

Corrected copy. A-639935

FORM U-1A MANUFACTURER'S DATA REPORT FOR PRESSURE VESSELS
(Alternative Form for Single Chamber, Completely Shop or Field Fabricated Vessels Only)
As Required by the Provisions of the ASME Boiler and Pressure Vessel Code Rules, Section VIII, Division 1

1. Manufactured and certified by Coral Oilfield Services Inc. 15303-94st. Grande Prairie, AB T8X 0L2 Canada
(Name and address of Manufacturer)
2. Manufactured for Haltech Testing Inc. Box 92 Baytree AB, T0H 0A0 Canada
(Name and address of Purchaser)
3. Location of installation Not Known
(Name and address)
4. Type: Horizontal 4132-02 V9366.21 3968 Rev. 3 10 2014
(Horizontal or vertical, tank) (Manufacturer's serial number) (CRN) (Drawing number) (National Board number) (Year built)
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 2013
Year
- to N/A N/A N/A
[Addenda, if applicable (Date)] (Code Case numbers) [Special Service per UG-120(d)]
6. Shell SA-516-70N 0.5" 0.125" 108" 30" S-S
(Material spec. number, grade) (Nominal thickness) (Corr. Allow.) (Inner diameter) (Length (overall))
7. Seams: Welded, Sngl Full 100 1125F 0.75 Hr Welded, Sngl Full 100 3
(Long. welded, dbl., angl., lap, butt) (R.T. Spot or Full) (Eff. %) (H.T. temp.) (Time, hr) (Girth welded, dbl., angl., lap, butt) (R.T. Spot or Full) (Eff. %) (No. of Courses)
8. Heads: (a) Material SA-516-70N (b) Material SA-516-70N
(Spec. no., grade) (Spec. no., 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	0.5"	0.125"	N/A	N/A	2:1	N/A	N/A	N/A	Concave
(b)	End	0.5"	0.125"	N/A	N/A	2:1	N/A	N/A	N/A	Concave

If removable, bolts used (describe other fastenings)

N/A

9. MAWP 125 PSI 0 PSI at max temp. 300F N/A °F
(Internal) (External) (Internal) (External)
- Min. design metal temp. -50 F °F at 125 PSI Hydro test press. Hydro 1 Hr @ 163 PSI
- Proof test N/A

10. Nozzles, inspection, and safety valve openings:

Purpose (Inlet, Outlet, Drain etc.)	No.	Diameter or Size (NPS)	Type	Material		Nozzle Thickness		Reinforcement Material	Attachment Details		Location (Insp. Open.)
				Nozzle	Flange	Nom.	Corr.		Nozzle	Flange	
Gas Inlet/Outlet	5	4"	RFWN	SA-106 Gr.B	SA-105N	XXH	0.125"	N/A	UW16.1 (D)	Type 1	Shell
PSV, Water/Oil Outlet	4	3"	RFWN	SA-106 Gr.B	SA-105N	XXH	0.125"	N/A	UW16.1 (D)	Type 1	Shell/Head
Sparge, Heater Coil	11	2"	RFWN	SA-106 Gr.B	SA-105N	XXH	0.125"	N/A	UW16.1 (D)	Type 1	Head
Sight Glass, PI, Spare	12	1"	RFWN	SA-106 Gr.B	SA-105N	XXH	0.125"	N/A	UW16.1 (D)	Type 1	Head
Manway	2	20"	RFWN	SA-106 Gr.B	SA-105N	STD	0.125"	SA-516-70N	UW16.1 (H)	Type 1	Shell
N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

11. Supports: Skirt No Lugs 2 Legs N/A Other Saddles 2 Attached Shell, Welded
(Yes or no) (Number) (Number) (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)

- Impact test Exempt as per UCS-66a, UCS-66b, UCS 67a(3)
- Heater Coil: MAWP 150 PSI @ 350F, MAEWP 125PSI, MDMT -50F @ 150 PSI, C.A 1/16", 2" 150 RFSO SA-105N Flange
- 2" NPS XH SA-106B Pipe
- Vessel Capacity 2122FT3 (60M3)
- Construction DWG NO. 3968-01 Rev.2
- 1 1/8" x 6 1/4" Studs c/w 2 Nuts Each SA-193-2HM for Both M1A and M1B

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 45,860 expires 09/17, 2016

Date 06/05/2014 Co. name Coral Oilfield Services Inc. Signed Ryan O'Toole
(Manufacturer) (Representative)

CERTIFICATE OF SHOP/FIELD INSPECTION

Vessel constructed by Coral Oilfield Services Inc at 15303-94st Grande Prairie AB, T8X 0L2
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 MAY 06, 2014, 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 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 MAY 23/14 Signed [Signature]
(Inspector)

Commissions NB-14773; AB-430A
[National Board (incl endorsements), State, Province and number]

COIL



CERTIFIED BY
CORAL
OILFIELD SERVICES

(780) 402-9800
www.coraloilfield.com

MAWP 150 PSI AT 350 °F

MAEWP 125 PSI AT 350 °F

MDMT -50 °F AT 150 PSI

SERIAL NO. 4132-02 YEAR BUILT 2014

CRN

63995 35

NB
10



HT
W
RT1

CERTIFIED BY
CORAL
OILFIELD SERVICES

(780) 402-9800
www.coraloilfield.com

MAWP 125 PSI AT 300 °F

MAEWP — PSI AT — °F

MDMT -50 °F AT 125 PSI

SERIAL NO. 4132-02 YEAR BUILT 2014

CRN V9366.21

TRAVEL SHEET

DO NOT START CONSTRUCTION WITHOUT AI REVIEW

TRAVEL SHEET REVISION NO.:

REVIEW: *AMC*

REVIEW DATE: *Feb 05, 2014*

SERIAL NO.: 4132-02

JOB NO.: 4132

VESSEL TYPE: Separator

DRAWING NO.: 3968-01

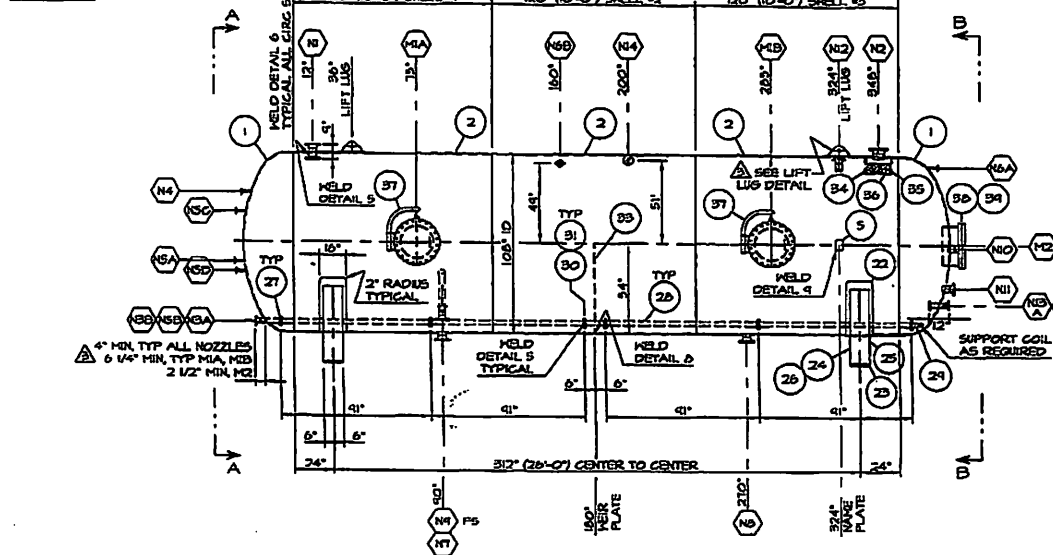
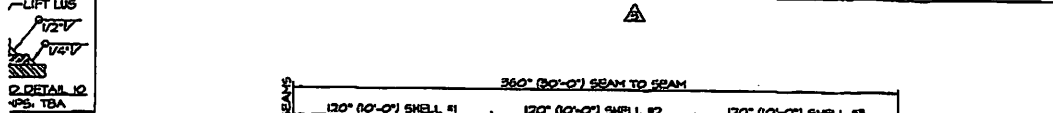
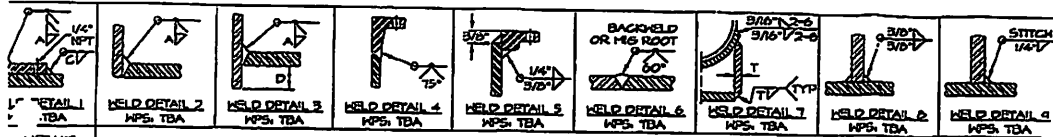
DWG. REVISION NO.: 2

TRAVEL SHEET INITIATION BY: Ryan O'Toole

Seq.	Item	Comments	Q.C.I.	Date	A.I. Hold Points	A.I.	Date	Owner	Date
1.	Calculations in File		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
2.	Release of App'd Dwg.		<i>R</i>	<i>14/04/14</i>					
3.	Materials Examined		<i>R</i>	<i>14/04/14</i>					
4.	Heat Numbers Recorded		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
5.	MTRs Checked		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
6.	WPS(s) Checked		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
7.	Welder(s) Qualified		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
8.	Thicknesses Verified & Recorded		<i>R</i>	<i>14/04/14</i>					
9.	Shell(s) & Head(s) Fit-up Inspection		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
10.	Nozzles & Fittings Fit-up Inspection		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
11.	Nozzle Orientation		<i>R</i>	<i>14/04/14</i>					
12.	Nozzle & Flange Rating Checked		<i>R</i>	<i>14/04/14</i>					
13.	Impact Tests		<i>N/A</i>	<i>N/A</i>	<i>N/A</i>	<i>/</i>			
14.	Internals Checked		<i>R</i>	<i>14/04/14</i>					
15.	Final Internal Inspection	Shell Side	<i>R</i>	<i>14/04/14</i>	<i>*</i> <i>*</i>	<i>AMC</i>	<i>Apr 15/14</i>		
		Tube Side	<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 15/14</i>		
16.	Weld Sizes Checked		<i>R</i>	<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 15/14</i>		
17.	Welder I.D. Checked		<i>R</i>	<i>14/04/14</i>					
18.	Final External Inspection		<i>R</i>	<i>14/04/14</i>					
19.	Radiography			<i>14/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 15/14</i>		
20.	Other N.D.E.								
21.	Final Ext. Prior to P.W.H.T.		<i>R</i>	<i>14/04/14</i>	<i>*</i> <i>*</i>	<i>AMC</i>	<i>Apr 15/14</i>		
22.	PWHT Chart Checked		<i>R</i>	<i>24/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 24/14</i>		
23.	Hydrostatic Test	Shell Gauge #							
		Side Tube Gauge #	<i>R</i>	<i>24/04/14</i>	<i>*</i> <i>*</i>	<i>AMC</i>	<i>Apr 24/14</i>		
24.	CRN Drawing	CRN#	<i>R</i>	<i>24/04/14</i>	<i>*</i>	<i>AMC</i>	<i>Apr 14/14</i>		
25.	N.C.R. #		<i>N/A</i>	<i>N/A</i>					
26.	Nameplate Stamping		<i>R</i>	<i>6/5/14</i>	<i>*</i> <i>*</i>	<i>AMC</i>	<i>May 06/14</i>		
27.	Manuf. Data Report Completed & Verified		<i>R</i>	<i>6/5/14</i>	<i>*</i> <i>*</i>	<i>AMC</i>	<i>May 06/14</i>		
28.	Nameplate Installation		<i>R</i>						

The Authorized Inspector shall be presented with the Travel Sheet prior to construction so that he can designate additional inspection points and/or Hold Points. Any revisions shall be marked with a delta symbol with revision number and described at the bottom of this page.

* Denotes an A.I. Inspection Point ** Denotes an A.I. Hold Point



GENERAL NOTES

OIL DESIGN NOTES

DESIGN & FABRICATE TO: ASME SECTION VIII, DIVISION 1, 2010 EDITION, 2011 ADDENDA
 MAXIMUM ALLOWABLE WORKING PRESSURE
 INTERNAL MAMP: 150 PSIG
 EXTERNAL MAMP: 125 PSIG
 DESIGN TEMPERATURE: 350° F
 MINIMUM DESIGN METAL TEMPERATURE (MDMT): -50° F AT 150 PSIG
 T TESTS: EXEMPT PER UCS-66G, UCS-66B
 JOGRAPHY: NONE PER UH-11c
 INT PER UCS-56: NOT REQUIRED
 HYDROSTATIC TEST PRESSURE: 183 PSIG MINIMUM
 CORROSION ALLOWANCE (INTERNAL): 0"
 CORROSION ALLOWANCE (EXTERNAL): 1/16"
 FLUID: EXPANSIBLE FLUID

1. QUALITY CONTROL PROGRAM NUMBER: ACP-1522
2. WELDING PROCEDURE REGISTRATION NUMBER: WP-31502
3. CAPACITY: 2222 FT³
4. SERVICES: HYDROCARBONS
5. EXPOSED INSIDE OR OUTSIDE EDGES OF NOZZLES OR OPENINGS SHALL HAVE AN 1/8" MINIMUM RADIUS.
6. SURFACE PREPARATION: HAND TOOL CLEAN (MIN)
7. PRIME AND PAINT: AS PER CLIENT SPECIFICATIONS
8. ALL BOLT HOLES TO STRADDLE CENTERLINES
9. ALL REPAIRS OR REPAIRS IF MORE THAN ONE PIECE IS USED, TO HAVE A MAXIMUM 1/4" NOT REPAIR HOLE. ON THE SHELL, THE WELD IN A TWO-PIECE REPAIR SHALL BE LOCATED IN THE CIRCUMFERENTIAL DIRECTION. CLEAN AND COVER ALL OPENINGS FOR SHIPMENT.
10. USE WELDING PROCEDURE (WPS) FOR ALL TACK WELDS.
11. CRN DRAWINGS: 34604 REV 3, 34606-2 REV 3
12. CRN CALCULATIONS: 34604CR-3, 34606CR-1

DESIGN NOTES

DESIGN & FABRICATE TO: ASME SECTION VIII, DIVISION 1, 2010 EDITION, 2011 ADDENDA
 MAXIMUM ALLOWABLE WORKING PRESSURE (MAWP): 125 PSIG
 DESIGN TEMPERATURE: 300° F
 MINIMUM DESIGN METAL TEMPERATURE (MDMT): -50° F AT 125 PSIG
 IMPACT TESTS: EXEMPT PER UCS-66G, UCS-66B
 RADIOGRAPHY - LONG SEAMS: FULL PER UH-11b
 RADIOGRAPHY - CIRC SEAMS: SPOT PER UH-11cSD (RT-2) (NOTE E)
 FMT PER UCS-56: NOT REQUIRED (NOTE F)
 HYDROSTATIC TEST PRESSURE: 163 PSIG
 CORROSION ALLOWANCE: 1/8"
 WEIGHT EMPTY: 21,000 LBS
 WEIGHT FULL OF WATER: 160,000 LBS

CONNECTION SCHEDULE										
MARC	SIZE	SCH	CLASS	TYPE	SERVICE	WELD	A	B	C	D ITEM NO'S
N1	4"	X001	150	RFWN	INLET	3, 4	3/8"	-	-	3/8" 9, 14, 10
N2	6"	160	150	RFWN	GAS OUTLET	3, 4	3/8"	-	-	1" 13, 14
NCAB	2"	X001	150	RFWN	COIL	3, 4	1/2"	-	-	1/2" 7, 17
N4	1"	X001	150	RFWN	PI	2, 4	3/8"	-	-	6, 16
NSAD	1"	X001	150	RFWN	SOLIDS LG	2, 4	3/8"	-	-	6, 16
NSAB	1"	X001	150	RFWN	LS / SPARE	2, 4	3/8"	-	-	6, 16
N7	4"	X001	150	RFWN	SOLIDS DRAIN	2, 4	3/8"	-	-	9, 14
N8	4"	X001	150	RFWN	LIQUIDS DRAIN	2, 4	3/8"	-	-	9, 14
N9	5"	X001	150	RFWN	LIQUID OUTLET	2, 4	3/8"	-	-	8, 18, 21
N10	5"	X001	150	RFWN	HC LC	2, 4	3/8"	-	-	8, 18
N11	5"	X001	150	RFWN	WATER LC	2, 4	3/8"	-	-	8, 18
N12	5"	X001	150	RFWN	PSV	2, 4	3/8"	-	-	8, 18
NSA-C	2"	X001	150	RFWN	SPARSE	3, 4	1/2"	-	-	1/2" 7, 17
N14	2"	X001	150	RFWN	SPARE	2, 4	1/2"	-	-	7, 17
MAAB	20"	STD	150	RFWN	MANWAY	1, 4	3/8"	-	3/8"	3, 11, 12, 20
M2	20"	160	150	RF MS	MANWAY	3	3/8"	-	1/8"	12, 15

CRN: V9366.2

ALBERTA BOILERS SAFETY ASSOCIATION
 PROVINCE OF ALBERTA
 SAFETY CODES ACT
 REG. NO. 3968 SNTS 1.2 REV 3 AS NOTED.
 DNR. No. 3968 SNTS 1.2 REV 3 AS NOTED.
 VESSEL INT. 862 149/96
 COIL INT/EXT 1034/862 177/96
 OCT 22 2012
 F. SCHERPENISSE

CANADIAN REGISTRATION NUMBER				
3	12-10-10	HD-6, NOTES, OUTSIDE PROJECTION	P.J.D.	R.J.
2	12-04-21	REVISE NOTE 12, COIL IMPACT TESTS	P.J.D.	R.J.
1	12-08-31	REVISED, ISSUED FOR REGISTRATION	P.J.D.	R.J.
0	12-08-21	ISSUED FOR APPROVAL	P.J.D.	R.J.
NO.	DATE	REVISION	BY	APP

CORAL OILFIELD SERVICES INC.
 BOX 2160, 15009 - 44 STREET
 GRANDE PRANEE, AB T0X 0L2
 TELEPHONE (180) 882-4800 FAX (180) 882-6868

CLIENT: 12-08-13
 DATE: 3460
 BOD NO.: 3460
 JOB NO.:
 SCALE: NTS
 DRAWN BY: P.J.D.
 CHECKED BY: R.J.
 APP BY: P.J.D.

SEPARATOR
 108" ID x 30'-0" 5/5
 125 PSIG AT -50° / 300° F
 DWS NO. SHEET 1 OF 2
 3460
 REV. 3

WELDING PROCEDURE SPECIFICATION NO.: COS-2 (Rev. 1)
WELDING PROCEDURE QUALIFICATION RECORD NO.(S): COS-2-1, COS-2-2,
COS-7-2

QUALIFIED FOR

Base Metal (Typical): Std. Appl.: P1 to P1
Notch Appl.: P1 Groups 1 & 2 to P1 Groups 1 & 2
(SA 333 Gr. 6, SA 350 Gr. LF2, SA 420 WPL6, SA 516 Gr. 70, etc.)
Process(es): SMAW Weld Types: GROOVE & FILLET
Position: ALL POSITIONS Diameter: ALL DIAMETERS
Filler Metal: Std. Appl.: E6010, E7018, E7018-1
Notch Appl.: E6010, E7018-1

BASE METAL CONDITIONS & GROOVE THICKNESS RANGE QUALIFIED:

BASE METAL THICKNESS RANGE - ASME SECTION IX

STANDARD APPLICATIONS WITH P.W.H.T. 1.6 to 203 mm (0.062 to 8.00 in.) inclusive

NOTCH TOUGHNESS APPLICATIONS TO -46°C (-50°F) WITH P.W.H.T.

3.2 to 203 mm (0.125 to 8.00 in.) inclusive

COMBINED DEPOSITED WELD METAL THICKNESS

ASME B31.1 & B31.3

203 mm (8.00 in.) maximum

ASME SECT. VIII, DIV.1

203 mm (8.00 in.) maximum

CSA Z662 FABRICATION

203 mm (8.00 in.) maximum

WQA

SAFETY CODES ACT - PROVINCE OF ALBERTA
WELDING PROCEDURE

Reg. No. WP 3150.2
Spec. No. COS-2 (REV. 1)
Weld Process SMAW
Matl. Gr. P No. 1 Gr 1+2 to P No. 1 Gr 1+2
Elec. Gr. F No. 3+4 A No. 1
Th. Qual. For 203 mm P.W.H.T. YES
Min. Th. Qual. 3.2 mm, CVN -46°C

Yr. 12. Mo. 8 Day 1 signed [Signature]
R. ROSEBERG, P.ENG.
WELDING SPECIALIST

PROVINCIAL REGISTRATION

WELDING PROCEDURE SPECIFICATION NO.: COS-9

WELDING PROCEDURE QUALIFICATION RECORD NO.(S): COS-7-1, COS-7-2

QUALIFIED FOR

Base Metal (Typical): Std. Appl.: P1 to P1
Notch Appl.: P1 Groups 1 & 2 to P1 Groups 1 & 2
(SA 333 Gr. 6, SA 350 Gr. LF2, SA 516 Gr. 70, etc.)
Process(es): GMAW / FCAW Weld Types: GROOVE & FILLET
Position: ALL POSITIONS Diameter: ALL DIAMETERS
Filler Metal: GMAW: ER70S-6 FCAW: E71T-12MJ

BASE METAL CONDITIONS & GROOVE THICKNESS RANGE QUALIFIED:

STANDARD APPLICATIONS WITH P.W.H.T.

NOTCH TOUGHNESS APPLICATIONS TO -46°C (-50°F) WITH P.W.H.T.

BASE METAL THICKNESS RANGE

ASME SECTION IX

4.8 to 203 mm (0.188 to 8.00 in.) inclusive

COMBINED DEPOSITED WELD METAL THICKNESS

ASME B31.1 & B31.3

203 mm (8.00 in.) maximum

ASME SECT. VIII, DIV.1

203 mm (8.00 in.) maximum

CSA Z662 FABRICATION

203 mm (8.00 in.) maximum

AXA
SAFETY CODES ACT - PROVINCE OF ALBERTA
WELDING PROCEDURE

Reg. No. WP 3150.2
Spec. No. COS-9
Weld Process GMAW / FCAW
Matl. Gr. P No. 1 Gr. 1+2 to P No. 1 Gr. 1+2
Elec. Gr. F No. 6+6 A No. 1
Th. Qual. For 4.8 to 203 mm P.W.H.T. YES
CVA - 46°C

Yr. 12 No. 8 Day 2 Signed R. ROSEBERG, P.E.N.G.
WELDING SPECIALIST

PROVINCIAL REGISTRATION

WELDING PROCEDURE SPECIFICATION NO.: COS-11

WELDING PROCEDURE QUALIFICATION RECORD NO.(S): COS-11-1, COS-7-2

QUALIFIED FOR

Base Metal (Typical): Std. Appl.: P1 to P1
Notch Appl.: P1 Groups 1 & 2 to P1 Groups 1 & 2
(SA 333 Gr. 6, SA 350 Gr. LF2, SA 420 WPL6, SA 516 Gr. 70, etc.)
Process(es): GMAW / SMAW / SAW Weld Types: GROOVE & FILLET
Position: GMAW & SMAW: ALL POSITIONS SAW: FLAT & HORIZONTAL
Diameter: ALL DIAMETERS
Filler Metal: Std. Appl.: GMAW: ER70S-6 SMAW: E7018, E7018-1 SAW: F7PX-EM14K
Notch Appl.: GMAW: ER70S-6 SMAW: E7018-1 SAW: F7P6/8-EM14K

BASE METAL CONDITIONS & GROOVE THICKNESS RANGE QUALIFIED:

BASE METAL THICKNESS RANGE - ASME Section IX

STANDARD APPLICATIONS WITH P.W.H.T. 4.8 to 203 mm (0.188 to 8.00 in.) inclusive

NOTCH TOUGHNESS APPLICATIONS TO -46°C (-50°F) WITH P.W.H.T.
15.9 to 203 mm (0.625 to 8.00 in.) inclusive

COMBINED DEPOSITED WELD METAL THICKNESS

ASME B31.1 & B31.3

203 mm (8.00 in.) maximum

ASME SECT. VIII, DIV.1

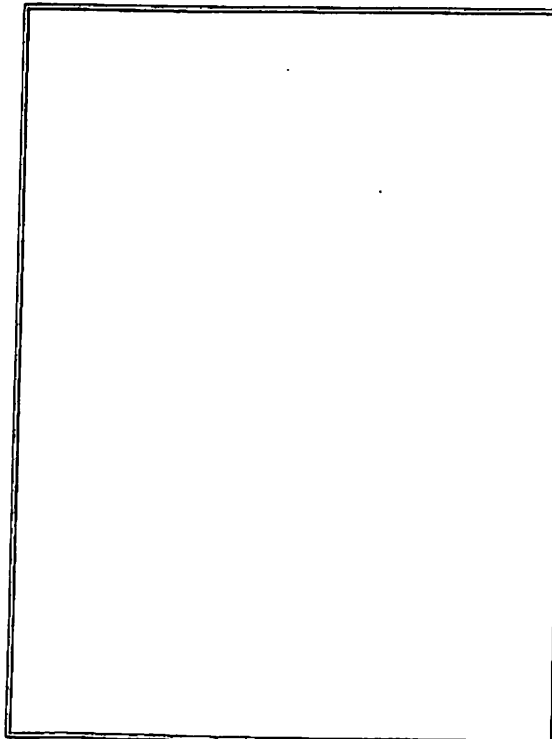
203 mm (8.00 in.) maximum

CSA Z662 FABRICATION

203 mm (8.00 in.) maximum

AXA	
SAFETY CODES ACT - PROVINCE OF ALBERTA	
WELDING PROCEDURE	
Reg. No. WP	<u>3150.2</u>
Spec. No.	<u>COS-11</u>
Weld Process	<u>GMAW / SMAW / SAW</u>
Matl. Gr. P No.	<u>1 Gr 1+2 to P No. 1 Gr 1+2</u>
Ele. Gr. F No.	<u>6+4+6</u> A No. <u>1</u>
Th. Qual For	<u>203 mm P.W.H.T.</u> <u>YES</u>
Min Th. Qual	<u>15.9 mm, CVL - 46°C</u>
vr <u>12</u> mo <u>8</u> Day <u>1</u> Signed <u>R. ROSEBERG, P.ENG.</u>	
WELDING SPECIALIST	

PROVINCIAL REGISTRATION





the pressure equipment safety authority

PRESSURE PIPING CONSTRUCTION AND TEST DATA REPORT

In accordance with the provisions of the PESR Section 31(1)

Shop Construction ☒;Field Construction ☐;Final Data Report ☒;Partial Data Report ☐

(from one ABSA- authorized Contractor to another ABSA- authorized Contractor).

Complete both sides of this Form

1. Constructed By: Coral Oilfield Services Inc. Owner's Job No: 4132-02
 (Name of ABSA authorized primary contractor or subcontractor)

15303 94 St. Grande Prairie AB

(Address)

Certificate of Authorization Permit No. AQP-1522 Expiry Date: September 6, 2016

2. Constructed For: Haltech Testing Inc.
 (Name of primary contractor if different from above)

Box 92 Baytree AB T0H 0A0

(Address)

Certificate of Authorization Permit No. AQP-N/A Expiry Date: N/A

(Required when the primary contractor undertakes some/all of the quality functions, e.g., NDE, PWHT, Tie-in, fabrication, hydro test, final assembly etc.)

3. Owner: Haltech Testing Inc. Box 92 Baytree AB T0H 0A0
 (Name and address)

Not Known

(Location of installation)

Certificate of Authorization Permit No. AQP-N/A Expiry Date: N/A

(Required when the owner undertakes some/all of the quality functions, e.g., NDE, PWHT, Tie-in, fabrication, hydro test, final assembly etc.)

4. Piping Design Alberta Registration No.: PP-N/A
 (Required if aggregate piping volume is over 0.5m³)

5. Design Responsibility: Owner ☐; Contractor ☒

6. WP No.: WP-3150.2; Company: Coral Oilfield Services Inc. Owner's WP No. (If used): WP-N/A
 (Alberta Registration No.) (Alberta Registration No.)

WPS No(s). used: COS-1(Rev.1); Owner's WPS No(s). (If used): N/A

7. Code: ASME B31.1 Non Boiler External Piping ☐; ASME B31.1 Boiler External Piping ☐;
 B31.5 ☐; B31.9 ☐; CSA Z662 Steam Pipelines ☐;
 ASME B31.3 ☒ - Service Category: Normal ☐, D ☐, M ☒, High Pressure ☐; Severe Cyclic Condition ☒
 High Purity ☐

Drawing No. Rev. No. Line No.	Fluid (Air/Stm. Etc.)	Des. Press. PSI	Des. Temp. °F (Max. & Min.)	Pressure Test PSI	Test Medium	Pipe Mat'l Spec. & Grade	C.A. mm	Pipe NPS & Schedule	Flange Material & Rating	PWHT/ Preheat Temp. °F	NDE
Control#1	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#2	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#3	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#5	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" Sch 40	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#6	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#7	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT

Control#8	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#9	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#10	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#11	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#12	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#13	W.O.G.	125	-50	188	Water	N/A	N/A	3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#14	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" Scch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#15	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#16	W.O.G.	125	-50	188	Water	N/A	N/A	4", 3" Sch 80	N/A	N/A	100%VT 100%MT 100%RT
Control#17	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#18	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#19	W.O.G.	125	-50	188	Water	N/A	N/A	3" XH	N/A	N/A	100%VT 100%MT 100%RT
Control#20	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#21	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#22	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#24	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#25	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#26	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#27	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#28	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#29	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#30	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#31	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#32	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT

Control#33	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#34	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#35	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#36	W.O.G.	125	-50	188	Water	N/A	N/A	3" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#37	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#38	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#39	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#40	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#41	W.O.G.	125	-50	188	Water	SA33-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#42	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#43	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#44	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#45	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#46	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#47	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#48	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#49	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#50	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" STD	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#51	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#52	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#53	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#54	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#55	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#56	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT

Control#57	W.O.G.	125	-50	188	Water	SA333-6	N/A	2" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#64	W.O.G.	125	-50	188	Water	N/A	N/A	2" XH	N/A	N/A	100%VT 100%MT 100%RT
Control#65	W.O.G.	125	-50	188	Water	N/A	N/A	2" XH	N/A	N/A	100%VT 100%MT 100%RT
Control#66	W.O.G.	125	-50	188	Water	SA333-6	N/A	4", 3" Sch 80	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#67	W.O.G.	125	-50	188	Water	N/A	N/A	4" Sch 80	N/A	N/A	100%VT 100%MT 100%RT
Control#68	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#69	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#70	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#71	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#72	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#73	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#74	W.O.G.	125	-50	188	Water	SA333-6	N/A	4" Sch 160	SA-350-LF2 CL 150	N/A	100%VT 100%MT 100%RT
Control#76	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#77	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#78	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#79	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#80	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#81	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#82	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#83	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#84	W.O.G.	125	-50	188	Water	N/A	N/A	4", 3" Sch 80	N/A	N/A	100%VT 100%MT 100%RT
Control#85	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#86	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT
Control#87	W.O.G.	125	-50	188	Water	N/A	N/A	2" XS	SA-105-N CL150	N/A	100%VT 100%MT 100%RT

Control#88	W.O.G.	125	-50	188	Water	N/A	N/A	4" STD	N/A	N/A	100%VT 100%MT 100%RT
Control#89	W.O.G.	125	-50	188	Water	SA333-6	N/A	3" Sch 80	N/A	N/A	100%VT 100%MT 100%RT

Partial Data Reports certified by sub-contractors are listed below and attached to this Data Report ☐

No.	Line No.	Spool No.	Dwg. No. (with Rev. No.)	Sub-contractor (Name)	AQP No. (if from Alberta)	Expiry (if from Alberta)

Remarks: For partial data report provide information about the code work that was not completed by the subcontractor (e.g., hydrostatic test, PWHT etc.). For final data report provide information about the code work that was not completed by subcontractors and subsequently completed by the primary contractor (e.g., hydrostatic test of entire assembly, PWHT etc.)

Endorse certificate 'A' or 'B'	
A. CERTIFICATE OF COMPLIANCE Signed by the subcontractor when supplying this certificate as a Partial Data Report We certify that the statements in this Data Report are correct and that materials, construction and workmanship of the piping fabrication conform to the registered quality system and the applicable Piping code(s). Date: _____ _____ Contractor _____ Print Authorized Representative's Name _____ Signature This certificate is not valid unless it forms part of a Final Data Report signed by Primary Contractor	B. CERTIFICATE OF COMPLIANCE Signed by the primary contractor when supplying this certificate as a Final Data Report We certify that the statements in this Data Report are correct and that piping job no. <u>4132-02</u> described in this Data Report was constructed in accordance with the Province of Alberta Safety Codes Act and Regulations, and applicable ASME Piping Code(s). Date: <u>April 22, 2014</u> <u>Coral Oilfield Services Inc.</u> _____ Contractor <u>Ryan O'Toole</u> _____ Print Authorized Representative's Name _____ Signature

CERTIFICATE OF INSPECTION	
I, the undersigned, employed by _____ have verified that all required examination and testing has been completed, and inspected the piping described in this construction data report to the extent necessary to be satisfied that it conforms to all applicable examination requirements of the Code and of the engineering design, and state that, to the best of my knowledge and belief, the contractor has constructed this piping in accordance with the Alberta Safety Codes Act and Regulations. By signing this certificate neither the inspector nor his or her employer makes any warranty, expressed or implied, concerning the piping described in this construction data report. Furthermore, neither the inspector nor his or 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: _____ _____ Owner's Inspector Name (please print) _____ Owner's Inspector Signature:	Date: _____ _____ ABSA Safety Codes Officer (please print) (BOILER EXTERNAL PIPING ONLY) _____ ABSA Safety Codes Officer's Signature

Current version of this Form may be obtained from www.absa.ca