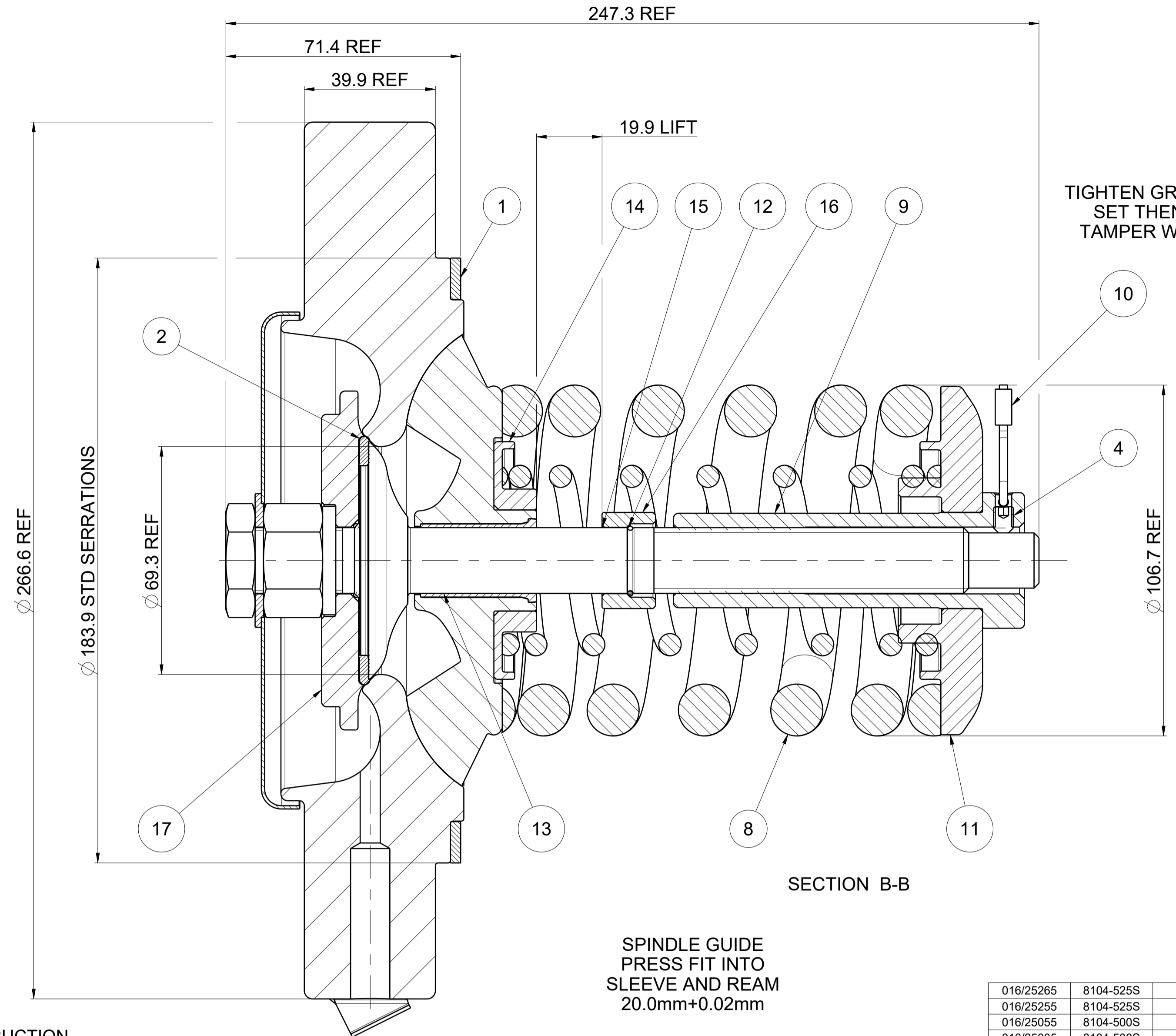


DRAWING STATUS		PRODUCTION	
REVISION	27	SIG	MG
		21-Dec-18	
016/22965 OPTION ADDED			

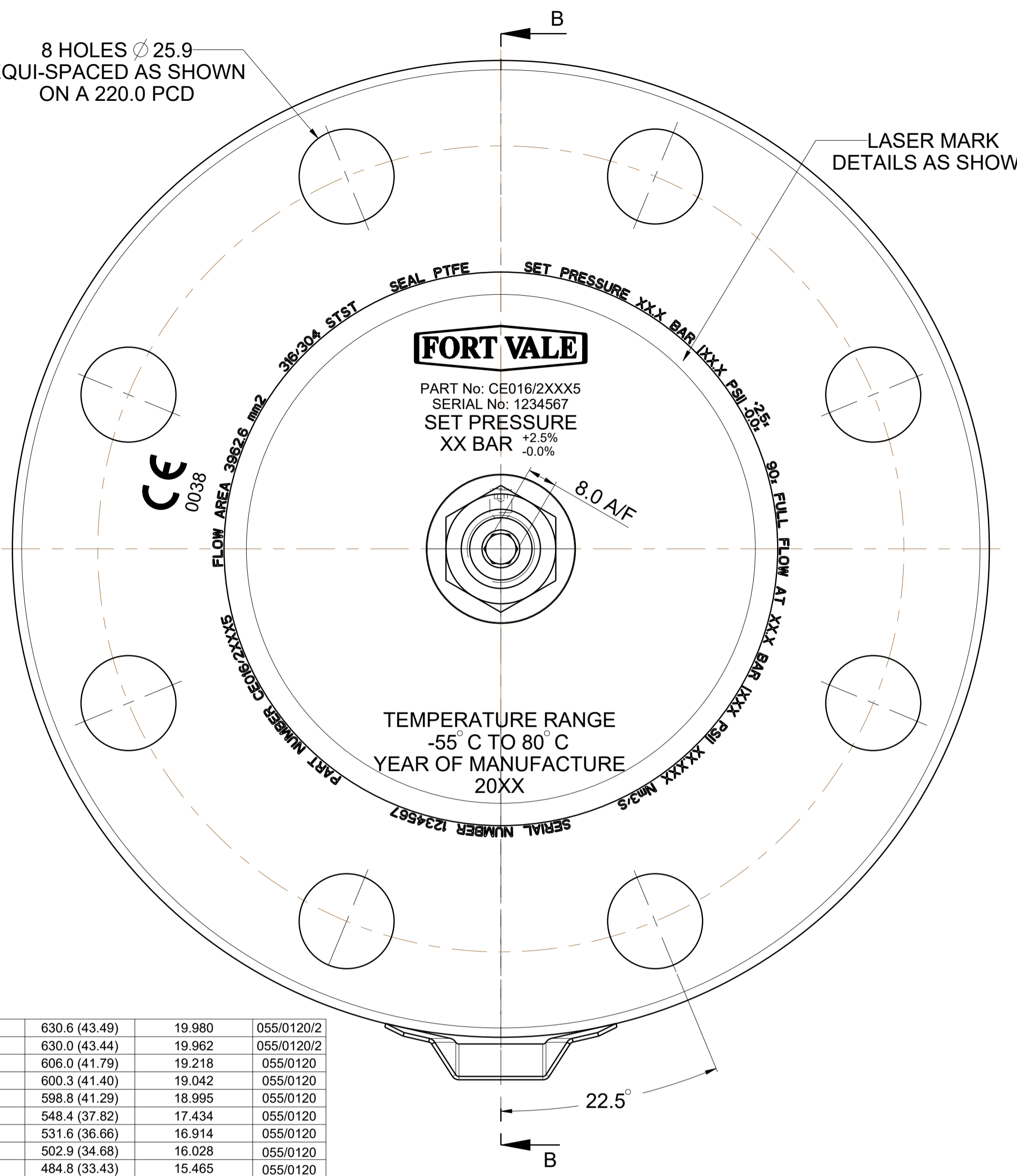


TIGHTEN GRUBSCREW WHEN SET THEN INSERT ANTI TAMPER WIRE AND CRIMP

SPINDLE PRESS FIT INTO SLEEVE AND REAM 20.0mm+0.02mm

8 HOLES Ø 25.9 EQUI-SPACED AS SHOWN ON A 220.0 PCD

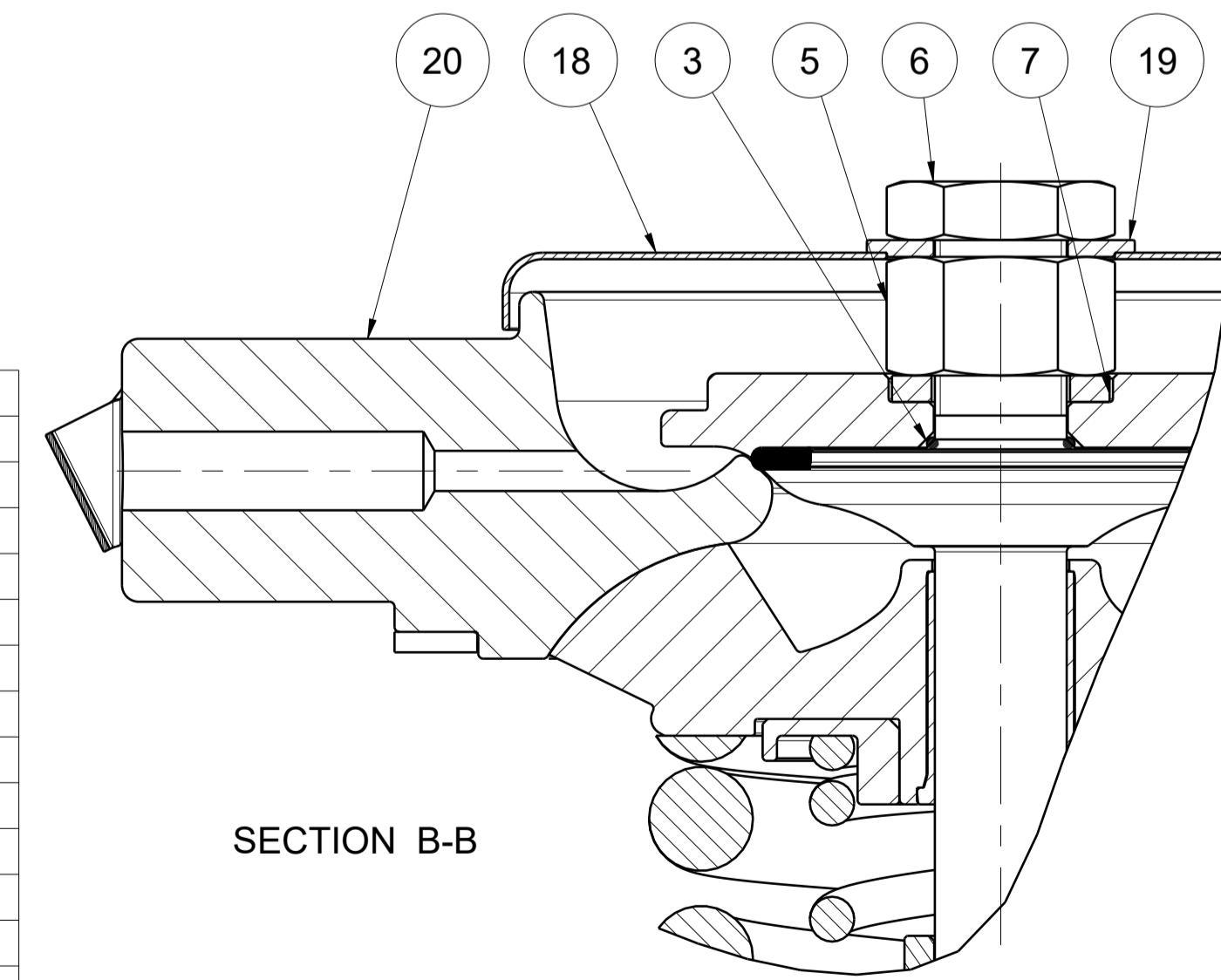
LASER MARK DETAILS AS SHOWN



**MATERIALS OF CONSTRUCTION**

- SEALS PTFE = (TEFLON)
- GUIDE BUSHES = FLOUROSINT
- COWL RETAINING WASHER = ERTALYTE
- SPRINGS = ASTM A313 \*\*\* OR ASTM A564 \*\*\* (SAE 5678 D , 17/7 PH STAINLESS ALLOY STEEL)

- MATERIALS MUST CONFORM TO**
- ASME SA240 316L ASTM A240 316L \*\*\*
  - ASME SA240 304 ASTM A240 304 \*\*\*
  - ASME SA479 316 ASTM A479 316 \*\*\*
  - ASME SA193 B8 ASTM A193 B8 \*\*\*
  - ASME SB446 N06625 ASTM B446 N06625 \*\*\* (STATING CORRECT YEAR DATE)



SECTION B-B

NOTE: WELD LEG LENGTHS & SYMBOLS TAKEN FROM BS 499

016/25265	8104-525S	C	525.5 (36.24)	578.0 (39.86)	17.654	630.6 (43.49)	19.980	055/0120/2
016/25255	8104-525S	C	525.0 (36.20)	577.5 (39.82)	17.638	630.0 (43.44)	19.962	055/0120/2
016/25055	8104-500S	C	505.0 (34.82)	555.5 (38.31)	16.982	606.0 (41.79)	19.218	055/0120
016/25005	8104-500S	C	500.2 (34.50)	550.2 (37.85)	16.826	600.3 (41.40)	19.042	055/0120
016/24995	8104-500S	C	499.0 (34.41)	548.9 (37.85)	16.785	598.8 (41.29)	18.995	055/0120
016/24575	8104-457S	C	457.0 (31.51)	502.7 (34.66)	15.409	548.4 (37.82)	17.434	055/0120
016/24435	8104-443S	C	443.0 (30.55)	487.3 (33.60)	14.950	531.6 (36.66)	16.914	055/0120
016/24195	8104-420S	B	419.1 (28.90)	461.0 (31.79)	14.169	502.9 (34.68)	16.028	055/0120
016/24045	8104-090S	B	399.0 (27.86)	444.4 (30.64)	13.672	484.8 (33.43)	15.465	055/0120
016/23995	8104-090S	B	394.0 (27.51)	438.9 (30.26)	13.508	478.8 (33.02)	15.279	055/0120
016/23785	8104-378S	B	378.0 (26.06)	415.8 (28.67)	12.820	453.6 (31.28)	14.498	055/0120
016/23685	8104-091S	B	368.3 (25.40)	405.1 (27.94)	12.502	441.9 (30.48)	14.138	055/0120
016/23635	8104-091S	B	363.0 (25.03)	399.3 (27.53)	12.328	435.6 (30.04)	13.941	055/0120
016/23515	8104-094S	B	351.0 (24.20)	386.1 (26.62)	11.935	421.2 (29.04)	13.495	055/0120
016/23355	8104-093S	B	335.0 (23.10)	368.5 (25.41)	11.411	402.0 (27.72)	12.900	055/0120
016/23345	8104-093S	B	334.0 (23.03)	367.4 (25.31)	11.378	400.8 (27.64)	12.863	055/0120
016/23305	8104-096S	A	330.0 (22.76)	363.0 (25.03)	11.247	396.0 (27.31)	12.714	055/0120
016/23205	8104-096S	A	320.0 (22.06)	352.0 (24.27)	10.919	384.0 (26.48)	12.343	055/0120
016/23195	8104-096S	A	319.0 (22.00)	350.9 (24.20)	10.886	382.8 (26.40)	12.305	055/0120
016/23075	8104-095S	A	307.0 (21.17)	337.7 (23.29)	10.493	368.4 (25.40)	11.859	055/0120
016/23055	8104-095S	A	305.0 (21.03)	335.5 (23.13)	10.428	366.0 (25.24)	11.785	055/0120
016/22965	8104-098S	A	296.0 (20.41)	325.6 (22.45)	10.133	355.2 (24.49)	11.451	055/0120
016/22905	8104-097S	A	290.0 (20.00)	319.0 (22.00)	9.936	348.0 (24.00)	11.228	055/0120
016/22855	8104-097S	A	285.0 (19.65)	313.5 (21.62)	9.772	342.0 (23.58)	11.042	055/0120
016/22745	8104-268S	A	274.0 (18.89)	301.4 (20.78)	9.412	328.8 (22.67)	10.633	055/0120
016/22685	8104-268S	A	268.0 (18.48)	294.8 (20.33)	9.215	321.6 (22.17)	10.410	055/0120
016/22615	8104-814S	A	261.0 (18.00)	287.1 (19.80)	8.986	313.2 (21.60)	10.150	055/0120
016/22605	8104-814S	A	260.0 (17.93)	286.0 (19.72)	8.953	312.0 (21.51)	10.113	055/0120
016/22595	8104-814S	A	259.0 (17.86)	284.9 (19.64)	8.920	310.8 (21.43)	10.075	055/0120
016/22505	8104-801S	A	250.0 (17.24)	275.0 (18.96)	8.625	300.0 (20.69)	9.741	055/0120
016/22395	8104-239S	A	239.0 (16.48)	262.9 (18.13)	8.265	286.8 (19.77)	9.332	055/0120
016/22325	8104-232S	A	232.0 (16.00)	255.2 (17.60)	8.035	278.4 (19.20)	9.072	055/0120
016/22285	8104-985S	A	228.0 (15.72)	250.8 (17.29)	7.904	273.6 (18.86)	8.923	055/0120
016/22265	8104-985S	A	226.0 (15.58)	248.6 (17.14)	7.839	271.2 (18.70)	8.849	055/0120
016/22205	8104-985S	A	220.0 (15.17)	242.0 (16.69)	7.642	264.0 (18.20)	8.626	055/0120
016/22195	8104-985S	A	219.0 (15.10)	240.9 (16.61)	7.609	262.8 (18.12)	8.589	055/0120
016/22185	8104-985S	A	218.0 (15.03)	239.8 (16.53)	7.576	261.6 (18.04)	8.551	055/0120
016/22155	8104-985S	A	215.0 (14.82)	236.5 (16.31)	7.478	258.0 (17.79)	8.440	055/0120
016/22105	8104-210S	A	210.0 (14.48)	231.0 (15.93)	7.314	252.0 (17.37)	8.254	055/0120
016/22035	8104-205S	A	203.0 (14.00)	223.3 (15.40)	7.085	243.6 (16.80)	7.994	055/0120
016/22005	8104-205S	A	200.0 (13.79)	220.0 (15.17)	6.986	240.0 (16.55)	7.882	055/0120
016/21905	8104-995S	A	190.0 (13.10)	209.0 (14.41)	6.659	228.0 (15.72)	7.511	055/0120
016/21885	8104-983S	A	185.0 (12.75)	203.5 (14.03)	6.495	222.0 (15.31)	7.325	055/0120
016/21785	8104-984S	A	178.0 (12.27)	195.8 (13.50)	6.265	213.6 (14.73)	7.065	055/0120
016/21755	8104-984S	A	175.0 (12.06)	192.5 (13.27)	6.167	210.0 (14.48)	6.953	055/0120
016/21675	8104-167S	A	167.0 (11.51)	183.7 (12.66)	5.905	200.4 (13.82)	6.656	055/0120
016/21645	8104-167S	A	164.0 (11.31)	180.4 (12.44)	5.807	196.8 (13.57)	6.544	055/0120
016/21605	8104-999S	A	160.0 (11.03)	176.0 (12.13)	5.676	192.0 (13.24)	6.396	055/0120
016/21505	8104-986S	A	150.0 (10.34)	165.0 (11.37)	5.348	180.0 (12.41)	6.024	055/0120
016/21455	8104-988S	A	145.0 (10.00)	159.5 (11.00)	5.184	174.0 (12.00)	5.838	055/0120
016/21215	8104-994S	A	121.8 (8.40)	133.9 (9.24)	4.424	146.1 (9.35)	4.976	055/0120
016/21135	8104-123S	A	113.0 (7.79)	124.3 (8.57)	4.135	135.6 (9.05)	4.649	055/0120
016/21015	8104-997S	A	101.5 (7.00)	111.6 (7.70)	3.758	121.8 (8.40)	4.222	055/0120
016/21005	8104-997S	A	100.0 (6.89)	110.0 (7.58)	3.709	120.0 (8.27)	4.166	055/0120

20	055/0250	BODY WELD ASSY	316 STST	1
19	055/0135	COWL RETAINING WASHER	ERTALITE (PETP)	1
18	055/0130	COWL	304 STST	1
17	055/0127	POPPET HEAD	316 STST	1
16	055/0125	STOP COLLAR	316 STST	1
15	055/0120X	POPPET STEM (SEE TABLE)	316 / INCONEL	1
14	055/0116X	TOP SPRING LOCATOR (SEE TABLE)	304/316 STST	1
13	055/0115	SPINDLE GUIDE BUSH	FLUROSINT 500	1
12	055/0114	RETAINING RING CLIP	316 STST	1
11	055/0110X	BOTTOM SPRING LOCATOR (SEE TABLE)	CF3M	1
10	055/0060	TAMPER WIRE	316 STST	1
9	055/0020	SPRING RETAINER	304/304L STST	1
8	8104-XXXX	SPRING SET (SEE TABLE)	17/7 SS	1
7	5113-016	M20 SPRING WASHER	316 STST	1
6	5112-036	M20 X 1.5MM LOCK NUT	NITRONIC 60	1
5	5112-033	M20 X 1.5MM FULL NUT	NITRONIC 60	1
4	5111-133	M6 X 8mm GRUBSCREW	316 STST	1
3	5005-995	BS018 'O' RING NEOPRENE	NEOPRENE	1
2	5005-825	MAIN SEAL	VMF 1600	1
1	5005-812	PTFE GASKET (SUPPLIED SEPARATE)	VIRGIN PTFE	1

Index	Part Number	Description	Material	Qty
Assembly BOM				

**EXAMPLE OF PART NUMBER**

TYPICAL PART NO. CE016/22595  
 016 DENOTE GAS RELIEF VALVE  
 2 DENOTES PTFE SEAL MATERIAL  
 259 DENOTE 259 PSIF PRESSURE SETTING  
 5 DENOTES DRILLING PATTERN

**DESIGN DETAILS**  
 DESIGN CODE : ASME VIII DIV 1  
 (STATE CORRECT REVISION LEVEL)  
 DESIGN PRESSURE (MAWP) : 36.24 barg (526 psig)  
 DESIGN TEMPERATURE : 80 °C (176 °F)  
 SERVICE TEST PRESSURE : 54.36 barg (788 psig)  
 MIN. DESIGN METAL TEMP. : -55 °C (-67 °F)

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ENGLAND, USA, CHINA  
NETHERLANDS, SINGAPORE

DO NOT SCALE- IF IN DOUBT ASK

UNLESS OTHERWISE STATED		FIRST ANGLE PROJECTION	MATERIAL: 304/316 STST
X.X ±0.5	SURFACE FINISH 3.2um MAX	REGISTERED FIRM: LRQ4007111	SCALE: NTS
X.XXX ±0.25	CORNER RADII 0.8		MASS: 20.64 kg
X.XXX ±0.125	CORNER CHAMFER 1.0 X 45°		CHEEK DWN: 32281
ANGLES ±0.5°	REMOVE ALL BURRS AND SHARP EDGES		SHEET 1 OF 1
DESCRIPTION			DRAWN BY: C GLUYAS
			DATE: 14-Apr-05
			DRG. NO. 016/2XXX5

80mm INTERNAL RELIEF VALVE

GAS RELIEF VALVE

A1 UNITS mm