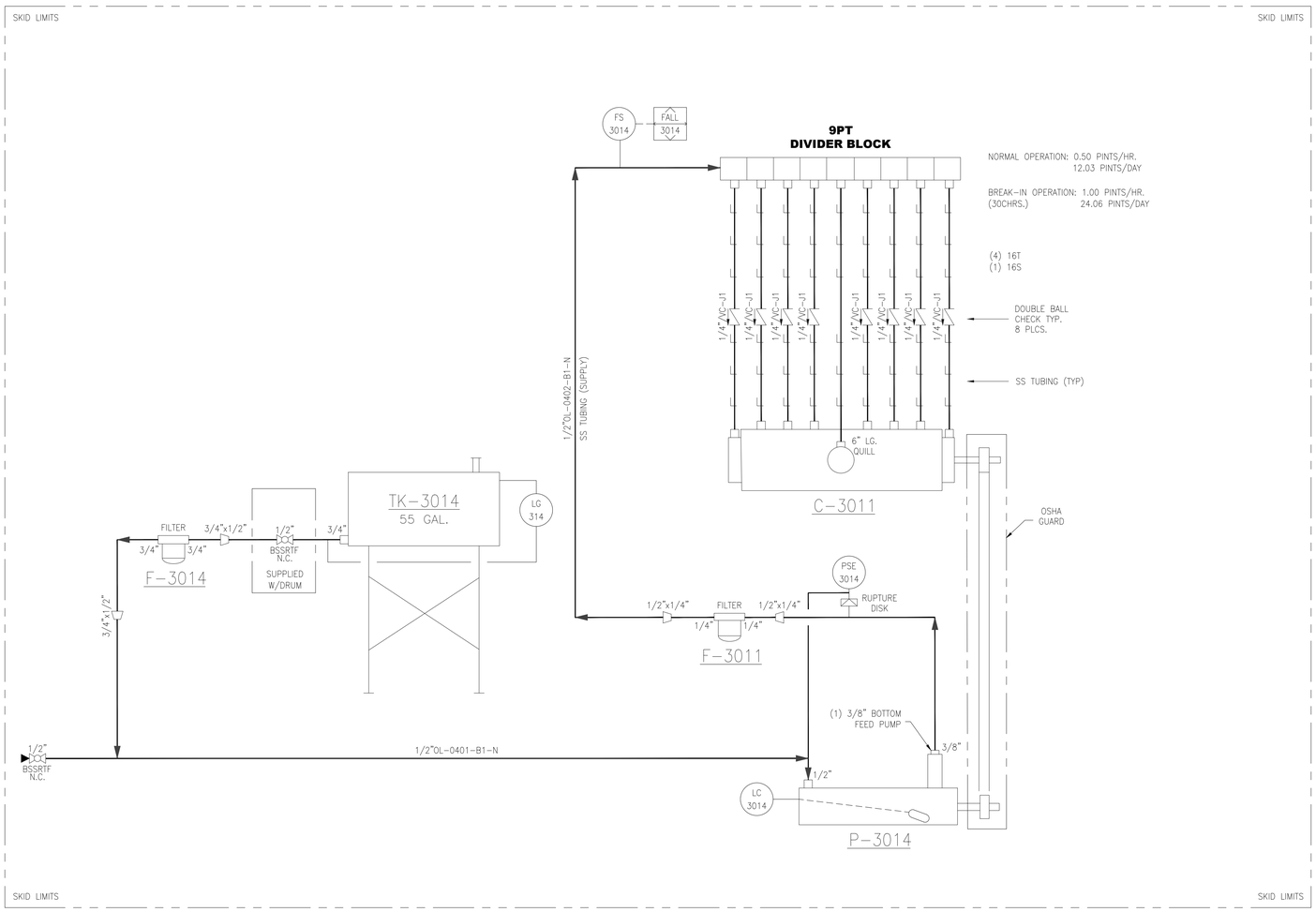
F-3014
MAKE-UP OIL FILTER
MFG: PARKER
MODEL: 12AT10CN15BBH

TK-3014
LUBE OIL TANK
MFG: KENCO
MODEL: K55G-36-FS
55 GALLON
SAE30 (ISO VG68-100)

F-3011
LUBE OIL FILTER
MFG: ARROW
MODEL: 9052T-90

P-3014
LUBRICATOR PUMP
PREMIER 3 PINT
60:1 RATIO



NOTES:

1. PLC PANEL ON SKID MOUNTED IN A NEMA 4X ENCLOSURE CLASS 1, DIV 2 W/ 20% SPARE TERMINALS.
2. PLC PANEL COMPONENTS TO BE LABELED AS PER PDCE-GBL-042-00.001.
3. SKID WIRING TO BE CLASS 1 DIV 2 CONDUIT SHALL BE 3/4" MIN W/ WIRE MARKERS ON END DEVICES W/ INSTRUMENT TAG # USING "FROM/TO" CONVENTION.
4. MAIN DRIVER TECO IEEE 841 W/ 120 VAC HEATER & BEARING & WINDING RTDS.
5. SWAGELOK FITINGS ALL TUBING AND FITTING TO BE 316SS.
6. TUBING TO BE 1/2", TUBING CLIP SPACING SHALL NOT EXCEED 4 FEET.
7. SKID TO BE DECKED CHECKERED DECK PLATE W/ 3" DRIP LIP & 2" DRAINS, LIFT LUGS.
8. LIFT LUGS TO BE 100% HT OR PT.
9. SKID TO HAVE ANCHOR AND JACK BOLTS (X4) & GROUND LUGS (X2 OPPOSITE SIDES).
10. SKID PER AWS D1.1
11. PAINT PER CUSTOMER SPEC PDCE-GBL-032-00.002 H1 PAINT SYSTEM FOR INSULATED PIPING GREATER THAN 200°F, A PAINT SYSTEM FOR UN-INSULATED PIPING.
12. SANDBLAST ALL SURFACES TO BE PAINTED TO SSPC-SP10 FOR H1 PAINT SYSTEM AND SSPC-SP6 FOR A PAINT SYSTEM.
13. THE FOLLOWING SURFACES SHALL NOT BE COATED: ZINC OR TEFLON COATED FLANGE STUD BOLTS, STAINLESS STEEL, RUBBER, TUBING, FLEXIBLE HOSES, SIGHT-GLASSES, GAUGE FACES AND BODIES, NAMEPLATES, CONTROL VALVE TRAVEL AND POSITION INDICATORS, ELECTRICAL ENCLOSURES & VALVE POSITION INDICATORS.
14. CARLSBAD CANYON PAINT COLOR.
15. PIPING TO BE ASME B31.3, HYDRO 1.5X FOR 1 HOURS, BW TO BE 100% X-RAYED, SW TO BE 100% HT OR PT.
16. PROCESS PIPING TO BE ACL, INSTRUMENT AIR PIPING TO BE ACM, JACKET WATER PIPING TO BE ACP.
17. PIPING 2" & LARGER = FLANGED.
18. PIPING COLD SPRING TEST REQUIRED.
19. PIPING NIPPLES FROM PIPING & EQUIPMENT TO BE SCH 160 TO THE FIRST VALVE AS PER PDCE-GBL-032-00-001.
20. PROCESS PIPING (SPEC ACM) THRED-O-LETS 1/2" ASTM A105 CLASS 6000 3/4" – 1 1/2" ASTM A105 CLASS 3000, NIPPLES & SWEDGES 1/2" – 1 1/2" ASTM A106 SCH 160, SOCK-O-LETS 1/2" ASTM A105 CLASS 6000 3/4" – 1 1/2" ASTM A105 CLASS 3000, 2" FLANGES CLASS 150 RF ASTM A105.
21. INSTRUMENT AIR PIPING (SPEC ACL) THRED-O-LETS 1/2" – 1 1/2" ASTM A105 CLASS 3000, NIPPLES & SWEDGES 1/2" – 1 1/2" ASTM A106 SCH 160, SOCK-O-LETS 1/2" – 1 1/2" ASTM A105 CLASS 3000, 2" FLANGES CLASS 150 RF ASTM A105.
22. JACKET WATER PIPING (SPEC ACP) FITTINGS 1/2" – 4" ASTM A105 CLASS 3000, NIPPLES & SWEDGES 1/2" – 4" ASTM A106 SCH 160, 2" FLANGES CLASS 150 RF ASTM A105.
23. 5 WORKING DAYS' NOTICE PRIOR TO HOLD POINTS & TESTS.
24. ALL MATERIALS FROM NORTH AMERICA & WESERN EUROPE.
25. PIPING ABOVE 140°F TO BE INSULATED FOR PERSONAL PROTECTION, HEAT TRACE AND INSULATION FOR LIQUID DRAIN PIPING.
26. INSULATION & HEAT TRACE TO BE AS PER PDCE-GBL-032-00.003.
27. VESSELS HYDRO 1.5X FOR 1 HOURS, 100% OF WELD TO BE X-RAYED.
28. HEAT EXCHANGER TO MEET API 661.
29. FLEXITALLIC GASKETS. (304 SS GRAHPHITE FILLED 1/8" THICK W/ 304 SS IR)
30. CAD PLATED STUDS & NUTS B7/2H.
31. NO PLASTICOATING.
32. PSV'S SIZED PER API 520/521 & APPLICABLE ASME VIII DIV I STANDARDS.
33. ROSEMOUNT PRESSURE & TEMPERATURE TRANSMITTERS.
34. BYPASS VALVE FISHER GX 2-WAY TO BE CONTROLLED BY ADVC2000 I/P CONTROLLER.
35. MTR'S REVIEW REQUIRED ON ALL MATERIALS.
36. NO YELLOW METALS OR MALLEABLE IRON.
37. ALL CUSTOMER CONNECTIONS TO BE INSIDE SKID CONTAINMENT.

NOTES:

DESIGN CONDITIONS:
P1 = 0.5-2.0 PSIG
P2 = 30 PSIG
T1 = 120°F
T2 = 120°F
TA = 100°F
SG = 1.83
N = 1.11
EL = 2600 FASL
Q = 1.04-1.28 MMSCFD

REFERENCE DRAWINGS

DWG NO.	TITLE

REVISIONS

REV	DESCRIPTION	BY	DATE	CHK BY	CHK DATE	APR BY	APR DATE
0	AS-BUILT BY LDIS	MAO	04/25/19	TBM	04/25/19	TBM	04/25/19

APPROVALS	SIGNATURE	DATE
DRAWN/DESIGNED		
CHECKED		
APPROVED		
CLIENT APPROVAL	**SIGNATURE**	**DATE**
OPERATIONS		
ENGINEERING		
PROJ. MGR.		

PDC ENERGY

PIPING & INSTRUMENTATION DIAGRAM
NEAST BOREAS OTF
REEVES COUNTY, TEXAS
VRU LUBE OIL

SCALE: NO SCALE
DRAWING NO. EAST-OTF-PID-3000-023 0

FILE PATH: C:\USERS\MOVER\DESKTOP\PDC BOREAS 4-25-19\EAST-OTF-PID-3000-023.DWG BY:MOVER DATE:Apr 25, 2019 9:30am