

VESSEL PROCESS DESIGN SHEET

SHT 2 OF 2

CLIENT Devon Canada **REQ. NO.** 407014-00120
PROJECT Ferrier Central Processing Facility (Job 5B1108) **ITEM NO.** 002-V-01-1610
FABR. SPEC **SERVICE** Compressed Cardium Gas Separator

OPERATING CASE	CASE 1	CASE 2
Fluid		
Operating Pressure Max/Norm/Min kPag	800/700/600	
Operating Temperature Max/Norm/Min °C	53/43/23	
Design Pressure kPag	1379	
Design Temperature Min/Max °C	-45/150	
Slug/Surge Volume m ³	-	
Hazard Level	Class 1, Div 2	

GAS		
Mass Flowrate	kg/hr	52,920
Density (@ P & T) kg/m ³		6.83
Viscosity cP		0.012
Molecular Weight		-

LIQUID HYDROCARBON		
Volume Flowrate	BBL/day	12.6
Density (@ P & T) kg/m ³		613
Viscosity cP		0.21
Surface Tension dyne/cm		-

LIQUID AQUEOUS		
Volume Flowrate	BBL/day	-
Density (@ P & T) kg/m ³		-
Viscosity cP		-

VESSEL		
Horizontal / Vertical		Vertical
Shell Diameter ID mm		1,676.0
Shell seam to seam length mm		3,658.0

BOOT		
Diameter mm		-
Height mm		-

INTERNALS		
Demister Type		Vane Pack
Vortex Breaker Required		Yes
Other Internals		Float Shield, 2x Annodes

COMPOSITION

Component	Vapour Phase mol fraction
CO2	0.008
H2S	0.000000
N2	0.0041
C1	0.7632
C2	0.1074
C3	0.0682
iC4	0.009
nC4	0.0201
iC5	0.0067
nC5	0.0045
C6	0.0045
C7	0.0021
H2O	0.0019
Oil (38 deg API)	

NOTE

- 5-1)** Seller to size this equipment as 2-phase separator.
5-2) Seller to recommend and provide any internals to facilitate proper operation.



WorleyParsons
resources & energy

JOB NO. 5B1108
DATA SHEET NO.

Description	REV	DATE	MECH	PROC	CHKD	APPR
Inlet Separator	0	0	0	0	0	0
0	0	0	0	0	0	0
0	0	0	0	0	0	0