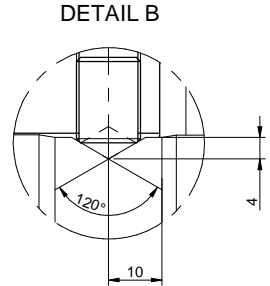
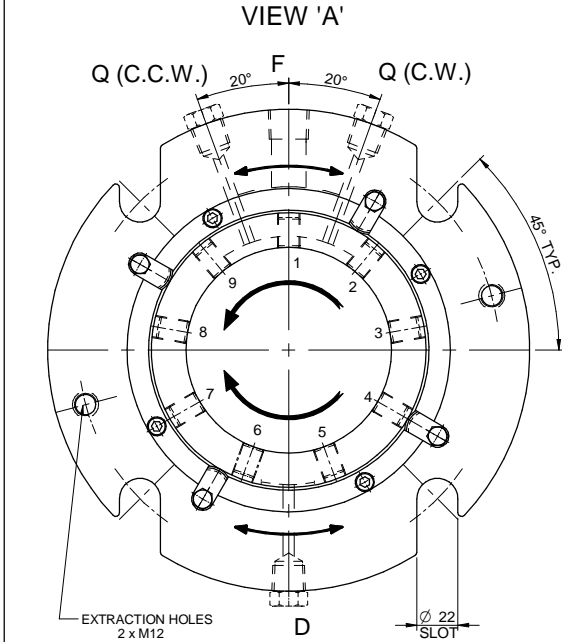
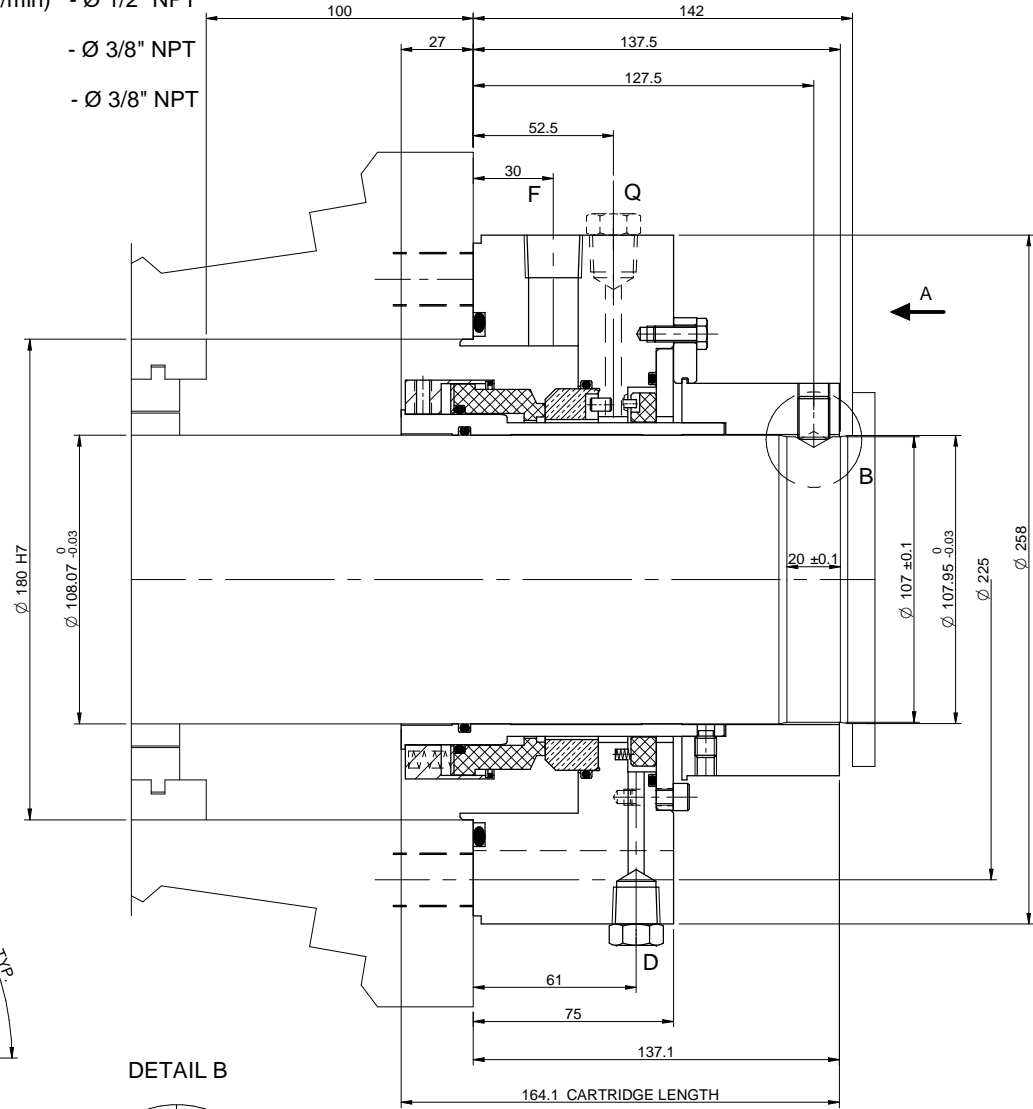


F - FLUSH (Filtered and cooled lean solution Q = 9 l/min) - Ø 1/2" NPT
Q - QUENCH (PLUGGED) - Ø 3/8" NPT
D - DRAIN (PLUGGED) - Ø 3/8" NPT

NOTES:
- REMOVE SHARP EDGES TO AVOID DAMAGE TO GASKETS
- TIGHTEN EVENLY THE SET SCREWS REF. 23
(RECOMMENDED TIGHTENING TORQUE 60.5 N m)
- RECOMMENDED SEQUENCE: 1-4-7-2-5-8-3-6-9
SEQUENCE TO BE REPEATED UNTIL ALL GRUBSCREWS
ARE TIGHTENED TO THE RECOMMENDED TORQUE
- THE SPACERS REF. 19 ARE USED ONLY TO PRESET
THE CORRECT OPERATING LENGTH OF THE SEAL,
THEY MUST BE DISENGAGED AFTER COMPLETING THE INSTALLATION
AND BEFORE STARTING THE EQUIPMENT.
- LUBRICATE THE SHAFT USING SOFT HAND SOAP / WATER SOLUTION,
GLYCERINE OR SILICON GREASE.
MINERAL AND HYDROCARBON OIL-BASED GREASES
CAN BE USED EXCEPT FOR ETHYLENE PROPYLENE GASKETS.
LUBRICATION WITH LIQUID OILS IS NOT RECOMMENDED.

Pump MAWP: 6.65 Mpa g @ 105°C
Seal STATIC PRESSURE RATING : 5 Mpa g
Seal DYNAMIC PRESSURE RATING : 1.5 Mpa g
Seal Power Absorption in Pump Normal Operation : 1700 W



Ref.	Part No.	Drawing or Legacy Part No.	Description	Materials	Qty	Spares
1	87022151	1174/C44/509	PIST SEAT	SIC	1	XX
2	81063708	2550/123/394	O-RING	FFKM	1	X
3	87023682	1238/C40/530	PRIMARY RING	ANTIMONY IMPREGN. CARBON	1	XX
4	81063274	2490/123/394	O-RING	FFKM	1	X
5	81046003	0639/092/033	SPRING	ASTM B575 UNS N10276	16	XX
6	87007132	1238/D97/001	RETAINER	ASTM A276 UNS S31600	1	
7	87006899	1238/H86/001	DISC	ASTM A167 UNS S31600	1	
8	81736144	1250/096/001	SNAP RING	ASTM A313 UNS S31600	1	XX
9	81263408	3504/305/001	GRUB SCREW	ASTM A193 UNS S31600	4	XX
10	89746448	H-4875-1457	SLEEVE	ASTM A276 UNS S31600	1	
11	81062856	2440/123/394	O-RING	FFKM	1	X
12	89746449	H-4825-1514	COVER ASSY	ASTM A276 UNS S31600	1	
13	81064265	3670/123/394	O-RING	FFKM	1	X
14	87009448	1174/G93/171	FLOATING SOLID BUSH	CARBON	1	XX
15	81046438	3320	SPRING	ASTM A313 UNS S31600	3	XX
16	81063816	2570/123/394	O-RING	FFKM	1	X
17	87007977	1174/H90/001	GLAND FOLLOWER	ASTM A276 UNS S31600	1	
18	81673833	7916/301/001	SCREW	ASTM A193 UNS S31600	4	
19	88617832	H-00005249	SETTING WASHER	SINTERED AISI 316L	4	XX
20	81775966	7916/300/001	SCREW	ASTM A193 UNS S31600	4	
21	89746450	H-4250-2628	DRIVE COLLAR	ASTM A276 UNS S31600	1	
22	81736467	8010/303/001	GRUB SCREW	ASTM A193 UNS S31600	6	XX
23	81673093	8216/305/050	GRUB SCREW	ISO 888-5 CLASS 14.9	9	XX
24	81776387	0300/Q23/001	PLUG	ASTM A320 UNS S31600	3	
X	89746445		SET GASKETS			
X+XX	89746446		REPAIR KIT			

THIS DRAWING IS RELEVANT TO
BOTH SIDES OF THE EQUIPMENT

SEAL DATA		API / ISO SEAL CODE	C2A1A3261 BSAIN 1CW-FL	PIPING PLAN	32/61
SEAL IDENTIFIER (INBOARD / OUTBOARD)		1238 / 48LP / X48 P147 1 X48 D81 H			
CUSTOMER DATA		CUSTOMER	Technip Italy (TPIT)	CONTRACTOR	Technip Italy (TPIT)
END USER		Duslo A.S.		EQUIPMENT TYPE	BB3 Centrifugal Pump
SITE LOCATION		ŠAL'A - SLOVAK REPUBLIC		OEM	GE Nuovo Pignone
PLANT		PROJECT DUSLO - ČPAVOK 4		MODEL / SIZE	10x16 MSND
PLANT ITEM No.		010-P-301 A/B/C		STUFFING BOX DRAWING No.	SOA38696
SERVICE DATA		PROCESS FLUID NAME		Mdea Solution	
PROCESS TEMPERATURE °C	DENSITY / SG	VAPOUR PRESSURE MPa a	VISCOSITY Pa s		
min					
norm	71	1.062	0.13	0.0016	
max	105				
SUCTION PRESSURE MPa a	DISCHARGE PRESSURE MPa a	CHAMBER PRESSURE bar a	SHAFT SPEED rpm		
min					
norm	0.32	5	4.7	2985	
max	0.66	6.5	9.1		
BARRIER / BUFFER FLUID NAME		BARRIER / BUFFER PRESSURE		BARRIER / BUFFER TEMPERATURE	
Filtered and cooled lean solution		Chamber pressure + 0.5 bar a		50 °C	
CUSTOMER REFERENCE DATA		JOHN CRANE REFERENCE DATA		ASSEMBLY PART No.	
		P14/0173 15-00216		89746444	

TITLE					
MECHANICAL SEAL CARTRIDGE / 108.07 mm / 1648-2					
SCALE	DATE	DRAWN	CHKD	APPD	DRG. LOCATION
1:1	20/11/2015	DG	DG	MS	IT01EN
DRAWING No.				Sheet No. ISSUE	
GA-184323				1 B	

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TECHNIP ITALY S.p.A.	
VENDOR DOCUMENT REVIEW	
<input type="checkbox"/> 1 REVISE AND RESUBMIT	
<input type="checkbox"/> 2 TO BE ISSUED AS FINAL PROVIDED COMMENTS ARE INCORPORATED	
<input checked="" type="checkbox"/> 3 NO COMMENT - FINAL ISSUE	
<input type="checkbox"/> 4 FOR INFORMATION ONLY	
GN - Mar 01, 2016	
PROJ.: 2522 - DUSLO CPAVOK 4 CLIENT: DUSLO A.S.	
DUSLO CODE: 2260 / 16 / 15 / TPIT	
MATERIAL REQUISITION No.	
2522 000 MR 01 91 51 01 01 1	
ITEM: CARTR-P-301 A/B/C_DE/NDE	
SR Doc. CODE: A1101	