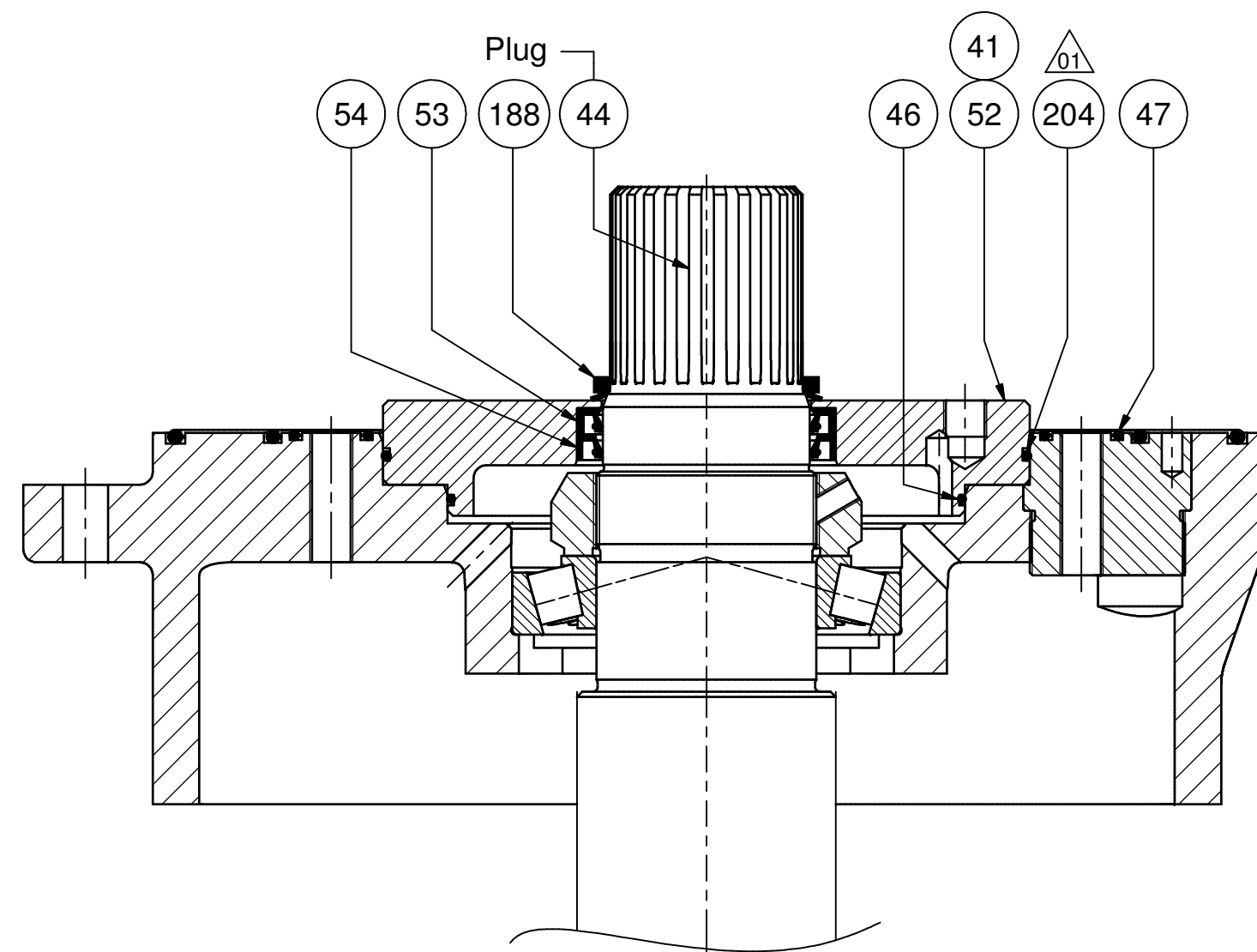
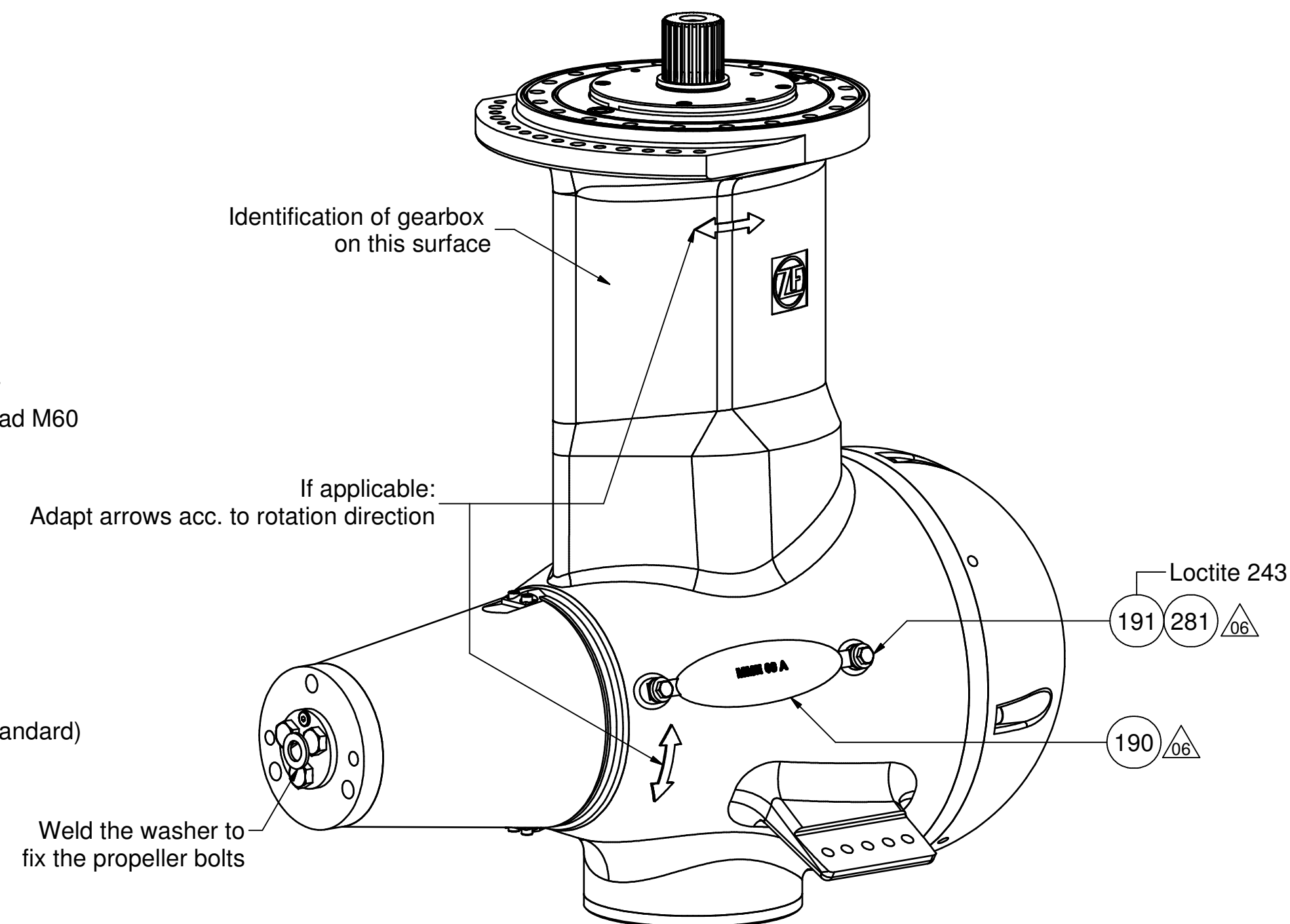
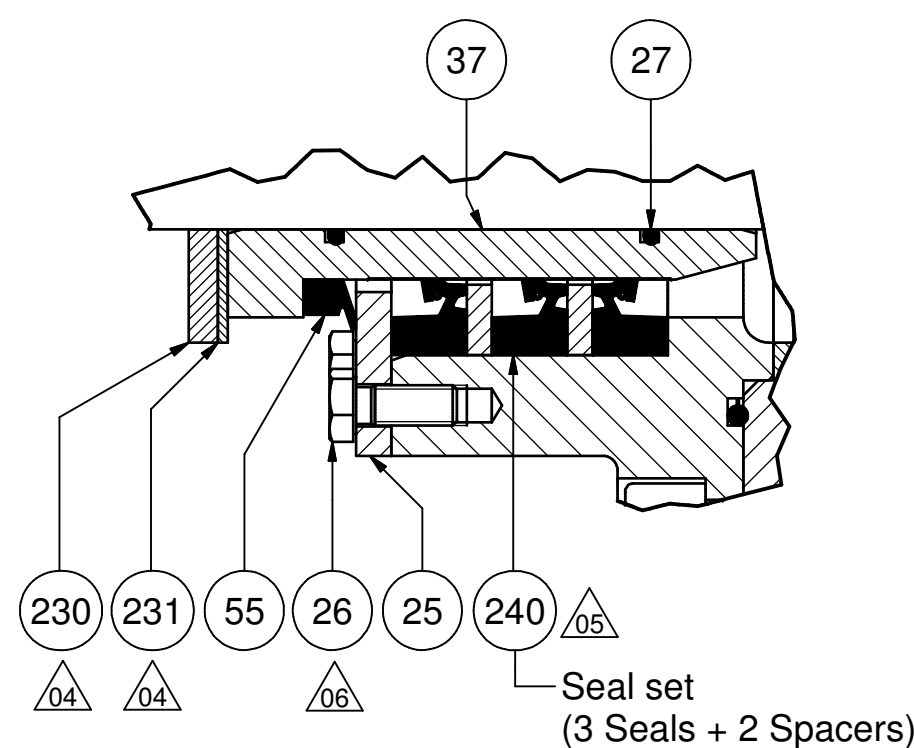
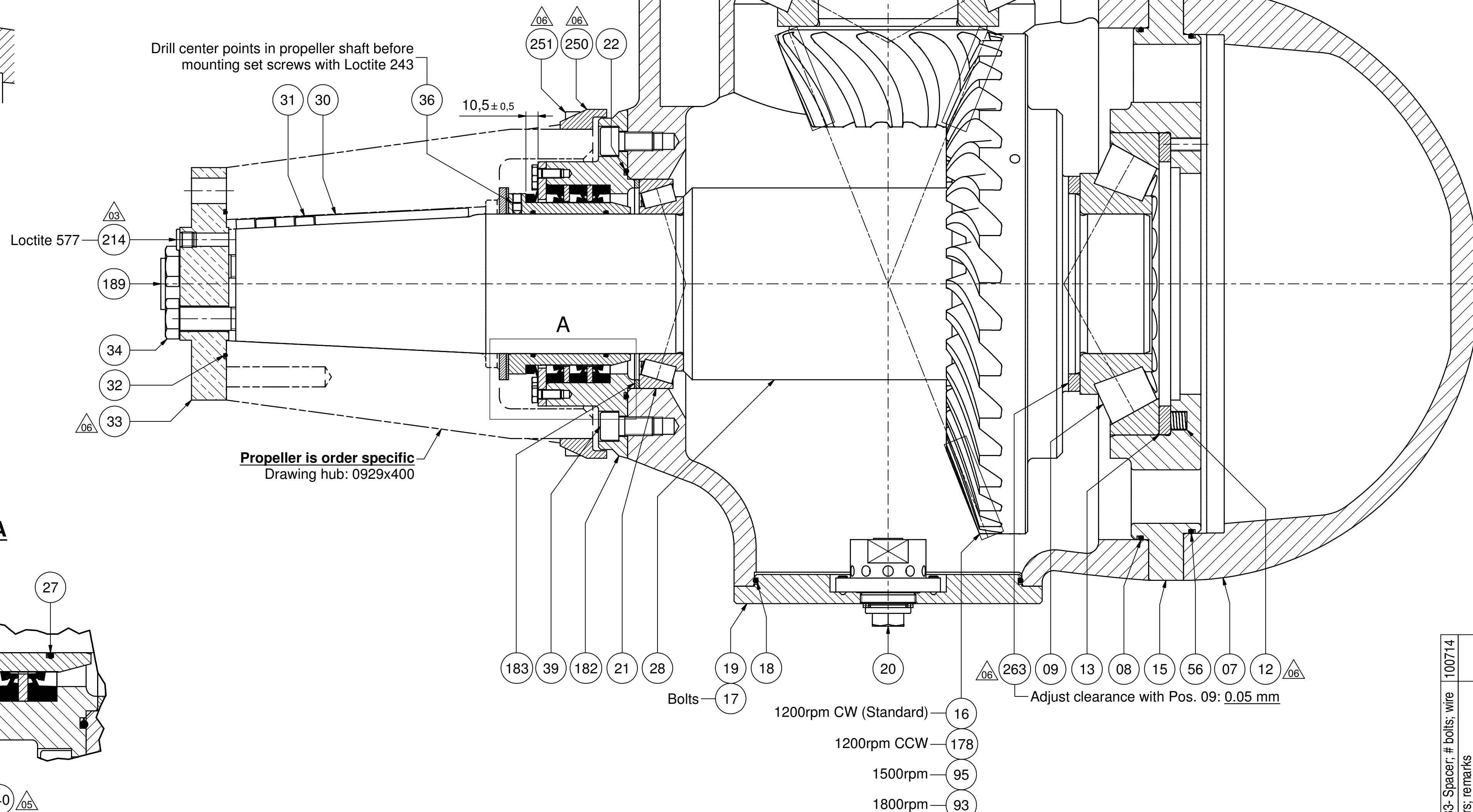
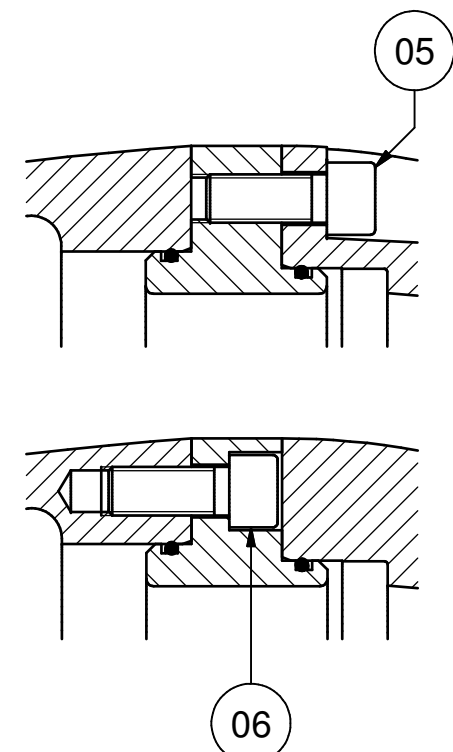


Tunnel thruster version



View 1

(Bolts for mounting Pos. 07 and Pos. 15)



Remarks:

- Fill all disassembly holes with acid free clear silicon paste;
- Grease o-rings with acid free vaseline;
- Prop. shaft seal (re)placement: P0118;
- Leakage test prop. fitting system: P0113;
- Grease ONLY lip of lip seals with little bit 'Shell Rhodina EP2' or equivalent;
- Weight exclusive oil and propeller;
- Locknut inserts: P0179;
- Bolt connections: P0072;
- Bolt connections: < M12 Loctite 243
 > M12 Loctite 2701;
- Material of classification parts: P0092;
- For coating contact surfaces: P0180;
- Tooth clearance: P0191;
- Paint 3 teeth of both bevel gears with:
'Layout Fluid' (Steel Red, Dykem).

Options:

Gearsets:

- 1200 rpm CW (standard): Incl. pos. 02, 16
- 1200 rpm CCW: Incl. pos. 177, 178
- 1500 rpm: Incl. pos. 94, 95
- 1800 rpm: Incl. pos. 92, 93

Standard thruster version (Main view)

- Incl. pos. 42, 84

Tunnel thruster version

- Incl. pos. 41, 44, 46, 47, 52, 53, 54, 188
204

Locking plate (CuNiAl / 316L)

- Use correct Pos. 33

Andodes (aluminium / zinc)

- Use correct Pos. 190

Bearing margins:

- Horizontal shaft: 0.00mm 
- Vertical shaft: 0.00mm

06	AS	R0133- Spacer, # bolts; wire cutlens; remarks	1700714
06	SH	Seal set added	040111
04	SH	Prop. seals added	220710
04	SH	Pos. 314 added	010210
02	SH	Plug remarks added	290909
02	SH	O-ring (204) added	170409
02	SH	REV SUBJECT	DATE
		SCALE : 1 : 2.5 DATE : 28-1-2008 NAME : SH CHECKED : MATERIAL : WEIGHT : 631.3 kg TITLE : ZF 4000 Lower gearbox FORMERLY KNOWN AS THRU DRIVER SYSTEM BV ZF Marine Krimpen BV VOOR AANMERKENING ZONDER OPSCHRIJVING TOEGELATEN GELOFT IF NOT SPECIFIED, ALL DIMENSIONS TOLERANCES Zaag 27 P.O. Box 2020 2930 AA Krimpen aan de Lek The Netherlands Site : www.zf.com Phone : +31 (0)180-3331000 Fax : +31 (0)180-3331099	
		REMARKS: P0070 IF METINGEN IN MILLIMETERS DIMENSIONS IN MILLIMETERS SCHRIJFTE AANTEN BREVEN CHARACTERS SHARP EDGES 1/16"	
		OVERNAME DATE NUMBERED SURFACE DISCOATED 1/16"	
		This drawing represents the property of ZF Marine Krimpen BV and may not be reproduced without the written permission of the owner. It may not be used by third parties or used for partial or full reproduction.	
		DRAWING No. : 0803x400 ORDER No. : Rev 06	