

**FORM U-1A MANUFACTURER'S DATA REPORT FOR PRESSURE VESSELS**  
**(Alternative Form for Single Chamber, Completely Shop or Field Fabricated Vessels Only)**

A587074

**As Required by the Provisions of the ASME Boiler and Pressure Vessel Code Rules, Section VIII, Division 1**

1. Manufactured and certified by: Pyramid Process Fabricators; 2308 - 8<sup>th</sup> Street, Nisku, Alberta T9E 7Z2 Canada  
(Name and address of manufacturer)  
Manufactured for: EnCana FCCL Oil Ltd.; 421 - 7<sup>th</sup> Avenue S.W., PO Box 2850, Calgary, Alberta T2P 2S5 Canada  
(Name and address of purchaser)  
3. Location of installation: Foster Creek  
(Name and address)  
4. Type: Horizontal 08-3180-0000 U7552.2 D-08-3180-0000- 2008  
(Horizontal or vertical tank) (Manufacturer's serial Number) (CRN) (Drawing number) (National Board number) (Year built)  
001 Rev. 3

5. The chemical and physical properties of all parts meet the requirements of material specifications of the ASME BOILER AND PRESSURE VESSEL CODE The design, construction, and workmanship conform to ASME Rules, Section VIII, Division 1 2007  
Year

6. Shell SA-516-70N 0.75" 0.125" 78" 20' S/S  
(Material spec. number, grade) (Nominal thickness) (Corr. allow) (Inner diameter) (Length overall)  
7. Seams: Type 1 Full 100% 1150 F 1.5 Type 1 Full 100% 2  
(Long (welded, dbl. singl., lap, butt)) (R.T. (spot or full)) (Eff.) (H.T. temp.) (Time, hr) (Girth (welded, dbl. singl., lap, butt)) (R.T. (spot or full)) (Eff. %) (No. of courses)  
8. Heads: (a) Material SA-516-70N (b) Material SA-516-70N  
(Spec. number, grade) (Spec. number, grade)

	Location (Top, Bottom, Ends)	Minimum Thickness	Corrosion Allowance	Crown Radius	Knuckle Radius	Elliptical Ratio	Conical Apex Angle	Hemispherical Radius	Flat Diameter	Side to Pressure (Convex or Concave)
(a)	End	0.6875"	0.125"	N/A	N/A	2:1	N/A	N/A	N/A	Concave
(b)	End	0.6875"	0.125"	N/A	N/A	2:1	N/A	N/A	N/A	Concave

If removable, bolts used (describe other fastenings)

9. MAWP 273 PSI 15 PSI at max temp. 140 F 140 F  
(Internal) (External) (Internal) (External)  
Min. design metal temp. -20 F at 273PSI Hydro. pneu., or comb. test press. 358 PSI

10. Nozzles, inspection, and safety valve openings:

Purpose (Inlet, Outlet, Drain)	Number	Diameter or Size	Type	Material	Nominal Thickness	Reinforcement Material	How Attached	Location
N1 & N2	2	14" NPS	150 WN	SA-106 Gr. B	0.750"	SA-516-70N	UW-16.1(e)	Shell
N7	1	6" NPS	150 WN	SA-106 Gr. B	0.864"	N/A	UW-16.1(e)	Shell
N3, N6 & N8	3	4" NPS	150 WN	SA-106 Gr. B	0.674"	N/A	UW-16.1(e)	Shell
N4	1	3" NPS	150 WN	SA-106 Gr. B	0.600"	N/A	UW-16.1(e)	Shell
N5A/B, N12	3	2" NPS	150 WN	SA-106 Gr. B	0.343"	N/A	UW-16.1(e)	Shell
N9A/B, N10A/B, N11, N13	6	2" NPS	150 WN	SA-106 Gr. B	0.343"	N/A	UW-16.1(e)	Shell
M1	1	24" NPS	150 WN	SA-106 Gr. B	0.500"	SA-516-70N	UW-16.1(e)	Head

11. Supports: Skirt No Lugs N/A Legs N/A Others Saddles Attached Shell/Weld  
(Yes or No) (No.) (No.) (Describe) (Where and How)

12. Remarks: Manufacturer's Partial Data Reports properly identified and signed by Commissioned Inspectors have been furnished for the following items of the report:

(Name of part, item number, Manufacturer's name and identifying stamp)

Vessel Fabricated To Dwg # D-08-3245-0003-001 Rev.4. Vessel Volume = 751 cu.ft. (21.266 cu.m.). PSV To Be Installed On Nozzle N8.

Vessel Impact Test Exempt per UG 20(f), UCS-66(b)(1)(b), UCS-66 Curve D & Fig. UCS-66 Note (c).

**CERTIFICATE OF SHOP/FIELD COMPLIANCE**

We certify that the statements made in this report are correct and that all details of design, material, construction and workmanship of this vessel conform to the ASME Boiler and pressure Vessel Code, Section VIII, Division 1. "U" Certificate of Authorization Number 37,481

expires May 8, 2011

Date Jan 8/09 Co. Name Pyramid Process Fabricators Signed Rhonda Green  
(Manufacturer) (Representative)

**CERTIFICATE OF SHOP/FIELD INSPECTION**

Vessel constructed by Pyramid Process Fabricators at 2308 - 8<sup>th</sup> Street, Nisku, Alberta T9E 7Z2 Canada

I, the undersigned, holding a valid commission issued by the National Board of Boiler and Pressure Vessel Inspectors and/or the State or Province of Alberta and employed by ABSA

have inspected the component described in this Manufacturer's Data Report on Jan 8, 2009, and state that, to the best of my knowledge and belief, the Manufacturer has constructed this pressure vessel in accordance with ASME Boiler and Pressure Vessel Code, Section VIII, Division 1. By signing this certificate neither the Inspector nor his/her employer makes any warranty, expressed or implied, concerning the pressure vessel this described in this Manufacturer's Data Report. Furthermore, neither the Inspector nor his/her employer shall be liable in any manner for any personal injury or property damage or a loss of any kind arising from or connected with this inspection.

Date Jan 8, 2009 Signed Harold Leake Commissions AB#87  
(Authorized Inspector) [National Board (incl endorsements) State, Prov. and number]