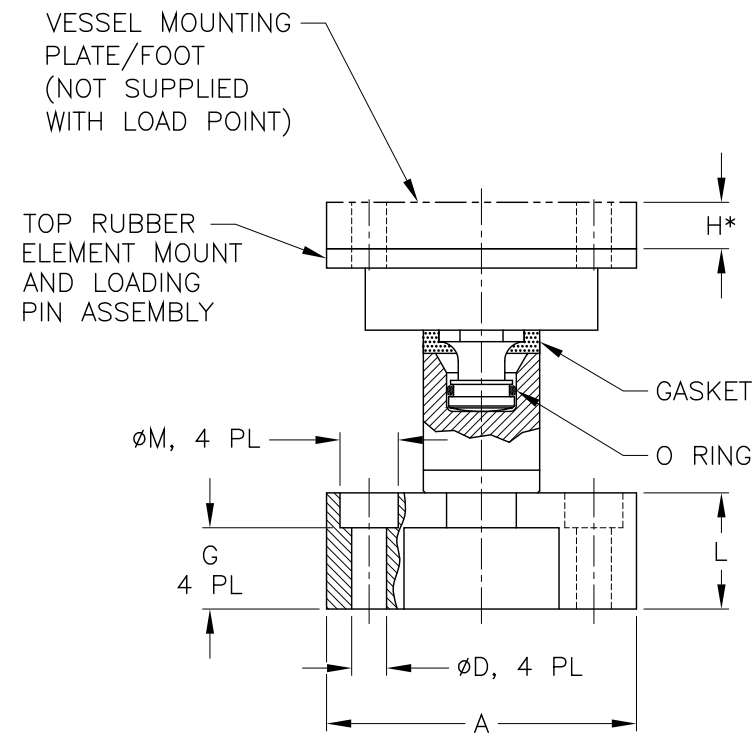
VESSEL MOUNTING TEMPLATE



TOP RUBBER ELEMENT MOUNT AND LOADING PIN ASSEMBLY

BASE PLATE

GROUND STRAP ASSEMBLY SUPPLIED WITH TWO M8 BOLTS INSTALLED ON SITE



VESSEL MOUNTING PLATE/FOOT (NOT SUPPLIED WITH LOAD POINT)

TOP RUBBER ELEMENT MOUNT AND LOADING PIN ASSEMBLY

GASKET

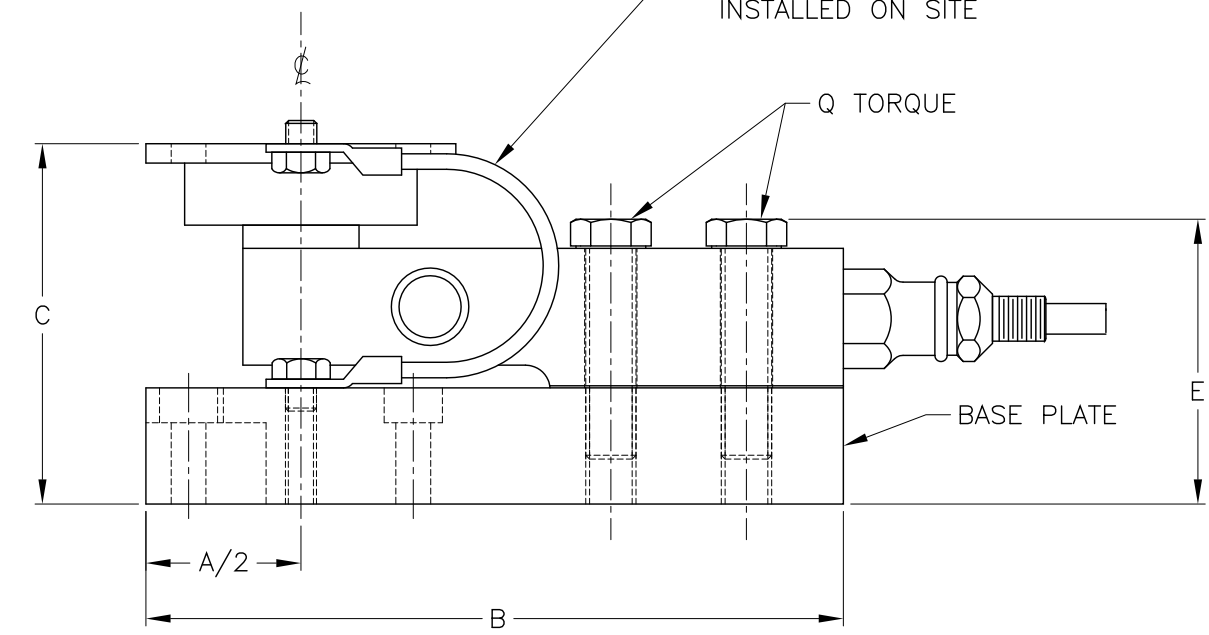
O RING

∅M, 4 PL

G, 4 PL

∅D, 4 PL

A



Q TORQUE

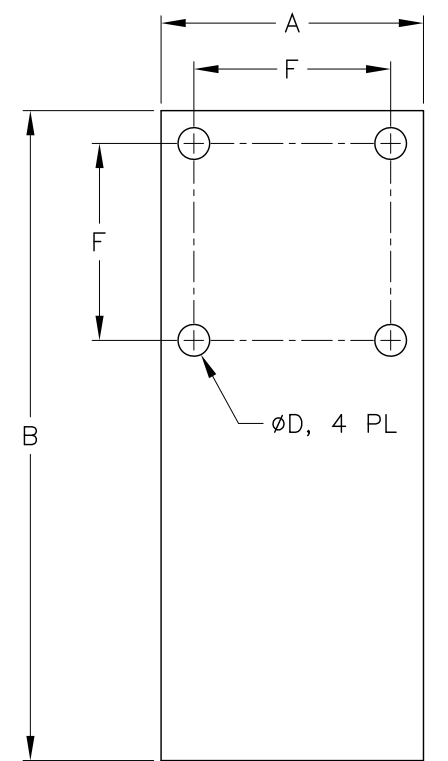
BASE PLATE

C

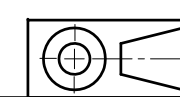
E

A/2

B



BASE MOUNTING TEMPLATE ROTATED 90° CLOCKWISE



HARDY PROCESS SOLUTIONS			
TITLE OUTLINE DRAWING, LOAD POINT, HI HLPRE04 SERIES			
SIZE	FSCM	DRAWING NO.	REV.
D	21316	0588-0160	A
FILE NAME: 588160A1.DWG		SCALE: NONE	SHEET 2 OF 2