

- 1

INPUT GROUP REFERENCE PLANE
- 2

PTO GROUP REFERENCE PLANE
- 3

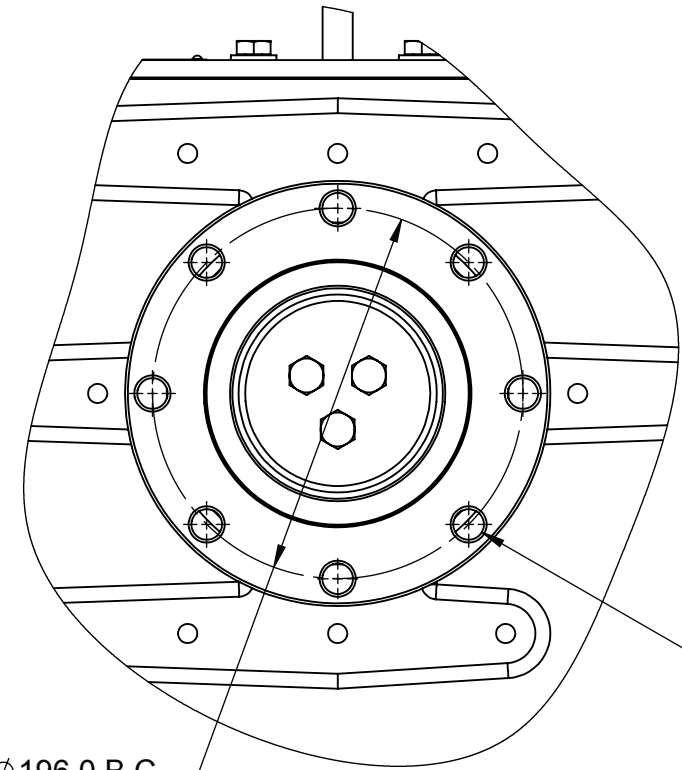
LEFT MOUNTING BRACKET FACE
- 4

RIGHT MOUNTING BRACKET FACE

NOTES:

- A. PROPORTIONAL CONTROL VALVE OPERATION
1. WARNING DO NOT CONNECT VALVE COIL DIRECTLY TO BATTERY/POWER SUPPLY VOLTAGE
2. OPERATION TO BE PERFORMED WITH ONLY TWIN DISC CONTROL SYSTEMS OR MODULES.
- B. MANUAL DIRECTIONAL CONTROL VALVE OPERATION
1. WITH MANUAL DIRECTIONAL CONTROL VALVE IN CENTERED POSITION, PUSH TO ENGAGE PRIMARY CLUTCH
2. WITH MANUAL DIRECTIONAL CONTROL VALVE IN CENTERED POSITION, PULL TO ENGAGE SECONDARY CLUTCH
- C. MANUAL DIRECTIONAL CONTROL VALVE MODE SWITCH
1. SWITCH IS NORMALLY CLOSED WHEN MANUAL DIRECTIONAL CONTROL VALVE IS IN THE CENTERED POSITION AND OPEN WHEN LEVER IS ACTUATED FROM CENTERED POSITION.
2. CURRENT = 20 AMP MAX.
3. FOR WIRING SCHEMATIC, REFER TO CONTROL MODULE DRAWING.

NOTE:
ALL POINTS AVAILABLE FOR TESTING ARE CODED



EYEBOLTS FOR LIFTING MARINE TRANSMISSION ONLY (2 EYEBOLTS, ONE EACH SIDE.) EQUALIZE LOAD ON BOTH EYEBOLTS TO LIFT MARINE TRANSMISSION

MAIN PRESSURE PORT
M16x1.5 METRIC PORT
TIGHTENING TORQUE 24 ± 2 Nm

PRIMARY CLUTCH (FIRST)
PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 16 ± 1.5 Nm

INPUT SPEED SENSOR PORT
5/8-18UNF-2B RHD
TARGET WHEEL : 54 TEETH

TEMPERATURE PORT
BEFORE HEAT EXCHANGER
M14x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 20 ± 2 Nm

Tbc

OIL GAUGE

PRIMARY CLUTCH
VALVE COIL
SEE NOTE "A"

SECONDARY CLUTCH
VALVE COIL
SEE NOTE "A"

SECONDARY CLUTCH (FIRST)
PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 16 ± 1.5 Nm

Zsc1

MAIN PRESSURE PORT AND
OIL FILTER DRAIN
M22x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 54 ± 5 Nm

X

SECONDARY CLUTCH (SECOND)
PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 16 ± 1.5 Nm

Zsc2

LUBE PRESSURE
M18x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 34 ± 3 Nm

G

CENTER OF GRAVITY

MAIN PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
CONNECT OIL PRESSURE
GAUGE LINE HERE
TIGHTENING TORQUE 16 ± 1.5 Nm

X

WATER OUTLET FOR
HEAT EXCHANGER
1 1/2 NPT THREAD

SECONDARY CLUTCH (FIRST)
PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 16 ± 1.5 Nm

Zsc1

TEMPERATURE PORT
AFTER HEAT EXCHANGER
M14x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 20 ± 2 Nm

Tac

M12x1.75 TAP 10.0 DEEP
30.2mm CLEARANCE REQUIRED
TO REMOVE SUCTION SCREEN

CENTER OF GRAVITY

PRIMARY CLUTCH (FIRST)
PRESSURE PORT
M12x1.5 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 16 ± 1.5 Nm

Zpc1

SEE NOTE "B"

382.5
EYE BOLT (2 PLACES)

BREATHER

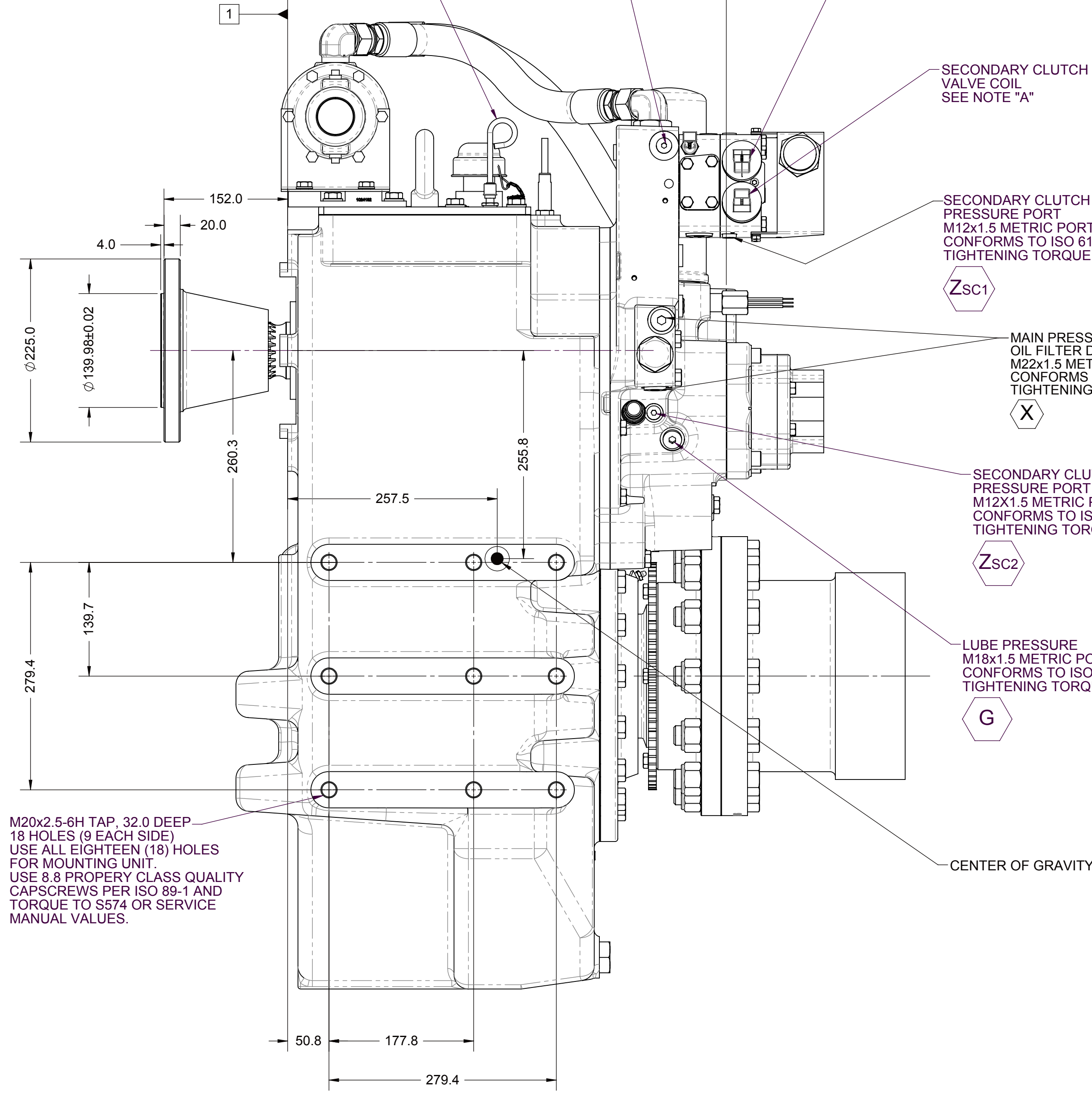
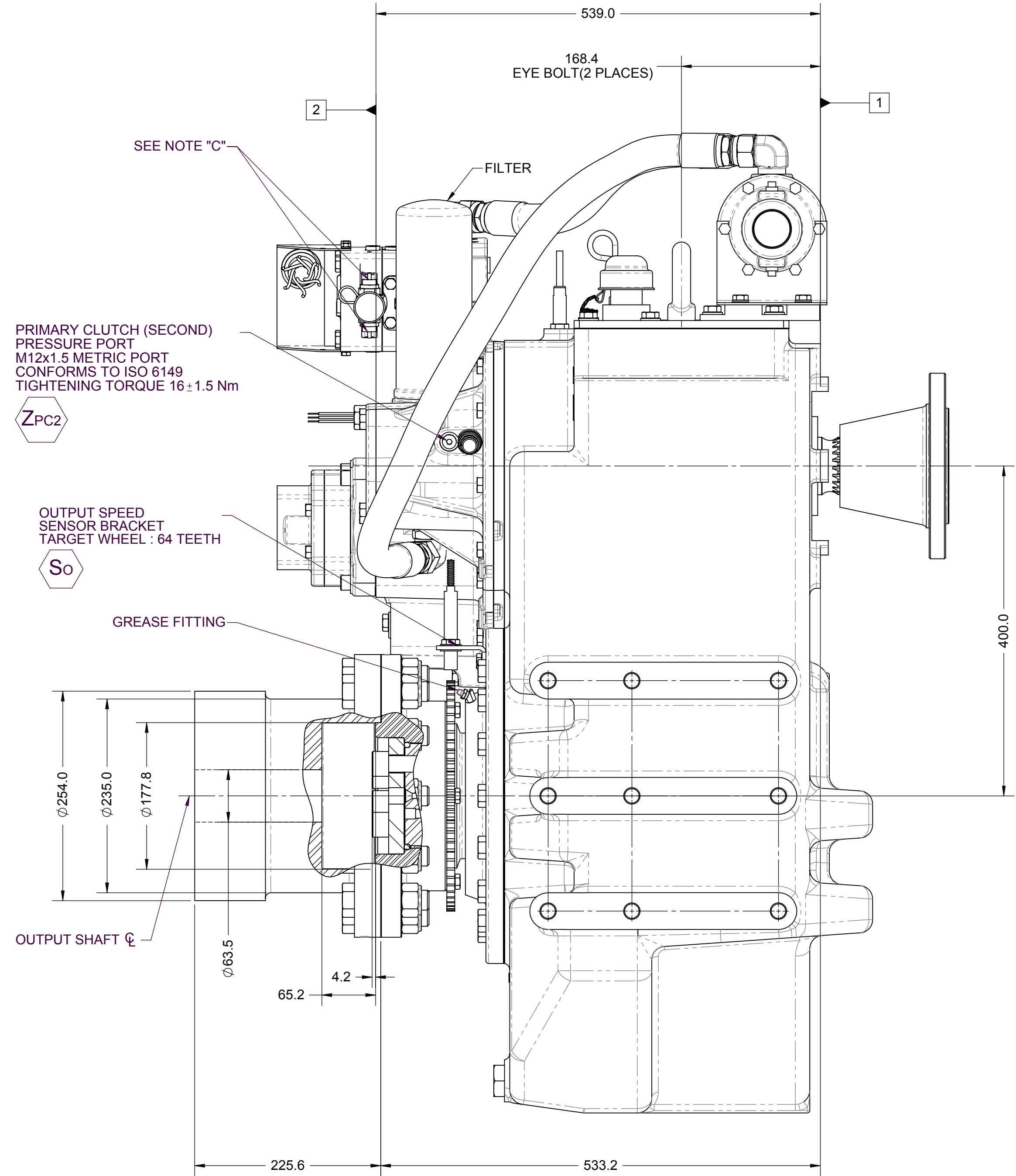
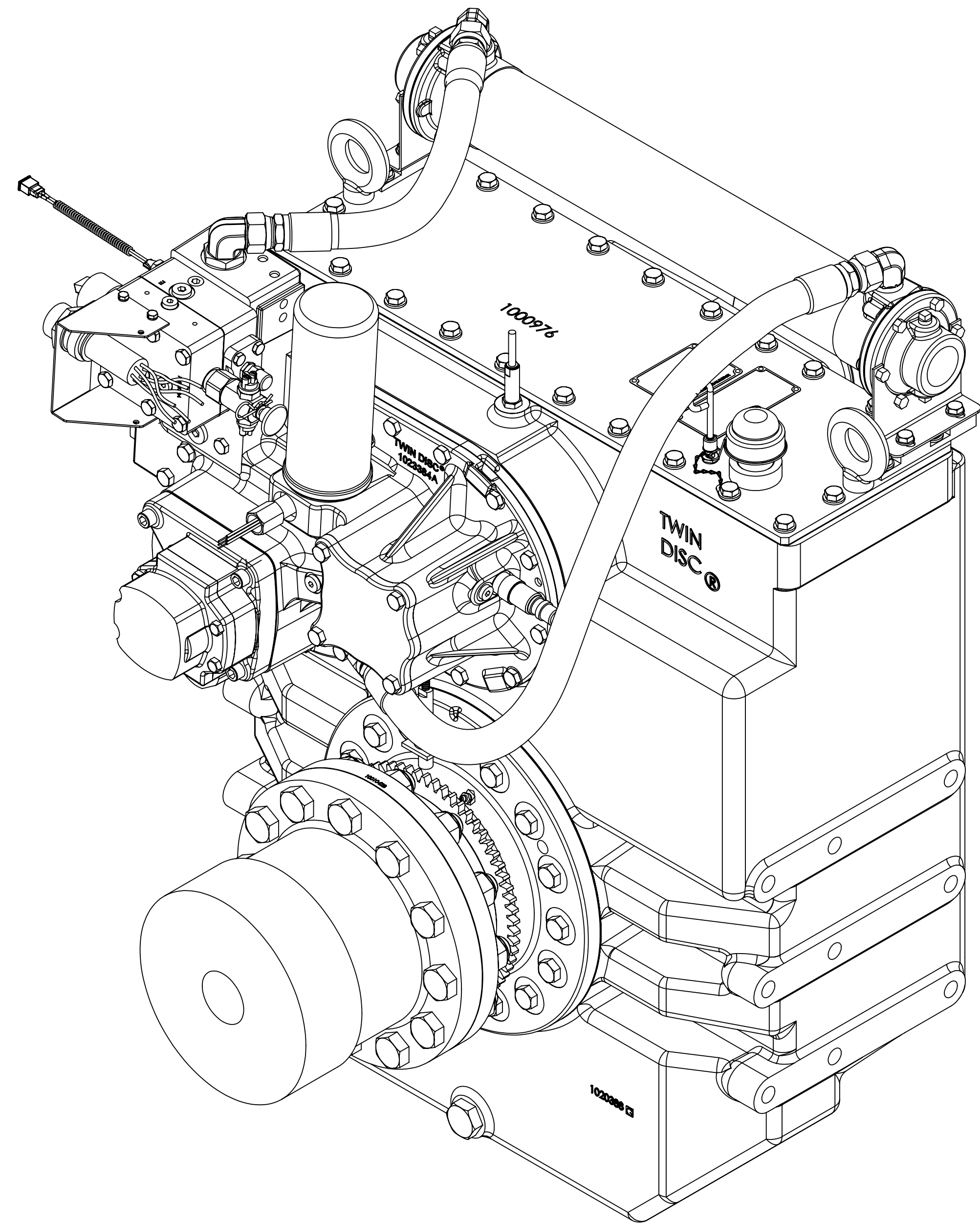
WATER INLET FOR
HEAT EXCHANGER
1 1/2 NPT THREAD

INPUT SHAFT Ø

FOR R.H. ENGINE DRIVING
THRU PRIMARY SHAFT

CENTER OF GRAVITY

OIL DRAIN
M33x2.0 METRIC PORT
CONFORMS TO ISO 6149
TIGHTENING TORQUE 88 ± 8 Nm
15.0 mm CLEARANCE REQUIRED
TO REMOVE PLUG



J

I

H

G

F

E

D

C

B

A

EQUIPMENT SHOWN:
- MGX-5225DC PER 1022825A
- 1019735A INPUT HUB
- GP VALVE WITH EC300 WIRING HARNESS
- 1002312 COMPANION FLANGE ASSEMBLY
- M1959AW MOUNTED HEAT EXCHANGER

FIRST USE ASSEMBLY 1022825A
FIRST USE MODEL MGX-5225DC
SIMILAR TO:
METRIC
UNLESS OTHERWISE SPECIFIED
X.XX 15.12
X.XX 15.13
ALL ANGULAR TOLERANCES ±1°
GEOMETRIC TOLERANCING
PER ASME Y14.5M 1994

THIRD ANGLE
PROJECTION
MATERIAL
HEAT TREAT
DESCRIPTION
INSTALLATION
MGX-5225DC

DATE
11/07/2013
SCALE
1:4
DRAWN BY
PM
CHECKED BY
ALC
APPROVED BY
ALC
SHEET
1 OF 1
REV:

NDWF-04566 11/22/2013
REV: CHANGE NO. DATE
TWIN DISC
RACINE, WI 53403 - USA
1025541D
A0