ONTARIO ENERGY BOARD
EB-2009-0339

SEPTEMBER 2009

TRIBUTE RESOURCES INC.

BAYFIELD RESOURCES INC.

Huron Bayfield Gas Storage Project
Bayfield Pool Binder
Binder #4

Tab A

Ontario Energy Board
EB 2009-0339

Index Binder #4

Bayfield Gas Storage Pool

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ONTARIO ENERGY BOARD

IN THE MATTER OF the Ontario Energy Board Act, 1998, S.O. 1998, c.15, Schedule B; and in particular sections 36(1), 38(1), 40(1), 90(1), thereof;

AND IN THE MATTER OF an Application by Tribute Resources Inc. and Bayfield Resources Inc., on behalf of Huron Bayfield Limited Partnership, for an Order designating the area known as the Bayfield Pool , in the Geographic Township of Stanley, Municipality of Bluewater, County of Huron, as a gas storage area;

AND IN THE MATTER OF an Application by Tribute Resources Inc. and Bayfield Resources Inc., on behalf of Huron Bayfield Limited Partnership, for authority to inject gas into, store gas in and remove gas from the area designated as the Bayfield Pool, and to enter into and upon the lands in the said area and use the said lands for such purposes;

AND IN THE MATTER OF an Application by Tribute Resources Inc. and Bayfield Resources Inc., on behalf of Huron Bayfield Limited Partnership, to the Ministry of Natural Resources for a license to drill four (4) wells in the said area.

Huron Bayfield Gas Storage Project – Bayfield Pool

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1. Tribute Resources Inc. and Bayfield Resources Inc., on behalf of Huron Bayfield Limited Partnership, a limited partnership formed under the laws of Ontario (hereinafter referred to as the "Applicant") seeks to designate and develop a natural gas reservoir as a natural gas storage pool for service commencing in 2012 in order to meet market demand for underground natural gas storage.

2. The Applicant hereby applies to the Ontario Energy Board (hereinafter referred to as the "Board") pursuant to section 36(1) of the *Ontario Energy Board Act, 1998*, S.O. 1998, c. 15, Schedule B (hereinafter referred to as the "Act"), for an Order designating the area containing a gas reservoir known as the Bayfield Pool located in Lots 7, 8 and 9, of Bayfield Road North Concession; and Lots 7, 8 and 9, of Bayfield Road South Concession, in the geographic Township of Stanley, in the Municipality of Bluewater, in the County of Huron, as a designated gas storage area (hereinafter referred to as the "Bayfield Pool").

3. The Applicant further applies to the Board pursuant to section 38(1) of the Act for authority to inject gas into, store gas in and remove gas from the Bayfield Pool, and enter into and upon the lands in the area for such purposes.

4. Pursuant to section 40(1) of the Act, the Applicant seeks a favourable report from the Board to the Ministry of Natural Resources to whom application has been made for a license to drill four (4) injection/withdrawal wells within the proposed designated storage area (hereinafter referred to as the "DSA") of the Bayfield Pool.

5. The Applicant requests such further or other related relief as the Applicant may request or as the Board may deem appropriate pursuant to the Act.

6. Attached hereto as Schedule A, is the Metes and Bounds Description of Bayfield for which designation is sought.

7. Attached hereto as Schedule B-1 is a map entitled Huron Bayfield Gas Storage Project showing the general location of the proposed Bayfield Pool DSA. Schedule B-2 and B-3 are maps showing the Petroleum and Natural Gas Leases and the Gas Storage Leases respectively within the Bayfield pool. The proposed well locations are shown on Schedule B-4 titled Bayfield Well Bores.

8. Attached hereto as Schedule C, is a list of the parties who are affected by the Application for designation and development of the Bayfield Pool, including the owners of property within the proposed Pool DSAs and the owners of property adjacent to the proposed Pool DSAs.

9. In order to meet an in-service date as early as April 2012 for the Bayfield Pool, the Applicant anticipates that commitments for project materials will commence as early as July 2010 and will escalate throughout the remainder of that year. The Applicant therefore respectfully requests the Board's timely approval of this Application by June 30, 2010.

Dated at the City of London, Ontario this 21st day of September, 2009.

On behalf of Tribute Resources Inc. and Bayfield Resources Inc.

Jane Lowrie
President

Comments and all communications respecting this Application should be directed to:

Mr. Peter Budd, LLB
Budd Energy Inc.
166 High Park Ave.,
Toronto, Ontario M6P 2S4
e-mail: peterbbudd@rogers.com
Telephone: (416) 948-1334
Facsimile: (519) 657-4296

Mr. William Blake, Vice President - Operations
Tribute Resources Inc.
309-D Commissioners Road West
London, Ontario N6J 1Y4
e-mail: wblake@tributeresources.com
Telephone: (519) 657-2151
Facsimile: (519) 657-4296

Mr. C. A. Lewis
Giffen and Partners
465 Waterloo Street
London, Ontario N6B 1Z4
e-mail: lewis@giffens.com
Telephone: (519)679-4700
Facsimile: (519) 432-8003

Metes and Bounds Description of the Proposed Boundary of the Bayfield Pool Designated Storage Area in the geographic Township of Stanley, Municipality of Bluewater, County of Huron

ALL AND SINGULAR that certain parcel or tract of land in the geographic Township of Stanley, in the Municipality of Bluewater, in the County of Huron, Province of Ontario, being composed of part of Lots 7, 8 and 9, of Bayfield Road North Concession and Lots 7, 8 and 9 of Bayfield Road South Concession, which may be more particularly described as follows:

COMMENCING at the Southeast angle of Lot 9, Bayfield Road North Concession;

THENCE: Northerly along the Easterly limit of Lot 9, Bayfield Road North Concession, a distance of 902.92m, more or less, to a point;

THENCE: Westerly parallel to the Southerly limit of said Lot 9 to a point in the Easterly limit of Lot 8, Bayfield Road North Concession;

THENCE: Northerly along the Easterly limit of Lot 8, Bayfield Road North Concession, a distance of 451.46m, more or less, to a point;

THENCE: Westerly parallel to the Southerly limit of Lots 8 and 7, Bayfield Road South Concession, to a point in the Westerly limit of said Lot 7;

THENCE: Southerly along the Westerly limit of Lot 7, Bayfield Road North Concession to the Southwesterly angle of said Lot 7;

THENCE: Southerly in a straight line to the point in the Northerly limit of Lot 7, Bayfield Road South Concession, at the line dividing the Westerly half and the Easterly half of said Lot 7;

THENCE: Southerly along the last mentioned limit to a point thereupon, distance 1506.76 m, more or less, measured Northerly therealong from the Southerly limit of Lot 7;

THENCE: Easterly parallel to the Southerly limit of Lot 23, Concession XI to a point in the Westerly limit of Lot 9, Bayfield Road South Concession;

THENCE: Southerly along the Westerly limit of Lot 9, South of Bayfield Road, a distance of 804.60m more or less, measured Northerly therealong from the Southerly limit of Lot 23, Concession XI;

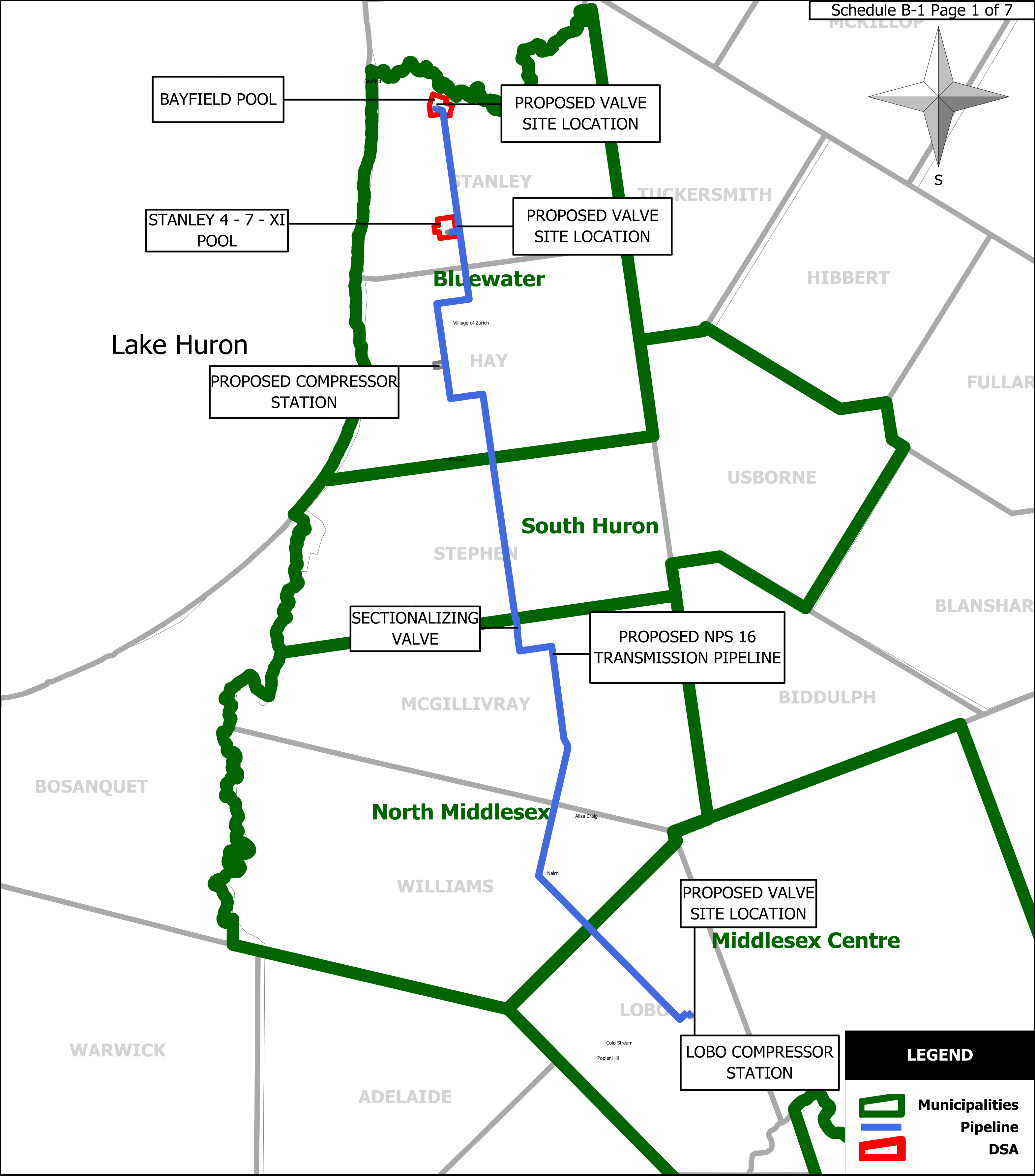
THENCE: Easterly parallel to the Southerly limit of Lot 9, South of Bayfield Road;

THENCE: Northerly along the Easterly limit between Lot 9, South of Bayfield Road to the Northeasterly angle of said Lot 9;

THENCE: Northerly in a straight line to the point of commencement.

Corresponding to the MNR tract as described below:

Tracts		
7,8,9	7,8	NBR
8,9	9	NBR
1,4	7	SBR
2,3,4	8	SBR
1,2	9	SBR

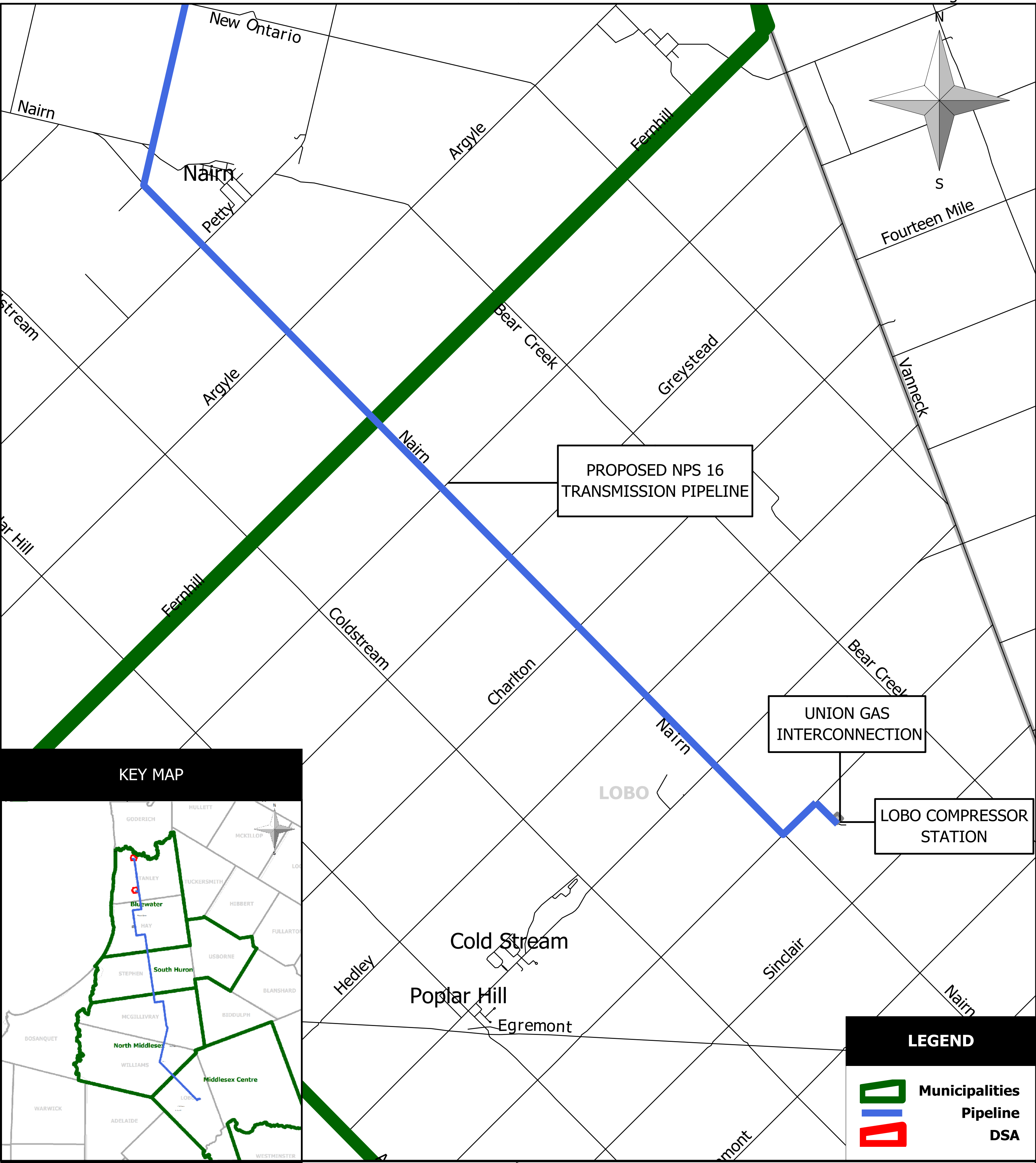


REVISIONS

NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

DRAWN BY E. Funston	DATE 09/01/2009	SCALE 1:380,000
CHECKED BY	DATE	
APPROVED BY	DATE	SHEET 1 of 7



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NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

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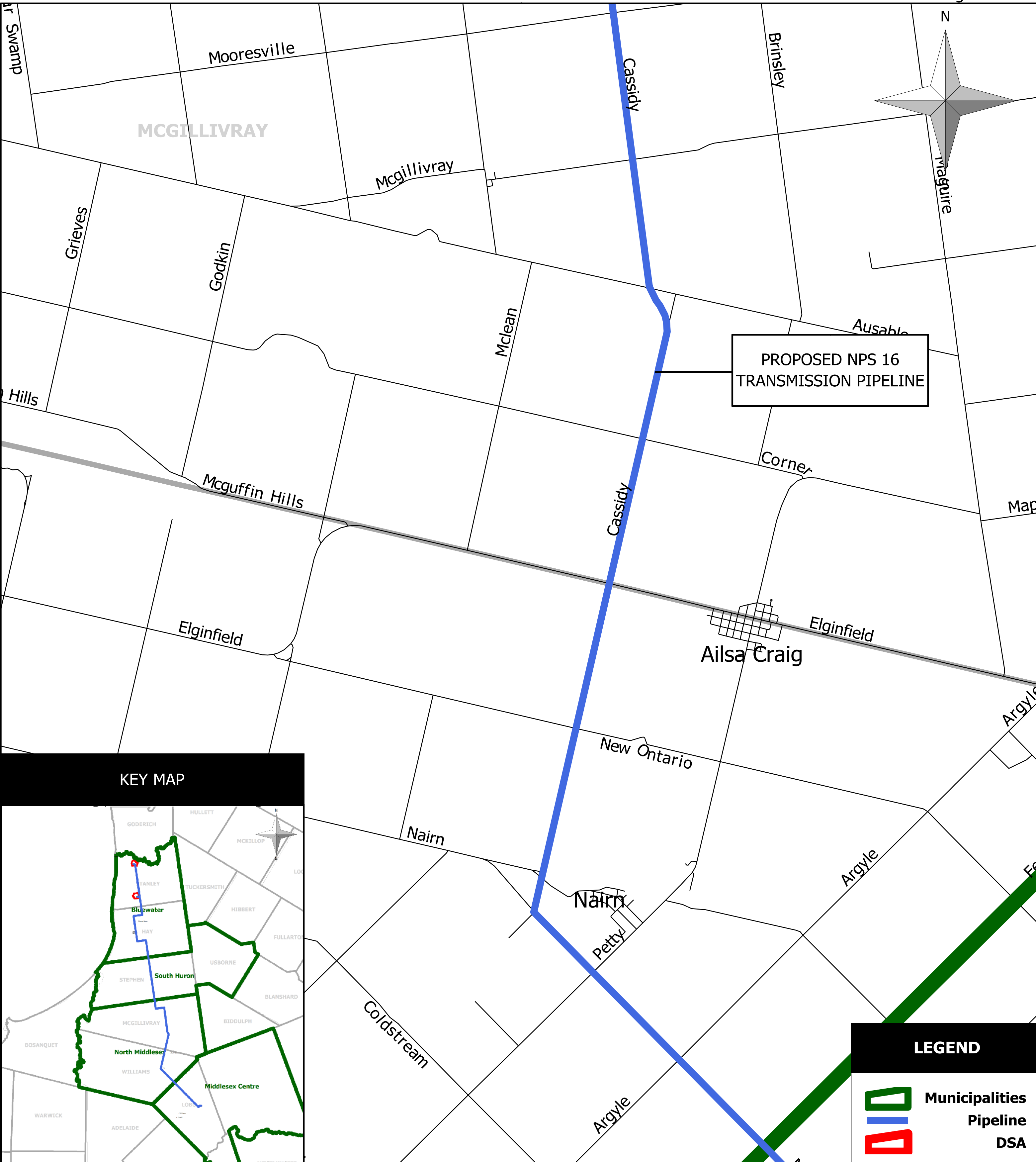
APPROVED BY	DATE	SHEET 2 of 7	



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NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

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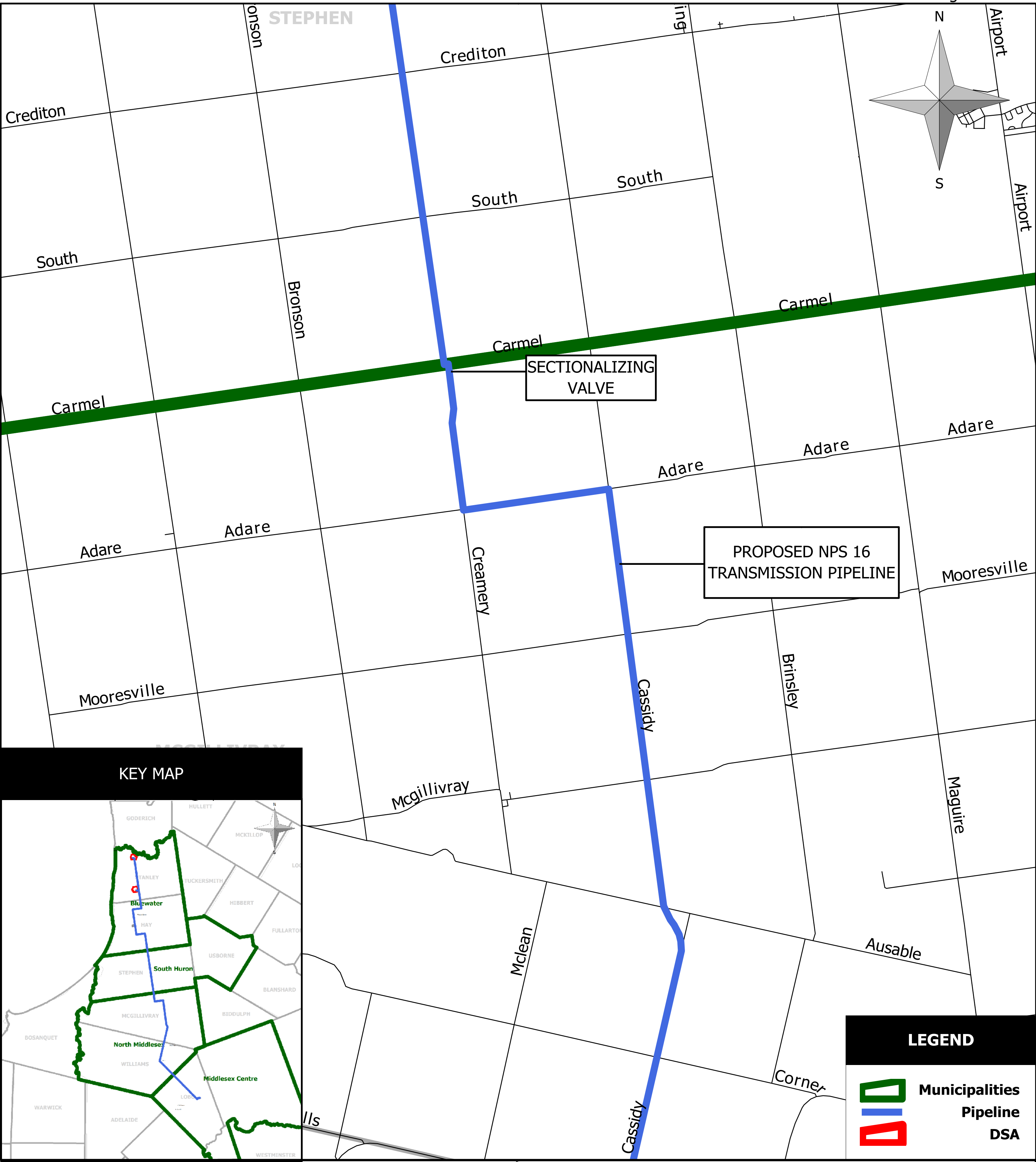
APPROVED BY		DATE		SHEET	3 of 7



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NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

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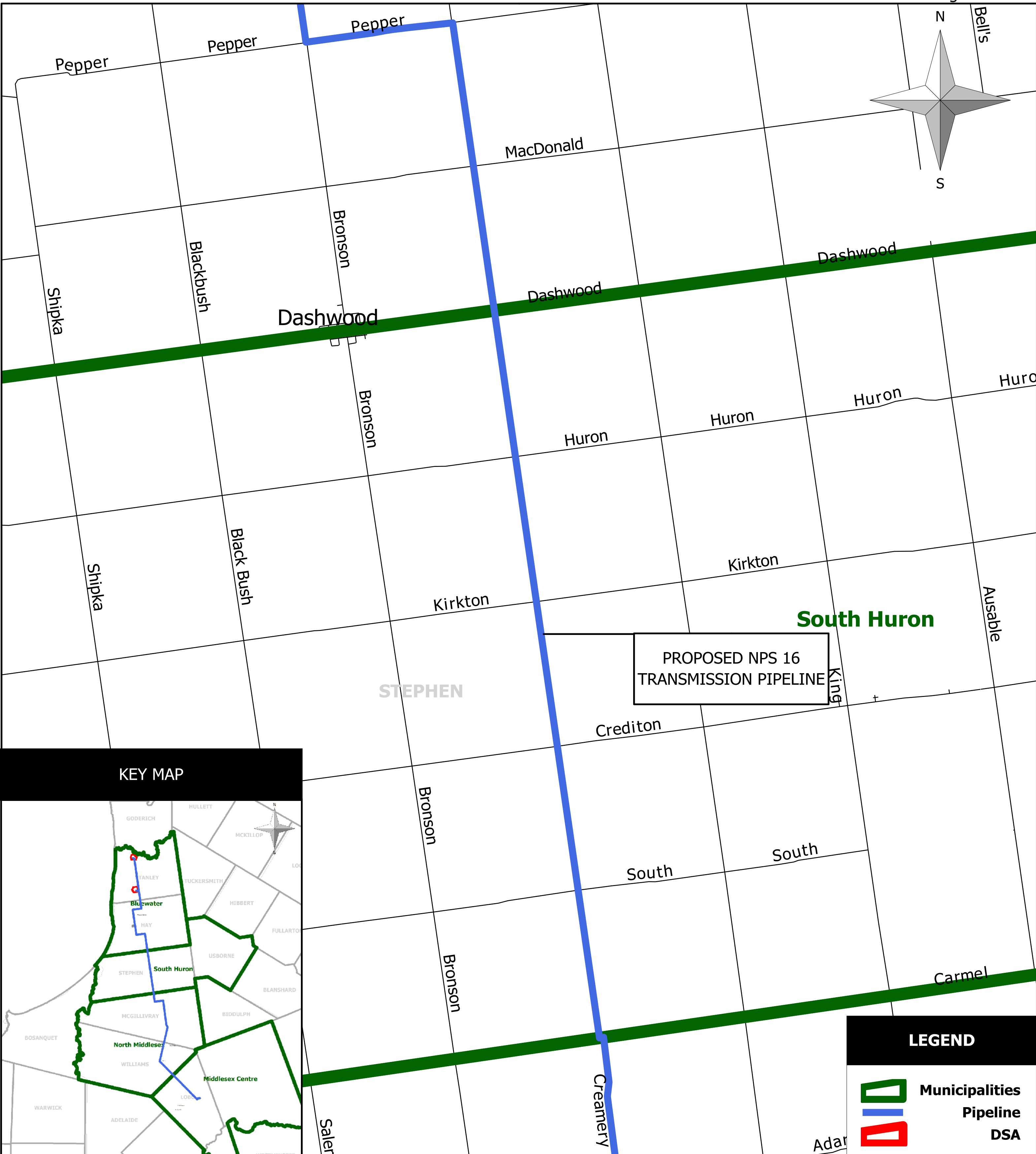
APPROVED BY	DATE	SHEET 4 of 7	



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NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

DRAWN BY	E. Funston	DATE	09/01/2009	SCALE	1:70,000
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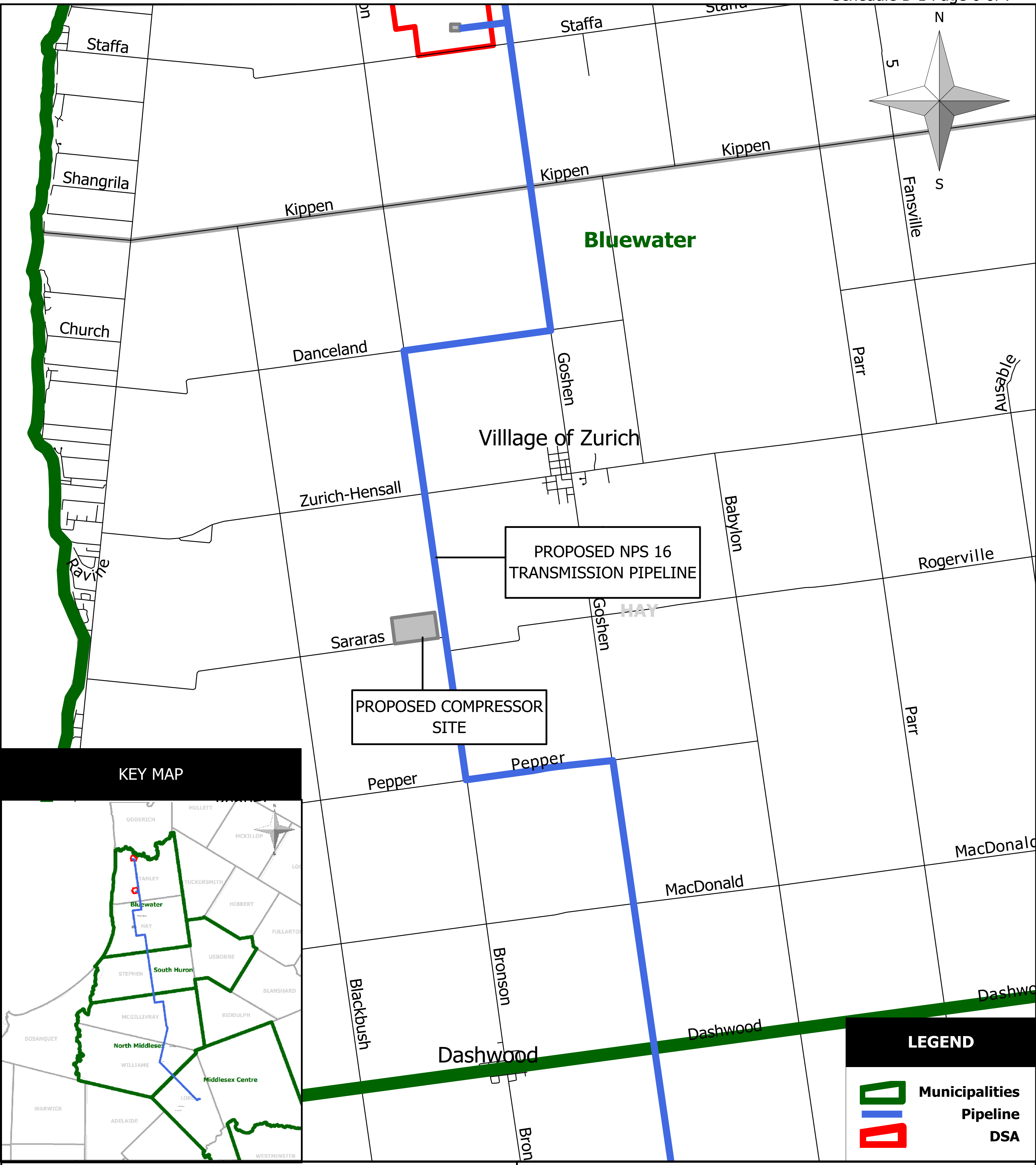
APPROVED BY		DATE		SHEET	5 of 7



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NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

DRAWN BY E. Funston	DATE 09/01/2009	SCALE 1:70,000	
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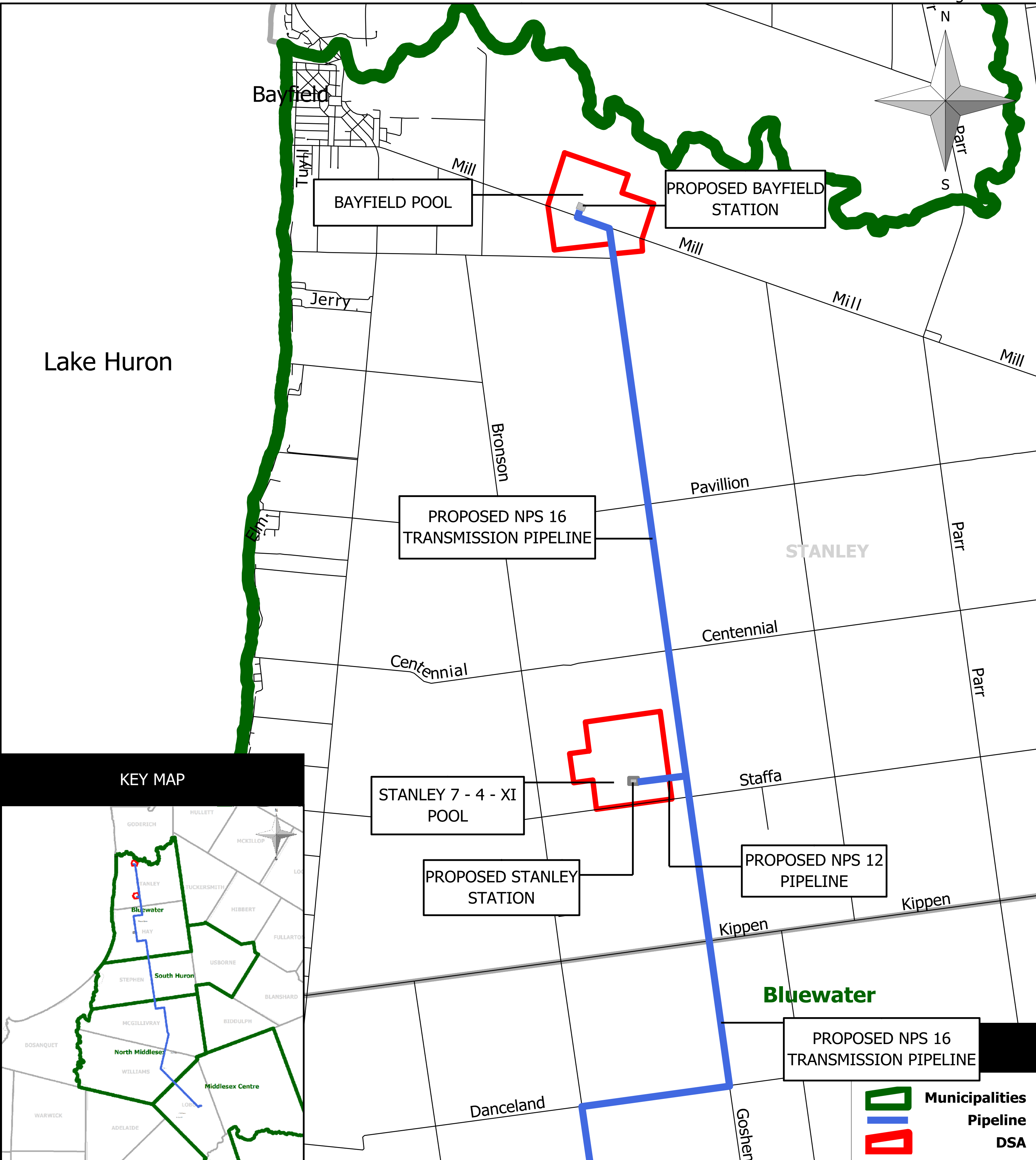

REVISIONS

NO.	DATE	BY	APP'D	REMARKS

HURON BAYFIELD GAS STORAGE PROJECT

DRAWN BY E. Funston	DATE 09/01/2009	SCALE 1:70,000	
CHECKED BY	DATE		
APPROVED BY	DATE	SHEET 7 of 7	

TRIBUTE RESOURCES INC.

Schedule B-2

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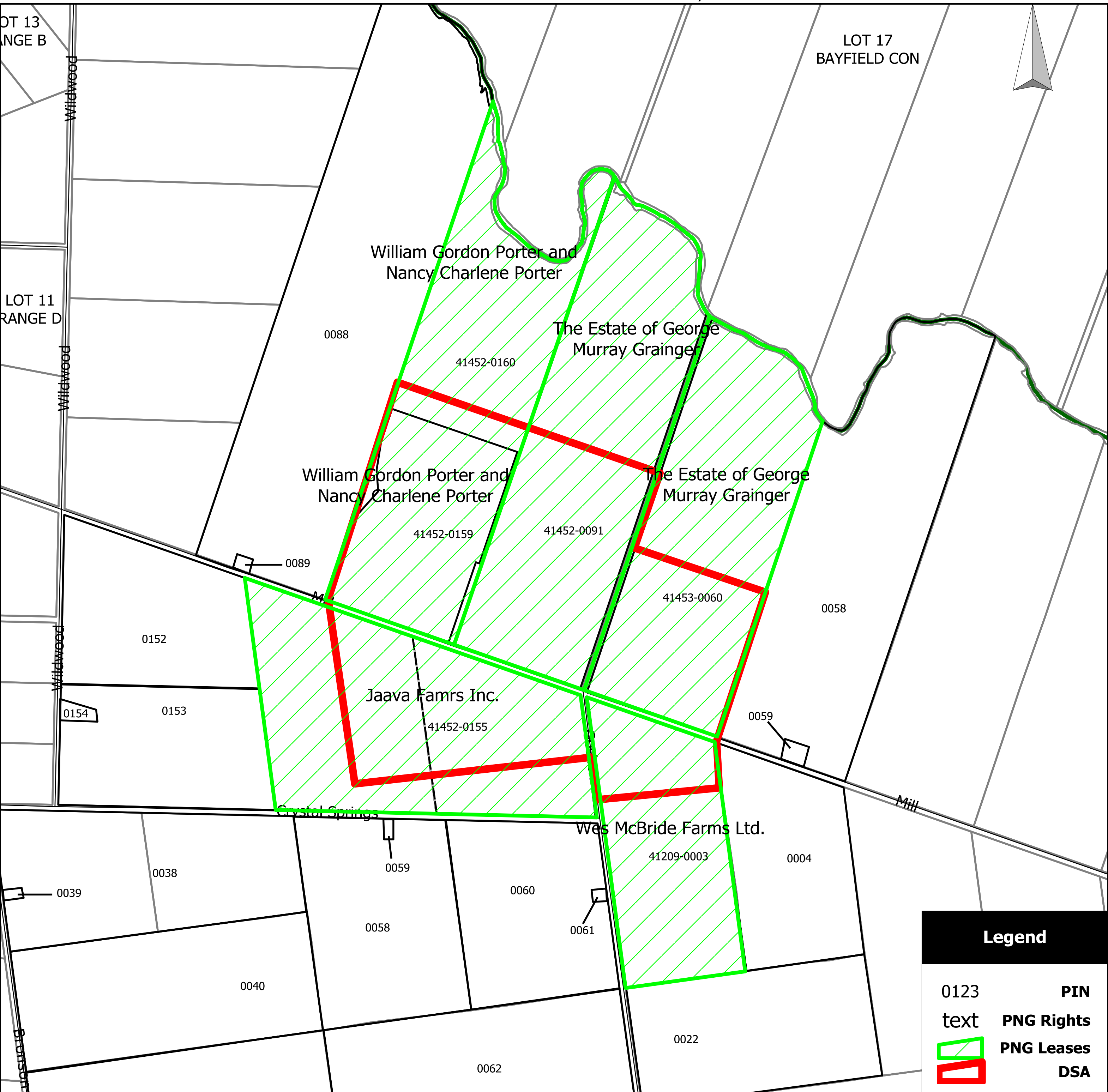
Gas StoragePhase II\OEB filing\Maps\OEB Land Plat PNG.map

PIN	Landowner	Location
0159	S. Eilers (Porter)	Stanley 7-BRN
0160	Mun. Bluewater (Porter)	Stanley 7-BRN
0091	Hill and Hill (Grainger)	Stanley 8-BRN
0060	GAC Corp. (Grainger)	Stanley 9-BRN
0155	Jaava Farms Inc.	Stanley 7+8-BRS
0003	McBride Farms Ltd.	Stanley 9-BRS



REVISIONS				
NO.	DATE	BY	APP'D	REMARKS

BAYFIELD POOL PNG LEASES

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CHECKED BY		DATE			
APPROVED BY		DATE		SHEET	1 of 1

TRIBUTE RESOURCES INC.

Schedule B-3

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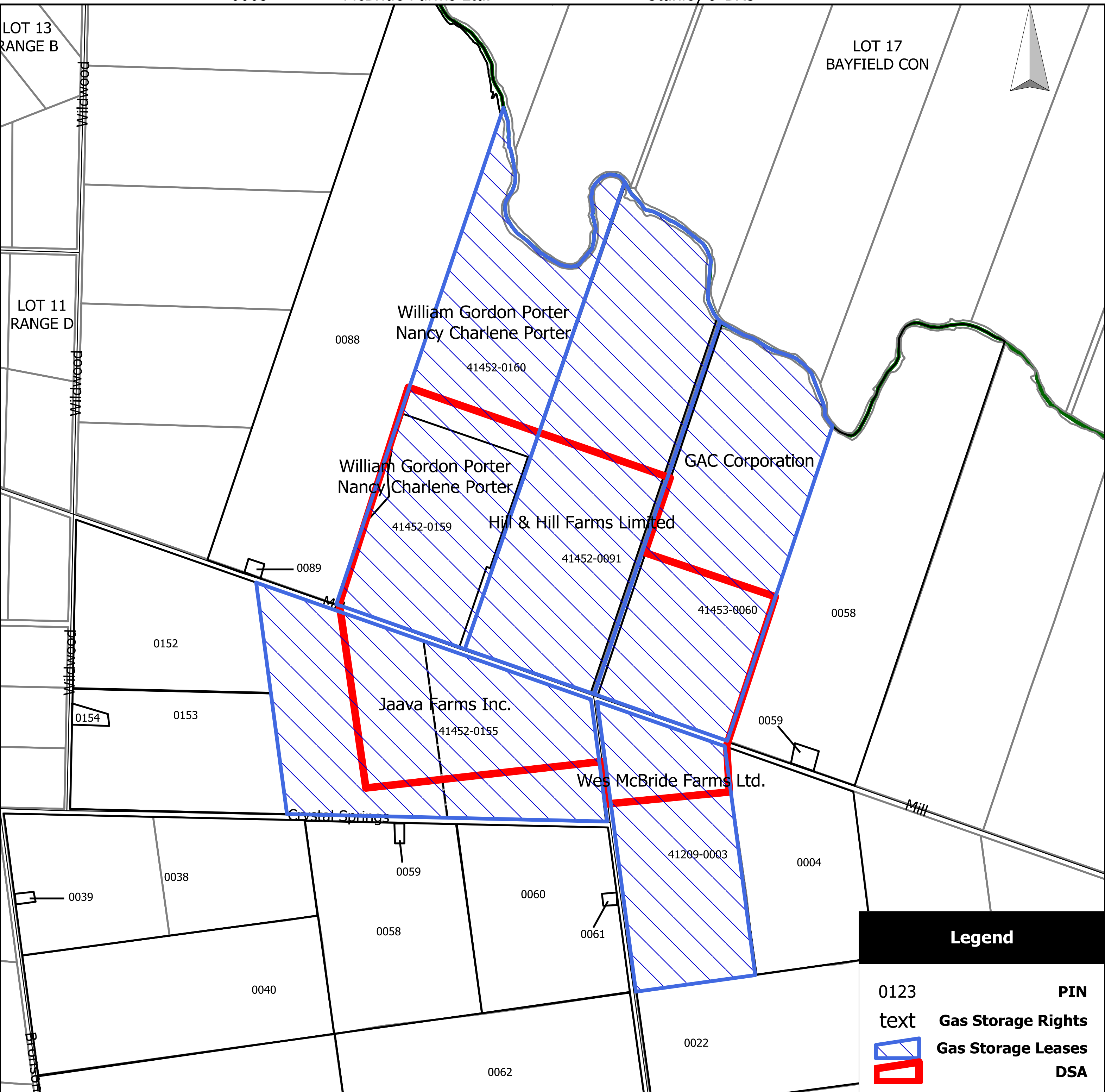
PIN	Landowner	Location
0159	S. Eilers (Porter)	Stanley 7-BRN
0160	Mun. Bluewater (Porter)	Stanley 7-BRN
0091	Hill and Hill (Grainger)	Stanley 8-BRN
0060	GAC Corp. (Grainger)	Stanley 9-BRN
0155	Jaava Farms Inc.	Stanley 7+8-BRS
0003	McBride Farms Ltd.	Stanley 9-BRS



REVISIONS				
NO.	DATE	BY	APP'D	REMARKS

BAYFIELD POOL GS LEASES

DRAWN BY E. Funston	DATE 09/09/2009	SCALE 1:18,000	
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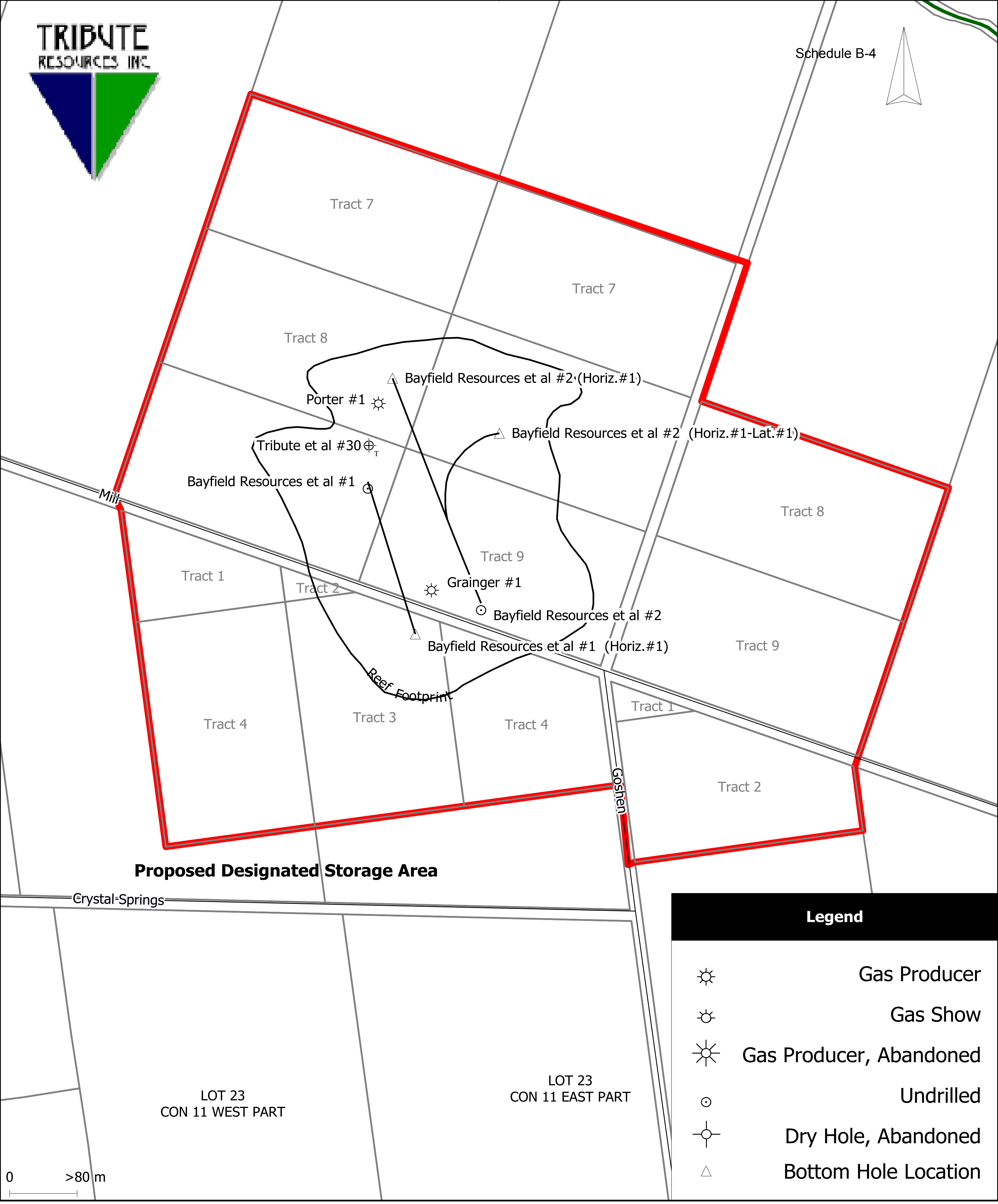
APPROVED BY	DATE	SHEET 1 of 1	



Bayfield Pool
Proposed Well Bores

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
PIN 41452-0159LT Stephen EILERS 73418 Blind Line, R.R. #1 Zurich, Ontario, N0N 1G0	William Gordon PORTER 120 Essex Street Goderich, Ontario, N7A 2H7 *Reservation of all mineral and gas storage rights Instrument Number R338076.* The Corporation of the Municipality of Bluewater 14 Mill Street, P.O. Box 250 Zurich, Ontario, N0M 2T0 *Right of first refusal of disposition of reservation of mineral and storage rights in Instrument No. LT006149.*	PIN 41452-0088LT Gerhard Eilers 73418 Blind Line, R.R. #1 Zurich, Ontario, N0N 1G0	Union Gas Limited P.O Box 2001 50 Keil Drive North Chatham ON N7M 5M1
PIN 41452-0160LT The Corporation of the Municipality of Bluewater 14 Mill Street, P.O. Box 250 Zurich, Ontario, N0M 2T0	William Gordon PORTER 120 Essex Street Goderich, Ontario, N7A 2H7 *Reservation of all mineral and gas storage rights Instrument Number R338076.* The Corporation of the Municipality of Bluewater 14 Mill Street, P.O. Box 250 Zurich, Ontario, N0M 2T0 *Right of first refusal of disposition of reservation of mineral and storage rights in Instrument No. LT006149.*	PIN 41452-0088LT Gerhard Eilers 73418 Blind Line, R.R. #1 Zurich, Ontario, N0N 1G0	Environment Canada 867 Lakeshore Rd P.O. Box 5050 Burlington ON L7R 4A6
PIN 41452-0091LT Hill & Hill Farms Limited Bev Hill, President R.R.#1 Varna, Ontario N0M 2R0	*Reservation of mineral rights in Instrument No. R48977* *Estate of Murray Grainger* David Kent JOHNSON (1/8) 16484 SW Bullhead Road Terrebonne, Oregon, USA, 97760 Kathleen M. KOUDELE (1/8) 1379 NW Viewmouont Drive Dundee, Oregon, USA, 97115 Betty HAYTER (1/16) 13448 Ilderton Road, R.R. #3 Ilderton, Ontario, N0M 2A0 Joyce BAIN (1/16) Crestwood Centre, R.R. #1 Lucan, Ontario, N0M 2J0 Marilyn KELLOR (1/16) 33 Sierra Road Olds, Alberta, T4H 1X2		Natural Resources Canada 580 Booth St Ottawa ON K1A 0E4

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
PIN 41453-0060LT GAC Corporation c/o Kip Cantrick 999 South Adams Birmingham, Michigan, USA, 48009	Neil HAMILTON (1/16) 6031 Edenwood Drive Mississauga, Ontario, L5N 2Y6 Nancy RYAN (1/12) 105 Cherryhill Blvd., Apt. 605 London, Ontario, N6H 2L2 Bob GRAINGER (1/12) 276 Royal Avenue Ottawa, Ontario, K2A 1T5 Barb YOUNGBERG (1/12) 831 Shetland Place Sunnyvale, California, USA, 94087 Elaine DEICHERT (1/28) Box 1759, 392 Elm Street Wingham, Ontario, N0G 2W0 Mary ERB (1/28) R.R. #1 Bayfield, Ontario, N0M 1G0	PIN 41453-0058LT Irene Sarah JOHNSTON	Ausable Bayfield Conservation Authority 71108 Morrison Line RR#3 Exeter ON N0M 1S5
PIN 41452-0155LT Jaava Farms Inc. Harold Van Aaken, President 37869 Mill Road, R.R. #1 Bayfield, Ontario N0M 1G0	Helen HORNER (1/28) Box 64 LaFond, Alberta, T0A 2G0 Cathryn FAWCETT (1/28) 27 Kingfisher Road Sherwood Park, Alberta, T8A 3P7 Phyllis RAMER (1/28) PO Box 303, 25 Walnut Street Zurich, Ontario, N0M 2T0		Ministry of Agriculture, Food and Rural Affairs 1 Stone Road West 3rd Floor Guelph ON N1G 4Y2
PIN 41209-0003LT Wes Mc Bride Farms Inc. Wes McBride, President R.R. #1 Varna, Ontario N0M 2R0	James GRAINGER (1/28) R.R. #2 Zurich, Ontario, N0M 2T0 Stephen GRAINGER (1/28) Box 18 Snowden Acres, R.R. #1 Bayfield, Ontario, N0M 1G0	PIN 41209-0004LT Lorne Douglas TAYLOR Debra Marguerite TAYLOR Harvey W. TAYLOR	Ministry of Culture 400 University Ave., 4th Floor Toronto ON M7A 2R9

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Ministry of Energy 880 Bay St., 3rd Floor Toronto ON M7A 2C1
			Ministry of the Environment 733 Exeter Road, 2nd Floor London ON N6E 1L3
			Ministry of Natural Resources 1 Stone Road West Guelph ON N1G 4Y2
			Ministry of Natural Resources 100 Don St P.O. Box 819 Clinton ON N0M 1L0

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Ministry of Natural Resources 615 John St. N. Aylmer ON N5H 2S8
			Ministry of Culture 400 University Ave. 4th Floor Toronto ON M7A 2R9
			Ministry of the Environment 659 Exeter Road, 2nd Floor London ON N6E 1L3
			Ministry of Natural Resources 300 Water St. 5th Floor North Tower P.O. Box 7000 Peterborough ON K9J 8M5

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Technical Standards and Safety Authority 3300 Bloor St W. 14th Foor, Centre Tower Etobicoke ON M8X 2X4
			M.P.P. Huron-Bruce Carol Mitchell 49-50 Albert St. Clinton ON N0M 1L0
			County of Huron County Clerk Barb Leaman Court House Square Goderich ON N7A 1M2
			Municipality of Bluewater Lori Wolfe, County Clerk 14 Mill Street P.O. Box 250 Zurich ON N0M 2T0

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Huron County Federation of Agriculture P.O. Box 429 Clinton ON N0M 1L0
			Ontario Federation of Agriculture 100 Stone Rd W., Suite 206 Guelph ON N1G 5L3
			Bell Canada 370 Albert St. Strathroy ON N7G 4B2
			Execulink 619 Main St. N. Burgessville ON N0J 1C0

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Hay Communications Cooperative Ltd. P.O. Box 99 Zurich ON N0M 2T0
			Hydro One Networks Inc. 483 Bay St, TCT15, North Tower Toronto ON M5G 2P5
			Tuckersmith Communications Co-operative Ltd. (TCC) 40023 Kippen Rd. Kippen ON N0M 2E0
			Indian and Northern Affairs Canada Environmental Unit re: EA Coordination 25 St. Clair Ave E., 8th Floor Toronto ON M4T 1M2

LANDOWNERS WITHIN BAYFIELD PROPOSED DESIGNATED STORAGE AREA	OTHER INTERESTED PARTIES TO THE LANDS WITHIN THE BAYFIELD PROPOSED DESIGNATED STORAGE AREA	LANDOWNERS ADJACENT TO THE BAYFIELD DESIGNATED STORAGE AREA	AGENCY CONTACT LIST
			Indian and Northern Affairs Canada 10 Wellington St. Gatineau QC K1A 0H4
			Indian and Northern Affairs Canada Deputy Director, Policy and Relationships 720 Bay St, 4th Floor Toronto ON M5G 2K1

Tab B

Geological and Geophysical Report

Bayfield Pool Development

September 2009

Neil Hoey

For Tribute Resources Inc. and Bayfield Resources Inc.

Table of Contents

List of Appendices

Regional Geology

The Bayfield Pool is located on the eastern rim of the Michigan Basin. Approximately 425 million years ago, much of southern Ontario and Michigan was covered by a large inland sea. On the perimeters of the Michigan Basin, water conditions were ideal for reef growth and many pinnacle reefs were formed. Schedule 1 shows the concentric ring in which reefs were developed in the area. In Ontario, these reefs are developed in the Middle Silurian Guelph Formation, illustrated on the stratigraphic column, shown in Schedule 2. Reefs grew to heights that ranged from 15 metres to well over 100 metres. When a reef attains a height of less than 50 metres it is termed an "incipient reef". When a reef attains a height of greater than 50 metres it is termed a "pinnacle reef". The Bayfield reef is a pinnacle reef with a height of approximately 115 metres. Pinnacle reefs are the most common gas storage reservoirs in southern Ontario.

The regional Guelph Formation is overlain by the Salina A-1 Unit, which consists of a thin basal anhydrite (A-1 Evaporite) and dense carbonate mudstones of the A-1 Carbonate. In an off-reef position, the typically non-porous A-1 Carbonate provides a seal that prevents gas from migrating laterally from the Guelph reef. However, some pinnacle reefs have reef-associated porosity in thin layers within the dense A-1 Carbonates. This porosity may hold minor amounts of gas, oil or water. Above the Guelph pinnacle reef and the off-reef A-1 Carbonate, an effective caprock seal is provided by both the basal A-2 Anhydrite and dense A-2 Carbonate mudstones. A generalized schematic picture of a Guelph pinnacle reef and off-reef sediments is shown in Schedule 3.

Development History

There have been only two wells drilled in the vicinity of the Bayfield Pool and both wells penetrated the crest of the reef. In 1956, Bluewater Oil & Gas discovered the Bayfield pinnacle reef with the drilling and completion of Bluewater Oil & Gas – Porter No.1, Stanley 2-7-BRN (now 8-7-BRN). The Porter No.1 well was completely dolomitized in the reef section and encountered gas flows of 28.3 m^3/day at a depth of 463.0 metres near the top of the Guelph reef, and 232.2 10^3m^3/day at a depth of 500.5 metres also in the Guelph Formation. An oil show was recorded at a depth of 576.7 metres to 586.1 metres. The Porter No.1 well was cored over the interval 527.6m to 592.2 metres. Well data for the Porter No.1 well is summarized on Schedule 4 and on well card Schedule 5. This well is presently shut-in, with plans to possibly convert the well to an Injection/Withdrawal well or an Observation well if it meets the Provincial Operating Standards.

In 1957, Bluewater Oil & Gas – Grainger No.1, Stanley 1-8-BRN (now 9-8-BRN) was drilled. The Grainger No.1 well encountered a full pinnacle reef build-up that was partially dolomitized. A gas show of 33.9 10^3m^3/day was encountered at a depth of 496.2 metres in the Guelph Formation. Well data for the Grainger No.1 well is summarized on Schedule 4 and on well card Schedule 6. This well is also presently shut-in, with plans to possibly convert the well to an Injection/Withdrawl well or an Observation well if it meets the Provincial Operating Standards.

There are no other wells located within the proposed Designated Storage Area. There are three regional wells in the area, however all are substantially removed from the Bayfield Pool and offer no related geologic information. The first of the wells is Imperial 523 – Weston No.1, Stanley 1-10-RC, drilled in 1955, and approximately 1500 metres west of the Pool (Schedule 7). The second of the wells is Paragon Bayfield #1, Stanley 1-10-RE, drilled in 1995, and approximately 1500 metres west of the Pool (Schedule 8). The third well, Florentine et al 1, Stanley 3-20-XI was drilled in 1987 and is located approximately 1160 metres south of the Pool (Schedule 9). A summary of the geologic information for these wells is included in Schedule 4.

Reef Geology & Reservoir Description

The Bayfield Pool is a partially dolomitized pinnacle reef. The reef appears to have a small limestone core that was encountered in the Grainger No.1 well. At its' crest, the reef is approximately 115 metres tall. The subsea elevation structure map of the Guelph formation maps the reef (Schedule 10).

As is typical in most of Huron County the off-reef A-1 Carbonate sediments are also partially dolomitized. Sample and log examination of the off-reef wells, Imperial 523 – Weston No.1, Stanley 1-10-RC, Paragon Bayfield #1, Stanley 1-10-RE, and Florentine et al 1, Stanley 3-20-XI confirm that the A-1 Carbonate in the area is partially dolomitized. However, as all of these wells are substantially removed from the Bayfield reef, they offer very limited information on the A-1 Carbonate dolomitization proximal to the reef.

Reservoir Description

The shape and structure of the Bayfield Pool was determined from geological well information and interpreted from 2-D and 3-D seismic data. This data shows a reef structure that is 66 acres in size. Structural maps for the Guelph and A-1 Carbonate formations are shown in Schedules 10 and 11 respectively. Schedule 12 depicts the Bayfield reef in cross-section showing the structure of the reef as well as its' relation to the off-reef sediments. The A-2 Salt, A-1 Carbonate, and A-1 Evaporite all pinch out against the side of the Bayfield pinnacle reef. The A-2 Carbonate, A-2 Shale, and A-2 Anhydrite formations all drape over the reef providing an effective caprock seal for the reservoir.

The upper 20 metres of the reef consists of medium-golden brown dolomite. This upper portion of the reef is severely plugged with anhydrite/halite in the vicinity of the Porter No.1 and Grainger No.1 wells. Medium-golden brown, finely crystalline dolomite, with moderate to good intercrystalline porosity, pin-point porosity and small vugular porosity makes up the middle portion of the reef at the Porter No.1 well, however at the Grainger No.1 well there is a 40 metre section of limestone in the core of the reef. The porosity estimates for the unplugged portion of the reef is based on a combination of data including sample examination, neutron porosity logs, and core data. A core cut on the lower section of the reef at the Porter No.1 location provides porosity data at that location. The core also indicates a gas / oil contact at 577 metres KB (-334 metres). This contact is used as the base of gas (“BOG”) for the reef. A gas bearing zone within the reef is interpreted to be approximately 85 metres maximum thickness. This is shown in Schedule 13. A show map (gas, oil and water) is shown in Schedule 14 depicting shows encountered in the Guelph and A-1 Carbonate formations in all the wells.

In the Porter No.1 well, porosity zones are evident from gas flows of 232.2 10^3m^3 (8.2 Mmcf/d) at 500.4 to 576.7metres. Porosity is also evident from neutron logs run over the reef in a similar interval. Five cores were cut and analyzed over an interval from 527 metres to 585 metres (beginning slightly below the salt plugged interval in the upper portion of the reef). Good porosity is indicated in the intervals 527 to 539 metres (average porosity 7.6%); 553 to 569 metres (average porosity 6.6%); and 573 to 577 metres (average porosity 10.5%). The bottom porosity zone contains oil beginning at 577 metres.

In the Grainger No.1 well, porosity zones are evident from gas flows of 5.6 10^3m^3 (200 mcf/d) at 534.6 to 563.2 metres, and 33.9 10^3m^3 (1.2 Mmcf/d) at 568.2 to 581.0 metres. Porosity is also evident over intervals similar to the gas shows, from sample examination and neutron logs run over the reef section.

Water saturations are difficult to determine based on log suites that were run in 1956 and 1957 on the Porter No.1 and Grainger No.1 wells. An average Sw of 20% was used, which is common in many reefs in southwestern Ontario.

A-1 Carbonate Sucrosic Porosity

Several pinnacle reefs in southwestern Ontario have porosity in the adjacent off-reef A-1 Carbonate that is connected to the reef. This porosity is usually generated on the leeward (southeast) side of the pinnacle reefs. With good well control, A-1 sucrosic porosity is easily mapped through sample and log examination, and hydrocarbon or water shows in the A-1 Carbonate. At the Bayfield reef, there are no proximal well penetrations that would help indicate the presence of A-1 porosity. With no wells present surrounding the pinnacle reef, it is much more difficult to detect the presence of A-1 sucrosic porosity. A-1 Carbonate sucrosic porosity is a common phenomenon in Lambton County, however is not commonly observed surrounding any of the pinnacle reefs in Huron County. Nevertheless, if there is a remote possibility that A-1 porosity could be encountered on the southeast sides of a pinnacle reef, that area of the reef should be protected within the DSA boundary.

Seismic

One 2-D seismic line shot in 2006, and a 2.82 km^2 (288 hectres) 3-D seismic survey have been conducted over the Bayfield Pool (Schedule 15). The 3-D survey was acquired in the fall of 2007 by Conquest Seismic Services of Calgary, Alberta. It was designed, processed and interpreted by David Schieck, a consulting geophysicist with Seismic Solutions of Calgary Alberta, who has many years of Ontario geophysical experience. The 3-D survey consisted of 21 north-south lines spaced 80 metres apart, an 80 metres source interval, and 40 metre receiver interval, resulting in a 20 by 20 metre subsurface bin size after 3D migration. The source was dynamite, with a charge size of 0.5 kg in packed holes 6 metres deep.

Results of the 3-D survey provided a reef outline similar to original interpretations, but shifted slightly south of the original geological interpretation. The more accurate structure and outline of the reef provided by the 3-D survey was one of the primary pieces of information used to define the boundaries of proposed Designated Storage Area.

Reservoir Containment - Caprock Seal

Guelph pinnacle reefs are overlain by the Salina A-2 Anhydrites that provide the caprock seal for the reefs. At the Bayfield Pool, the A-2 Anhydrite is 4.5 metres in thickness at the Porter No.1 well and 2.8 metres at the Grainger No.1 well. This compares to other reefs in Huron County that have A-2 Anhydrite thicknesses that range from 0.5 metres to over 10 metres. In addition to the A-2 Anhydrite, the basal portion of the A-2 Carbonate is a very dense mudstone that also contributes to the effectiveness of the caprock.

In December of 2008, Tribute et al #30 – Stanley 4-7-BRN (now 9-7-BRN) was spudded in the Bayfield pool as a “Stratigraphic Test” to gather geologic information about the reef and overlying formations. This well was intended core the lower A-2 Carbonate, A-2 Shale, and the A-2 Anhydrite caprock of the Bayfield reef. This well has now been “lost” due to uphole drilling difficulties. A re-drill well, Bayfield Resources et al #1 will be permitted, drilled and cored. The core will then be analyzed for porosity and permeability, as well as other rock properties, and then be submitted to threshold pressure tests to confirm the effectiveness of the caprock. The final results will be submitted as an addendum to this report when they become available in the early 2010.

Designated Storage Area

A new tract outline of the Bayfield area has been designed by the MNR and has been used in this proposal and shown in Schedule 16. The proposed Designated Storage Area (DSA) has a mapped outline that includes tracts 7, 8 and 9 of Lot 7, Concession BRN; tracts 7, 8 and 9 of Lot 8, Concession BRN; and tracts 8 and 9, Lot 9, Concession BRN. South of the Mill Road, tracts 1 and 4 of Lot 7, Concession BRS; tracts 2, 3 and 4 of Lot 8, Concession BRS; and tracts 1 and 2 of Lot 9, Concession BRS are also included within the DSA. The proposed DSA is shown in Schedule 17 together with the reef outline interpreted from the 3-D seismic survey. Distances from the reef edges to the DSA boundary are shown in Schedule 18 and are as follows: 285 metres to the north boundary; 530 metres to the east boundary; 195 metres to the south boundary; and 205 metres to the west boundary. There are a total of 325 acres included in the proposed DSA boundary.

As discussed above, there have been no wells drilled inside the DSA boundary other that than the Porter No.1 and Grainger No.1 reef wells. Thus, there is no available geologic information to determine whether a sucrosic A-1 porosity halo exists surrounding the Bayfield reef. Using the other pinnacle reefs in Huron County as a model, the A-1 Carbonate sucrosic porosity that exists around some reefs in Lambton County, does not appear to be present around the reefs in Huron County such as Bayfield. The proposed distance of 530 metres on the eastern side of the reef is sufficient to cover the remote possibility that sucrosic A-1 may be present here. The MNR technical staff have agreed with, and approved this evaluation (Schedule 19).

Designing a DSA boundary requires a balance between protecting the reservoir and not eliminating lands from further exploration. The proposed DSA has been designed to be large enough to protect the integrity of the Bayfield storage reservoir and any possible A-1 sucrosic porosity that may be attached to the reef, without being excessive.

Reservoir Development

The development of the Bayfield Pool reservoir will include four Injection/Withdrawal wells in order to provide complete cycling of the entire working inventory on an annual basis. The Tribute et al #30 location has been "lost" and will be replaced by Bayfield Resources et al #1, which will core the caprock of the Bayfield reef and then be drilled to total depth near the base of the reef. Bayfield Resources et al #1 (Horiz.#1) will be kicked to the south from the Bayfield Resources et al #1 vertical well to target lower porosity zones seen in the Grainger No.1 well.

Bayfield Resources et al #2 (Horiz.#1) will be drilled from a surface location in the southern end of the reef and be drilled horizontally to target porosity zones in the northern sections of the reef in the Porter No.1 well. One lateral well, Bayfield Resources et al #2 (Horiz.#1–Lat.#1) will be kicked from the Bayfield Resources et al #2 (Horiz.#1) wellbore. The proposed surface locations and horizontal paths are shown in Schedule 20. Schedule 21 depicts the proposed wells in cross-section. The surface and horizontal locations were all selected based on geological information from existing wellbores and the structure and outline of the reef provided by the 3-D seismic. The horizontal paths are planned to maximize the intersection of porosity and permeability zones within the reef.

The Porter No.1 and Grainger No.1 wells will be re-entered and completed as Injection/Withdrawal wells or Observation wells for the pool.

Well License Applications for the planned wells are attached as Tab D.

Conclusions

The Bayfield Pool is a full pinnacle reef buildup that is approximately 115 metres in height. Two wells penetrating the reef exhibited excellent gas flows indicative of very good porosity within portions of the reef. Portions of the porosity within the reef have been severely plugged with salt.

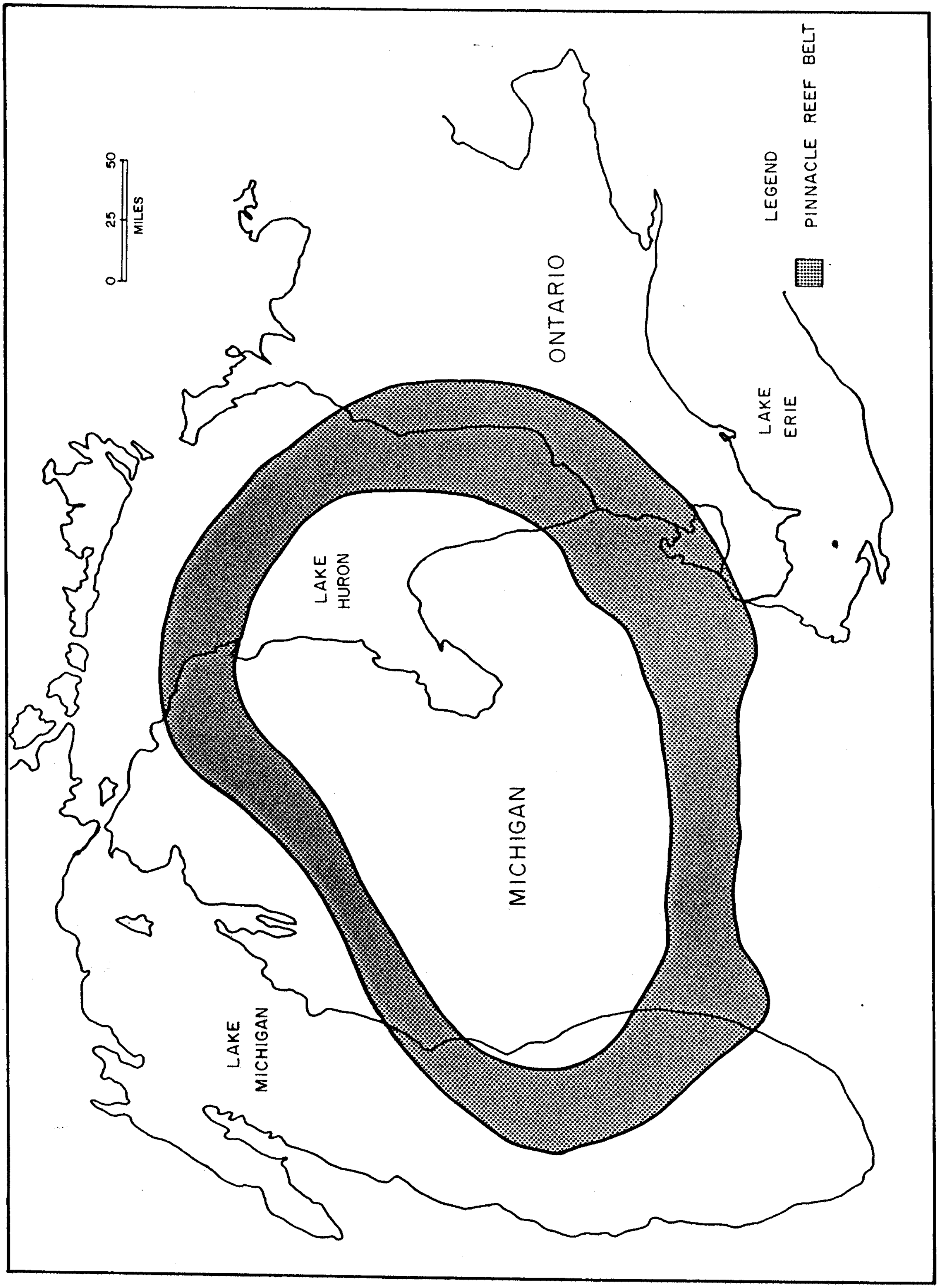
The reef is overlain by 4.5 metres of anhydrite at the Porter No.1 well and 2.8 metres of anhydrite at the Grainger No.1 well, which provides an excellent caprock seal for the reservoir. This caprock will be cored and analyzed to determine its threshold capabilities.

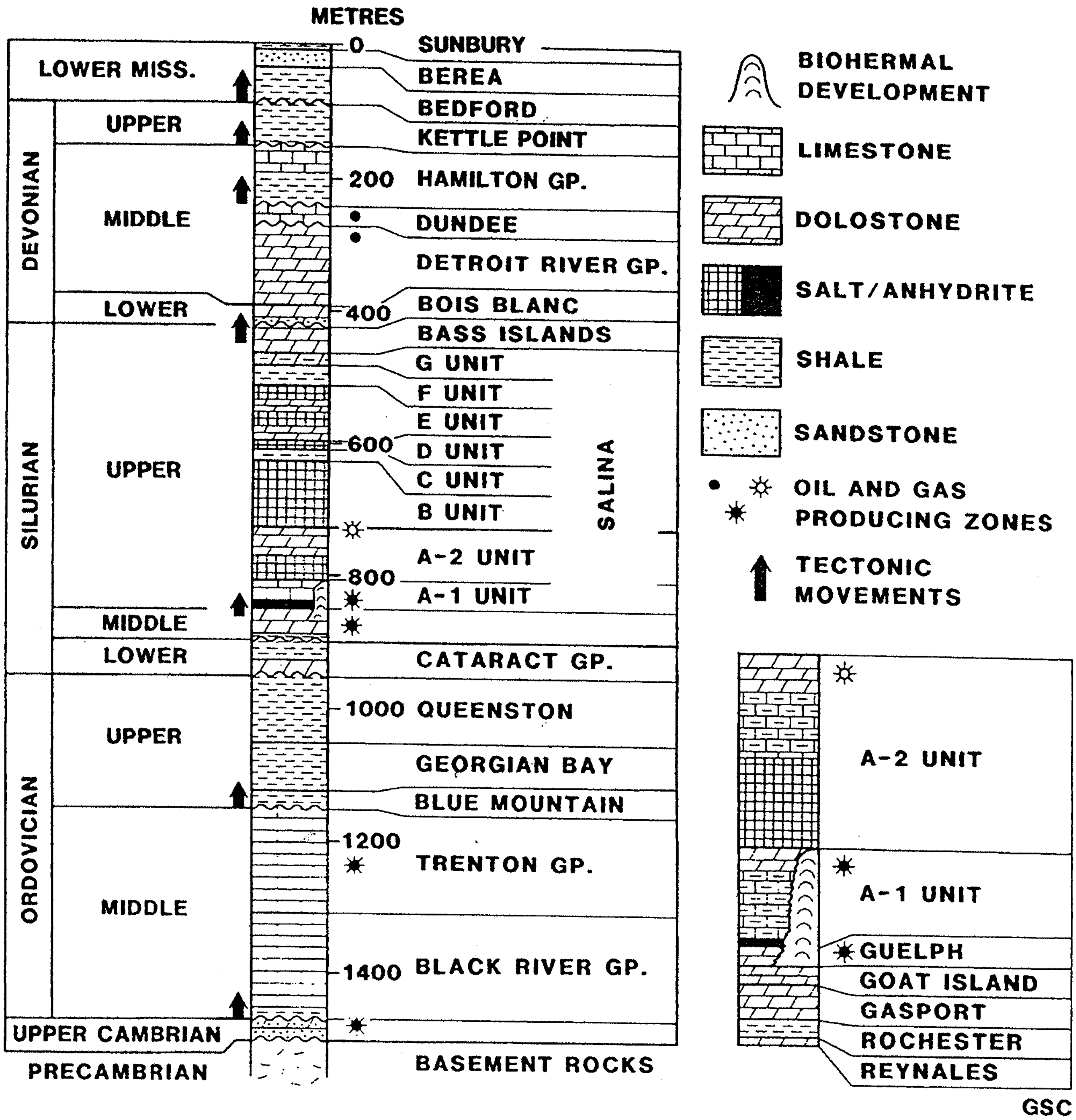
A Designated Storage Boundary has been proposed that will protect the reef itself but also the possibility of any A-1 sucrosic porosity that may be present on the southeast side of the reef.

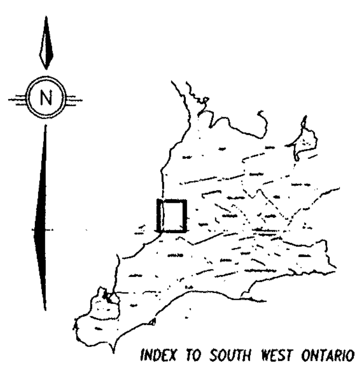
N.Hoey, P.Geo.

September 15, 2009.

MICHIGAN BASIN of S. W. ONTARIO & MICHIGAN

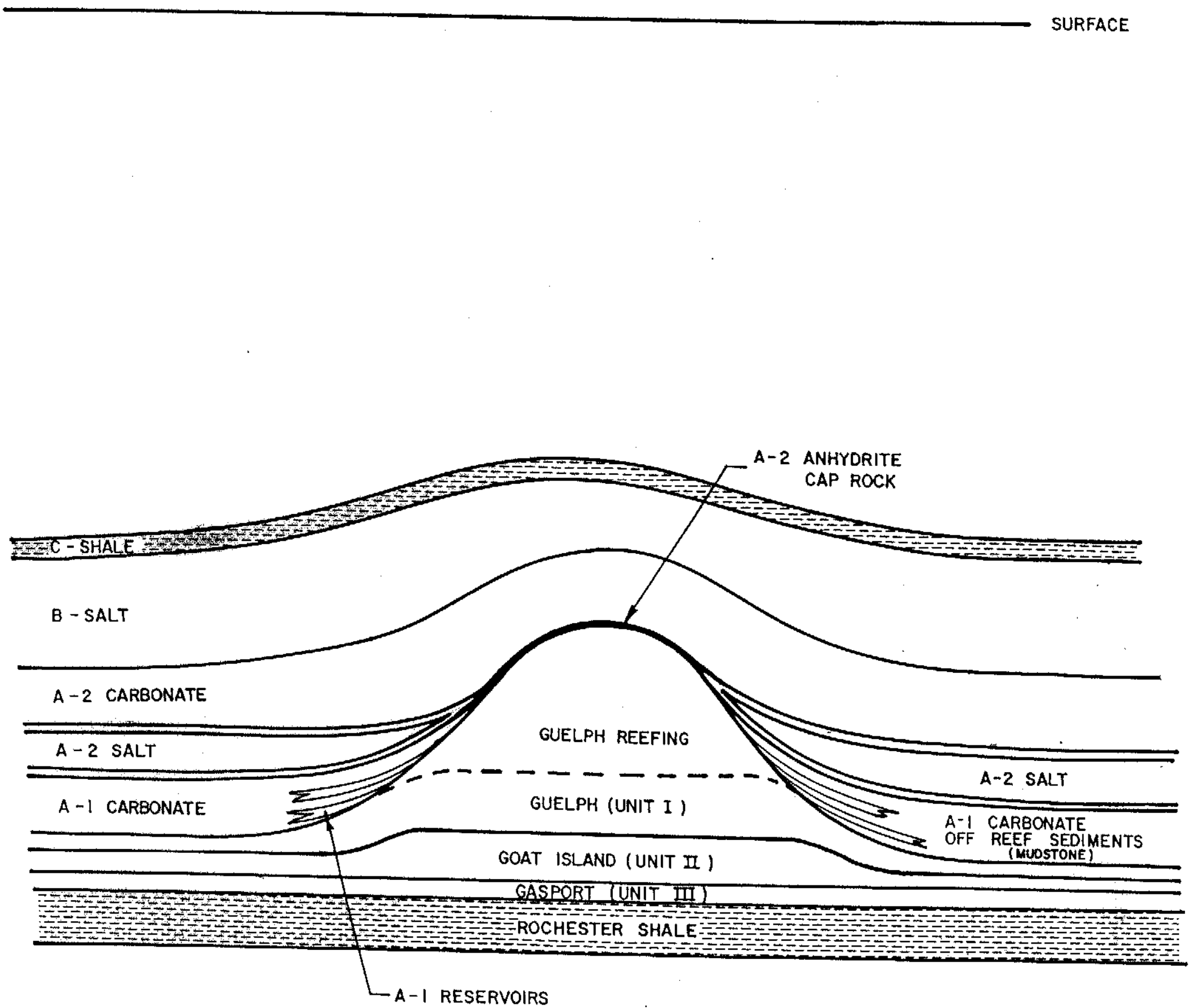






TRIBUTE RESOURCES	
Stratigraphic Section Southwestern Ontario	
Southwestern Ontario	
Township	County, Ontario
Scale:	By: B.V. Sanford
Date: November 2003	Figure: 3
Edmund Welychka - Geological & Geophysical Consulting	

SCHEMATIC SECTION
PINNACLE REEF



Bayfield Pool - Summary of Geological Well Data

Well No.	Old Tract	Lot	Concession	New Tract	Lot	Concession	Well Name	Permit No.	Log	Year Drilled	Tray No.
1	1	8	BRN	9	8	BRN	Bluewater Oil & Gas - Grainger No. 1, Stanley 9-8-BRN	8753	Y	1957	6652
2	2	7	BRN	8	7	BRN	Bluewater Oil & Gas - Porter No.1, Stanley 8-7-BRN	8752	Y	1956	6695
3	3	20	XI	3	20	XI	Florentine et al 1, Stanley 3-20-XI	7104	Y	1987	9720
4	1	10	RC	1	10	RC	Imperial 523 - Weston No. 1, Stanley 1-10-RC	11904	N	1955	6123
5	1	10	RE	1	10	RE	Paragon Bayfield #1, Stanley 1-10-RE	8250	Y	1995	10500

Bayfield Pool - Summary of Geological Well Data

Well Name	KB	C Shale	B Salt	A2 Carb	A2 Shale	A2 Salt	A2 Anhy	A1 Carb	A1 Evap	Guelph	Goat Isl.	Gasport	Rochester	TD
Bluewater Oil & Gas - Grainger No. 1, Stanley 9-8-BRN	247.5	-115.2	-142.6	-178.6	-201.2	nil	-206.3	nil	nil	-209.1	nde	nde	nde	-333.5
Bluewater Oil & Gas - Porter No.1, Stanley 8-7-BRN	242.6	-119.5	-137.8	-186.8	-210.0	nil	-213.1	nil	nil	-217.6	nde	nde	nde	-349.6
Florentine et al #1, Stanley 3-20-XI	251.5	-117.8	-141.5	-220.2	-257.3	-258.6	-279.8	-281.7	-318.3	-323.6	-330.9	-339.9	-344.5	-362.0
Imperial 523 - Weston No. 1, Stanley 9-10-BRN	222.2	-147.8	-175.9	-252.7	-281.3	-287.7	-308.8	-311.8	-350.5	-352.7	-363.9	-369.7	-375.8	-389.5
Paragon Bayfield #1, Stanley 1-10-RE	219.2	-146.8	-174.8	-255.8	-286.8	-294.8	-312.1	-315.8	-352.0	-357.8	-364.8	-374.3	-379.3	-392.8

CTY: Huron	**TWP:** Stanley	**TRACT:** 8	**LOT:** 7	**CON:** NBR
WELL NAME: Bluewater Imperial Porter #1			**WELL ID:** T008752	**CLASS:** NPW
OPERATOR: Tribute Resources Inc.	**Target:** SAL		**STATUS:** GP - ACT	

DRILLING DATA	**DATES**	**COORDINATES**	**SAMPLES**
RIG TYPE: Cable	**LICENCE ISSUED:** 1956-06-29	**N/S BOUND:** 312.40 N	**TRAY:** 6695
GRND ELEV: 242.01	**SPUD DATE:**	**E/W BOUND:** 68.00 W	**POOL**
KB ELEV: 242.62	**TD DATE:** 1956-10-08	**NAD 83**	Bayfield Pool
TVD: 592.23 **PBTD:**	**COMPLETE DATE:**	**SURF LAT:** 43.55112611 **SURF LONG:** -81.65538889	
	WORKOVER DATE:	**BOT LAT:** 43.55112611 **BOT LONG:** -81.65538889	
	PLUG DATE:		

FORMATION	TOP	TVD	ELEV
Drift	0.60	0.60	242.02
Top of Bedrock	52.40	52.40	190.22
Dundee	52.40	52.40	190.22
Lucas	57.60	57.60	185.02
Bois Blanc	203.90	203.90	38.72
Bass Islands/Bertie	234.70	234.70	7.92
G Unit	280.40	280.40	-37.78
F Unit	286.80	286.80	-44.18
E Unit	321.60	321.60	-78.98
D Unit	358.10	358.10	-115.48
C Unit	362.10	362.10	-119.48
B Salt	380.40	380.40	-137.78
A-2 Carbonate	429.50	429.50	-186.88
A-2 Anhydrite	455.70	455.70	-213.08
A-1 Carbonate	460.20	460.20	-217.58
Guelph	486.20	486.20	-243.58

COMMENTS
Latitude and longitude corrected using GIS (K.M. - May '02). Concession designation in OPDS and well files changed to North of Bayfield Road (formerly BRN) on October 10, 2008 by PRC staff, after discussions with the Surveyor General's office as to the proper concession name. Originally tract 2, reassigned as tract 8 in 2008.

INITIAL GAS INTERVAL	FLOW 1000 m3/dM	SIP kPag
462.99 - 463.30	0.028	
500.48 - 576.68	0.232	

INITIAL OIL INTERVAL	FLOW m3/d	SIP kPag
576.68 - 576.99		

WATER RECORD INTERVAL	STATIC LEVEL	TYPE
60.96 -	38.10	Fresh
300.23 -	3.05	Salt
222.50 -	30.48	Sulphur

LOGGING RECORD INTERVAL	TYPE	COMPANY

Casing O.D. (mm)	Weight (kg/m)	Setting Depth (m)	How Set
273.05		121.92	
177.80		375.21	
339.85		52.73	
219.20		277.06	

CTY: Huron	**TWP:** Stanley	**TRACT:** 9	**LOT:** 8	**CON:** NBR
WELL NAME: Bluewater Imperial Grainger #1			**WELL ID:** T008753	**CLASS:** DEV
OPERATOR: Tribute Resources Inc.	**Target:** SAL		**STATUS:** GP - ACT	

DRILLING DATA	**DATES**	**COORDINATES**	**SAMPLES**
RIG TYPE:	**LICENCE ISSUED:** 1956-10-22	**N/S BOUND:** 91.00 N	**TRAY:** 8476
GRND ELEV: 246.89	**SPUD DATE:**	**E/W BOUND:** 137.20 E	**POOL**
KB ELEV: 247.50	**TD DATE:** 1957-02-21	**NAD 83**	Bayfield Pool
TVD: 580.95 **PBTD:**	**COMPLETE DATE:**	**SURF LAT:** 43.54862500 **SURF LONG:** -81.65380278	
	WORKOVER DATE:	**BOT LAT:** 43.54862500 **BOT LONG:** -81.65380278	
	PLUG DATE:		

FORMATION	TOP	TVD	ELEV
Drift	0.60	0.60	246.90
Top of Bedrock	62.50	62.50	185.00
Dundee	62.50	62.50	185.00
Lucas	68.60	68.60	178.90
Bois Blanc	179.80	179.80	67.70
Bass Islands/Bertie	236.20	236.20	11.30
G Unit	286.80	286.80	-39.30
E Unit	317.30	317.30	-69.80
D Unit	356.90	356.90	-109.40
C Unit	362.70	362.70	-115.20
B Salt	390.10	390.10	-142.60
A-2 Carbonate	435.30	435.30	-187.80
A-2 Anhydrite	446.50	446.50	-199.00
A-1 Carbonate	449.00	449.00	-201.50
Guelph	490.10	490.10	-242.60

COMMENTS
Latitude and longitude using 2006 Orthos in PetroGIS (AC, Sept 2008). Landowner info change May 2007 by F.Circelli. Concession designation in OPDS and well files changed to North of Bayfield Road (formerly BRN) on October 10, 2008 by PRC staff, after discussions with the Surveyor General's office as to the proper concession name. Tract designation changed to 9 in 2008, originally tract 1

INITIAL GAS INTERVAL	FLOW 1000 m3/dM	SIP kPag
555.96 - 562.97	0.034	
496.21 - 499.87		
534.62 - 535.23		
563.27 - 563.88		
544.37 - 545.59		
568.15 - 580.95		

INITIAL OIL INTERVAL	FLOW m3/d	SIP kPag

WATER RECORD INTERVAL	STATIC LEVEL	TYPE
12.19 -	9.14	Fresh
67.06 -	47.24	Fresh

LOGGING RECORD INTERVAL	TYPE	COMPANY

Casing O.D. (mm)	Weight (kg/m)	Setting Depth (m)	How Set
139.70	20.83	455.68	CEM
219.20	35.72	271.58	
273.05	59.53	121.92	
177.80	25.30	387.10	BHP
339.85	66.97	61.87	

CTY: Huron	**TWP:** Stanley	**TRACT:** 1	**LOT:** 10	**CON:** C
WELL NAME: Imperial 523 - Weston No. 1			**WELL ID:** F011904	**CLASS:** NPW
OPERATOR: Imperial Oil Ltd	**Target:** CLI		**STATUS:** DH - ABD	

DRILLING DATA	**DATES**	**COORDINATES**	**SAMPLES**
RIG TYPE:	**LICENCE ISSUED:**	**N/S BOUND:** 152.40 N	**TRAY:** 6123-4
GRND ELEV: 221.60	**SPUD DATE:**	**E/W BOUND:** 76.00 W	**POOL**
KB ELEV: 222.20	**TD DATE:** 1955-08-04	**NAD 83**	
TVD: 611.12 **PBTD:**	**COMPLETE DATE:**	**SURF LAT:** 43.56172444 **SURF LONG:** -81.67584528	
	WORKOVER DATE:		
	PLUG DATE: 1955-08-12	**BOT LAT:** 43.56172444 **BOT LONG:** -81.67584528	

FORMATION	TOP	TVD	ELEV
Drift	0.60	0.60	221.60
Top of Bedrock	32.00	32.00	190.20
Dundee	32.00	32.00	190.20
Lucas	50.30	50.30	171.90
Bois Blanc	178.30	178.30	43.90
Bass Islands/Bertie	227.10	227.10	-4.90
G Unit	275.20	275.20	-53.00
F Unit	286.80	286.80	-64.60
F Salt	330.40	330.40	-108.20
E Unit	336.80	336.80	-114.60
D Unit	361.20	361.20	-139.00
C Unit	370.00	370.00	-147.80
B Salt	398.10	398.10	-175.90
A-2 Carbonate	474.90	474.90	-252.70
A-2 Salt	509.90	509.90	-287.70
A-1 Carbonate	534.00	534.00	-311.80
A-1 Evaporite	572.70	572.70	-350.50
Guelph	574.90	574.90	-352.70
Rochester	598.00	598.00	-375.80
Reynales/Fossil Hill	603.50	603.50	-381.30
Cabot Head	609.90	609.90	-387.70

COMMENTS

Latitude and longitude corrected using GIS (J.C. 2009). Well located in Lot 10 Concession `Range C` of Bayfield Survey. Latitude and longitude corrected using GIS (K.M. - May '02). Concession designation in OPDS and well files changed to North of Bayfield Road (formerly BRN) on October 10, 2008 by PRC staff, after discussions with the Surveyor General's office as to the proper concession name. Tract designation changed to tract 9 in 2008, formerly tract 1.

INITIAL GAS INTERVAL	FLOW 1000 m3/dM	SIP kPag

INITIAL OIL INTERVAL	FLOW m3/d	SIP kPag

WATER RECORD INTERVAL	STATIC LEVEL	TYPE
38.10 -	4.60	Fresh
154.50 -	91.40	Salt
608.10 - 609.60	548.60	Salt

LOGGING RECORD INTERVAL	TYPE	COMPANY

Casing O.D. (mm)	Weight (kg/m)	Setting Depth (m)	How Set
178.05	34.20	296.00	
218.95	41.70	117.30	
273.05	61.00	111.30	
340.11	71.40	88.40	

CTY: Huron	**TWP:** Stanley	**TRACT:** 1	**LOT:** 10	**CON:** RE
WELL NAME: Paragon Bayfield #1			**WELL ID:** T008250	**CLASS:** NPW
OPERATOR: Clearwood Resources Inc.	**Target:** CLI		**STATUS:** DH - ABD	

DRILLING DATA	DATES	COORDINATES	SAMPLES
RIG TYPE: Cable	**LICENCE ISSUED:** 1995-03-13	**N/S BOUND:** 78.40 N	**TRAY:** 10500
GRND ELEV: 217.90	**SPUD DATE:**	**E/W BOUND:** 97.00 W	**POOL**
KB ELEV: 219.20	**TD DATE:** 1995-04-28	**NAD 83**	
TVD: 612.00 **PBTD:**	**COMPLETE DATE:**	**SURF LAT:** 43.55418139 **SURF LONG:** -81.67638972	
	WORKOVER DATE:	**BOT LAT:** 43.55418139 **BOT LONG:** -81.67638972	
	PLUG DATE: 1995-05-08		

FORMATION	TOP	TVD	ELEV
Drift	1.30	1.30	217.90
Top of Bedrock	50.00	50.00	169.20
Lucas	50.00	50.00	169.20
Amherstburg	117.00	117.00	102.20
Bois Blanc	171.00	171.00	48.20
Bass Islands/Bertie	227.00	227.00	-7.80
G Unit	271.40	271.40	-52.20
F Unit	279.70	279.70	-60.50
E Unit	312.70	312.70	-93.50
D Unit	356.10	356.10	-136.90
C Unit	366.00	366.00	-146.80
B Unit	387.00	387.00	-167.80
B Salt	394.00	394.00	-174.80
B Anhydrite	474.00	474.00	-254.80
A-2 Carbonate	475.00	475.00	-255.80
A-2 Salt	514.00	514.00	-294.80
A-2 Anhydrite	531.30	531.30	-312.10
A-1 Carbonate	535.00	535.00	-315.80
A-1 Evaporite	571.20	571.20	-352.00
Guelph	577.00	577.00	-357.80
Goat Island	584.00	584.00	-364.80
Gasport	593.50	593.50	-374.30
Rochester	598.50	598.50	-379.30
Reynales/Fossil Hill	601.40	601.40	-382.20
Cabot Head	604.80	604.80	-385.60

COMMENTS
Latitude and longitude corrected using GIS (K.M. - May '02).

INITIAL GAS INTERVAL	FLOW 1000 m3/dM	SIP kPag

INITIAL OIL INTERVAL	FLOW m3/d	SIP kPag

WATER RECORD INTERVAL	STATIC LEVEL	TYPE
64.00 -	20.00	Fresh
86.00 -	20.00	Fresh
135.00 -	20.00	Fresh
167.00 -	20.00	Fresh
117.00 -	20.00	Fresh
60.00 -	0.00	

LOGGING RECORD INTERVAL	TYPE	COMPANY
392.00 - 606.00	Sonic	Schlumberger
12.00 - 611.00	Compensated Neutron	Schlumberger
15.00 - 392.00	Cement Bond	Schlumberger

Casing O.D. (mm)	Weight (kg/m)	Setting Depth (m)	How Set
273.05	66.97	112.50	CEM
339.85	80.36	50.00	SHO
177.80	29.76	394.00	CEM

CTY: Huron	**TWP:** Stanley	**TRACT:** 3	**LOT:** 20	**CON:** XI
WELL NAME: Florentine et al 1			**WELL ID:** T007104	**CLASS:** NPW
OPERATOR: PPC Oil & Gas Corp.	**Target:** SAL		**STATUS:** DH - ABD	

DRILLING DATA	**DATES**	**COORDINATES**	**SAMPLES**
RIG TYPE:	**LICENCE ISSUED:** 1987-01-23	**N/S BOUND:** 107.70 N	**TRAY:** 9720
GRND ELEV: 250.00	**SPUD DATE:**	**E/W BOUND:** 610.60 W	**POOL**
KB ELEV: 251.50	**TD DATE:** 1987-03-27	**NAD 83**	
TVD: 613.50 **PBTD:**	**COMPLETE DATE:**	**SURF LAT:** 43.52634806 **SURF LONG:** -81.65394444	
	WORKOVER DATE:	**BOT LAT:** 43.52634806 **BOT LONG:** -81.65394444	
	PLUG DATE: 1987-04-07		

FORMATION	TOP	TVD	ELEV
Drift	1.50	1.50	250.00
Top of Bedrock	71.60	71.60	179.90
Dundee	71.60	71.60	179.90
Lucas	90.30	90.30	161.20
Amherstburg	131.10	131.10	120.40
Bois Blanc	161.50	161.50	90.00
Bass Islands/Bertie	221.60	221.60	29.90
G Unit	271.90	271.90	-20.40
F Unit	279.50	279.50	-28.00
E Unit	329.60	329.60	-78.10
D Unit	354.00	354.00	-102.50
C Unit	369.30	369.30	-117.80
B Unit	386.30	386.30	-134.80
B Salt	393.00	393.00	-141.50
A-2 Carbonate	471.70	471.70	-220.20
A-2 Shale	508.80	508.80	-257.30
A-2 Salt	510.10	510.10	-258.60
A-2 Anhydrite	531.30	531.30	-279.80
A-1 Carbonate	533.20	533.20	-281.70
A-1 Evaporite	569.80	569.80	-318.30
Guelph	575.10	575.10	-323.60
Goat Island	582.40	582.40	-330.90
Gasport	591.40	591.40	-339.90
Rochester	596.00	596.00	-344.50
Reynales/Fossil Hill	600.20	600.20	-348.70
Cabot Head	603.50	603.50	-352.00

COMMENTS
Latitude and longitude corrected using GIS (K.M. - May '02).

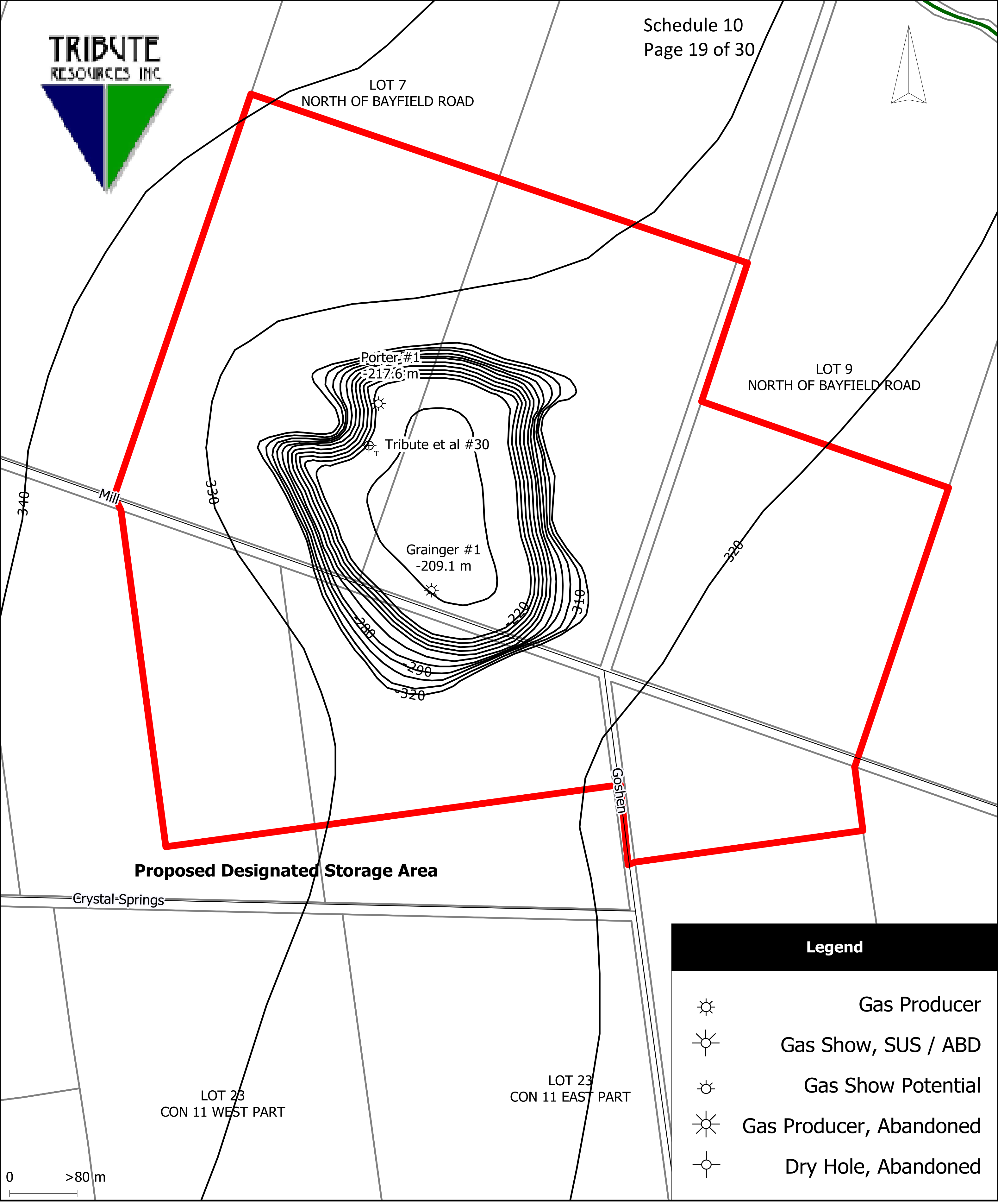
INITIAL GAS INTERVAL	FLOW 1000 m3/dM	SIP kPag
575.40 - 582.80	SHOW	

INITIAL OIL INTERVAL	FLOW m3/d	SIP kPag

WATER RECORD INTERVAL	STATIC LEVEL	TYPE
75.00 -	61.00	Fresh
325.00 -	0.00	Salt
154.00 -	61.00	Sulphur

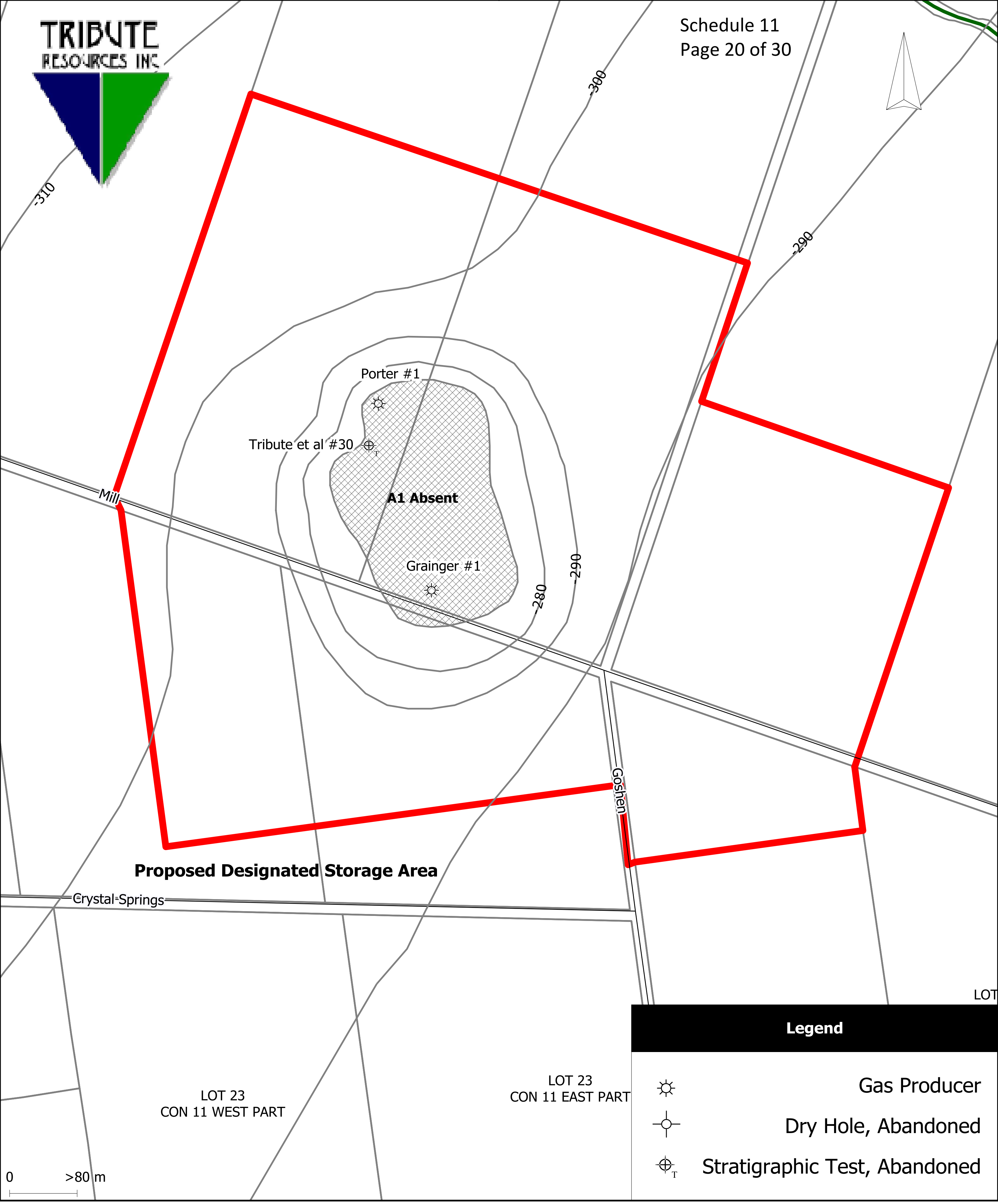
LOGGING RECORD INTERVAL	TYPE	COMPANY
20.00 - 613.00	Natural Gamma Ray	Schlumberger
365.00 - 613.50	Microspherically Focussed Laterolog	Schlumberger
365.00 - 613.50	Dual Laterolog	Schlumberger
20.00 - 603.00	Gamma Ray	Schlumberger
350.00 - 613.00	Dipmeter	Schlumberger
20.00 - 613.00	Compensated Neutron Formation Density	Schlumberger

Casing O.D. (mm)	Weight (kg/m)	Setting Depth (m)	How Set
178.05	30.00	291.60	SHO
218.95		176.30	PAC
340.11	76.00	64.60	SHO
273.05	60.00	85.90	SHO



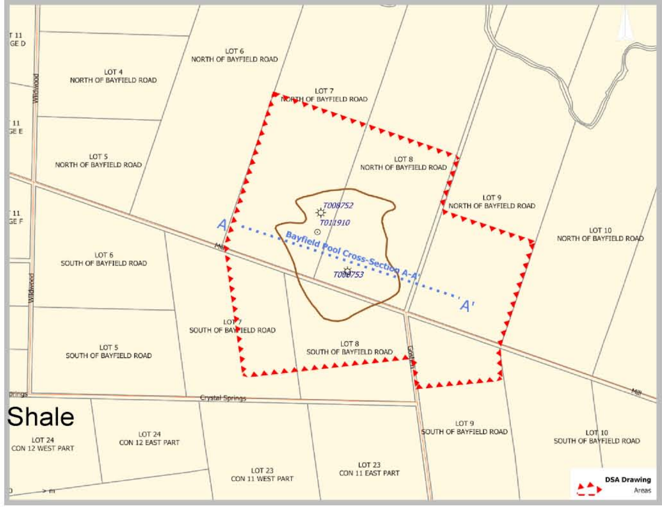
Bayfield Pool
Guelph Structure

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 16/09/2009



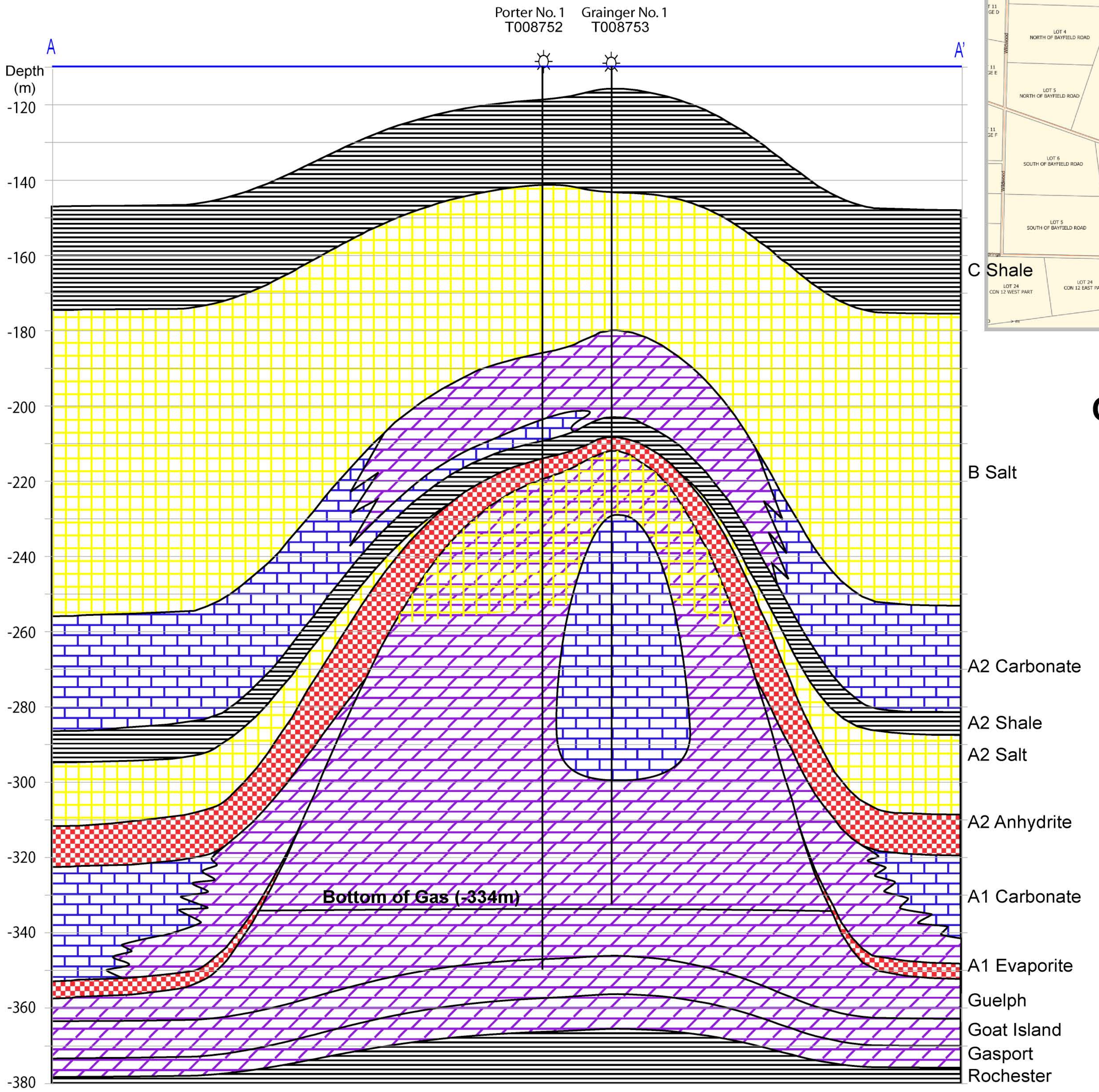
Bayfield Pool
A1 Carbonate Structure

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009



Bayfield Pool

Cross-Section A-A'

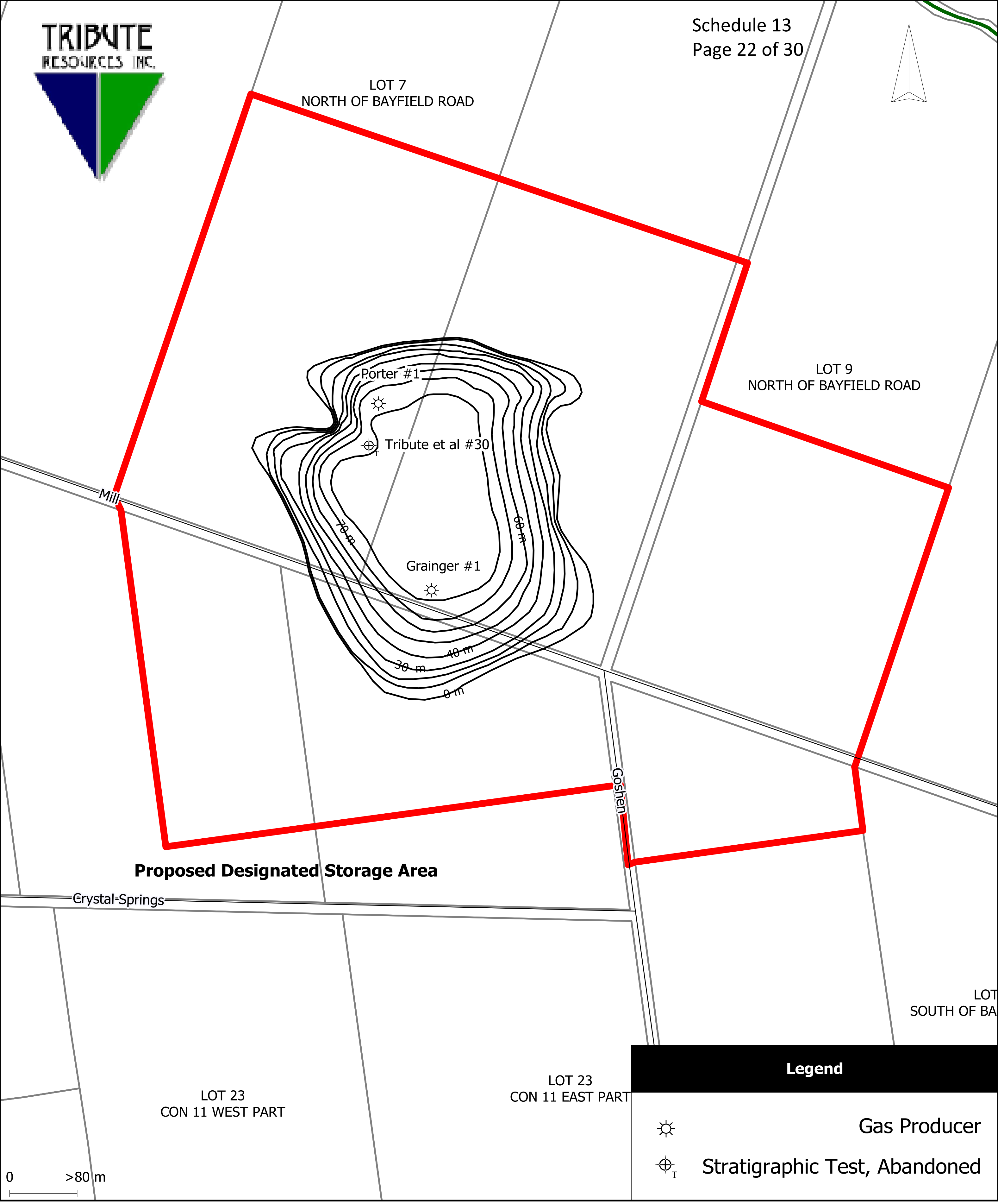


Gas Well
Abandoned Gas Well
Well Location
Shale
Salt
Limestone
Dolomite
Anhydrite
Salt Plugging

TRIBUTE RESOURCES INC.

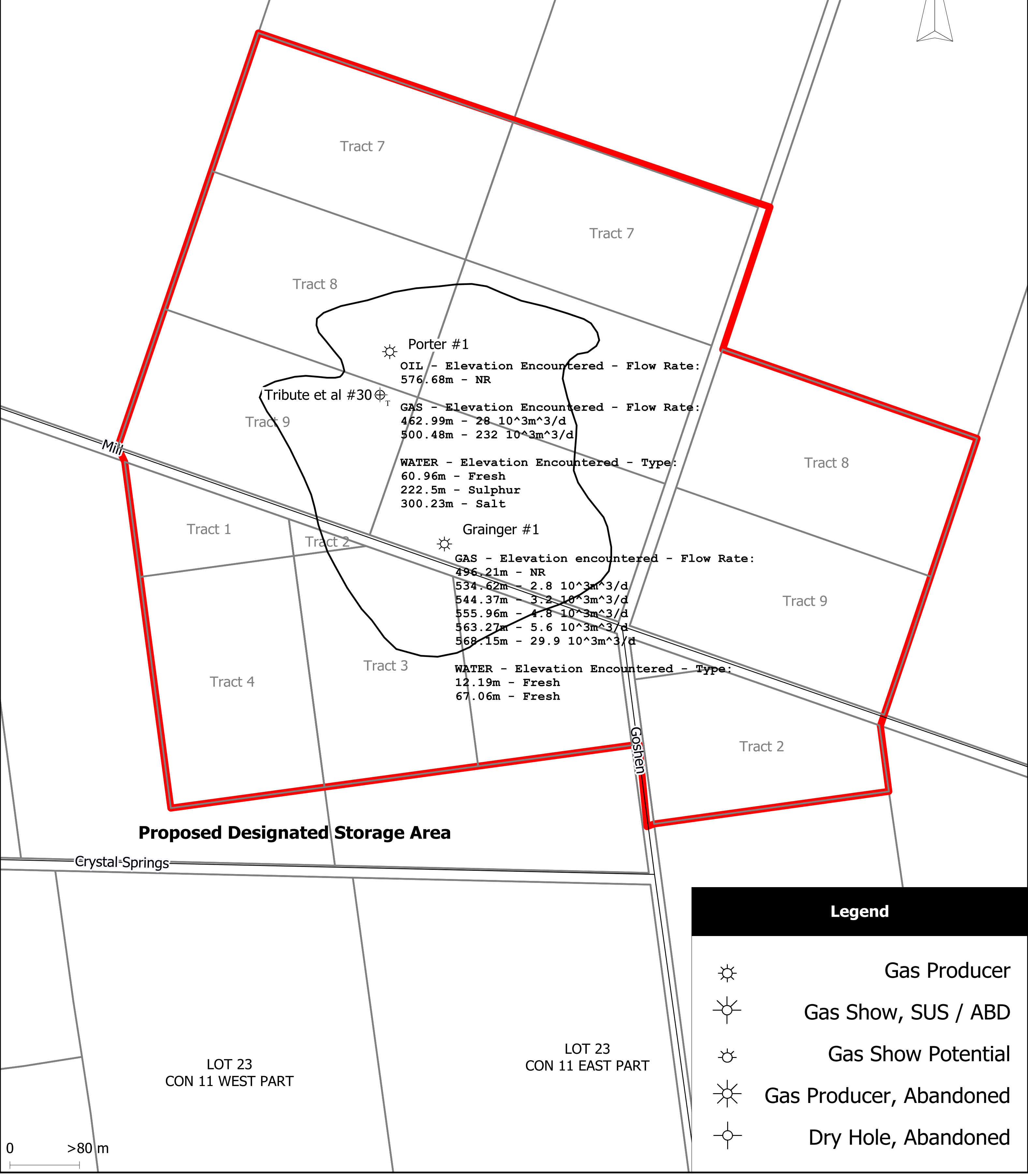
March 25, 2009

Prepared by J.C. for
Tribute Resources Inc.



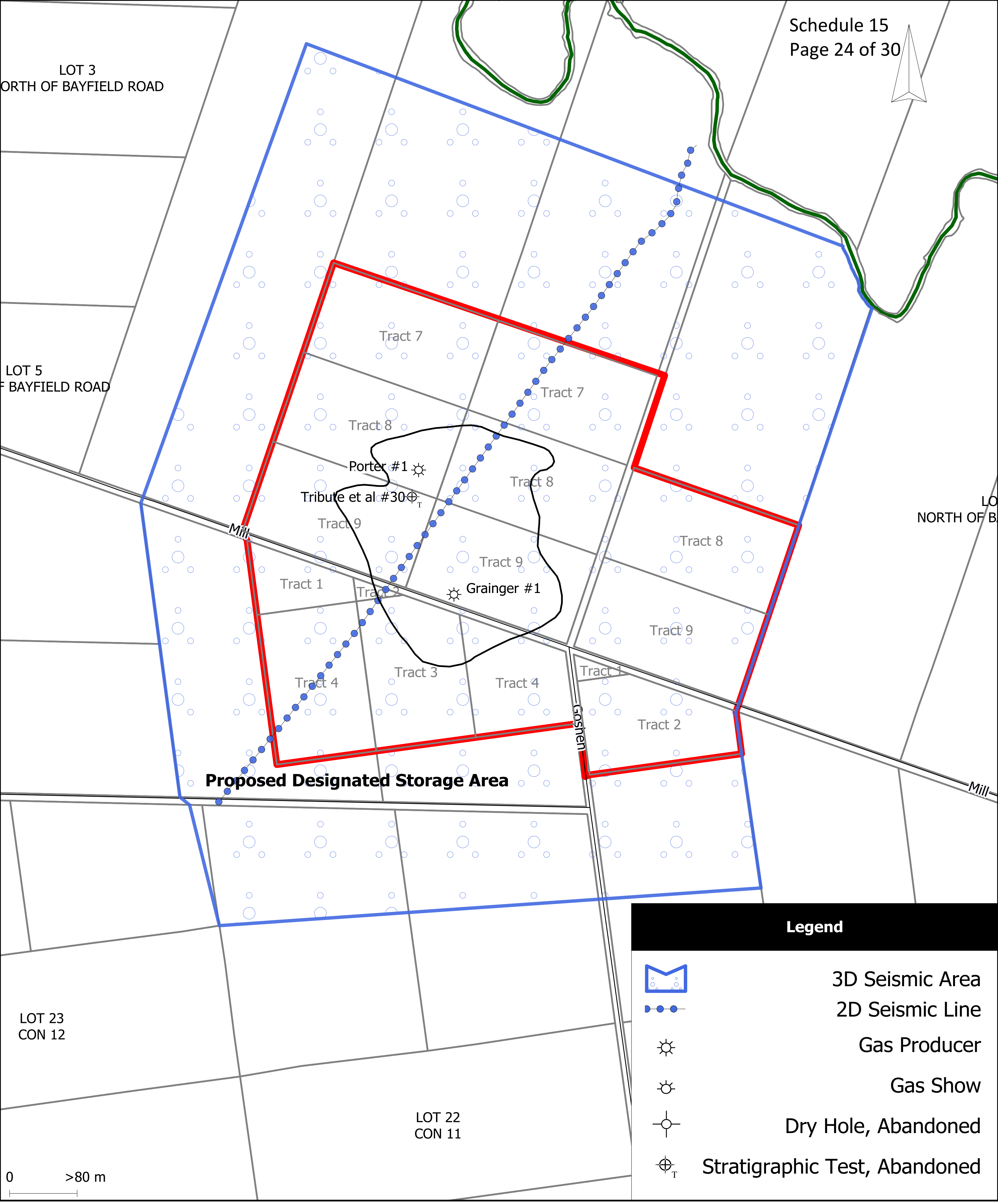
Bayfield Pool
Gross Gas Isopach

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009



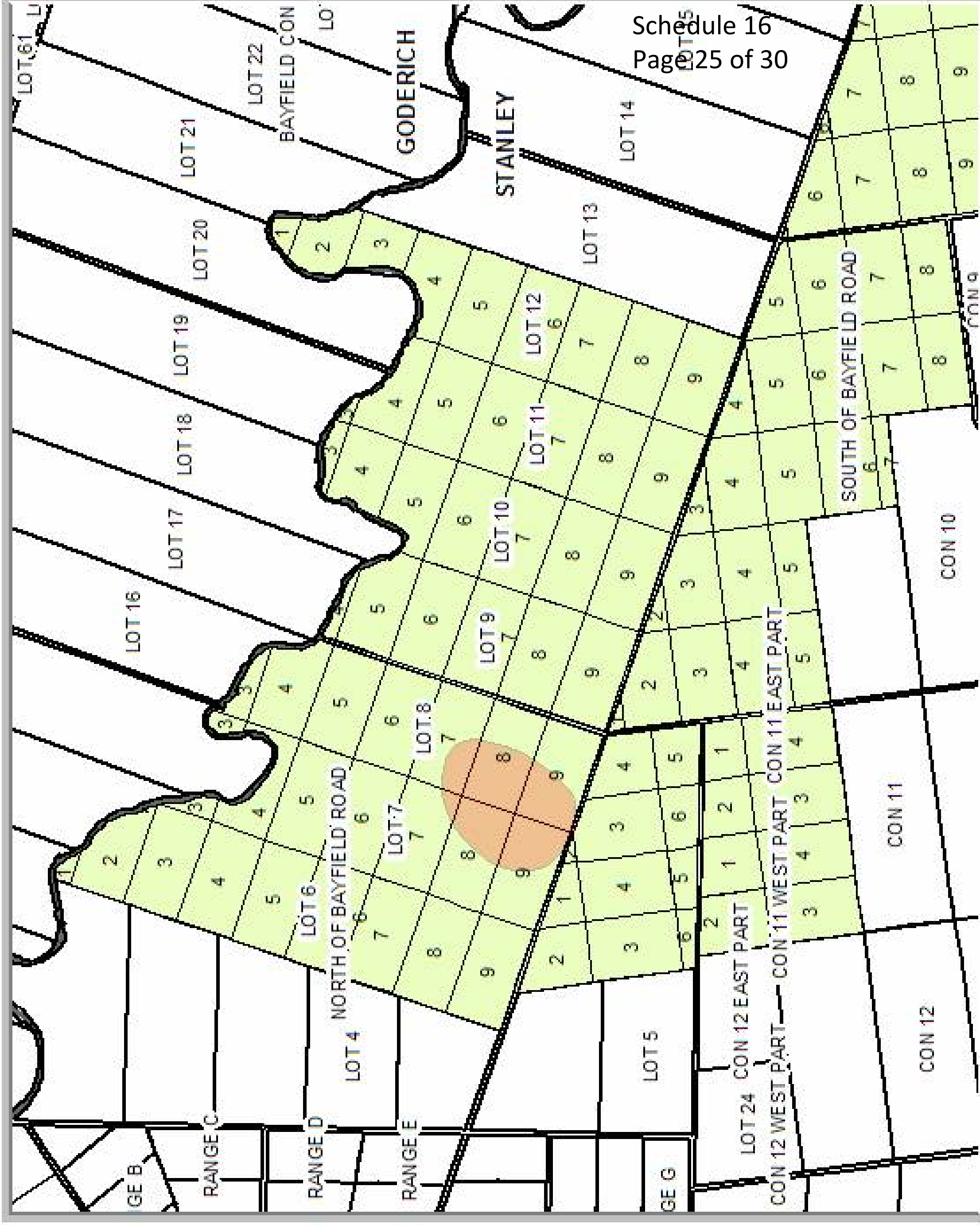
Bayfield Pool Show Map

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009



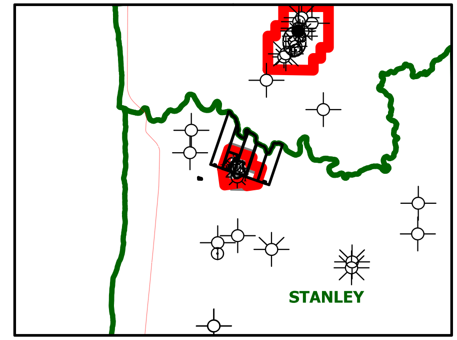
Bayfield Pool
Seismic Coverage

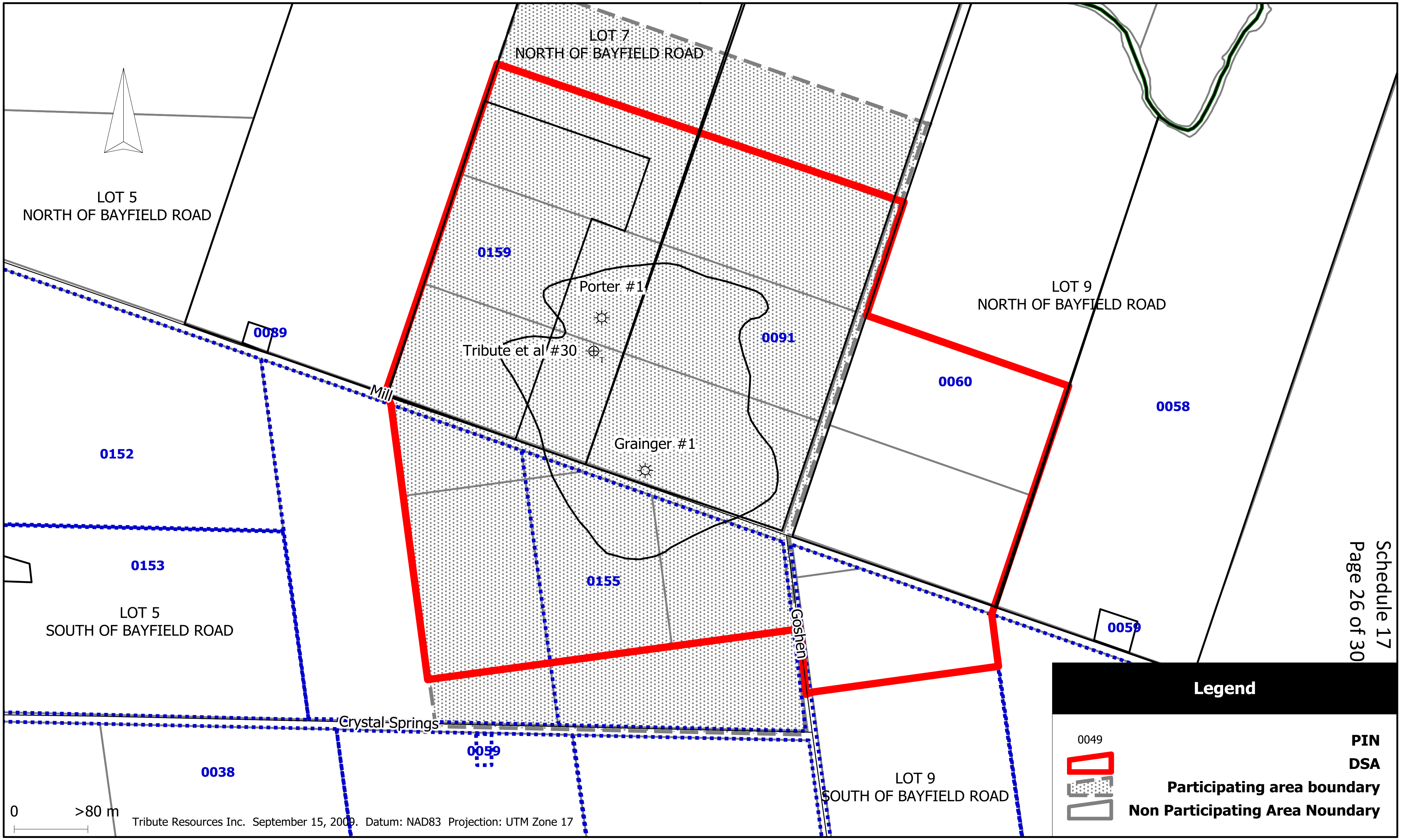
Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009


GODERICH
STANLEY
BAYFIELD CON
LOT 22
LOT 21
LOT 20
LOT 19
LOT 18
LOT 17
LOT 16
LOT 14
LOT 13
LOT 12
LOT 11
LOT 10
LOT 9
LOT 8
LOT 7
LOT 6
LOT 5
LOT 4
LOT 24
NORTH OF BAYFIELD ROAD
SOUTH OF BAYFIELD ROAD
CON 10
CON 11
CON 12
CON 11 EAST PART
CON 11 WEST PART
CON 12 EAST PART
CON 12 WEST PART
RANGE C
RANGE D
RANGE E

Bayfield Pool

PIN	Landowner	Location
0159	S. Eilers (Porter)	Stanley 7-BRN
0160	Mun. Bluewater (Porter)	Stanley 7-BRN
0091	Hill and Hill (Grainger)	Stanley 8-BRN
0060	GAC Corp. (Grainger)	Stanley 9-BRN
0155	Jarva Farms	Stanley 7+8-BRS
0003	McBride Farms	Stanley 9-BRS





Tribute Resources Inc. September 15, 2009. Datum: NAD83 Projection: UTM Zone 17

Bayfield Pool
Reef Edge to DSA Boundary

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 16/09/2009

Ontario

RECORD OF TECHNICAL DATA REVIEWED FOR A PROPOSED DESIGNATED GAS STORAGE AREA

Date:	January 12, 2009			
Proponent:	Neil Hoey, Howard Jordan (Name)		Tribute Resources Inc. (Representing)	
DSA Name:	Bayfield Pool			
Zone(s):	Silurian – Guelph Pinnacle Reef			
Area:	**Tracts**	**Lots**	**Concs.**	**Township**
	7,8,9	7,8	North of Bayfield Rd	Stanley
	8,9	9	North of Bayfield Rd	Stanley
	1,4	7	South of Bayfield Rd	Stanley
	2,3,4	8	South of Bayfield Rd	Stanley
	1,2	9	South of Bayfield Rd	Stanley

DATA SUBMITTED:

Well Data		Geo-physical/chemical Data	
Completion record		Seismic profile	
DST		Seismic interpretation 3-D	√
Draw down test		Gravity	
Build-up test		Magnetic	
Pressure survey		Geochemical:	
Other:		Other: Formation tops	√

Data Retained: √ Yes ☐ No

COMMENTS:

Ministry staff are in agreement with the proposed area and boundaries? √ Yes ☐ No

R. M. Rybansky

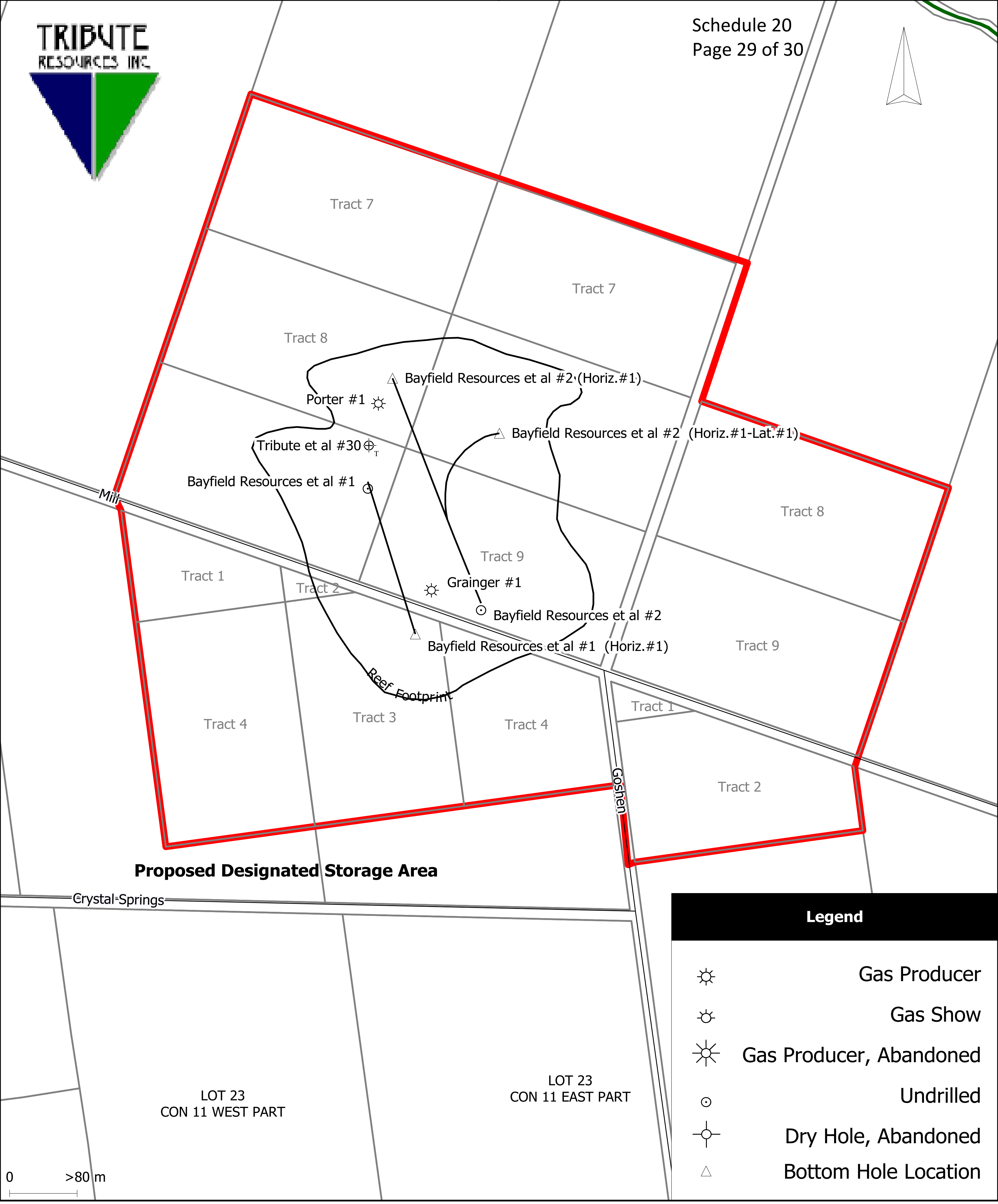
Signature – Petroleum Resources Staff

Proposed DSA has been approved by the OEB? ☐ Yes
If yes, return signed copy of this form to Petroleum Resources Centre.

Name	Signature	Date

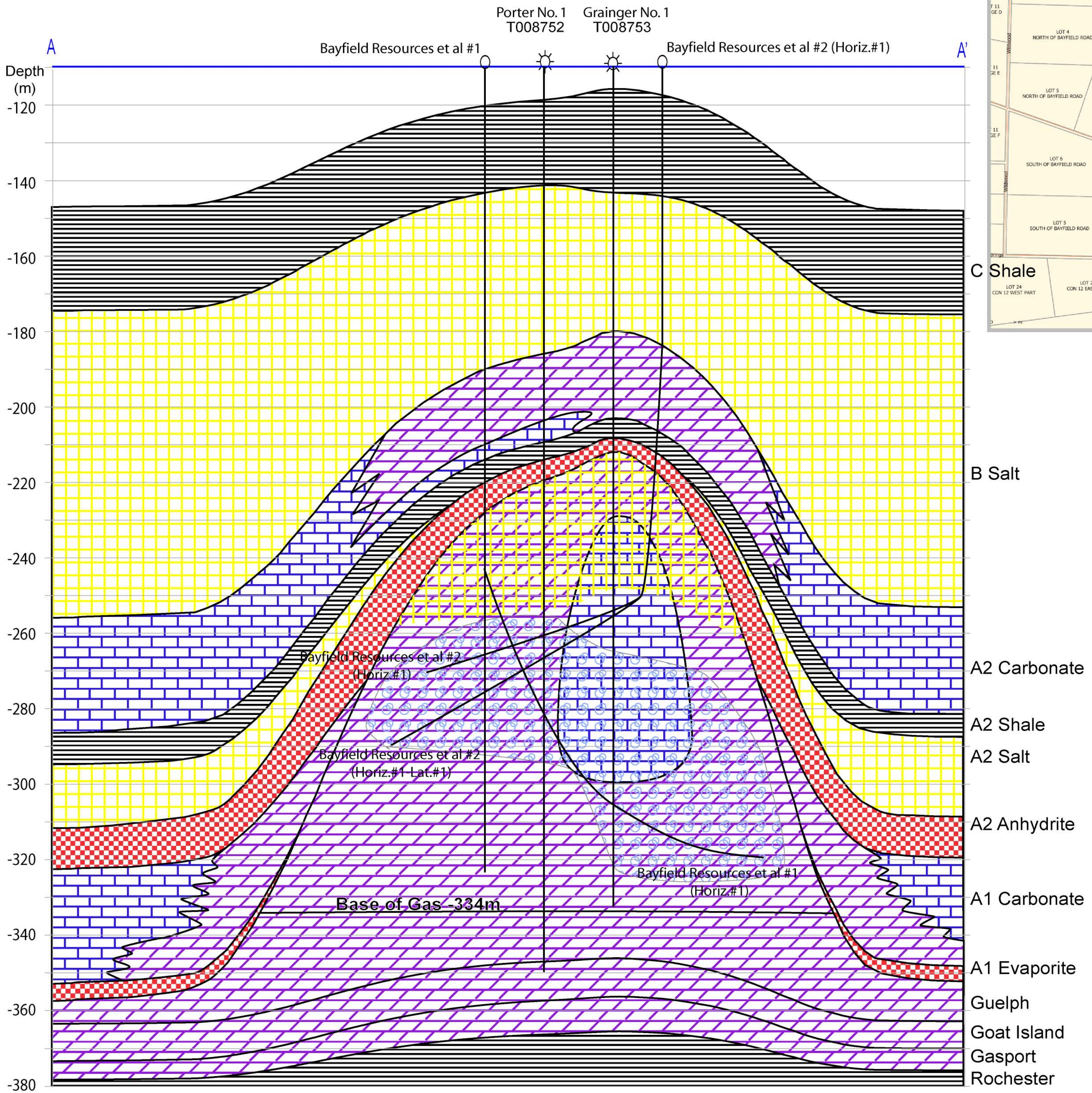
MNR Use Only

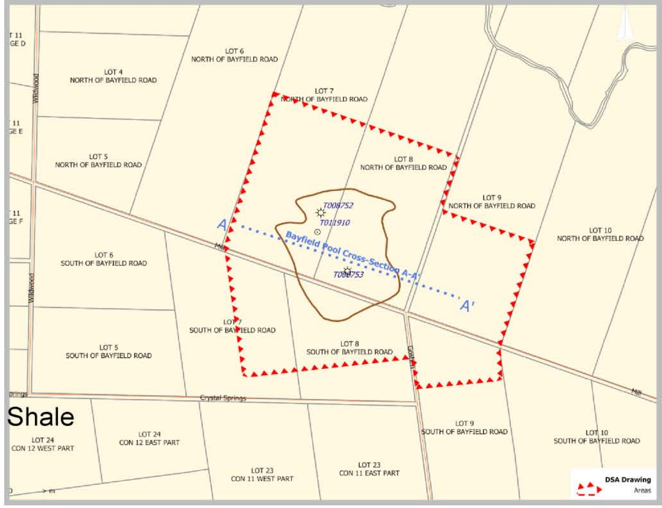
Checklist	√	Initial	Date	Comments
DSA Boundary Plotted				
DSA File Created				



Bayfield Pool
Proposed Well Bores

Universal Transverse Mercator - Zone 17 (N).
Contour Interval: 10m. All Units Metric.
Lon: 81°39'10" W
Lat: 43°32'53" N
Prepared by: J.C. for Tribute Resources Inc.
Printed at: 15/09/2009





Bayfield Pool

Cross-Section A-A'

- Gas Well
- Abandoned Gas Well
- Well Location
- Shale
- Salt
- Limestone
- Dolomite
- Anhydrite
- Salt Plugging
- Porosity

TRIBUTE RESOURCES INC.

March 25, 2009

Prepared by J.C. for
Tribute Resources Inc.

Tab C

Bayfield Pool Reservoir Engineering Report

September 2009
Jim McIntosh Petroleum Engineering Ltd.

On behalf of

Tribute Resources Inc. and Bayfield Resources Inc.

For the Ontario Energy Board

EB-2009-0339

Table of Contents: **Page #**

List of Schedules:

Introduction

The Bayfield Guelph pinnacle reef (the "Bayfield Pool") was discovered in 1956 by Bluewater Oil and Gas with the drilling of Bluewater Porter #1, Stanley 7-BRN. A second well, Bluewater Grainger #1, Stanley 8-BRN, was drilled in the pool prior to the start of production. The pool was produced from 1958 until mid 2008, when the pool was shut in as a depleted gas storage reservoir.

Tribute Resources Inc. and Bayfield Resources Inc. (the "Operator") plans to convert the Bayfield Pool to a gas storage reef. The Bayfield Pool Reservoir Engineering Report summarizes the reservoir engineering data associated with the pool, calculates the Original Gas-in-Place for the pool, calculates the Gas-in-Place and Working Gas for the pool once it is delta pressured, and estimates the number and type of Injection/Withdrawal (I/W) wells that will be required to cycle the Working Gas into and out of the pool on an annual basis.

Original Gas-in-Place and Delta Pressured Gas-in-Place

The Bayfield Guelph pinnacle reef (the “Bayfield Pool”) was discovered with the drilling of Bluewater Porter #1, Stanley 7-BRN (the “Porter well”) in 1956. The Porter well contacted an excellent quality dolomitized Guelph pinnacle reef section that flow tested at 8.2 MMcfd while drilling. A Sandface Absolute Open Flow (AOF) test was conducted on the well on October 31, 1956 which resulted in a Sandface AOF of 8.65 MMcfd with a surface shut-in pressure of 409.5 psig (423.9 psia), downhole shut-in pressure of 430.3 psig (444.7 psia), and Sandface n and Sandface C values of .592 and 6.34×10^{-3} MMcfd/[$(psia^2)^n$] respectively.

Bluewater followed up the discovery well with Bluewater Grainger #1, Stanley 8-BRN (the “Grainger well”) in 1957. The Grainger well as well contacted an excellent quality Guelph pinnacle reef that flow tested at 1.1 MMcfd while drilling with a surface shut-in pressure of 410 psig (424.4 psia).

Production commenced from the Bayfield Pool in 1958, with continuous production until early 1972. The pool was shut in from 1972 until 1983 then produced from 1983 until 1986, from late 1988 until 1991, from late 1992 until the fall of 1994, and from the fall of 2003 until mid-year 2008. The Bayfield Pool has been shut in since then. Schedule 1 contains a table and graph showing the production history from the pool.

Annual surface shut in pressures were obtained from the Grainger and Porter wells during the 1958 to 1973 period, and sporadically during the remaining production period. All of these pressure points were obtained by measuring surface shut-in pressures after the well(s) had been shut in for a period of time. The shut-in times varied from 24 hours to 336 hours. This type of pressure measurement (surface shut-in pressures extrapolated to downhole pressures) gives a very good idea of the downhole reservoir pressure providing no fluid is present in the wellbore, and providing the well is shut-in long enough for the wellbore to stabilize with the reservoir pressure. To obtain downhole pressures equivalent to these surface shut-in pressures, one needs to know or assume a fluid gradient in the wellbore. If the well contains only natural gas, this extrapolation of surface pressures to downhole pressures is accurate. However, if any fluid is present in the wellbore, the reservoir pressure calculated by extrapolating the surface pressure to downhole pressure using a gas gradient will result in a calculated reservoir pressure lower than the true reservoir pressure at the time. If the shut in period prior to measuring the surface shut-in pressure is short, the shut-in well pressure may still be increasing at a slow rate as gas and associated reservoir pressure within the main porous part of the reef move toward the pressure sink caused by production from the well. In this case, the surface pressure measured and resulting extrapolated reservoir pressure will lead to a calculated reservoir pressure for the near wellbore part of the reef only and would not necessarily represent the total porous reef reservoir pressure, nor would it include any tighter gas pressure support from salt plugged parts of the reef or from halo A-1 Carb areas surrounding the reef. As the reservoir pressure in the main, porous part of the reef gets very low due to production, small quantities of gas and associated pressure contained within lower perm partially salt plugged sections of the reef or from minor porosity in any A-1 halo porosity around the perimeter of the reef will start to inflow into the main porous part of the reef, slightly supporting the shut-in pressures measured at the producing wells. Although this additional pressure support is real, from a gas storage point of view, the permeability associated with this tight gas is so small that the porosity containing this tight gas will not be an effective part of the storage pool. For both of these reasons, surface shut-in pressure data can lead to either an underestimate or a slight overestimate of actual reservoir pressures reflective of the main porosity in the pool. A short summary of the well data on the Porter and Grainger wells and a complete list of all pressure data for the Bayfield Pool, extrapolated to the pool datum of -323.1 mss (-1060 ftss), is included in Schedule 2.

To accurately measure downhole reservoir pressures, one must measure the pressure in the wellbore at the depth of the pay zone, and those pressure measurements must continue for a period of time to confirm that the wellbore pressure is stable and not still building slowly. To obtain a current accurate reservoir pressure in the Bayfield Pool, electronic pressure recorders were lowered into the Porter well on July 29th, 2008, and retrieved on August 19th, 2008. The pressure data confirms that the full reservoir pressure is present at the wellbore, as the measured pressure was not increasing. This pressure data is more accurate than surface measured pressures extrapolated to the reservoir depth because the recorded pressures were at the reservoir face and not influenced by assumed fluid gradients within the wellbore. As discussed above, this reservoir pressure will include the main, well connected part of the reef as well as any tighter salt plugged parts or A-1 halo areas surrounding the reef. A graph of this downhole electronic pressure and table of associated pressure/time data points is included in Schedule 2, appended to this report.

The material balance plot (the "P/z plot") for the Bayfield Pool used to determine Delta-pressured gas-in-place volumes uses the original shut-in pressures from the Porter and Grainger wells when they were initially drilled and prior to commencement of production along with the extrapolated reservoir pressure measurements from the time of initial production until early 1971. The additional pressure points since early 1971 are heavily influenced by tighter perm gas inflowing into the main pool area and partially supporting pool pressure, so these additional data points have not been included. This tighter perm area does not represent effective reservoir perm for a gas storage reservoir due to the quick turnaround from gas injection to gas withdrawal that is the nature of gas storage containers. All surface shut-in pressure data have been extrapolated to an equivalent downhole pressure using the gas properties from the nearby Stanley pool (gas gravity: .66, N_2: 6.13%, CO_2: .03%), the Bayfield Pool datum depth of

-1060 ft sub-sea (-323.1mss), and a reservoir temperature of 13.1°C (55.6°F) as measured from the 2008 downhole pressure survey obtained from the Porter well.

In a closed tank-type gas reservoir, the decline in reservoir pressure, adjusted for the non-ideal nature of natural gas (the “z factor” or “compressibility factor”) is proportional to the cumulative production of natural gas from the reservoir. This P/z plot is often called a “Material Balance” plot. The Bayfield Material Balance Original Gas-in-Place summary table, P/z plot, a plot of pressure versus time, and a table listing all pressure and P/z data points are included in Schedule 3. The P/z plot indicates an Original Gas-in-Place (the “OGIP”) value of 67.91 $10^6 m^3$ (2.410 Bcf) for the pool, with an original downhole reservoir pressure of 3065 kPa_a (444.6 psia). The current reservoir pressure, as measured with the downhole pressure recorders in the summer of 2008 is 315 kPa_a (45.7 psia). As discussed above, this reservoir pressure is heavily supported by tighter low perm gas inflowing from the salt plugged regions or A-1 halo of the pool, so this pressure point does not fall on the Material Balance straight line. Because there is a straight line relationship between P/z and cumulative production, this P/z plot can be used to calculate the volume of natural gas that will be contained within the Bayfield Pool at any pressure. This cumulative gas versus P/z factor, called the “Material Balance Factor”, for the Bayfield Pool is 20.5 $10^3 m^3$/kPa (4.998 MMcf/psi).

The Tribute Resources et al #30, Stanley 9-7-NBR well was being drilled by Tribute Resources to obtain a core of the A2 Anhydrite cap rock to the Bayfield Pool for threshold pressure testing. Unfortunately, the drill tools were lost in the shallower part of the well and could not be retrieved so the well was abandoned. Bayfield Resources et al #1, Stanley 9-7-NBR will be drilled to collect the A2 Anhydrite cap rock core. Threshold pressure test analysis will be performed on this core to confirm the strength of the cap rock, and is expected that the Bayfield Pool is capable of handling reservoir pressures in excess of the initial reservoir pressure of 3065 kPa_a (444.6 psia). The threshold tests performed on other A2 anhydrite cap rock samples in Huron County pools and in Lambton County pools have confirmed that the A2 anhydrite is a very tight (no to very low permeability) zone that acts as an excellent seal over the underlying A1 Carbonate/Guelph reefs. Tribute anticipates that the threshold testing on this core will confirm that the A2 anhydrite is capable of containing underlying reservoir pressures of at least 12,000kPa (1740 psi). This 12,000 kPa (1740 psi) pressure, in conjunction with the depth of the A2 anhydrite at the crest of the pinnacle reef trap, is often referred to as the fracture gradient for the rock. The crest of the Bayfield Pool is at a depth of 456.0m, so this anticipated threshold pressure will equate to a fracture gradient of 26.3 kPa/m (1.16 psi/ft). As a conservative estimate, Tribute has used an assumed fracture gradient of 22.6 kPa/m (1 psi/ft) in the design of the Bayfield Pool for storage.

The maximum reservoir pressure (the "delta-Pressure") planned during the storage operation is based on this assumed fracture gradient. Tribute has used a 30% safety factor on this 22.6 kPa/m (1 psi/ft) fracture gradient, and is applying for approval to delta-Pressure the Bayfield Pool to a gradient of 15.8 kPa/m (0.7 psi/ft), which is similar to delta-Pressure gradients used in other storage pools in Huron and Lambton Counties. This delta-Pressure gradient equates to a delta-Pressure for the Bayfield Pool of 7219 kPaa (1047 psia) measured at the reservoir face directly below the A2 anhydrite cap rock at a depth of 456.0m (1,496 ft).

The equivalent P/z value (pressure adjusted for the non-ideal nature of natural gas) to the 7219 kPaa (1047 psia) delta-Pressure for the Bayfield Pool is 8598 kPaa (1247 psia) using Union Gas system gas analysis to calculate the compressibility factor (gas gravity: .591, N_2: 2.38%, CO_2: .33%). This P/z value, in combination with the Material Balance Factor for the Bayfield Pool, leads to a delta-Pressured Gas-in-Place gas volume of 176.5 10^6m^3 (6,231 MMcf). The cushion gas pressure designed into most gas storage reservoirs in Ontario is 2068 kPa_a (300 psia) at the reservoir face. The remaining gas in the Bayfield Pool at this cushion gas pressure will be 44.6 10^6m^3 (1,575 MMcf). The working gas capacity is the difference between the delta-pressured gas-in-place and the cushion gas-in-place, or 131.9 10^6m^3 (4,656 MMcf).

The original discovery pressure, original gas-in-place, delta pressure, delta pressure gas-in-place, and working gas capacity for the Bayfield Pool are summarized below:

Original Discovery Pressure (kPa_a)	Original Gas-in-Place (10^6m^3)	Delta-Pressure (kPa_a)	Delta-Pressured Gas-in-Place (10^6m^3)	Bayfield Pool Working Gas (10^6m^3)
3065	67.91	7,219	176.5	131.9

Original Discovery Pressure (psia)	Original Gas-in-Place (MMcf)	Delta-Pressure (psia)	Delta-Pressured Gas-in-Place (MMcf)	Bayfield Pool Working Gas (MMcf)
444.6	2,410	1047	6,231	4,656

Well Deliverability

The flowrate from a gas well at varying drawdown pressures can be predicted using the "simplified AOF formula":

$$q = C^*(P_r^2 - P_{wf}^2)^n$$

where:

- q = flow rate at standard conditions ($10^3m^3/D$ metric, MMcfd imperial)
- P_r = Static pressure (kPa_a metric, psia Imperial)
- P_{wf} = Flowing pressure (kPa_a metric, psia Imperial)
- C = constant that describes the position of the stabilized deliverability line [$10^3m^3/D/(kPa_a^2)^n$ metric, $MMcfd/(psia^2)^n$ Imperial]
- n = an exponent that describes the slope of the deliverability line and the degree of turbulence in the reservoir, and varies between 0.5 and 1

For smaller flow rate gas wells, the n factor is equal to or very close to 1. As the reservoir permeability increases, the amount of turbulence either in the near wellbore reservoir (for the Sandface AOF) or in the near wellbore reservoir and well tubulars (for the Wellhead AOF) increases and the "n" factor decreases. The AOF plot for a well is a plot of pressure squared on the "y" axis versus gas flow rate plotted on the "x" axis, plotted on log-log scales. The Deliverability plot for a well is simply a plot of pressure on the "y" axis versus gas flow rate on the "x" axis plotted on coordinate scales. An AOF plot or Deliverability plot can be calculated for a gas well either based on wellhead conditions (the Wellhead AOF Plot or Wellhead Deliverability Plot) or on downhole conditions (Sandface AOF Plot or Sandface Deliverability Plot). The Absolute Open Flow (AOF) for a well is simply the gas flow rate equivalent to a flowing pressure, P_{wf}, of 0 kPa_a (0 psia).

The Porter well and the Grainger well originally flow tested at Wellhead AOF rates of 8.2 MMcfd and 1.1 MMcfd respectively. A series of 8 short (½ to ¾ hour) flow tests were performed on the Porter well on October 31, 1956 which led to a Sandface AOF Plot with a "C" value of 6.34×10^{-3} $MMcfd/[psi^2]^n$ and an "n" value of .592. Equivalent Wellhead AOF "n" and "C" values have been calculated for this flow test and are listed below. Without an equivalent flow test from the Grainger well, an "n" value of 1 has been assumed for the Sandface AOF calculations, with the constant, "C", calculated using the Sandface AOF formula based on the 1.1 MMcfd flow test rate while drilling and the initial shut-in pressure extrapolated to the reservoir face. As with the Porter well, equivalent Wellhead AOF "n" and "C" values have been calculated and are listed below. The equivalent "n" factor for the Wellhead AOF will be slightly less than the Sandface "n" value due to the additional turbulence and friction loss caused by the well casing/tubing configuration. The Sandface and Wellhead AOF, "C", and "n" values for both wells are summarized below. The Deliverability plots for both wells are included in Schedule 4, attached to this report.

	Sandface n	Sandface C ($10^3 m^3/D/(kPa_a^2)^n$)	Wellhead n	Wellhead C ($10^3 m^3/D/(kPa_a^2)^n$)
Porter well	0.592	1.81×10^{-2}	0.590	1.98×10^{-2}
Grainger well	1.0	3.30×10^{-6}	0.995	3.93×10^{-6}
Average	0.796	2.44×10^{-4}	0.792	2.79×10^{-4}

	Sandface n	Sandface C ($MMcfd/(psia^2)^n$)	Wellhead n	Wellhead C ($10^3 m^3/D/(kPa_a^2)^n$)
Porter well	0.592	6.34×10^{-3}	0.590	6.85×10^{-3}
Grainger well	1.0	5.57×10^{-6}	0.995	6.49×10^{-6}
Average	0.796	1.88×10^{-4}	0.792	2.11×10^{-4}

The average "C" and "n" values from the Porter and Grainger wells can be used to estimate the AOF's for an "average" vertical Injection/Withdrawal ("I/W") well at all pressures up to the delta-Pressure. The gross gas pay in the Porter and Grainger wells are 74.7 m (245 ft) and 80.5 m (264 ft) respectively as presented in the geological evidence, with the average gross gas pay being 77.6 m (255 ft). By drilling either horizontally or at a high angle through the Guelph zone, the effective gross gas pay contacted by a wellbore can be greatly increased. This increased gross gas pay will be closely related to an increase in the "C" value for that well. Besides vertical wells, 2 other potential I/W well configurations and deliverabilities have been estimated. In the deviated well case, a wellbore angle of 60^o from vertical is assumed while in the reef. This well configuration would potentially increase the gross gas pay contacted with the wellbore by 100%, and would lead to a Sandface "C" value of 4.88×10^{-4} $10^3 m^3/D/(kPa_a^2)^n$ [3.76×10^{-4} $MMcfd/(psia^2)^n$]. By drilling a horizontal well through the porous part of the Guelph zone, the gross gas pay contacted is theoretically only limited by the length of the horizontal section within the reef. For the analysis here, I have assumed about 520 m (1700 ft) of porous reef can be contacted by a multi-lateral horizontal well, resulting in a "C" value of 1.62×10^{-3} $10^3 m^3/D/(kPa_a^2)^n$ [1.25×10^{-3} $MMcfd/(psia^2)^n$]. The resulting Sandface and Wellhead AOF's for these three well configurations are tabulated below. All AOF values are with the reservoir pressured to the delta-Pressure value of 7219 kPaa (1047 psia).

	Sandface			Wellhead		
	C ($10^3m^3/D/(kPa_a{}^2)^n$)	N	AOF ($10^3m^3/D$)	C ($10^3m^3/D/(kPa_a{}^2)^n$)	N	AOF ($10^3m^3/D$)
Vertical I/W well	$2.44x10^{-4}$	0.796	340.2	$2.88x10^{-4}$	0.791	339.7
Deviated IW well	$4.88x10^{-4}$	0.796	680.4	$6.15x10^{-4}$	0.787	675.0
Horizontal I/W well	$1.62x10^{-3}$	0.796	2262.1	$3.16x10^{-3}$	0.759	2112.7

	Sandface			Wellhead		
	C ($MMcfd/(psia^2)^n$)	N	AOF (MMcfd)	C ($MMcfd/(psia^2)^n$)	N	AOF (MMcfd)
Vertical I/W well	$1.88x10^{-4}$	0.796	12.08	$2.17x10^{-4}$	0.791	12.06
Deviated IW well	$3.76x10^{-4}$	0.796	24.15	$4.56x10^{-4}$	0.787	23.96
Horizontal I/W well	$1.25x10^{-3}$	0.796	80.29	$2.10x10^{-3}$	0.759	74.99

Deliverability plots for all of these potential well configurations are appended as Schedule 5 of the report. These deliverability plots show both the Sandface and Wellhead deliverability curves, assuming 178mm (7”) casing is installed in each I/W well.

These potential well configurations, in conjunction with the delta Pressured Gas-in-Place and working gas volumes were input into a pipeline and wellbore simulation program to estimate the number and type of potential wellbores required to effectively cycle the working gas volume of the Bayfield Pool over a 121 day winter withdrawal period with a maximum drawdown of 20%. Based on this pipeline simulation, the Bayfield Pool will require a total Sandface “C” value of all producing wells of $3.82x10^{-3}$ $10^3m^3/D/(kPa_a{}^2)^n$ [$4.98x10^{-3}$ $MMcfd/(psia^2)^n$] with an average “n” value of 0.796. With the high Gas-in-Place per acre and small reef footprint for the Bayfield Pool in conjunction with the limited surface access as a result of Mill Road (County Road 3), there are limited surface locations from which to drill wells into the reef. Based on this required total pool “C” value, the pool would require up to 20 vertical wells, or 10 deviated wells, or 3 multilateral horizontal wells.

In addition to new drilling into the Bayfield pool, both the Porter and Grainger wells will be either re-worked to bring the wellbores up to storage wellbore standards or plugged and abandoned. If both wells are brought up to storage standards, one of the wells, presumably the Porter well (since it has better deliverability and currently only has 178mm casing set in the F Shale) could be used as an I/W well, with the Grainger well used as the observation well for the pool.

An accurate measure of the deliverability potential of any wells drilled into the reef will only be known once the Bayfield Pool is developed as a storage pool and pressured up. The potential well requirements discussed here should be viewed as an estimated well count requirement only. For this Bayfield Pool Gas Storage application, 2 new wells are planned, Bayfield et al #1, Stanley 9-7-NBR and Bayfield et al #2, Stanley 9-8-NBR. The Bayfield et al #1, Stanley 9-7-NBR well will be drilled as a vertical well to collect the A2 Anhydrite core and to test the quality of the western flank of the reef. Bayfield et al #1 (Horiz. #1), Stanley 9-7-NBR will be drilled from the vertical wellbore as a horizontal well to increase the deliverability potential of the well. The Bayfield et al #2, Stanley 9-8-NBR well will be drilled as a horizontal well (Bayfield et al #2 (Horiz. #1), Stanley 9-8-NBR) with a lateral planned from the initial horizontal section (Bayfield et al #2 (Horiz. #1–Lat. #1), Stanley 9-8-NBR). If both the Porter and Grainger wells can be brought up to storage standards, the Porter well will be used as an I/W well as well. If the deliverability from these 2, possibly 3 wells is not capable of draining the working gas from the pool in the required 121 day window, then an additional horizontal I/W well may be required in the future.

Bayfield Pool Reservoir Engineering Report

Schedule 1

Production History

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	MTHLY PROD'N Oil/Cond (m3)	MTHLY PROD'N Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	CUM PROD'N Oil/Cond (Mm3)	CUM PROD'N Water (Mm3)	COMMENTS
jan.1956													410 psi SI
jan.1957													420 psi SI
jan.1958	365	744	408.09			13.16	464.7	0.00	0.00	0.41	0.00	0.00	410 psi SI, 172.873 MMcf
feb.1958		672	408.09			14.57	514.5	0.00	0.00	0.82	0.00	0.00	
mar.1958		744	408.09			13.16	464.7	0.00	0.00	1.22	0.00	0.00	
apr.1958		720	408.09			13.60	480.2	0.00	0.00	1.63	0.00	0.00	
may.1958		744	408.09			13.16	464.7	0.00	0.00	2.04	0.00	0.00	
jun.1958		720	408.09			13.60	480.2	0.00	0.00	2.45	0.00	0.00	
jul.1958		744	408.09			13.16	464.7	0.00	0.00	2.86	0.00	0.00	
aug.1958		744	408.09			13.16	464.7	0.00	0.00	3.26	0.00	0.00	
sep.1958		720	408.09			13.60	480.2	0.00	0.00	3.67	0.00	0.00	
oct.1958		744	408.09			13.16	464.7	0.00	0.00	4.08	0.00	0.00	
nov.1958		720	408.09			13.60	480.2	0.00	0.00	4.49	0.00	0.00	
dec.1958		744	408.09			13.16	464.7	0.00	0.00	4.90	0.00	0.00	
jan.1959	365	744	502.33			16.20	572.0	0.00	0.00	5.40	0.00	0.00	358 psi SI, 212.793 MMcf
feb.1959		672	502.33			17.94	633.3	0.00	0.00	5.90	0.00	0.00	
mar.1959		744	502.33			16.20	572.0	0.00	0.00	6.40	0.00	0.00	
apr.1959		720	502.33			16.74	591.1	0.00	0.00	6.91	0.00	0.00	
may.1959		744	502.33			16.20	572.0	0.00	0.00	7.41	0.00	0.00	
jun.1959		720	502.33			16.74	591.1	0.00	0.00	7.91	0.00	0.00	
jul.1959		744	502.33			16.20	572.0	0.00	0.00	8.41	0.00	0.00	
aug.1959		744	502.33			16.20	572.0	0.00	0.00	8.92	0.00	0.00	
sep.1959		720	502.33			16.74	591.1	0.00	0.00	9.42	0.00	0.00	
oct.1959		744	502.33			16.20	572.0	0.00	0.00	9.92	0.00	0.00	
nov.1959		720	502.33			16.74	591.1	0.00	0.00	10.42	0.00	0.00	
dec.1959		744	502.33			16.20	572.0	0.00	0.00	10.93	0.00	0.00	
jan.1960	365	744	443.83			14.32	505.4	0.00	0.00	11.37	0.00	0.00	330 psi SI, 188.011 MMcf
feb.1960		672	443.83			15.85	559.6	0.00	0.00	11.81	0.00	0.00	
mar.1960		744	443.83			14.32	505.4	0.00	0.00	12.26	0.00	0.00	
apr.1960		720	443.83			14.79	522.3	0.00	0.00	12.70	0.00	0.00	
may.1960		744	443.83			14.32	505.4	0.00	0.00	13.14	0.00	0.00	
jun.1960		720	443.83			14.79	522.3	0.00	0.00	13.59	0.00	0.00	
jul.1960		744	443.83			14.32	505.4	0.00	0.00	14.03	0.00	0.00	
aug.1960		744	443.83			14.32	505.4	0.00	0.00	14.48	0.00	0.00	
sep.1960		720	443.83			14.79	522.3	0.00	0.00	14.92	0.00	0.00	
oct.1960		744	443.83			14.32	505.4	0.00	0.00	15.36	0.00	0.00	
nov.1960		720	443.83			14.79	522.3	0.00	0.00	15.81	0.00	0.00	
dec.1960		744	443.83			14.32	505.4	0.00	0.00	16.25	0.00	0.00	
jan.1961	365	744	451.84			14.58	514.5	0.00	0.00	16.70	0.00	0.00	296 psi SI, 191.405 MMcf
feb.1961		672	451.84			16.14	569.7	0.00	0.00	17.15	0.00	0.00	
mar.1961		744	451.84			14.58	514.5	0.00	0.00	17.61	0.00	0.00	
apr.1961		720	451.84			15.06	531.7	0.00	0.00	18.06	0.00	0.00	
may.1961		744	451.84			14.58	514.5	0.00	0.00	18.51	0.00	0.00	
jun.1961		720	451.84			15.06	531.7	0.00	0.00	18.96	0.00	0.00	
jul.1961		744	451.84			14.58	514.5	0.00	0.00	19.41	0.00	0.00	
aug.1961		744	451.84			14.58	514.5	0.00	0.00	19.87	0.00	0.00	
sep.1961		720	451.84			15.06	531.7	0.00	0.00	20.32	0.00	0.00	
oct.1961		744	451.84			14.58	514.5	0.00	0.00	20.77	0.00	0.00	
nov.1961		720	451.84			15.06	531.7	0.00	0.00	21.22	0.00	0.00	
dec.1961		744	451.84			14.58	514.5	0.00	0.00	21.67	0.00	0.00	
jan.1962	365	744	444.13			14.33	505.8	0.00	0.00	22.12	0.00	0.00	258 psi SI, 188.139 MMcf
feb.1962		672	444.13			15.86	559.9	0.00	0.00	22.56	0.00	0.00	
mar.1962		744	444.13			14.33	505.8	0.00	0.00	23.01	0.00	0.00	
apr.1962		720	444.13			14.80	522.6	0.00	0.00	23.45	0.00	0.00	
may.1962		744	444.13			14.33	505.8	0.00	0.00	23.89	0.00	0.00	
jun.1962		720	444.13			14.80	522.6	0.00	0.00	24.34	0.00	0.00	
jul.1962		744	444.13			14.33	505.8	0.00	0.00	24.78	0.00	0.00	
aug.1962		744	444.13			14.33	505.8	0.00	0.00	25.23	0.00	0.00	
sep.1962		720	444.13			14.80	522.6	0.00	0.00	25.67	0.00	0.00	
oct.1962		744	444.13			14.33	505.8	0.00	0.00	26.11	0.00	0.00	
nov.1962		720	444.13			14.80	522.6	0.00	0.00	26.56	0.00	0.00	
dec.1962		744	444.13			14.33	505.8	0.00	0.00	27.00	0.00	0.00	
jan.1963	365	744	449.14			14.49	511.4	0.00	0.00	27.45	0.00	0.00	227.7 psiSI, 190.259 MMcf
feb.1963		672	449.14			16.04	566.2	0.00	0.00	27.90	0.00	0.00	
mar.1963		744	449.14			14.49	511.4	0.00	0.00	28.35	0.00	0.00	
apr.1963		720	449.14			14.97	528.5	0.00	0.00	28.80	0.00	0.00	
may.1963		744	449.14			14.49	511.4	0.00	0.00	29.25	0.00	0.00	
jun.1963		720	449.14			14.97	528.5	0.00	0.00	29.70	0.00	0.00	
jul.1963		744	449.14			14.49	511.4	0.00	0.00	30.15	0.00	0.00	
aug.1963		744	449.14			14.49	511.4	0.00	0.00	30.60	0.00	0.00	
sep.1963		720	449.14			14.97	528.5	0.00	0.00	31.04	0.00	0.00	
oct.1963		744	449.14			14.49	511.4	0.00	0.00	31.49	0.00	0.00	
nov.1963		720	449.14			14.97	528.5	0.00	0.00	31.94	0.00	0.00	
dec.1963		744	449.14			14.49	511.4	0.00	0.00	32.39	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
jan.1964	365	744	427.78			13.80	487.1	0.00	0.00	32.82	0.00	0.00	191.5 psiSI, 181.212 MMcf
feb.1964		672	427.78			15.28	539.3	0.00	0.00	33.25	0.00	0.00	
mar.1964		744	427.78			13.80	487.1	0.00	0.00	33.68	0.00	0.00	
apr.1964		720	427.78			14.26	503.4	0.00	0.00	34.10	0.00	0.00	
may.1964		744	427.78			13.80	487.1	0.00	0.00	34.53	0.00	0.00	
jun.1964		720	427.78			14.26	503.4	0.00	0.00	34.96	0.00	0.00	
jul.1964		744	427.78			13.80	487.1	0.00	0.00	35.39	0.00	0.00	
aug.1964		744	427.78			13.80	487.1	0.00	0.00	35.81	0.00	0.00	
sep.1964		720	427.78			14.26	503.4	0.00	0.00	36.24	0.00	0.00	
oct.1964		744	427.78			13.80	487.1	0.00	0.00	36.67	0.00	0.00	
nov.1964		720	427.78			14.26	503.4	0.00	0.00	37.10	0.00	0.00	
dec.1964		744	427.78			13.80	487.1	0.00	0.00	37.53	0.00	0.00	
jan.1965	365	744	402.45			12.98	458.3	0.00	0.00	37.93	0.00	0.00	174.6 psiSI, 170.483 MMcf
feb.1965		672	402.45			14.37	507.4	0.00	0.00	38.33	0.00	0.00	
mar.1965		744	402.45			12.98	458.3	0.00	0.00	38.73	0.00	0.00	
apr.1965		720	402.45			13.42	473.6	0.00	0.00	39.14	0.00	0.00	
may.1965		744	402.45			12.98	458.3	0.00	0.00	39.54	0.00	0.00	
jun.1965		720	402.45			13.42	473.6	0.00	0.00	39.94	0.00	0.00	
jul.1965		744	402.45			12.98	458.3	0.00	0.00	40.34	0.00	0.00	
aug.1965		744	402.45			12.98	458.3	0.00	0.00	40.75	0.00	0.00	
sep.1965		720	402.45			13.42	473.6	0.00	0.00	41.15	0.00	0.00	
oct.1965		744	402.45			12.98	458.3	0.00	0.00	41.55	0.00	0.00	
nov.1965		720	402.45			13.42	473.6	0.00	0.00	41.95	0.00	0.00	
dec.1965		744	402.45			12.98	458.3	0.00	0.00	42.36	0.00	0.00	
jan.1966	365	744	406.32			13.11	462.7	0.00	0.00	42.76	0.00	0.00	135 psiSI, 172.123 MMcf
feb.1966		672	406.32			14.51	512.3	0.00	0.00	43.17	0.00	0.00	
mar.1966		744	406.32			13.11	462.7	0.00	0.00	43.57	0.00	0.00	
apr.1966		720	406.32			13.54	478.1	0.00	0.00	43.98	0.00	0.00	
may.1966		744	406.32			13.11	462.7	0.00	0.00	44.39	0.00	0.00	
jun.1966		720	406.32			13.54	478.1	0.00	0.00	44.79	0.00	0.00	
jul.1966		744	406.32			13.11	462.7	0.00	0.00	45.20	0.00	0.00	
aug.1966		744	406.32			13.11	462.7	0.00	0.00	45.61	0.00	0.00	
sep.1966		720	406.32			13.54	478.1	0.00	0.00	46.01	0.00	0.00	
oct.1966		744	406.32			13.11	462.7	0.00	0.00	46.42	0.00	0.00	
nov.1966		720	406.32			13.54	478.1	0.00	0.00	46.82	0.00	0.00	
dec.1966		744	406.32			13.11	462.7	0.00	0.00	47.23	0.00	0.00	
jan.1967	365	744	383.53			12.37	436.7	0.00	0.00	47.61	0.00	0.00	125 psiSI, 162.469 MMcf
feb.1967		672	383.53			13.70	483.5	0.00	0.00	48.00	0.00	0.00	
mar.1967		744	383.53			12.37	436.7	0.00	0.00	48.38	0.00	0.00	
apr.1967		720	383.53			12.78	451.3	0.00	0.00	48.77	0.00	0.00	
may.1967		744	383.53			12.37	436.7	0.00	0.00	49.15	0.00	0.00	
jun.1967		720	383.53			12.78	451.3	0.00	0.00	49.53	0.00	0.00	
jul.1967		744	383.53			12.37	436.7	0.00	0.00	49.92	0.00	0.00	
aug.1967		744	383.53			12.37	436.7	0.00	0.00	50.30	0.00	0.00	
sep.1967		720	383.53			12.78	451.3	0.00	0.00	50.68	0.00	0.00	
oct.1967		744	383.53			12.37	436.7	0.00	0.00	51.07	0.00	0.00	
nov.1967		720	383.53			12.78	451.3	0.00	0.00	51.45	0.00	0.00	
dec.1967		744	383.53			12.37	436.7	0.00	0.00	51.83	0.00	0.00	
jan.1968	365	744	288.97			9.32	329.1	0.00	0.00	52.12	0.00	0.00	98 psi 72 hr SI, 122.409 MMcf
feb.1968		672	288.97			10.32	364.3	0.00	0.00	52.41	0.00	0.00	
mar.1968		744	288.97			9.32	329.1	0.00	0.00	52.70	0.00	0.00	
apr.1968		720	288.97			9.63	340.0	0.00	0.00	52.99	0.00	0.00	
may.1968		744	288.97			9.32	329.1	0.00	0.00	53.28	0.00	0.00	
jun.1968		720	288.97			9.63	340.0	0.00	0.00	53.57	0.00	0.00	
jul.1968		744	288.97			9.32	329.1	0.00	0.00	53.86	0.00	0.00	
aug.1968		744	288.97			9.32	329.1	0.00	0.00	54.15	0.00	0.00	
sep.1968		720	288.97			9.63	340.0	0.00	0.00	54.43	0.00	0.00	
oct.1968		744	288.97			9.32	329.1	0.00	0.00	54.72	0.00	0.00	
nov.1968		720	288.97			9.63	340.0	0.00	0.00	55.01	0.00	0.00	
dec.1968		744	288.97			9.32	329.1	0.00	0.00	55.30	0.00	0.00	
jan.1969	365	744	257.76			8.31	293.5	0.00	0.00	55.56	0.00	0.00	70psi 48 hr SI, 109.191 MMcf
feb.1969		672	257.76			9.21	325.0	0.00	0.00	55.82	0.00	0.00	
mar.1969		744	257.76			8.31	293.5	0.00	0.00	56.07	0.00	0.00	
apr.1969		720	257.76			8.59	303.3	0.00	0.00	56.33	0.00	0.00	
may.1969		744	257.76			8.31	293.5	0.00	0.00	56.59	0.00	0.00	
jun.1969		720	257.76			8.59	303.3	0.00	0.00	56.85	0.00	0.00	
jul.1969		744	257.76			8.31	293.5	0.00	0.00	57.11	0.00	0.00	
aug.1969		744	257.76			8.31	293.5	0.00	0.00	57.36	0.00	0.00	
sep.1969		720	257.76			8.59	303.3	0.00	0.00	57.62	0.00	0.00	
oct.1969		744	257.76			8.31	293.5	0.00	0.00	57.88	0.00	0.00	
nov.1969		720	257.76			8.59	303.3	0.00	0.00	58.14	0.00	0.00	
dec.1969		744	257.76			8.31	293.5	0.00	0.00	58.39	0.00	0.00	
jan.1970	365	744	164.07			5.29	186.8	0.00	0.00	58.56	0.00	0.00	58 psi 24 hr SI, 69.503 MMcf
feb.1970		672	164.07			5.86	206.9	0.00	0.00	58.72	0.00	0.00	
mar.1970		744	164.07			5.29	186.8	0.00	0.00	58.89	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
apr.1970		720	164.07			5.47	193.1	0.00	0.00	59.05	0.00	0.00	
may.1970		744	164.07			5.29	186.8	0.00	0.00	59.21	0.00	0.00	
jun.1970		720	164.07			5.47	193.1	0.00	0.00	59.38	0.00	0.00	
jul.1970		744	164.07			5.29	186.8	0.00	0.00	59.54	0.00	0.00	
aug.1970		744	164.07			5.29	186.8	0.00	0.00	59.71	0.00	0.00	
sep.1970		720	164.07			5.47	193.1	0.00	0.00	59.87	0.00	0.00	
oct.1970		744	164.07			5.29	186.8	0.00	0.00	60.03	0.00	0.00	
nov.1970		720	164.07			5.47	193.1	0.00	0.00	60.20	0.00	0.00	
dec.1970		744	164.07			5.29	186.8	0.00	0.00	60.36	0.00	0.00	
jan.1971	365	744	110.20			3.55	125.5	0.00	0.00	60.47	0.00	0.00	50 psi 24 hr SI, 46.683 MMcf
feb.1971		672	110.20			3.94	138.9	0.00	0.00	60.58	0.00	0.00	
mar.1971		744	110.20			3.55	125.5	0.00	0.00	60.69	0.00	0.00	
apr.1971		720	110.20			3.67	129.7	0.00	0.00	60.80	0.00	0.00	
may.1971		744	110.20			3.55	125.5	0.00	0.00	60.91	0.00	0.00	
jun.1971		720	110.20			3.67	129.7	0.00	0.00	61.02	0.00	0.00	
jul.1971		744	110.20			3.55	125.5	0.00	0.00	61.13	0.00	0.00	
aug.1971		744	110.20			3.55	125.5	0.00	0.00	61.24	0.00	0.00	
sep.1971		720	110.20			3.67	129.7	0.00	0.00	61.35	0.00	0.00	
oct.1971		744	110.20			3.55	125.5	0.00	0.00	61.46	0.00	0.00	
nov.1971		720	110.20			3.67	129.7	0.00	0.00	61.58	0.00	0.00	
dec.1971		744	110.20			3.55	125.5	0.00	0.00	61.69	0.00	0.00	
jan.1972	31	744	22.3			0.72	25.4	0.00	0.00	61.71	0.00	0.00	50 psi 24 hr SI, 268 Mcf, assume 1 mo on
feb.1972		0	0.0							61.71	0.00	0.00	
mar.1972		0	0.0							61.71	0.00	0.00	
apr.1972		0	0.0							61.71	0.00	0.00	
may.1972		0	0.0							61.71	0.00	0.00	
jun.1972		0	0.0							61.71	0.00	0.00	
jul.1972		0	0.0							61.71	0.00	0.00	
aug.1972		0	0.0							61.71	0.00	0.00	
sep.1972		0	0.0							61.71	0.00	0.00	
oct.1972		0	0.0							61.71	0.00	0.00	
nov.1972		0	0.0							61.71	0.00	0.00	
dec.1972		0	0.0							61.71	0.00	0.00	
jan.1973		0	0.0							61.71	0.00	0.00	50 psi 24 hr SI, IOL sold to Jim Harmon
feb.1973		0	0.0							61.71	0.00	0.00	
mar.1973		0	0.0							61.71	0.00	0.00	
apr.1973		0	0.0							61.71	0.00	0.00	
may.1973		0	0.0							61.71	0.00	0.00	
jun.1973		0	0.0							61.71	0.00	0.00	
jul.1973		0	0.0							61.71	0.00	0.00	
aug.1973		0	0.0							61.71	0.00	0.00	
sep.1973		0	0.0							61.71	0.00	0.00	
oct.1973		0	0.0							61.71	0.00	0.00	
nov.1973		0	0.0							61.71	0.00	0.00	
dec.1973		0	0.0							61.71	0.00	0.00	
jan.1974		0	0.0							61.71	0.00	0.00	
feb.1974		0	0.0							61.71	0.00	0.00	
mar.1974		0	0.0							61.71	0.00	0.00	
apr.1974		0	0.0							61.71	0.00	0.00	
may.1974		0	0.0							61.71	0.00	0.00	
jun.1974		0	0.0							61.71	0.00	0.00	
jul.1974		0	0.0							61.71	0.00	0.00	
aug.1974		0	0.0							61.71	0.00	0.00	
sep.1974		0	0.0							61.71	0.00	0.00	
oct.1974		0	0.0							61.71	0.00	0.00	
nov.1974		0	0.0							61.71	0.00	0.00	
dec.1974		0	0.0							61.71	0.00	0.00	
jan.1975		0	0.0							61.71	0.00	0.00	
feb.1975		0	0.0							61.71	0.00	0.00	
mar.1975		0	0.0							61.71	0.00	0.00	
apr.1975		0	0.0							61.71	0.00	0.00	
may.1975		0	0.0							61.71	0.00	0.00	
jun.1975		0	0.0							61.71	0.00	0.00	
jul.1975		0	0.0							61.71	0.00	0.00	
aug.1975		0	0.0							61.71	0.00	0.00	
sep.1975		0	0.0							61.71	0.00	0.00	
oct.1975		0	0.0							61.71	0.00	0.00	
nov.1975		0	0.0							61.71	0.00	0.00	
dec.1975		0	0.0							61.71	0.00	0.00	
jan.1976		0	0.0							61.71	0.00	0.00	
feb.1976		0	0.0							61.71	0.00	0.00	
mar.1976		0	0.0							61.71	0.00	0.00	
apr.1976		0	0.0							61.71	0.00	0.00	
may.1976		0	0.0							61.71	0.00	0.00	
jun.1976		0	0.0							61.71	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
jul.1976		0	0.0							61.71	0.00	0.00	
aug.1976		0	0.0							61.71	0.00	0.00	
sep.1976		0	0.0							61.71	0.00	0.00	
oct.1976		0	0.0							61.71	0.00	0.00	
nov.1976		0	0.0							61.71	0.00	0.00	
dec.1976		0	0.0							61.71	0.00	0.00	
jan.1977		0	0.0							61.71	0.00	0.00	
feb.1977		0	0.0							61.71	0.00	0.00	
mar.1977		0	0.0							61.71	0.00	0.00	
apr.1977		0	0.0							61.71	0.00	0.00	
may.1977		0	0.0							61.71	0.00	0.00	
jun.1977		0	0.0							61.71	0.00	0.00	
jul.1977		0	0.0							61.71	0.00	0.00	
aug.1977		0	0.0							61.71	0.00	0.00	
sep.1977		0	0.0							61.71	0.00	0.00	
oct.1977		0	0.0							61.71	0.00	0.00	
nov.1977		0	0.0							61.71	0.00	0.00	
dec.1977		0	0.0							61.71	0.00	0.00	
jan.1978		0	0.0							61.71	0.00	0.00	
feb.1978		0	0.0							61.71	0.00	0.00	
mar.1978		0	0.0							61.71	0.00	0.00	
apr.1978		0	0.0							61.71	0.00	0.00	
may.1978		0	0.0							61.71	0.00	0.00	
jun.1978		0	0.0							61.71	0.00	0.00	
jul.1978		0	0.0							61.71	0.00	0.00	
aug.1978		0	0.0							61.71	0.00	0.00	
sep.1978		0	0.0							61.71	0.00	0.00	
oct.1978		0	0.0							61.71	0.00	0.00	
nov.1978		0	0.0							61.71	0.00	0.00	
dec.1978		0	0.0							61.71	0.00	0.00	
jan.1979		0	0.0							61.71	0.00	0.00	
feb.1979		0	0.0							61.71	0.00	0.00	
mar.1979		0	0.0							61.71	0.00	0.00	
apr.1979		0	0.0							61.71	0.00	0.00	
may.1979		0	0.0							61.71	0.00	0.00	
jun.1979		0	0.0							61.71	0.00	0.00	
jul.1979		0	0.0							61.71	0.00	0.00	
aug.1979		0	0.0							61.71	0.00	0.00	
sep.1979		0	0.0							61.71	0.00	0.00	
oct.1979		0	0.0							61.71	0.00	0.00	
nov.1979		0	0.0							61.71	0.00	0.00	
dec.1979		0	0.0							61.71	0.00	0.00	
jan.1980		0	0.0							61.71	0.00	0.00	
feb.1980		0	0.0							61.71	0.00	0.00	
mar.1980		0	0.0							61.71	0.00	0.00	
apr.1980		0	0.0							61.71	0.00	0.00	
may.1980		0	0.0							61.71	0.00	0.00	
jun.1980		0	0.0							61.71	0.00	0.00	
jul.1980		0	0.0							61.71	0.00	0.00	
aug.1980		0	0.0							61.71	0.00	0.00	
sep.1980		0	0.0							61.71	0.00	0.00	
oct.1980		0	0.0							61.71	0.00	0.00	
nov.1980		0	0.0							61.71	0.00	0.00	
dec.1980		0	0.0							61.71	0.00	0.00	
jan.1981		0	0.0							61.71	0.00	0.00	
feb.1981		0	0.0							61.71	0.00	0.00	
mar.1981		0	0.0							61.71	0.00	0.00	
apr.1981		0	0.0							61.71	0.00	0.00	
may.1981		0	0.0							61.71	0.00	0.00	
jun.1981		0	0.0							61.71	0.00	0.00	
jul.1981		0	0.0							61.71	0.00	0.00	
aug.1981		0	0.0							61.71	0.00	0.00	
sep.1981		0	0.0							61.71	0.00	0.00	
oct.1981		0	0.0							61.71	0.00	0.00	
nov.1981		0	0.0							61.71	0.00	0.00	
dec.1981		0	0.0							61.71	0.00	0.00	
jan.1982		0	0.0							61.71	0.00	0.00	
feb.1982		0	0.0							61.71	0.00	0.00	
mar.1982		0	0.0							61.71	0.00	0.00	
apr.1982		0	0.0							61.71	0.00	0.00	
may.1982		0	0.0							61.71	0.00	0.00	
jun.1982		0	0.0							61.71	0.00	0.00	
jul.1982		0	0.0							61.71	0.00	0.00	
aug.1982		0	0.0							61.71	0.00	0.00	
sep.1982		0	0.0							61.71	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	MTHLY PROD'N Oil/Cond (m3)	MTHLY PROD'N Water (m3)	DLY GAS PROD'N (Mm3/D)	DLY GAS PROD'N (Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	CUM PROD'N Oil/Cond (Mm3)	CUM PROD'N Water (Mm3)	COMMENTS
oct.1982		0	0.0							61.71	0.00	0.00	
nov.1982		0	0.0							61.71	0.00	0.00	
dec.1982		0	0.0							61.71	0.00	0.00	
jan.1983	365	744	142.16			4.59	161.9	0.00	0.00	61.85	0.00	0.00	410kPa, 8 day SI, 1705.89357 Mm3
feb.1983		672	142.16			5.08	179.2	0.00	0.00	61.99	0.00	0.00	
mar.1983		744	142.16			4.59	161.9	0.00	0.00	62.13	0.00	0.00	
apr.1983		720	142.16			4.74	167.3	0.00	0.00	62.28	0.00	0.00	
may.1983		744	142.16			4.59	161.9	0.00	0.00	62.42	0.00	0.00	
jun.1983		720	142.16			4.74	167.3	0.00	0.00	62.56	0.00	0.00	
jul.1983		744	142.16			4.59	161.9	0.00	0.00	62.70	0.00	0.00	
aug.1983		744	142.16			4.59	161.9	0.00	0.00	62.84	0.00	0.00	
sep.1983		720	142.16			4.74	167.3	0.00	0.00	62.99	0.00	0.00	
oct.1983		744	142.16			4.59	161.9	0.00	0.00	63.13	0.00	0.00	
nov.1983		720	142.16			4.74	167.3	0.00	0.00	63.27	0.00	0.00	
dec.1983		744	142.16			4.59	161.9	0.00	0.00	63.41	0.00	0.00	
jan.1984	365	744	127.16			4.10	144.8	0.00	0.00	63.54	0.00	0.00	Sept: 13 day SI, 262 kPa, 1525.9276 Mm3
feb.1984		672	127.16			4.54	160.3	0.00	0.00	63.67	0.00	0.00	
mar.1984		744	127.16			4.10	144.8	0.00	0.00	63.80	0.00	0.00	
apr.1984		720	127.16			4.24	149.6	0.00	0.00	63.92	0.00	0.00	
may.1984		744	127.16			4.10	144.8	0.00	0.00	64.05	0.00	0.00	
jun.1984		720	127.16			4.24	149.6	0.00	0.00	64.18	0.00	0.00	
jul.1984		744	127.16			4.10	144.8	0.00	0.00	64.30	0.00	0.00	
aug.1984		744	127.16			4.10	144.8	0.00	0.00	64.43	0.00	0.00	
sep.1984		720	127.16			4.24	149.6	0.00	0.00	64.56	0.00	0.00	
oct.1984		744	127.16			4.10	144.8	0.00	0.00	64.69	0.00	0.00	
nov.1984		720	127.16			4.24	149.6	0.00	0.00	64.81	0.00	0.00	
dec.1984		744	127.16			4.10	144.8	0.00	0.00	64.94	0.00	0.00	
jan.1985	365	744	48.92			1.58	55.7	0.00	0.00	64.99	0.00	0.00	Ap 24 hr SI 255kPa, 586.991 Mm3
feb.1985		672	48.92			1.75	61.7	0.00	0.00	65.04	0.00	0.00	
mar.1985		744	48.92			1.58	55.7	0.00	0.00	65.09	0.00	0.00	
apr.1985		720	48.92			1.63	57.6	0.00	0.00	65.14	0.00	0.00	
may.1985		744	48.92			1.58	55.7	0.00	0.00	65.18	0.00	0.00	
jun.1985		720	48.92			1.63	57.6	0.00	0.00	65.23	0.00	0.00	
jul.1985		744	48.92			1.58	55.7	0.00	0.00	65.28	0.00	0.00	
aug.1985		744	48.92			1.58	55.7	0.00	0.00	65.33	0.00	0.00	
sep.1985		720	48.92			1.63	57.6	0.00	0.00	65.38	0.00	0.00	
oct.1985		744	48.92			1.58	55.7	0.00	0.00	65.43	0.00	0.00	
nov.1985		720	48.92			1.63	57.6	0.00	0.00	65.48	0.00	0.00	
dec.1985		744	48.92			1.58	55.7	0.00	0.00	65.53	0.00	0.00	
jan.1986	365	744	3.6			0.12	4.1	0.00	0.00	65.53	0.00	0.00	Nov 168 hr SI 255 kPa, 43.08 Mm3
feb.1986		672	3.6			0.13	4.5	0.00	0.00	65.53	0.00	0.00	
mar.1986		744	3.6			0.12	4.1	0.00	0.00	65.54	0.00	0.00	
apr.1986		720	3.6			0.12	4.2	0.00	0.00	65.54	0.00	0.00	
may.1986		744	3.6			0.12	4.1	0.00	0.00	65.54	0.00	0.00	
jun.1986		720	3.6			0.12	4.2	0.00	0.00	65.55	0.00	0.00	
jul.1986		744	3.6			0.12	4.1	0.00	0.00	65.55	0.00	0.00	
aug.1986		744	3.6			0.12	4.1	0.00	0.00	65.56	0.00	0.00	
sep.1986		720	3.6			0.12	4.2	0.00	0.00	65.56	0.00	0.00	
oct.1986		744	3.6			0.12	4.1	0.00	0.00	65.56	0.00	0.00	
nov.1986		720	3.6			0.12	4.2	0.00	0.00	65.57	0.00	0.00	
dec.1986		744	3.6			0.12	4.1	0.00	0.00	65.57	0.00	0.00	
jan.1987	SI	0	-							65.57	0.00	0.00	Dec 168 hr SI 255 kPa
feb.1987		0	-							65.57	0.00	0.00	
mar.1987		0	-							65.57	0.00	0.00	
apr.1987		0	-							65.57	0.00	0.00	
may.1987		0	-							65.57	0.00	0.00	
jun.1987		0	-							65.57	0.00	0.00	
jul.1987		0	-							65.57	0.00	0.00	
aug.1987		0	-							65.57	0.00	0.00	
sep.1987		0	-							65.57	0.00	0.00	
oct.1987		0	-							65.57	0.00	0.00	
nov.1987		0	-							65.57	0.00	0.00	
dec.1987		0	-							65.57	0.00	0.00	
jan.1988		0	-							65.57	0.00	0.00	
feb.1988		0	-							65.57	0.00	0.00	
mar.1988		0	-							65.57	0.00	0.00	
apr.1988		0	-							65.57	0.00	0.00	
may.1988		0	-							65.57	0.00	0.00	
jun.1988		0	-							65.57	0.00	0.00	
jul.1988		0	-							65.57	0.00	0.00	
aug.1988		0	-							65.57	0.00	0.00	
sep.1988		0	-							65.57	0.00	0.00	
oct.1988		0	-							65.57	0.00	0.00	
nov.1988		0	-							65.57	0.00	0.00	
dec.1988	31	744	16.7			0.54	19.0	0.00	0.00	65.59	0.00	0.00	Nov 336 hr SI 110kPa, 16.726 Mm3

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
jan.1989	365	744	55.41			1.79	63.1	0.00	0.00	65.64	0.00	0.00	664.86 Mm3
feb.1989		672	55.41			1.98	69.9	0.00	0.00	65.70	0.00	0.00	
mar.1989		744	55.41			1.79	63.1	0.00	0.00	65.75	0.00	0.00	
apr.1989		720	55.41			1.85	65.2	0.00	0.00	65.81	0.00	0.00	
may.1989		744	55.41			1.79	63.1	0.00	0.00	65.86	0.00	0.00	
jun.1989		720	55.41			1.85	65.2	0.00	0.00	65.92	0.00	0.00	
jul.1989		744	55.41			1.79	63.1	0.00	0.00	65.97	0.00	0.00	
aug.1989		744	55.41			1.79	63.1	0.00	0.00	66.03	0.00	0.00	
sep.1989		720	55.41			1.85	65.2	0.00	0.00	66.08	0.00	0.00	
oct.1989		744	55.41			1.79	63.1	0.00	0.00	66.14	0.00	0.00	
nov.1989		720	55.41			1.85	65.2	0.00	0.00	66.20	0.00	0.00	
dec.1989		744	55.41			1.79	63.1	0.00	0.00	66.25	0.00	0.00	
jan.1990	365	744	62.03			2.00	70.6	0.00	0.00	66.31	0.00	0.00	744.38 Mm3
feb.1990		672	62.03			2.22	78.2	0.00	0.00	66.38	0.00	0.00	
mar.1990		744	62.03			2.00	70.6	0.00	0.00	66.44	0.00	0.00	
apr.1990		720	62.03			2.07	73.0	0.00	0.00	66.50	0.00	0.00	
may.1990		744	62.03			2.00	70.6	0.00	0.00	66.56	0.00	0.00	
jun.1990		720	62.03			2.07	73.0	0.00	0.00	66.62	0.00	0.00	
jul.1990		744	62.03			2.00	70.6	0.00	0.00	66.69	0.00	0.00	
aug.1990		744	62.03			2.00	70.6	0.00	0.00	66.75	0.00	0.00	
sep.1990		720	62.03			2.07	73.0	0.00	0.00	66.81	0.00	0.00	
oct.1990		744	62.03			2.00	70.6	0.00	0.00	66.87	0.00	0.00	
nov.1990		720	62.03			2.07	73.0	0.00	0.00	66.93	0.00	0.00	
dec.1990		744	62.03			2.00	70.6	0.00	0.00	67.00	0.00	0.00	
jan.1991	365	744	24.34			0.79	27.7	0.00	0.00	67.02	0.00	0.00	292.1 Mm3
feb.1991		672	24.34			0.87	30.7	0.00	0.00	67.04	0.00	0.00	
mar.1991		744	24.34			0.79	27.7	0.00	0.00	67.07	0.00	0.00	
apr.1991		720	24.34			0.81	28.6	0.00	0.00	67.09	0.00	0.00	
may.1991		744	24.34			0.79	27.7	0.00	0.00	67.12	0.00	0.00	
jun.1991		720	24.34			0.81	28.6	0.00	0.00	67.14	0.00	0.00	
jul.1991		744	24.34			0.79	27.7	0.00	0.00	67.17	0.00	0.00	
aug.1991		744	24.34			0.79	27.7	0.00	0.00	67.19	0.00	0.00	
sep.1991		720	24.34			0.81	28.6	0.00	0.00	67.21	0.00	0.00	
oct.1991		744	24.34			0.79	27.7	0.00	0.00	67.24	0.00	0.00	
nov.1991		720	24.34			0.81	28.6	0.00	0.00	67.26	0.00	0.00	
dec.1991		744	24.34			0.79	27.7	0.00	0.00	67.29	0.00	0.00	
jan.1992		0	-							67.29	0.00	0.00	
feb.1992		0	-							67.29	0.00	0.00	
mar.1992		0	-							67.29	0.00	0.00	
apr.1992		0	-							67.29	0.00	0.00	
may.1992		0	-							67.29	0.00	0.00	
jun.1992		0	-							67.29	0.00	0.00	
jul.1992		0	-							67.29	0.00	0.00	
aug.1992		0	-							67.29	0.00	0.00	
sep.1992		0	-							67.29	0.00	0.00	
oct.1992		0	-							67.29	0.00	0.00	
nov.1992	30	671	37.40			1.34	47.2	0.00	0.00	67.33	0.00	0.00	
dec.1992	31	744	40.90			1.32	46.6	0.00	0.00	67.37	0.00	0.00	
jan.1993		744	11.20			0.36	12.8	0.00	0.00	67.38	0.00	0.00	
feb.1993		672	9.50			0.34	12.0	0.00	0.00	67.39	0.00	0.00	
mar.1993		744	12.60			0.41	14.3	0.00	0.00	67.40	0.00	0.00	
apr.1993		720	18.90			0.63	22.2	0.00	0.00	67.42	0.00	0.00	
may.1993		744	29.80			0.96	33.9	0.00	0.00	67.45	0.00	0.00	
jun.1993		720	29.80			0.99	35.1	0.00	0.00	67.48	0.00	0.00	
jul.1993		744	29.60			0.95	33.7	0.00	0.00	67.51	0.00	0.00	
aug.1993		744	29.60			0.95	33.7	0.00	0.00	67.54	0.00	0.00	
sep.1993		720	29.40			0.98	34.6	0.00	0.00	67.57	0.00	0.00	
oct.1993		744	28.50			0.92	32.5	0.00	0.00	67.59	0.00	0.00	
nov.1993		720	27.40			0.91	32.2	0.00	0.00	67.62	0.00	0.00	
dec.1993		744	26.40			0.85	30.1	0.00	0.00	67.65	0.00	0.00	
jan.1994		744	0.20			0.01	0.2	0.00	0.00	67.65	0.00	0.00	
feb.1994		672	3.00			0.11	3.8	0.00	0.00	67.65	0.00	0.00	
mar.1994		744	21.30			0.69	24.3	0.00	0.00	67.67	0.00	0.00	
apr.1994		720	16.00			0.53	18.8	0.00	0.00	67.69	0.00	0.00	
may.1994		744	22.60			0.73	25.7	0.00	0.00	67.71	0.00	0.00	
jun.1994		720	24.30			0.81	28.6	0.00	0.00	67.74	0.00	0.00	
jul.1994		744	23.40			0.75	26.6	0.00	0.00	67.76	0.00	0.00	
aug.1994		744	21.50			0.69	24.5	0.00	0.00	67.78	0.00	0.00	
sep.1994		720	1.70			0.06	2.0	0.00	0.00	67.78	0.00	0.00	
oct.1994		0	-							67.78	0.00	0.00	
nov.1994		0	-							67.78	0.00	0.00	
dec.1994		0	-							67.78	0.00	0.00	
jan.1995		0	-							67.78	0.00	0.00	
feb.1995		0	-							67.78	0.00	0.00	
mar.1995		0	-							67.78	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
apr.1995		0	-							67.78	0.00	0.00	
may.1995		0	-							67.78	0.00	0.00	
jun.1995		0	-							67.78	0.00	0.00	
jul.1995		0	-							67.78	0.00	0.00	
aug.1995		0	-							67.78	0.00	0.00	
sep.1995		0	-							67.78	0.00	0.00	
oct.1995		0	-							67.78	0.00	0.00	
nov.1995		0	-							67.78	0.00	0.00	
dec.1995		0	-							67.78	0.00	0.00	193kPa SIP both wells
jan.1996		0	-							67.78	0.00	0.00	
feb.1996		0	-							67.78	0.00	0.00	
mar.1996		0	-							67.78	0.00	0.00	
apr.1996		0	-							67.78	0.00	0.00	
may.1996		0	-							67.78	0.00	0.00	
jun.1996		0	-							67.78	0.00	0.00	
jul.1996		0	-							67.78	0.00	0.00	
aug.1996		0	-							67.78	0.00	0.00	
sep.1996		0	-							67.78	0.00	0.00	
oct.1996		0	-							67.78	0.00	0.00	
nov.1996		0	-							67.78	0.00	0.00	
dec.1996		0	-							67.78	0.00	0.00	
jan.1997		0	-							67.78	0.00	0.00	
feb.1997		0	-							67.78	0.00	0.00	
mar.1997		0	-							67.78	0.00	0.00	
apr.1997		0	-							67.78	0.00	0.00	
may.1997		0	-							67.78	0.00	0.00	
jun.1997		0	-							67.78	0.00	0.00	
jul.1997		0	-							67.78	0.00	0.00	
aug.1997		0	-							67.78	0.00	0.00	
sep.1997		0	-							67.78	0.00	0.00	
oct.1997		0	-							67.78	0.00	0.00	
nov.1997		0	-							67.78	0.00	0.00	
dec.1997		0	-							67.78	0.00	0.00	
jan.1998		0	-							67.78	0.00	0.00	Purchased from PPC Jan/98
feb.1998		0	-							67.78	0.00	0.00	
mar.1998		0	-							67.78	0.00	0.00	
apr.1998		0	-							67.78	0.00	0.00	
may.1998		0	-							67.78	0.00	0.00	
jun.1998		0	-							67.78	0.00	0.00	
jul.1998		0	-							67.78	0.00	0.00	
aug.1998		0	-							67.78	0.00	0.00	
sep.1998		0	-							67.78	0.00	0.00	
oct.1998		0	-							67.78	0.00	0.00	
nov.1998		0	-							67.78	0.00	0.00	
dec.1998		0	-							67.78	0.00	0.00	
jan.1999		0	-							67.78	0.00	0.00	
feb.1999		0	-							67.78	0.00	0.00	
mar.1999		0	-							67.78	0.00	0.00	
apr.1999		0	-							67.78	0.00	0.00	
may.1999		0	-							67.78	0.00	0.00	
jun.1999		0	-							67.78	0.00	0.00	
jul.1999		0	-							67.78	0.00	0.00	
aug.1999		0	-							67.78	0.00	0.00	
sep.1999		0	-							67.78	0.00	0.00	
oct.1999		0	-							67.78	0.00	0.00	
nov.1999		0	-							67.78	0.00	0.00	
dec.1999		0	-							67.78	0.00	0.00	
jan.2000		0	-							67.78	0.00	0.00	
feb.2000		0	-							67.78	0.00	0.00	
mar.2000		0	-							67.78	0.00	0.00	
apr.2000		0	-							67.78	0.00	0.00	
may.2000		0	-							67.78	0.00	0.00	
jun.2000		0	-							67.78	0.00	0.00	
jul.2000		0	-							67.78	0.00	0.00	
aug.2000		0	-							67.78	0.00	0.00	
sep.2000		0	-							67.78	0.00	0.00	
oct.2000		0	-							67.78	0.00	0.00	
nov.2000		0	-							67.78	0.00	0.00	
dec.2000		0	-							67.78	0.00	0.00	
jan.2001		0	-							67.78	0.00	0.00	
feb.2001		0	-							67.78	0.00	0.00	
mar.2001		0	-							67.78	0.00	0.00	
apr.2001		0	-							67.78	0.00	0.00	
may.2001		0	-							67.78	0.00	0.00	
jun.2001		0	-							67.78	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

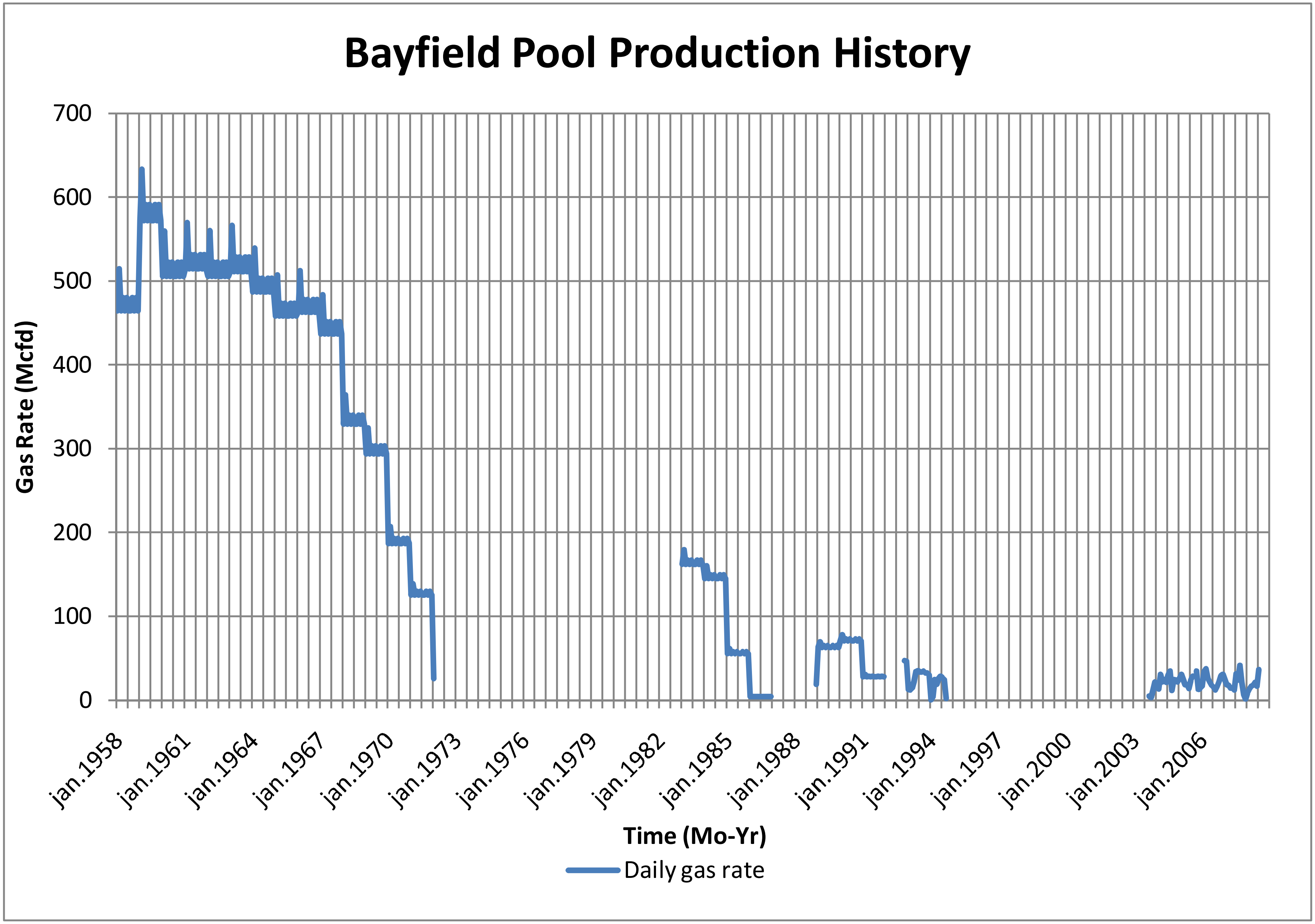
Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
jul.2001		0	-							67.78	0.00	0.00	
aug.2001		0	-							67.78	0.00	0.00	
sep.2001		0	-							67.78	0.00	0.00	
oct.2001		0	-							67.78	0.00	0.00	
nov.2001		0	-							67.78	0.00	0.00	
dec.2001		0	-							67.78	0.00	0.00	
jan.2002		0	-							67.78	0.00	0.00	
feb.2002		0	-							67.78	0.00	0.00	
mar.2002		0	-							67.78	0.00	0.00	
apr.2002		0	-							67.78	0.00	0.00	
may.2002		0	-							67.78	0.00	0.00	
jun.2002		0	-							67.78	0.00	0.00	
jul.2002		0	-							67.78	0.00	0.00	
aug.2002		0	-							67.78	0.00	0.00	
sep.2002		0	-							67.78	0.00	0.00	
oct.2002		0	-							67.78	0.00	0.00	
nov.2002		0	-							67.78	0.00	0.00	
dec.2002		0	-							67.78	0.00	0.00	
jan.2003		0	-							67.78	0.00	0.00	
feb.2003		0	-							67.78	0.00	0.00	
mar.2003		0	-							67.78	0.00	0.00	
apr.2003		0	-							67.78	0.00	0.00	
may.2003		0	-							67.78	0.00	0.00	
jun.2003		0	-							67.78	0.00	0.00	
jul.2003		0	-							67.78	0.00	0.00	
aug.2003		0	-							67.78	0.00	0.00	P1:193kPa, G1: 207kPa, 72hrSI
sep.2003		720	4.08			0.14	4.8	0.00	0.00	67.79	0.00	0.00	
oct.2003		744	2.94			0.09	3.3	0.00	0.00	67.79	0.00	0.00	
nov.2003		720	9.63			0.32	11.3	0.00	0.00	67.80	0.00	0.00	
dec.2003		744	19.19			0.62	21.9	0.00	0.00	67.82	0.00	0.00	
jan.2004		744	16.14			0.52	18.4	0.00	0.00	67.83	0.00	0.00	P1: 200kPa, G1: 190kPa, 24hrSI
feb.2004		672	10.37			0.37	13.1	0.00	0.00	67.85	0.00	0.00	
mar.2004		744	27.17			0.88	30.9	0.00	0.00	67.87	0.00	0.00	
apr.2004		720	18.68			0.62	22.0	0.00	0.00	67.89	0.00	0.00	
may.2004		744	21.51			0.69	24.5	0.00	0.00	67.91	0.00	0.00	
jun.2004		720	18.19			0.61	21.4	0.00	0.00	67.93	0.00	0.00	
jul.2004		744	26.01			0.84	29.6	0.00	0.00	67.96	0.00	0.00	
aug.2004		744	30.43			0.98	34.7	0.00	0.00	67.99	0.00	0.00	
sep.2004		720	10.01			0.33	11.8	0.00	0.00	68.00	0.00	0.00	
oct.2004		744	21.45			0.69	24.4	0.00	0.00	68.02	0.00	0.00	
nov.2004		720	20.18			0.67	23.7	0.00	0.00	68.04	0.00	0.00	
dec.2004		744	19.29			0.62	22.0	0.00	0.00	68.06	0.00	0.00	
jan.2005		744	23.03			0.74	26.2	0.00	0.00	68.08	0.00	0.00	
feb.2005		672	24.22			0.87	30.5	0.00	0.00	68.11	0.00	0.00	
mar.2005		744	21.61			0.70	24.6	0.00	0.00	68.13	0.00	0.00	
apr.2005		720	15.77			0.53	18.6	0.00	0.00	68.14	0.00	0.00	
may.2005		744	16.34			0.53	18.6	0.00	0.00	68.16	0.00	0.00	
jun.2005		720	11.56			0.39	13.6	0.00	0.00	68.17	0.00	0.00	
jul.2005		744	20.77			0.67	23.7	0.00	0.00	68.19	0.00	0.00	
aug.2005		744	24.86			0.80	28.3	0.00	0.00	68.22	0.00	0.00	
sep.2005		0	-							68.22	0.00	0.00	
oct.2005		744	30.50			0.98	34.7	0.00	0.00	68.25	0.00	0.00	
nov.2005		720	10.71			0.36	12.6	0.00	0.00	68.26	0.00	0.00	P#1: 213kPa, G#1: 207kPa, 72hrSI
dec.2005		744	12.78			0.41	14.6	0.00	0.00	68.27	0.00	0.00	
jan.2006		744	14.8			0.48	16.9	0.00	0.00	68.28	0.00	0.00	
feb.2006		672	26.91			0.96	33.9	0.00	0.00	68.31	0.00	0.00	
mar.2006		744	32.67			1.05	37.2	0.00	0.00	68.34	0.00	0.00	
apr.2006		720	22.30			0.74	26.2	0.00	0.00	68.37	0.00	0.00	P#1: 207kPa, G#1: 200kPa, 72hrSI
may.2006		744	19.13			0.62	21.8	0.00	0.00	68.39	0.00	0.00	
jun.2006		720	15.22			0.51	17.9	0.00	0.00	68.40	0.00	0.00	
jul.2006		744	13.79			0.44	15.7	0.00	0.00	68.41	0.00	0.00	
aug.2006		744	10.46			0.34	11.9	0.00	0.00	68.43	0.00	0.00	
sep.2006		720	14.03			0.47	16.5	0.00	0.00	68.44	0.00	0.00	
oct.2006		744	19.14			0.62	21.8	0.00	0.00	68.46	0.00	0.00	
nov.2006		720	24.51			0.82	28.8	0.00	0.00	68.48	0.00	0.00	
dec.2006		744	26.84			0.87	30.6	0.00	0.00	68.51	0.00	0.00	
jan.2007		744	21.7			0.70	24.7	0.00	0.00	68.53	0.00	0.00	
feb.2007		672	14.50			0.52	18.3	0.00	0.00	68.55	0.00	0.00	
mar.2007		744	15.70			0.51	17.9	0.00	0.00	68.56	0.00	0.00	
apr.2007		720	12.40			0.41	14.6	0.00	0.00	68.57	0.00	0.00	
may.2007		744	12.70			0.41	14.5	0.00	0.00	68.59	0.00	0.00	
jun.2007		720	10.40			0.35	12.2	0.00	0.00	68.60	0.00	0.00	
jul.2007		744	27.60			0.89	31.4	0.00	0.00	68.62	0.00	0.00	
aug.2007		744	21.10			0.68	24.0	0.00	0.00	68.65	0.00	0.00	
sep.2007		720	35.40			1.18	41.7	0.00	0.00	68.68	0.00	0.00	

PRODUCTION HISTORY
MONTHLY RAW TOTALS

Bayfield Reef: Bluewater Porter #1: Stanley 7-BRN, Bluewater Grainger #1: Stanley 8-BRN

MONTH	DAYS ON	HRS ON	MTHLY PROD'N Gas (Mm3)	Oil/Cond (m3)	Water (m3)	DLY GAS PROD'N (Mm3/D)	(Mcfd)	O/G Ratio (m3/Mm3)	W/G Ratio (m3/Mm3)	CUM PROD'N Gas (MMm3)	Oil/Cond (Mm3)	Water (Mm3)	COMMENTS
oct.2007		744	18.50			0.60	21.1	0.00	0.00	68.70	0.00	0.00	
nov.2007		720	5.90			0.20	6.9	0.00	0.00	68.71	0.00	0.00	
dec.2007		744	1.20			0.04	1.4	0.00	0.00	68.71	0.00	0.00	
jan.2008		744	7.5			0.24	8.5	0.00	0.00	68.71	0.00	0.00	
feb.2008		696	10.70			0.37	13.0	0.00	0.00	68.73	0.00	0.00	
mar.2008		744	14.70			0.47	16.7	0.00	0.00	68.74	0.00	0.00	
apr.2008		720	15.20			0.51	17.9	0.00	0.00	68.76	0.00	0.00	
may.2008		744	18.70			0.60	21.3	0.00	0.00	68.77	0.00	0.00	
jun.2008		720	14.30			0.48	16.8	0.00	0.00	68.79	0.00	0.00	
jul.2008		744	31.70			1.02	36.1	0.00	0.00	68.82	0.00	0.00	
aug.2008		Pool SI								68.82	0.00	0.00	
sep.2008										68.82	0.00	0.00	
oct.2008										68.82	0.00	0.00	
nov.2008										68.82	0.00	0.00	
dec.2008										68.82	0.00	0.00	


Bayfield Pool Production History
700
600
500
400
300
200
100
0
Gas Rate (Mcfd)
jan.1958
jan.1961
jan.1964
jan.1967
jan.1970
jan.1973
jan.1976
jan.1979
jan.1982
jan.1985
jan.1988
jan.1991
jan.1994
jan.1997
jan.2000
jan.2003
jan.2006
Time (Mo-Yr)
Daily gas rate

Bayfield Pool Reservoir Engineering Report

Schedule 2

Pressure History

Bayfield Reef Pressure History Data

Basic Well Data:

Bluewater Grainger #1: Stanley 8-BRN

Spudded:	14-Nov-56								
Rig Rel:	21-Feb-57								
RF elev:	810.6 ft								
Gd elev:	808.6 ft (		246.45 m O'Rourke survey)						
TD:	1906 ft RF								
Guelph:		1608 'RF A1 top:			1473 ft RF	(		448.9 mRF)	
Rochester:		NP							
Prod'n csg:	5 1/2" 14# at 1495'RF, cemented								
Gas shows:		1628 -	1640 'RF (	817.4 -		829.4 'ss)	Not measured		
		1754 -	1756 'RF (	943.4 -		945.4 'ss)	99.8 Mcfd		
		1786 -	1790 'RF (	975.4 -		979.4 'ss)	114.3 Mcfd		
		1824 -	1847 'RF (	1013.4 -		1036.4 'ss)	171.7 Mcfd		
		1848 -	1850 'RF (	1037.4 -		1039.4 'ss)	198.3 Mcfd		
		1864 -	1906 'RF (	1053.4 -		1095.4 'ss)	1057 Mcfd		
Datum Depth:			1870.6 'RF (	1060 'ss)					
Treatments:	2500 gal 15%HCl								
Final results:	Flow	1057 Mcfd							
	Pressure	410 psig							

Bluewater Imperial Stanley 7-BRN: Porter #1

Spud:	10-Jul-56								
Rig Rel:	08-Oct-56								
RF elev:	793.4 ft								
Gd elev:	791.4 ft (		241.20 m O'Rourke survey)						
TD:	1943 ft RF								
Guelph:		1595 'RF A1 top:			1510 ft RF	(		460.2 mRF)	
Rochester:		NP							
Prod'n csg:	7" at 1231'RF, cemented								
Gas shows:		1519 -	1520 'RF (	725.6 -		726.6 'ss)	1 Mcfd		
		1642 -	1892 'RF (	848.6 -		1098.6 'ss)	8200 Mcfd		
Cored:		1731 -	1943 'RF (	937.6 -		1149.6 'ss)			
Oil show on core: 1892 - 1923'RF									
Datum Depth:			1853.38 'RF (	1060 'ss)					
Treatments:	Nil								
Final results:	Flow	8200 Mcfd							
	Pressure	409 psig							

Pressure History (Note: using pool datum of 1060 'ss, Pa - Pg = 99 kPa
(14.4 psi)

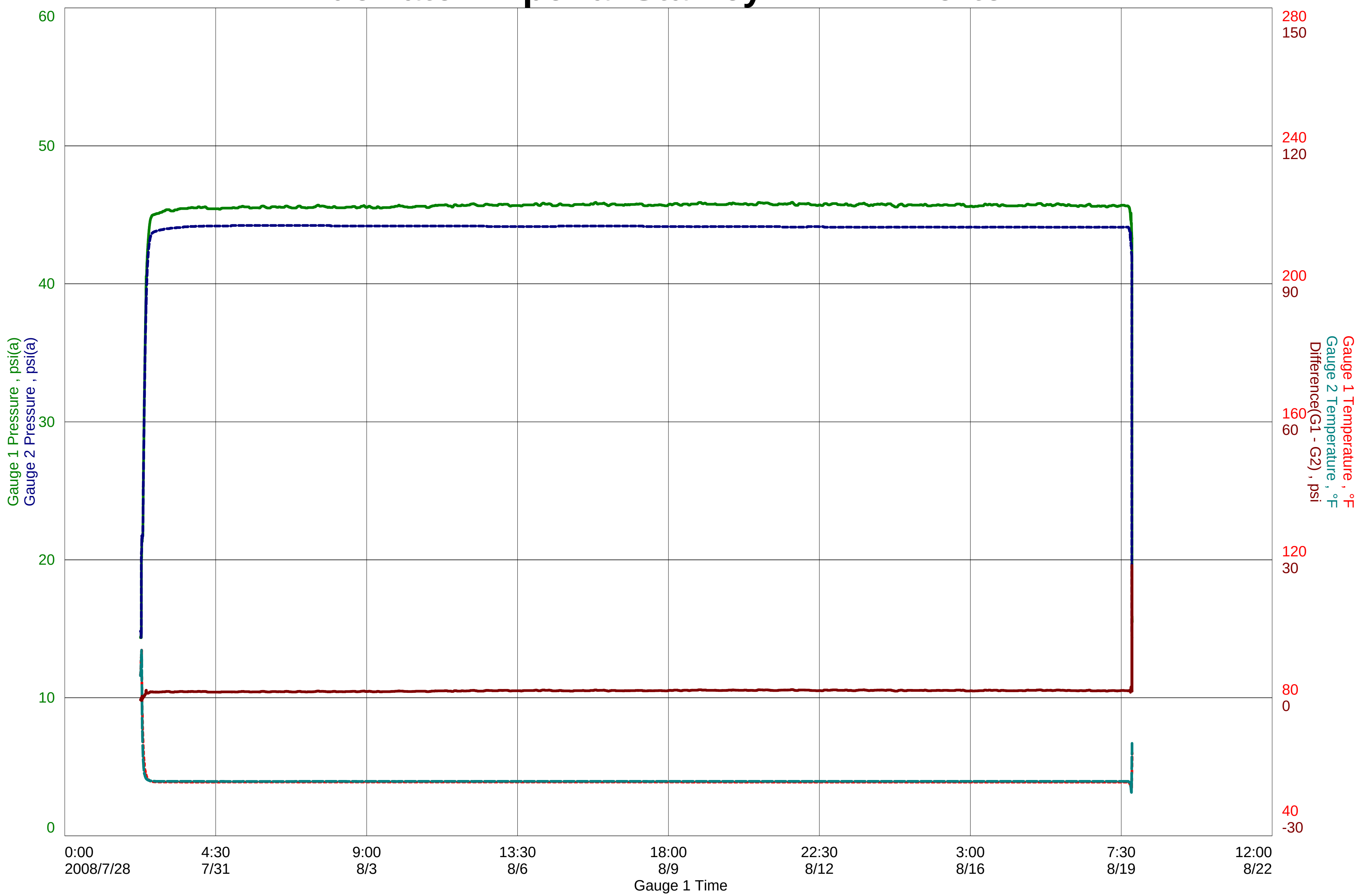
Gas Properties: sg = .66, N_2 = 6.13%, CO_2 = .03%, T_{surf} = 60^oF, T_{BH} = 55.6^oF

Date	Well	Type of Press	SI time (hrs)	Press (psig)		Depth (ft RF)	Datum Pressure (psia)	(kPaa)
08-Oct-56	Porter #1	ISIP		409.5	psig	Surf	444.7	3066
21-Feb-57	Grnger #1	ISIP		410	psig	Surf	445.2	3070
1957		Form 8		420	psig	Surf	455.8	3142
1958		Form 8		410	psig	Surf	445.2	3070
1959		Form 8		358	psig	Surf	390.5	2692
1960		Form 8		330	psig	Surf	361.0	2489
1961		Form 8		296	psig	Surf	325.3	2243
1962		Form 8		258	psig	Surf	285.4	1968
1963		Form 8		227.7	psig	Surf	253.6	1748
1964		Form 8		191.5	psig	Surf	215.6	1486
1965		Form 8		174.6	psig	Surf	197.9	1364
1966		Form 8		135	psig	Surf	156.4	1078
1967		Form 8		125	psig	Surf	145.9	1006
1968		Form 8	72 hr SI	98	psig	Surf	117.6	811
1969		Form 8	48 hr SI	70	psig	Surf	88.3	609
1970		Form 8	24 hr SI	58	psig	Surf	75.7	522
1971		Form 8	24 hr SI	50	psig	Surf	67.4	464
1972		Form 8	24 hr SI	50	psig	Surf	67.4	464
1973		Form 8	24 hr SI	50	psig	Surf	67.4	464
1983		Form 8	8 day SI	410	kPa	Surf	77.2	532
01-Sep-84		13 day SI		262	kPa	Surf	54.8	378
01-Apr-85		24 hr SI		255	kPa	Surf	53.7	370
01-Nov-86		168 hr SI		255	kPa	Surf	53.7	370
01-Dec-87		168 hr SI		255	kPa	Surf	53.7	370
01-Nov-88		336 hr SI		110	kPa	Surf	31.7	219
01-Dec-95		Extended		193	kPa	Surf	44.3	305
01-Aug-03	Porter #1	72 hr SI		193	kPa	Surf	44.3	305
01-Aug-03	Grnger #1	72hr SI		207	kPa	Surf	46.4	320
01-Jan-04	Porter #1	24 hr SI		200	kPa	Surf	45.3	313
01-Jan-04	Grnger #1	24 hr SI		190	kPa	Surf	43.8	302
01-Nov-05	Porter #1	72 hr SI		213	kPa	Surf	47.3	326
01-Nov-05	Grnger #1	72 hr SI		207	kPa	Surf	46.4	320
01-Apr-06	Porter #1	72 hr SI		207	kPa	Surf	46.4	320
01-Apr-06	Grnger #1	72 hr SI		200	kPa	Surf	45.3	313
19-Aug-08	Porter #1	500 hr SI		314.7	kPaa	Btm hole	45.7	314.7

Tribute Resources Inc.
Start Test Date: 2008/07/29
Final Test Date: 2008/08/19

Bluewater Imperial Stanley 7-BRN: Porter #1
Formation: Guelph

Bluewater Imperial Stanley 7-BRN: Porter #1



Tribute Resources Inc.
Start Test Date: 2008/07/29
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Bluewater Imperial Stanley 7-BRN: Porter #1
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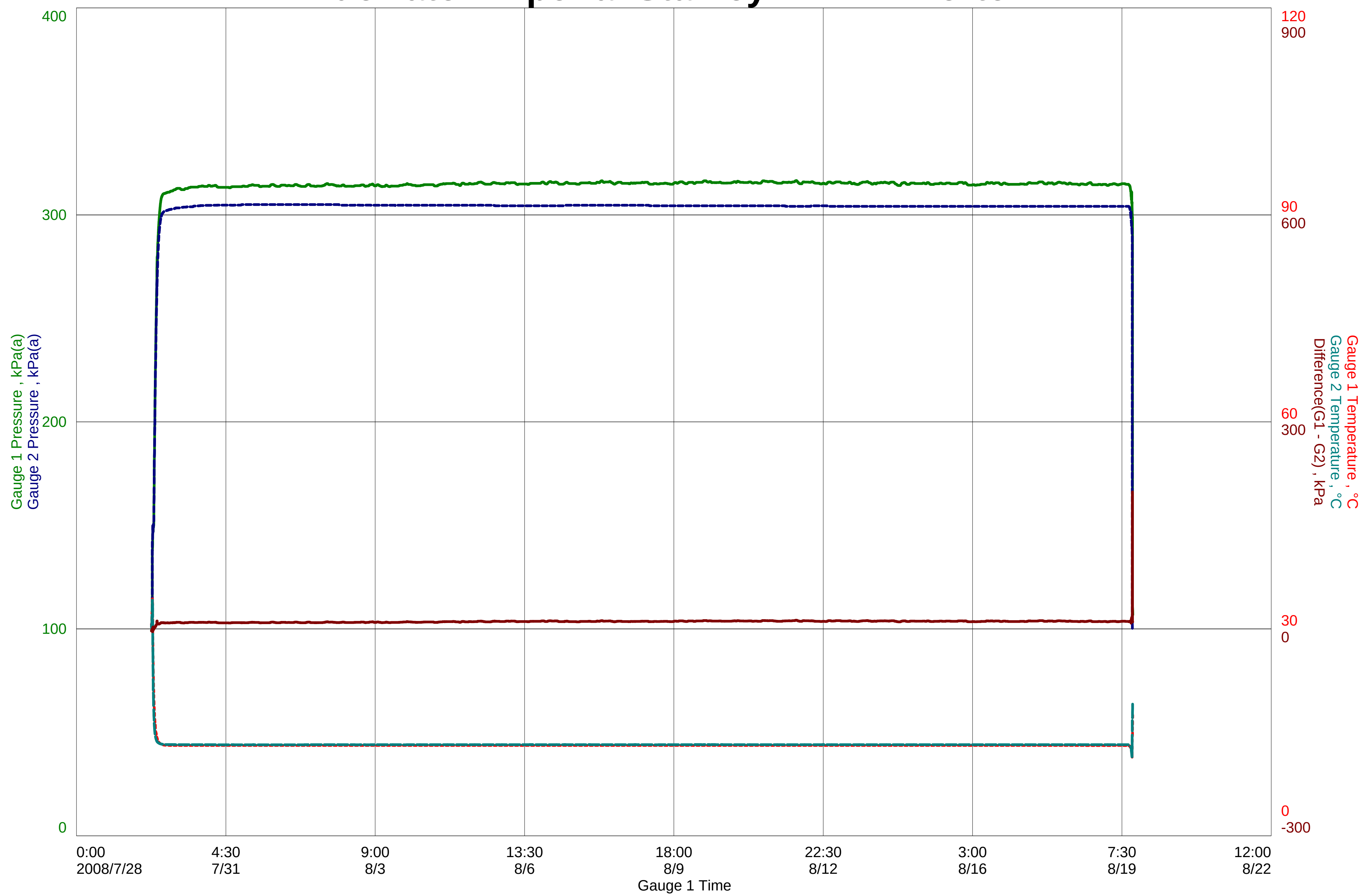
Bluewater Imperial Stanley 7-BRN: Porter #1



Company Name Tribute Resources Inc.
Unique Well ID
Start Test Date 2008/07/29
Final Test Date 2008/08/19

Well Name Bluewater Imperial Stanley 7-BRN: Porter #1
Formation Guelph

	Gauge 1 Date	Gauge 1 Time	Gauge 1 Pres.	Gauge 1 Temp.	Gauge 2 Time	Gauge 2 Pres.	Gauge 2 Temp.
	YYYY/MM/DD HH:mm:ss	h	kPa(a)	°C	h	kPa(a)	°C
1	2008/07/29 14:21:00	0.0000	99.00	30.36	0.0000	102.10	30.22
2	2008/07/29 17:21:00	3.0000	279.83	14.11	3.0000	269.16	13.63
3	2008/07/29 20:21:00	6.0000	310.00	13.18	6.0000	301.10	13.26
4	2008/07/29 23:21:00	9.0000	310.94	13.11	9.0000	302.49	13.22
5	2008/07/30 02:21:00	12.0000	312.18	13.10	12.0000	303.06	13.21
6	2008/07/30 05:21:00	15.0000	312.51	13.10	15.0000	303.53	13.21
7	2008/07/30 08:21:00	18.0000	312.72	13.10	18.0000	303.82	13.21
8	2008/07/30 11:21:00	21.0000	313.38	13.10	21.0000	303.91	13.21
9	2008/07/30 14:21:00	24.0000	313.53	13.09	24.0000	304.30	13.21
10	2008/07/30 17:21:00	27.0000	313.75	13.09	27.0000	304.47	13.21
11	2008/07/30 20:21:00	30.0000	314.16	13.09	30.0000	304.57	13.21
12	2008/07/30 23:21:00	33.0000	314.27	13.09	33.0000	304.66	13.21
13	2008/07/31 02:21:00	36.0000	313.31	13.09	36.0000	304.68	13.20
14	2008/07/31 05:21:00	39.0000	313.27	13.10	39.0000	304.68	13.20
15	2008/07/31 08:21:00	42.0000	313.60	13.10	42.0000	304.67	13.21
16	2008/07/31 11:21:00	45.0000	313.60	13.10	45.0000	304.68	13.20
17	2008/07/31 14:21:00	48.0000	313.70	13.10	48.0000	304.96	13.20
18	2008/07/31 17:21:00	51.0000	314.25	13.10	51.0000	304.96	13.20
19	2008/07/31 20:21:00	54.0000	314.25	13.10	54.0000	304.96	13.20
20	2008/07/31 23:21:00	57.0000	313.81	13.10	57.0000	304.96	13.20
21	2008/08/01 02:21:00	60.0000	313.81	13.10	60.0000	304.96	13.20
22	2008/08/01 05:21:00	63.0000	314.34	13.10	63.0000	304.96	13.20
23	2008/08/01 08:21:00	66.0000	313.92	13.10	66.0000	304.96	13.20
24	2008/08/01 11:21:00	69.0000	314.14	13.10	69.0000	304.96	13.20
25	2008/08/01 14:21:00	72.0000	314.03	13.10	72.0000	304.96	13.20
26	2008/08/01 17:21:00	75.0000	314.36	13.10	75.0000	304.96	13.20
27	2008/08/01 20:21:00	78.0000	313.70	13.10	78.0000	304.96	13.20
28	2008/08/01 23:21:00	81.0000	314.58	13.10	81.0000	304.95	13.21
29	2008/08/02 02:21:00	84.0000	313.70	13.10	84.0000	304.95	13.21
30	2008/08/02 05:21:00	87.0000	313.90	13.10	87.0000	304.95	13.21
31	2008/08/02 08:21:00	90.0000	315.10	13.10	90.0000	304.95	13.21
32	2008/08/02 11:21:00	93.0000	314.56	13.10	93.0000	304.95	13.21
33	2008/08/02 14:21:00	96.0000	313.90	13.10	96.0000	304.95	13.21
34	2008/08/02 17:21:00	99.0000	314.01	13.10	99.0000	304.67	13.21
35	2008/08/02 20:21:00	102.0000	313.81	13.10	102.0000	304.67	13.21
36	2008/08/02 23:21:00	105.0000	314.12	13.10	105.0000	304.68	13.20
37	2008/08/03 02:21:00	108.0000	314.47	13.10	108.0000	304.67	13.21
38	2008/08/03 05:21:00	111.0000	313.92	13.10	111.0000	304.68	13.20
39	2008/08/03 08:21:00	114.0000	314.25	13.10	114.0000	304.67	13.21
40	2008/08/03 11:21:00	117.0000	314.03	13.10	117.0000	304.67	13.21
41	2008/08/03 14:21:00	120.0000	314.14	13.10	120.0000	304.67	13.21
42	2008/08/03 17:21:00	123.0000	313.92	13.10	123.0000	304.67	13.21
43	2008/08/03 20:21:00	126.0000	313.90	13.10	126.0000	304.67	13.21
44	2008/08/03 23:21:00	129.0000	314.45	13.10	129.0000	304.68	13.20
45	2008/08/04 02:21:00	132.0000	314.66	13.10	132.0000	304.67	13.21

Print Filter: Approximately every 89 lines

Gauge Name	Serial Number	Start Date	Start Time	Run Depth (TVD)
Gauge 1		2008/07/29	14:21:00	m
Gauge 2		2008/07/29	14:21:00	m

Company Name Tribute Resources Inc.
Unique Well ID
Start Test Date 2008/07/29
Final Test Date 2008/08/19

Well Name Bluewater Imperial Stanley 7-BRN: Porter #1
Formation Guelph

	Gauge 1 Date	Gauge 1 Time	Gauge 1 Pres.	Gauge 1 Temp.	Gauge 2 Time	Gauge 2 Pres.	Gauge 2 Temp.
	YYYY/MM/DD HH:mm:ss	h	kPa(a)	°C	h	kPa(a)	°C
46	2008/08/04 05:21:00	135.0000	314.23	13.10	135.0000	304.67	13.21
47	2008/08/04 08:21:00	138.0000	314.14	13.10	138.0000	304.67	13.21
48	2008/08/04 11:21:00	141.0000	314.56	13.10	141.0000	304.67	13.21
49	2008/08/04 14:21:00	144.0000	314.58	13.10	144.0000	304.67	13.21
50	2008/08/04 17:21:00	147.0000	314.34	13.10	147.0000	304.67	13.21
51	2008/08/04 20:21:00	150.0000	314.88	13.10	150.0000	304.66	13.21
52	2008/08/04 23:21:00	153.0000	315.10	13.10	153.0000	304.67	13.21
53	2008/08/05 02:21:00	156.0000	314.77	13.10	156.0000	304.67	13.21
54	2008/08/05 05:21:00	159.0000	315.12	13.10	159.0000	304.67	13.21
55	2008/08/05 08:21:00	162.0000	314.77	13.10	162.0000	304.67	13.21
56	2008/08/05 11:21:00	165.0000	314.88	13.10	165.0000	304.67	13.21
57	2008/08/05 14:21:00	168.0000	315.75	13.10	168.0000	304.67	13.21
58	2008/08/05 17:21:00	171.0000	314.88	13.10	171.0000	304.67	13.21
59	2008/08/05 20:21:00	174.0000	314.88	13.10	174.0000	304.67	13.21
60	2008/08/05 23:21:00	177.0000	315.23	13.10	177.0000	304.39	13.21
61	2008/08/06 02:21:00	180.0000	315.01	13.10	180.0000	304.39	13.21
62	2008/08/06 05:21:00	183.0000	315.54	13.10	183.0000	304.39	13.21
63	2008/08/06 08:21:00	186.0000	315.54	13.10	186.0000	304.39	13.21
64	2008/08/06 11:21:00	189.0000	314.88	13.10	189.0000	304.39	13.21
65	2008/08/06 14:21:00	192.0000	314.88	13.10	192.0000	304.39	13.21
66	2008/08/06 17:21:00	195.0000	315.21	13.10	195.0000	304.37	13.22
67	2008/08/06 20:21:00	198.0000	315.23	13.10	198.0000	304.38	13.21
68	2008/08/06 23:21:00	201.0000	315.67	13.10	201.0000	304.38	13.21
69	2008/08/07 02:21:00	204.0000	315.99	13.10	204.0000	304.38	13.21
70	2008/08/07 05:21:00	207.0000	315.86	13.10	207.0000	304.38	13.21
71	2008/08/07 08:21:00	210.0000	314.79	13.10	210.0000	304.38	13.21
72	2008/08/07 11:21:00	213.0000	315.67	13.10	213.0000	304.66	13.21
73	2008/08/07 14:21:00	216.0000	315.12	13.10	216.0000	304.66	13.21
74	2008/08/07 17:21:00	219.0000	314.79	13.10	219.0000	304.66	13.21
75	2008/08/07 20:21:00	222.0000	315.45	13.10	222.0000	304.66	13.21
76	2008/08/07 23:21:00	225.0000	315.34	13.10	225.0000	304.66	13.21
77	2008/08/08 02:21:00	228.0000	315.56	13.10	228.0000	304.66	13.21
78	2008/08/08 05:21:00	231.0000	316.41	13.10	231.0000	304.66	13.21
79	2008/08/08 08:21:00	234.0000	315.86	13.10	234.0000	304.66	13.21
80	2008/08/08 11:21:00	237.0000	314.88	13.10	237.0000	304.66	13.21
81	2008/08/08 14:21:00	240.0000	315.75	13.10	240.0000	304.66	13.21
82	2008/08/08 17:21:00	243.0000	315.23	13.10	243.0000	304.66	13.21
83	2008/08/08 20:21:00	246.0000	315.43	13.10	246.0000	304.66	13.21
84	2008/08/08 23:21:00	249.0000	315.43	13.10	249.0000	304.66	13.21
85	2008/08/09 02:21:00	252.0000	315.54	13.10	252.0000	304.66	13.21
86	2008/08/09 05:21:00	255.0000	314.90	13.10	255.0000	304.48	13.21
87	2008/08/09 08:21:00	258.0000	315.12	13.10	258.0000	304.40	13.20
88	2008/08/09 11:21:00	261.0000	315.12	13.10	261.0000	304.39	13.21
89	2008/08/09 14:21:00	264.0000	315.21	13.10	264.0000	304.39	13.21
90	2008/08/09 17:21:00	267.0000	314.79	13.10	267.0000	304.39	13.21

Print Filter: Approximately every 89 lines

Gauge Name	Serial Number	Start Date	Start Time	Run Depth (TVD)
Gauge 1		2008/07/29	14:21:00	m
Gauge 2		2008/07/29	14:21:00	m

Company Name Tribute Resources Inc.
Unique Well ID
Start Test Date 2008/07/29
Final Test Date 2008/08/19

Well Name Bluewater Imperial Stanley 7-BRN: Porter #1
Formation Guelph

	Gauge 1 Date	Gauge 1 Time	Gauge 1 Pres.	Gauge 1 Temp.	Gauge 2 Time	Gauge 2 Pres.	Gauge 2 Temp.
	YYYY/MM/DD HH:mm:ss	h	kPa(a)	°C	h	kPa(a)	°C
91	2008/08/09 20:21:00	270.0000	315.54	13.10	270.0000	304.39	13.21
92	2008/08/09 23:21:00	273.0000	315.43	13.10	273.0000	304.39	13.21
93	2008/08/10 02:21:00	276.0000	315.69	13.09	276.0000	304.38	13.21
94	2008/08/10 05:21:00	279.0000	315.58	13.09	279.0000	304.37	13.22
95	2008/08/10 08:21:00	282.0000	315.69	13.09	282.0000	304.38	13.21
96	2008/08/10 11:21:00	285.0000	315.90	13.09	285.0000	304.37	13.22
97	2008/08/10 14:21:00	288.0000	315.58	13.09	288.0000	304.37	13.22
98	2008/08/10 17:21:00	291.0000	315.69	13.09	291.0000	304.38	13.21
99	2008/08/10 20:21:00	294.0000	315.34	13.10	294.0000	304.38	13.21
100	2008/08/10 23:21:00	297.0000	315.47	13.09	297.0000	304.38	13.21
101	2008/08/11 02:21:00	300.0000	316.01	13.09	300.0000	304.38	13.21
102	2008/08/11 05:21:00	303.0000	315.71	13.09	303.0000	304.38	13.21
103	2008/08/11 08:21:00	306.0000	315.80	13.09	306.0000	304.39	13.21
104	2008/08/11 11:21:00	309.0000	315.58	13.09	309.0000	304.38	13.21
105	2008/08/11 14:21:00	312.0000	315.25	13.09	312.0000	304.39	13.21
106	2008/08/11 17:21:00	315.0000	316.21	13.10	315.0000	304.39	13.21
107	2008/08/11 20:21:00	318.0000	316.21	13.10	318.0000	304.39	13.21
108	2008/08/11 23:21:00	321.0000	315.25	13.09	321.0000	304.39	13.21
109	2008/08/12 02:21:00	324.0000	315.69	13.09	324.0000	304.39	13.21
110	2008/08/12 05:21:00	327.0000	315.69	13.09	327.0000	304.11	13.21
111	2008/08/12 08:21:00	330.0000	316.45	13.09	330.0000	304.11	13.21
112	2008/08/12 11:21:00	333.0000	315.03	13.09	333.0000	304.11	13.21
113	2008/08/12 14:21:00	336.0000	315.80	13.09	336.0000	304.11	13.21
114	2008/08/12 17:21:00	339.0000	315.80	13.09	339.0000	304.39	13.21
115	2008/08/12 20:21:00	342.0000	315.25	13.09	342.0000	304.38	13.21
116	2008/08/12 23:21:00	345.0000	315.03	13.09	345.0000	304.38	13.21
117	2008/08/13 02:21:00	348.0000	315.78	13.10	348.0000	304.10	13.21
118	2008/08/13 05:21:00	351.0000	315.90	13.09	351.0000	304.10	13.21
119	2008/08/13 08:21:00	354.0000	315.36	13.09	354.0000	304.10	13.21
120	2008/08/13 11:21:00	357.0000	315.47	13.09	357.0000	304.10	13.21
121	2008/08/13 14:21:00	360.0000	315.25	13.09	360.0000	304.11	13.21
122	2008/08/13 17:21:00	363.0000	315.25	13.09	363.0000	304.10	13.21
123	2008/08/13 20:21:00	366.0000	315.80	13.09	366.0000	304.10	13.21
124	2008/08/13 23:21:00	369.0000	314.92	13.09	369.0000	304.10	13.21
125	2008/08/14 02:21:00	372.0000	315.45	13.10	372.0000	304.10	13.21
126	2008/08/14 05:21:00	375.0000	315.58	13.09	375.0000	304.10	13.21
127	2008/08/14 08:21:00	378.0000	315.25	13.09	378.0000	304.10	13.21
128	2008/08/14 11:21:00	381.0000	315.03	13.09	381.0000	304.11	13.21
129	2008/08/14 14:21:00	384.0000	314.71	13.09	384.0000	304.11	13.21
130	2008/08/14 17:21:00	387.0000	314.79	13.10	387.0000	304.11	13.21
131	2008/08/14 20:21:00	390.0000	315.36	13.09	390.0000	304.11	13.21
132	2008/08/14 23:21:00	393.0000	315.14	13.09	393.0000	304.12	13.20
133	2008/08/15 02:21:00	396.0000	315.25	13.09	396.0000	304.11	13.21
134	2008/08/15 05:21:00	399.0000	314.81	13.09	399.0000	304.11	13.21
135	2008/08/15 08:21:00	402.0000	315.03	13.09	402.0000	304.11	13.21

Print Filter: Approximately every 89 lines

Gauge Name	Serial Number	Start Date	Start Time	Run Depth (TVD)
Gauge 1		2008/07/29	14:21:00	m
Gauge 2		2008/07/29	14:21:00	m

Company Name Tribute Resources Inc.
Unique Well ID
Start Test Date 2008/07/29
Final Test Date 2008/08/19

Well Name Bluewater Imperial Stanley 7-BRN: Porter #1
Formation Guelph

	Gauge 1 Date	Gauge 1 Time	Gauge 1 Pres.	Gauge 1 Temp.	Gauge 2 Time	Gauge 2 Pres.	Gauge 2 Temp.
	YYYY/MM/DD HH:mm:ss	h	kPa(a)	°C	h	kPa(a)	°C
136	2008/08/15 11:21:00	405.0000	315.14	13.09	405.0000	304.11	13.21
137	2008/08/15 14:21:00	408.0000	315.36	13.09	408.0000	304.10	13.21
138	2008/08/15 17:21:00	411.0000	315.03	13.09	411.0000	304.11	13.21
139	2008/08/15 20:21:00	414.0000	315.69	13.09	414.0000	304.10	13.21
140	2008/08/15 23:21:00	417.0000	315.56	13.10	417.0000	304.10	13.21
141	2008/08/16 02:21:00	420.0000	314.38	13.09	420.0000	304.10	13.21
142	2008/08/16 05:21:00	423.0000	314.51	13.09	423.0000	304.11	13.21
143	2008/08/16 08:21:00	426.0000	314.81	13.09	426.0000	304.10	13.21
144	2008/08/16 11:21:00	429.0000	315.25	13.09	429.0000	304.11	13.21
145	2008/08/16 14:21:00	432.0000	315.25	13.09	432.0000	304.11	13.21
146	2008/08/16 17:21:00	435.0000	314.73	13.09	435.0000	304.11	13.21
147	2008/08/16 20:21:00	438.0000	314.94	13.09	438.0000	304.11	13.21
148	2008/08/16 23:21:00	441.0000	314.73	13.09	441.0000	304.11	13.21
149	2008/08/17 02:21:00	444.0000	314.73	13.09	444.0000	304.11	13.21
150	2008/08/17 05:21:00	447.0000	314.81	13.09	447.0000	304.11	13.21
151	2008/08/17 08:21:00	450.0000	315.60	13.09	450.0000	304.11	13.21
152	2008/08/17 11:21:00	453.0000	315.25	13.09	453.0000	304.11	13.21
153	2008/08/17 14:21:00	456.0000	315.93	13.09	456.0000	304.10	13.21
154	2008/08/17 17:21:00	459.0000	315.14	13.09	459.0000	304.10	13.21
155	2008/08/17 20:21:00	462.0000	315.03	13.09	462.0000	304.10	13.21
156	2008/08/17 23:21:00	465.0000	315.82	13.09	465.0000	304.10	13.21
157	2008/08/18 02:21:00	468.0000	315.25	13.09	468.0000	304.10	13.21
158	2008/08/18 05:21:00	471.0000	315.16	13.09	471.0000	304.10	13.21
159	2008/08/18 08:21:00	474.0000	314.84	13.09	474.0000	304.10	13.21
160	2008/08/18 11:21:00	477.0000	314.94	13.09	477.0000	304.10	13.21
161	2008/08/18 14:21:00	480.0000	315.18	13.08	480.0000	304.11	13.21
162	2008/08/18 17:21:00	483.0000	314.53	13.08	483.0000	304.10	13.21
163	2008/08/18 20:21:00	486.0000	314.73	13.09	486.0000	304.11	13.21
164	2008/08/18 23:21:00	489.0000	314.64	13.08	489.0000	304.10	13.21
165	2008/08/19 02:21:00	492.0000	314.75	13.08	492.0000	304.11	13.21
166	2008/08/19 05:21:00	495.0000	314.51	13.09	495.0000	304.10	13.21
167	2008/08/19 08:21:00	498.0000	315.07	13.08	498.0000	304.10	13.21
168	2008/08/19 11:21:00	501.0000	314.30	13.03	501.0000	303.64	13.16
169							

Print Filter: Approximately every 89 lines

Gauge Name	Serial Number	Start Date	Start Time	Run Depth (TVD)
Gauge 1		2008/07/29	14:21:00	m
Gauge 2		2008/07/29	14:21:00	m

Bayfield Pool Reservoir Engineering Report

Schedule 3

Material Balance Plot and Original Gas-in-Place

Material Balance
Summary of Results
(as at February 1, 2008)

Bayfield reef
Bayfield reef

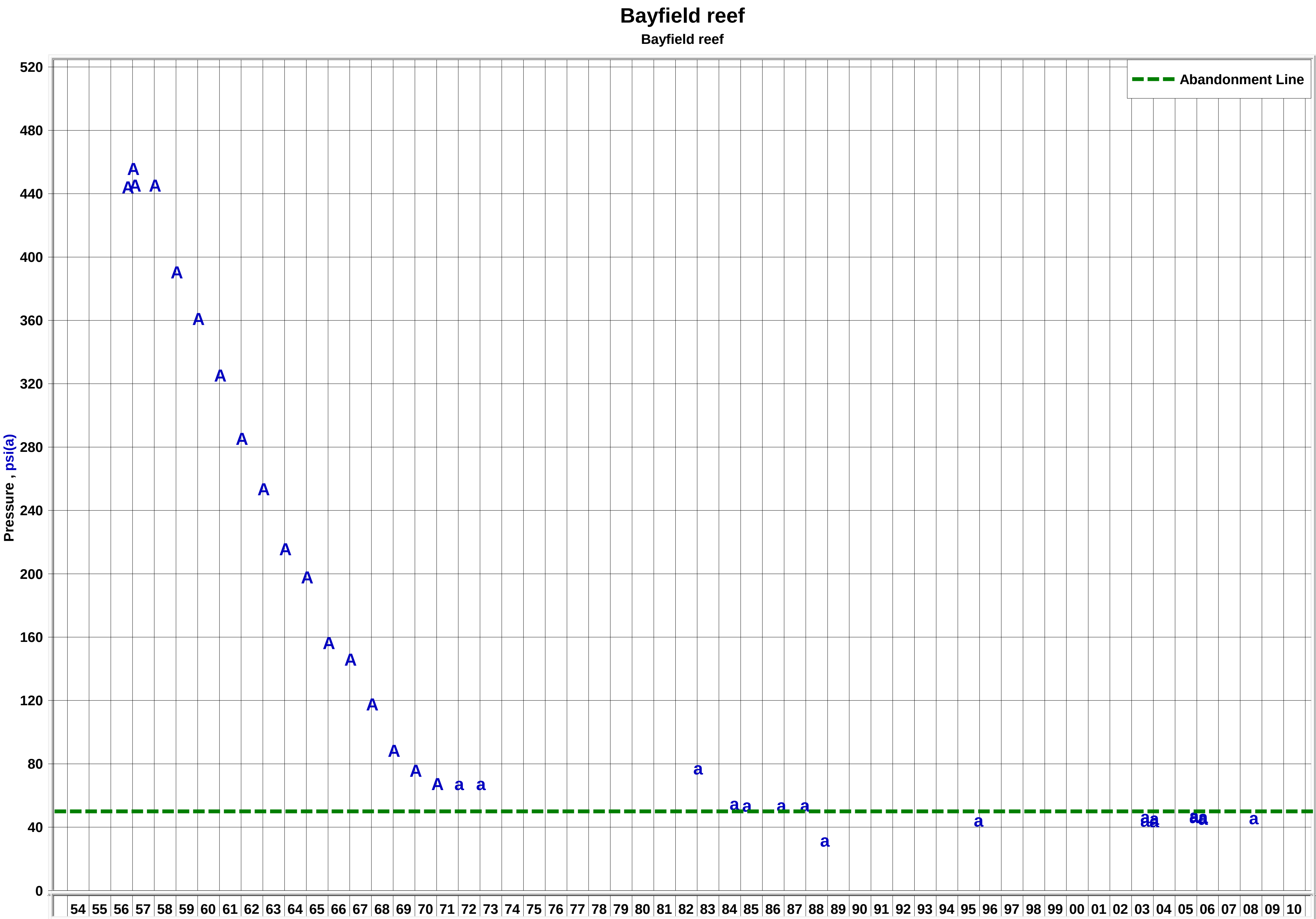
Default Analysis

Initial Reservoir Pressure	3065 kPa(a)	444.6 psi(a)
Reservoir Temperature	13.1 °C	56 °F

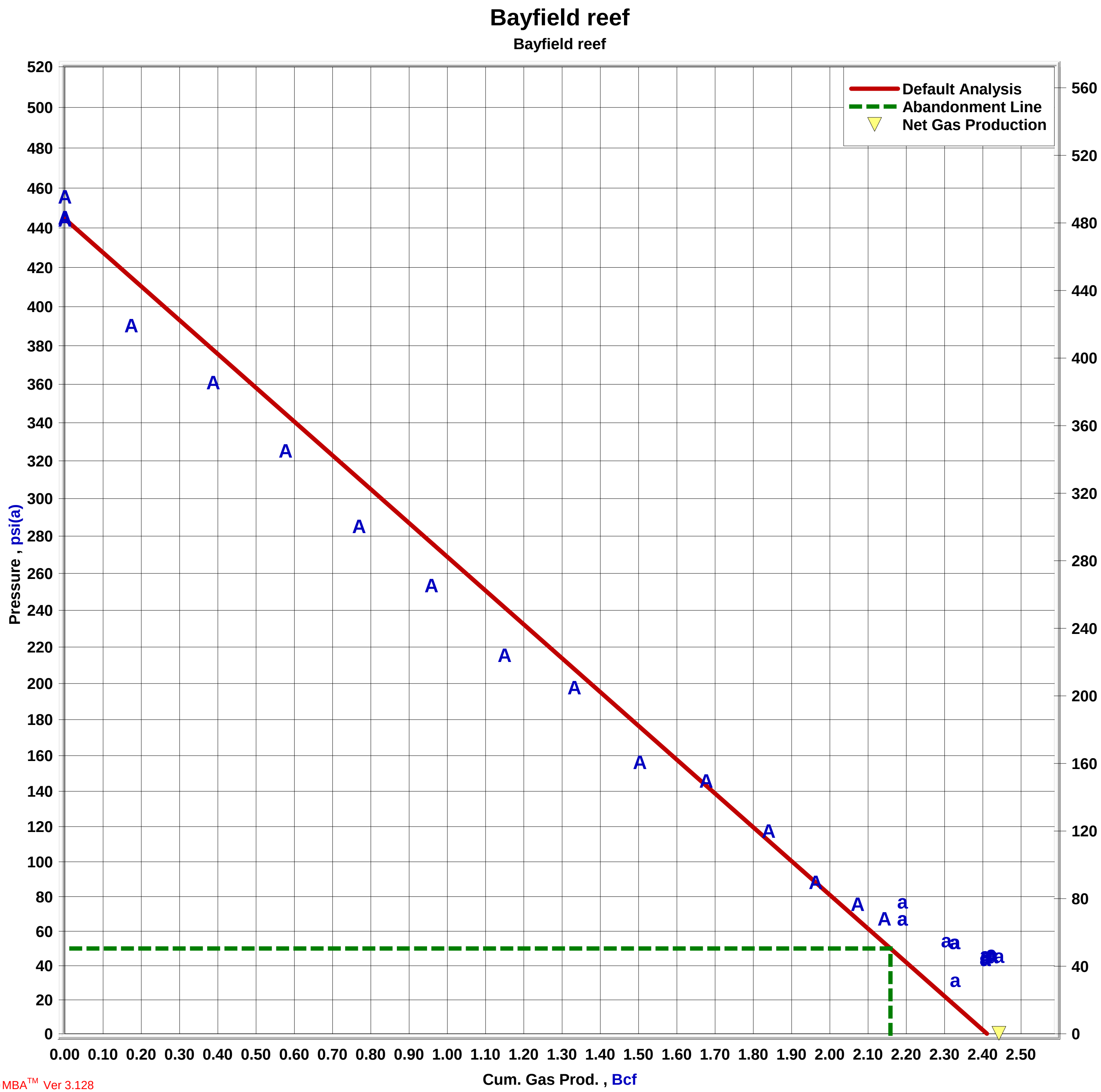
Original Volumes	($10^6 m^3$)	(Bcf)
Main Producing Pool		
Gas-In-Place (OGIP)	67.913	2.410
Pool Recovery	89.54 %	89.54 %
Recoverable GIP	60.812	2.158
Surface Losses	5.00 %	5.00 %
Marketable GIP	57.771	2.051
Flow Volumes (Cumulative)		
Raw Gas Produced	68.805	2.442
Marketable Gas Produced	65.364	2.320
Gas Injected	0.000	0.000
Net Sales	65.364	2.320
Remaining Volumes		
Recoverable Gas Reserves	**0.000**	**0.000**
Marketable Gas Reserves	**0.000**	**0.000**

Gas Properties

Gas Gravity	0.660	
N_2	6.13 %	
CO_2	0.03 %	
H_2S	0.00 %	
T_c	201 K	362.0 °R
P_c	4554 kPa(a)	660.4 psi(a)


Bayfield reef
Bayfield reef
Abandonment Line
Pressure , psi(a)
520
480
440
400
360
320
280
240
200
160
120
80
40
0
54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 00 01 02 03 04 05 06 07 08 09 10

Material Balance
Summary of Results
(as at February 01, 2008)



Bayfield reef

Initial Reservoir Pressure	444.6 psi(a)
Reservoir Temperature	56 °F

Original Volumes

Gas-In-Place (OGIP)	2.410 Bcf
Pool Recovery	89.544 %
Recoverable GIP	2.158 Bcf
Surface Loss	5.000 %
Marketable GIP	2.051 Bcf

Flow Volumes (Cumulative)

Raw Gas Produced	2.442 Bcf
Marketable Gas Produced	2.320 Bcf
Gas Injected	0.000 Bcf
Net Sales	2.320 Bcf

Remaining

Original Gas-In-Place	0.000 Bcf
Recoverable Gas Reserves	0.000 Bcf
Marketable Gas Reserves	0.000 Bcf

Gas Properties

Gas Gravity	0.660
N_2	6.130 %
CO_2	0.030 %
H_2S	0.000 %
T_c	362 °R
P_c	660.4 psi

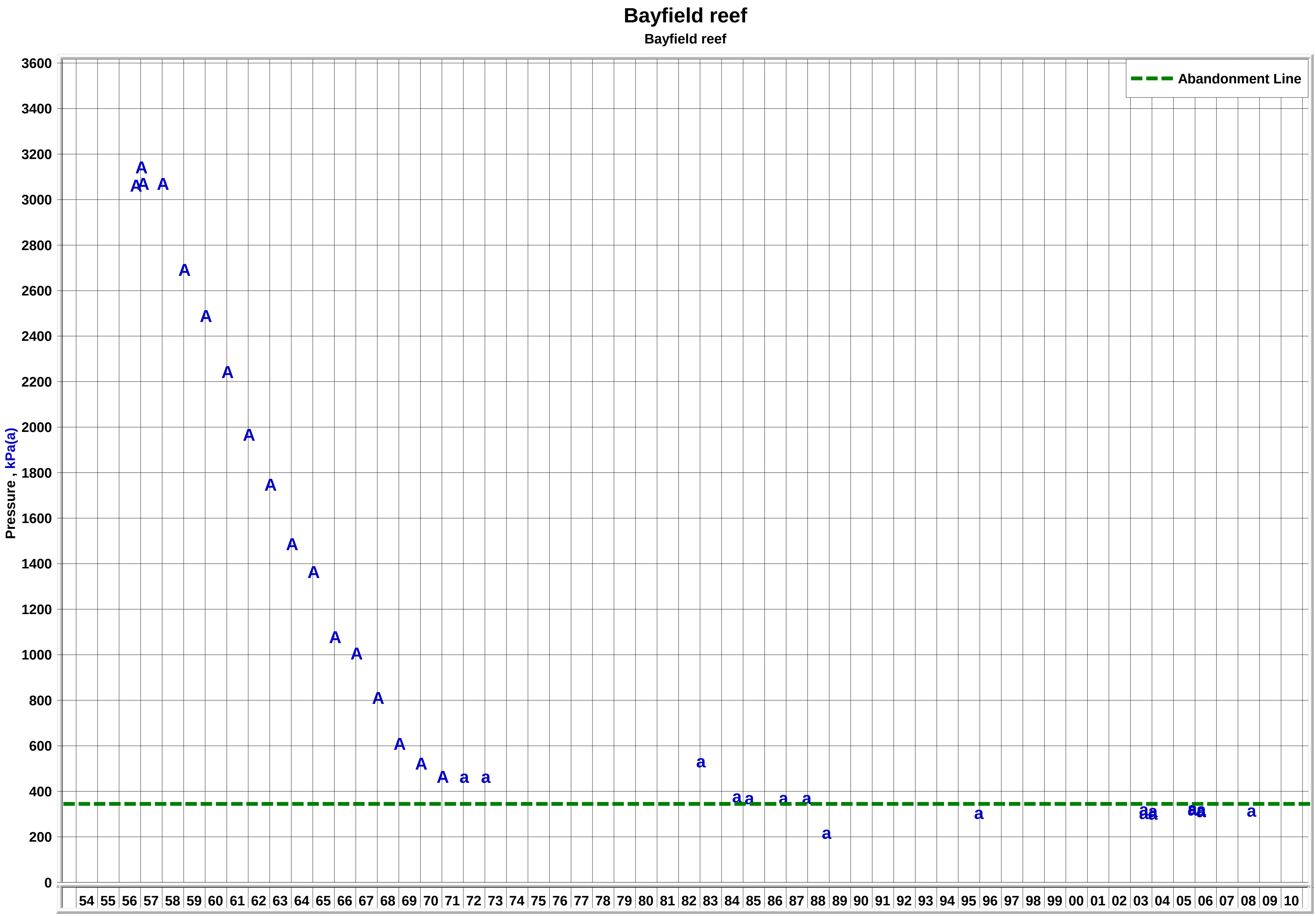
Summary Data Report

(as at February 1, 2008)

Bayfield reef
Bayfield reef

Default Analysis

Date	Unique Well ID	Reservoir Pressure (psi(a))	Z	P/Z (psi(a))	Cumulative Gas Production (Bcf)	Selected
Oct. 08, 56	0Bluewater Porter #1	444.10	0.922	481.86	0.000	Yes
Jan. 01, 57	0Bluewater Porter #1	455.70	0.920	495.54	0.000	Yes
Feb. 21, 57	0Bluewater Porter #1	445.20	0.921	483.15	0.000	Yes
Jan. 01, 58	0Bluewater Porter #1	445.20	0.921	483.15	0.000	Yes
Jan. 01, 59	0Bluewater Porter #1	390.40	0.931	419.31	0.174	Yes
Jan. 01, 60	0Bluewater Porter #1	361.00	0.936	385.58	0.388	Yes
Jan. 01, 61	0Bluewater Porter #1	325.30	0.943	345.13	0.577	Yes
Jan. 01, 62	0Bluewater Porter #1	285.30	0.950	300.44	0.769	Yes
Jan. 01, 63	0Bluewater Porter #1	253.50	0.955	265.38	0.958	Yes
Jan. 01, 64	0Bluewater Porter #1	215.60	0.962	224.13	1.150	Yes
Jan. 01, 65	0Bluewater Porter #1	197.80	0.965	204.96	1.332	Yes
Jan. 01, 66	0Bluewater Porter #1	156.30	0.972	160.74	1.503	Yes
Jan. 01, 67	0Bluewater Porter #1	145.90	0.974	149.76	1.676	Yes
Jan. 01, 68	0Bluewater Porter #1	117.60	0.979	120.09	1.840	Yes
Jan. 01, 69	0Bluewater Porter #1	88.30	0.984	89.70	1.963	Yes
Jan. 01, 70	0Bluewater Porter #1	75.70	0.987	76.73	2.073	Yes
Jan. 01, 71	0Bluewater Porter #1	67.30	0.988	68.11	2.143	Yes
Jan. 01, 72	0Bluewater Porter #1	67.30	0.988	68.11	2.189	No
Jan. 01, 73	0Bluewater Porter #1	67.30	0.988	68.11	2.190	No
Jan. 01, 83	0Bluewater Porter #1	77.16	0.986	78.23	2.190	No
Sep. 01, 84	0Bluewater Porter #1	54.68	0.990	55.21	2.304	No
Apr. 01, 85	0Bluewater Porter #1	53.66	0.991	54.18	2.325	No
Nov. 01, 86	0Bluewater Porter #1	53.70	0.991	54.21	2.327	No
Dec. 01, 87	0Bluewater Porter #1	53.70	0.991	54.21	2.327	No
Nov. 01, 88	0Bluewater Porter #1	31.62	0.994	31.80	2.327	No
Dec. 01, 95	0Bluewater Porter #1	44.30	0.992	44.65	2.405	No
Aug. 01, 03	0Bluewater Porter #1	44.24	0.992	44.58	2.405	No
Aug. 01, 03	0Bluewater Porter #1	46.41	0.992	46.80	2.405	No
Jan. 01, 04	0Bluewater Porter #1	45.40	0.992	45.76	2.407	No
Jan. 01, 04	0Bluewater Porter #1	43.80	0.992	44.14	2.407	No
Nov. 01, 05	0Bluewater Porter #1	46.41	0.992	46.80	2.422	No
Nov. 01, 05	0Bluewater Porter #1	47.28	0.992	47.68	2.422	No
Apr. 01, 06	0Bluewater Porter #1	45.40	0.992	45.76	2.425	No
Apr. 01, 06	0Bluewater Porter #1	46.41	0.992	46.80	2.425	No
Aug. 19, 08	0Bluewater Porter #1	45.69	0.992	46.06	2.442	No



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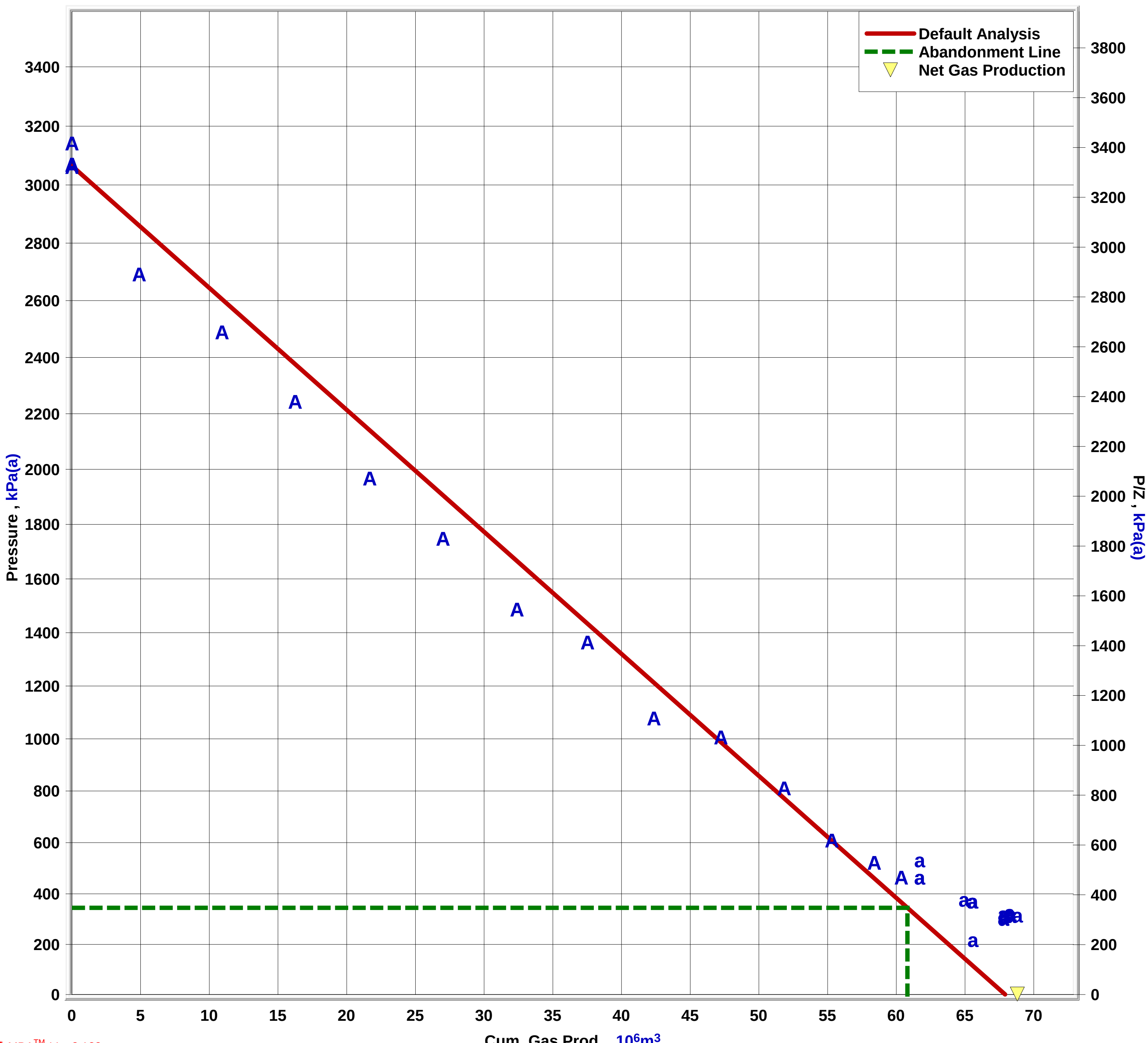
Material Balance

Summary of Results

(as at February 01, 2008)

Bayfield reef

Bayfield reef



MBA™ Ver 3.128
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Bayfield reef

Initial Reservoir Pressure	3065	kPa(a)
Reservoir Temperature	13.1	°C
Original Volumes		
Gas-In-Place (OGIP)	67.913	10^6m^3
Pool Recovery	89.544	%
Recoverable GIP	60.812	10^6m^3
Surface Loss	5.000	%
Marketable GIP	57.771	10^6m^3
Flow Volumes (Cumulative)		
Raw Gas Produced	68.805	10^6m^3
Marketable Gas Produced	65.364	10^6m^3
Gas Injected	0.000	10^6m^3
Net Sales	65.364	10^6m^3
Remaining		
Original Gas-In-Place	0.000	10^6m^3
Recoverable Gas Reserves	0.000	10^6m^3
Marketable Gas Reserves	0.000	10^6m^3
Gas Properties		
Gas Gravity	0.660	
N_2	6.130	%
CO_2	0.030	%
H_2S	0.000	%
T_c	201.1	K
P_c	4554	kPa

Summary Data Report

(as at February 1, 2008)

Bayfield reef
Bayfield reef

Default Analysis

Date	Unique Well ID	Reservoir Pressure (kPa(a))	Z	P/Z (kPa(a))	Cumulative Gas Production ($10^6 m^3$)	Selected
Oct. 08, 56	0Bluewater Porter #1	3061.96	0.922	3322.30	0.000	Yes
Jan. 01, 57	0Bluewater Porter #1	3141.94	0.920	3416.62	0.000	Yes
Feb. 21, 57	0Bluewater Porter #1	3069.55	0.921	3331.23	0.000	Yes
Jan. 01, 58	0Bluewater Porter #1	3069.55	0.921	3331.23	0.000	Yes
Jan. 01, 59	0Bluewater Porter #1	2691.71	0.931	2891.03	4.897	Yes
Jan. 01, 60	0Bluewater Porter #1	2489.01	0.936	2658.50	10.925	Yes
Jan. 01, 61	0Bluewater Porter #1	2242.86	0.943	2379.58	16.251	Yes
Jan. 01, 62	0Bluewater Porter #1	1967.07	0.950	2071.47	21.673	Yes
Jan. 01, 63	0Bluewater Porter #1	1747.82	0.955	1829.76	27.003	Yes
Jan. 01, 64	0Bluewater Porter #1	1486.51	0.962	1545.36	32.392	Yes
Jan. 01, 65	0Bluewater Porter #1	1363.78	0.965	1413.15	37.526	Yes
Jan. 01, 66	0Bluewater Porter #1	1077.65	0.972	1108.23	42.355	Yes
Jan. 01, 67	0Bluewater Porter #1	1005.95	0.974	1032.54	47.231	Yes
Jan. 01, 68	0Bluewater Porter #1	810.82	0.979	828.01	51.833	Yes
Jan. 01, 69	0Bluewater Porter #1	608.81	0.984	618.45	55.301	Yes
Jan. 01, 70	0Bluewater Porter #1	521.93	0.987	529.00	58.394	Yes
Jan. 01, 71	0Bluewater Porter #1	464.02	0.988	469.60	60.363	Yes
Jan. 01, 72	0Bluewater Porter #1	464.02	0.988	469.60	61.685	No
Jan. 01, 73	0Bluewater Porter #1	464.02	0.988	469.60	61.693	No
Jan. 01, 83	0Bluewater Porter #1	532.00	0.986	539.35	61.693	No
Sep. 01, 84	0Bluewater Porter #1	377.00	0.990	380.67	64.925	No
Apr. 01, 85	0Bluewater Porter #1	370.00	0.991	373.54	65.512	No
Nov. 01, 86	0Bluewater Porter #1	370.25	0.991	373.79	65.555	No
Dec. 01, 87	0Bluewater Porter #1	370.25	0.991	373.79	65.555	No
Nov. 01, 88	0Bluewater Porter #1	218.00	0.994	219.22	65.572	No
Dec. 01, 95	0Bluewater Porter #1	305.44	0.992	307.84	67.768	No
Aug. 01, 03	0Bluewater Porter #1	305.00	0.992	307.40	67.768	No
Aug. 01, 03	0Bluewater Porter #1	320.00	0.992	322.64	67.768	No
Jan. 01, 04	0Bluewater Porter #1	313.00	0.992	315.53	67.803	No
Jan. 01, 04	0Bluewater Porter #1	302.00	0.992	304.35	67.803	No
Nov. 01, 05	0Bluewater Porter #1	320.00	0.992	322.64	68.231	No
Nov. 01, 05	0Bluewater Porter #1	326.00	0.992	328.74	68.231	No
Apr. 01, 06	0Bluewater Porter #1	313.00	0.992	315.53	68.329	No
Apr. 01, 06	0Bluewater Porter #1	320.00	0.992	322.64	68.329	No
Aug. 19, 08	0Bluewater Porter #1	315.00	0.992	317.56	68.805	No

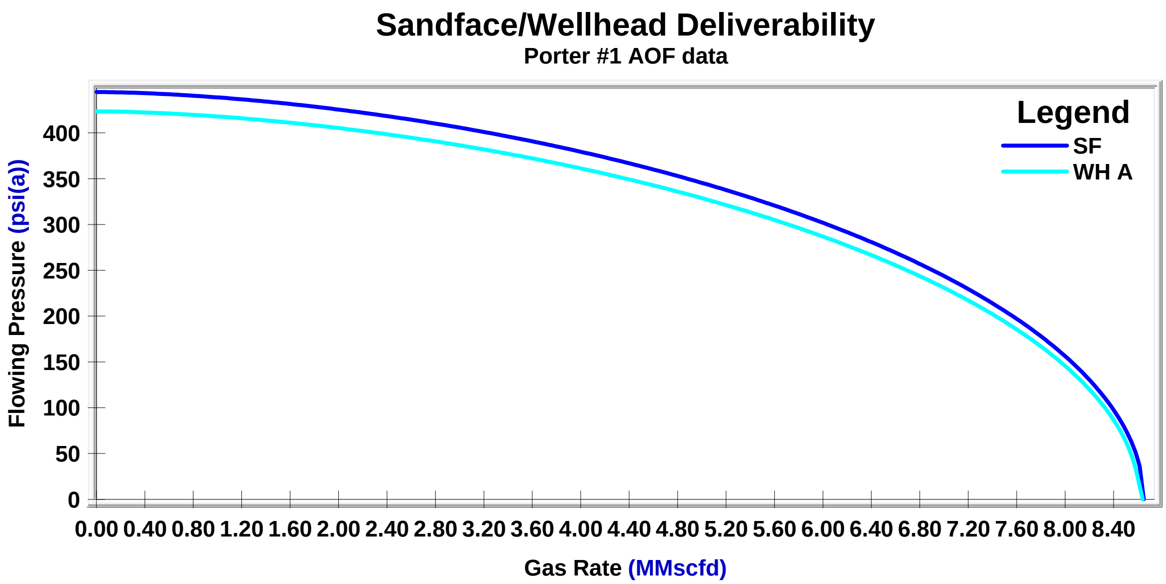
Bayfield Pool Reservoir Engineering Report

Schedule 4

AOF and Deliverability Plots – Existing Wells

F.A.S.T. VirtuWell
SF/WH Analysis
Porter #1 AOF data

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	psi(a)		MMscfd	
Sandface	444.6	0.592	8.650	
Wellhead A	423.5	0.590	8.614	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:	8.200	MMscfd
WH Pressure:	14.4	psi(a)
SF Pressure:	38.8	psi(a)

Wellbore Fluids:

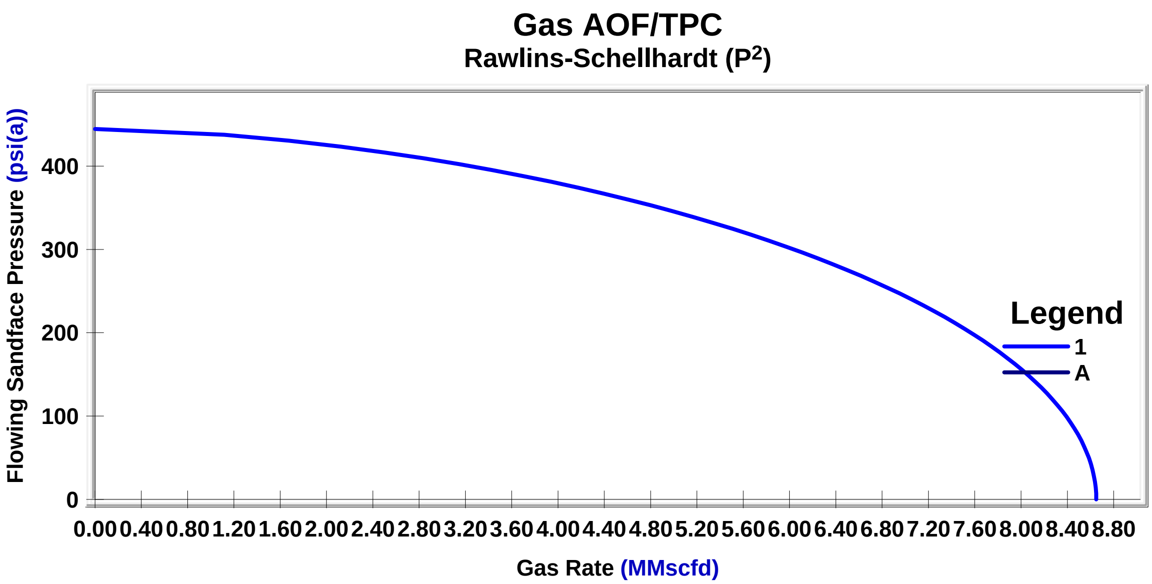
Fluid Data		
OGR:		bbl/MMscf
CGR:		bbl/MMscf
WGR		bbl/MMscf

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	MMscfd	psi(a)	psi(a)	
Wellhead	8.200	14.4	423.4	
Sandface	8.200	38.6	444.5	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Porter #1 AOF data

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	psi(a)	MMscfd/(psi²)ⁿ		MMscfd
1	444.6	6.3361e-03	0.592	8.650

Gas TPC Data:

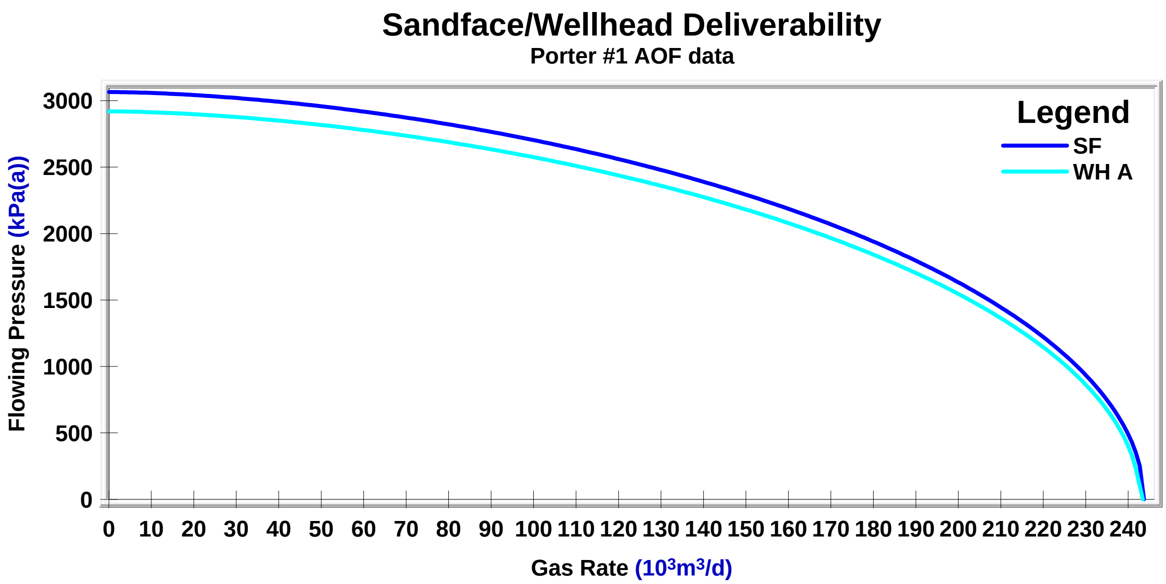
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	psi(a)	bbl/MMscf	bbl/MMscf	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	ft/s	MMscfd	ft/s	ft/s	ft/s

F.A.S.T. VirtuWell
SF/WH Analysis
Porter #1 AOF data

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	kPa(a)		$10^3m^3/d$	
Sandface	3065	0.592	243.7	
Wellhead A	2920	0.590	242.7	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:	231.0	$10^3m^3/d$
WH Pressure:	99	kPa(a)
SF Pressure:	268	kPa(a)

Wellbore Fluids:

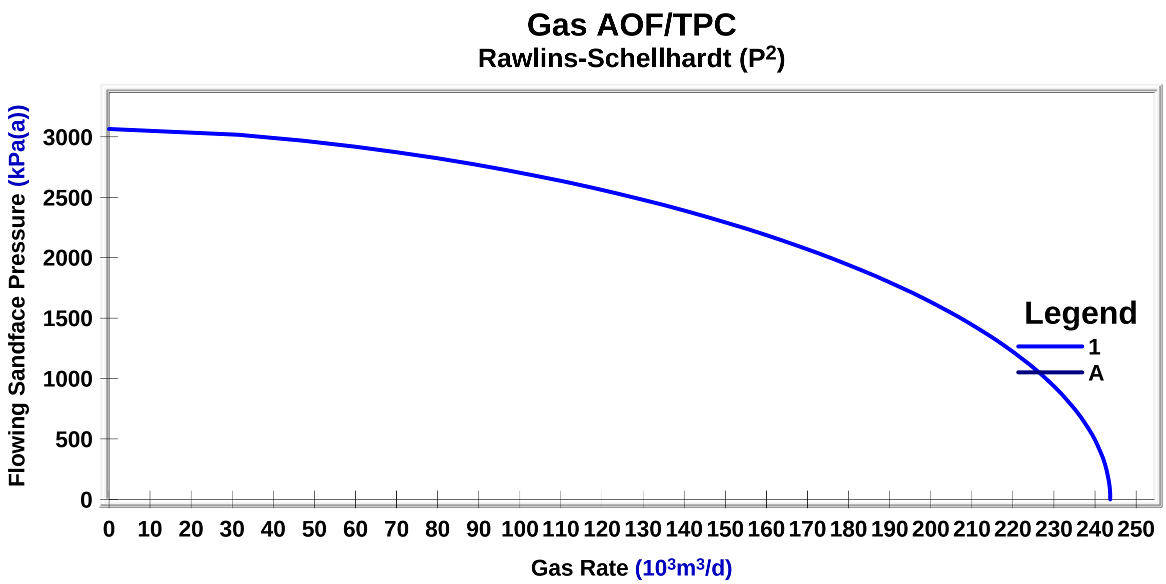
Fluid Data		
OGR:		$m^3/10^3m^3$
CGR:		$m^3/10^3m^3$
WGR		$m^3/10^3m^3$

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	$10^3m^3/d$	kPa(a)	kPa(a)	
Wellhead	231.0	99	2919	
Sandface	231.0	266	3065	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Porter #1 AOF data

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	kPa(a)	$(10^3m^3/d)/(kPa^2)^n$		$10^3m^3/d$
1	3065	1.8149e-02	0.592	243.7

Gas TPC Data:

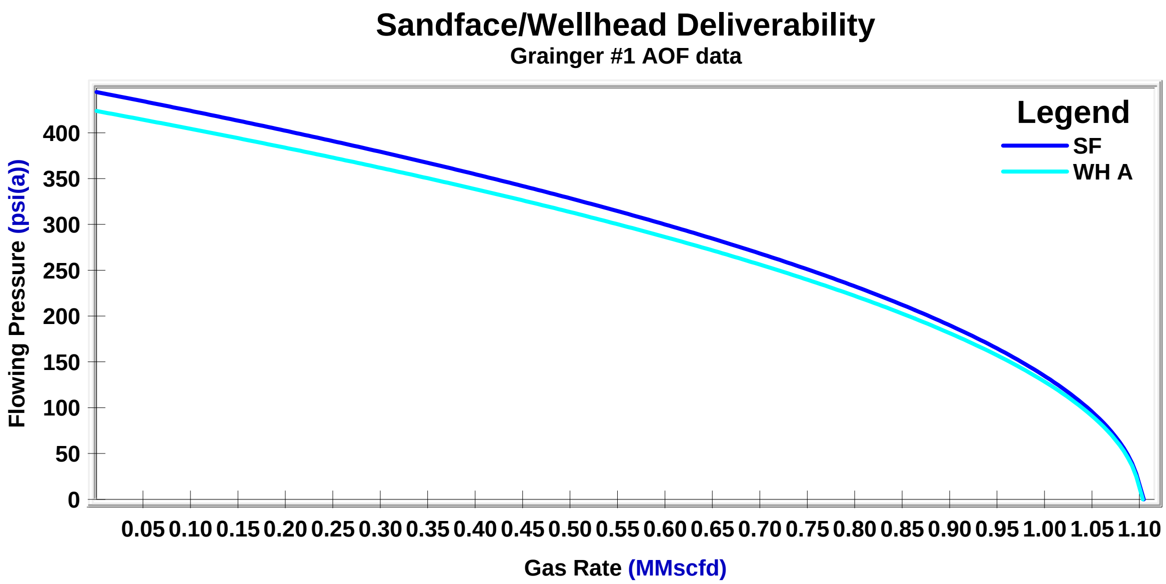
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	kPa(a)	$m^3/10^3m^3$	$m^3/10^3m^3$	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	m/s	$10^3m^3/d$	m/s	m/s	m/s

F.A.S.T. VirtuWell
SF/WH Analysis
Grainger #1 AOF data

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	psi(a)		MMscfd	
Sandface	444.7	1.000	1.101	
Wellhead A	424.0	0.995	1.100	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		MMscfd
WH Pressure:		psi(a)
SF Pressure:		psi(a)

Wellbore Fluids:

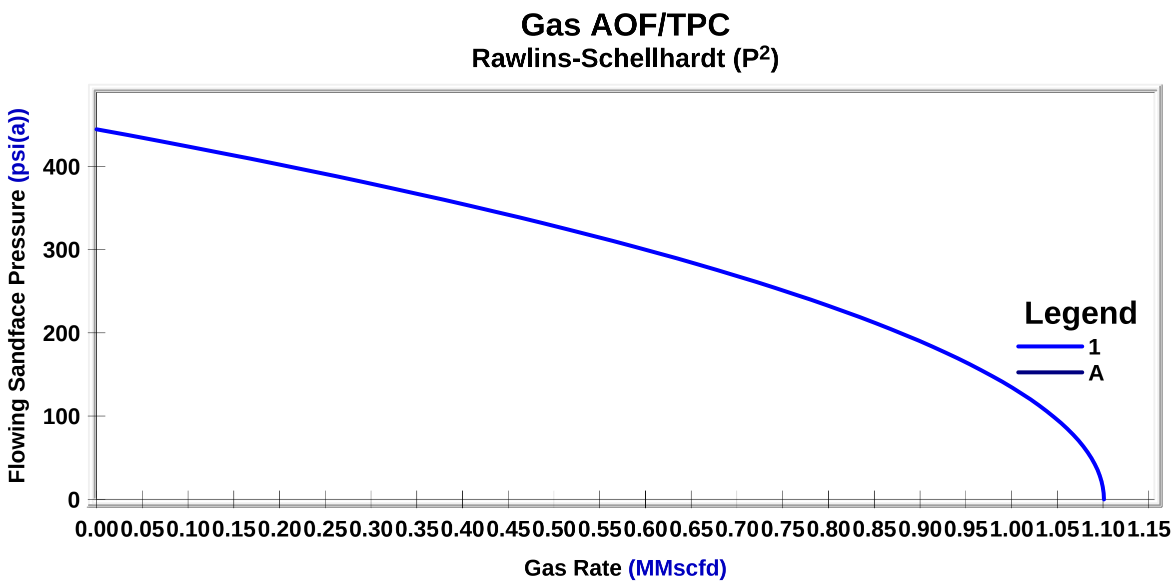
Fluid Data		
OGR:		bbl/MMscf
CGR:		bbl/MMscf
WGR		bbl/MMscf

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	MMscfd	psi(a)	psi(a)	
Wellhead	1.100	14.4	410.0	
Sandface	1.100	18.0	430.0	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Grainger #1 AOF data

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	psi(a)	MMscfd/(psi^2)^n		MMscfd
1	444.6	5.5699e-06	1.000	1.101

Gas TPC Data:

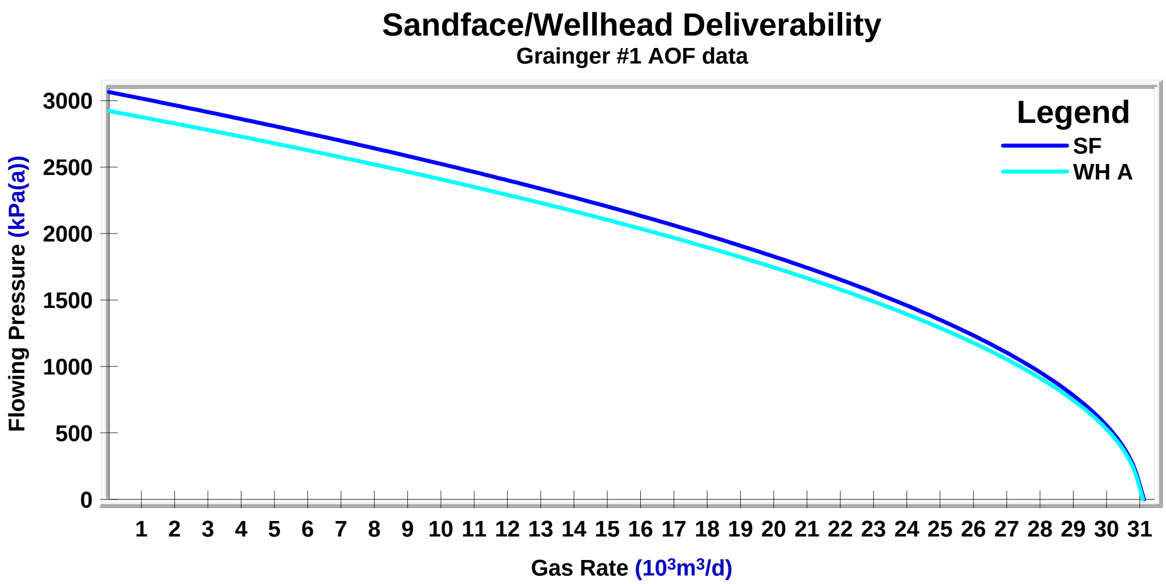
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	psi(a)	bbl/MMscf	bbl/MMscf	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	ft/s	MMscfd	ft/s	ft/s	ft/s

F.A.S.T. VirtuWell
SF/WH Analysis
Grainger #1 AOF data

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	kPa(a)		$10^3m^3/d$	
Sandface	3066	1.000	31.0	
Wellhead A	2923	0.995	31.0	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		$10^3m^3/d$
WH Pressure:		kPa(a)
SF Pressure:		kPa(a)

Wellbore Fluids:

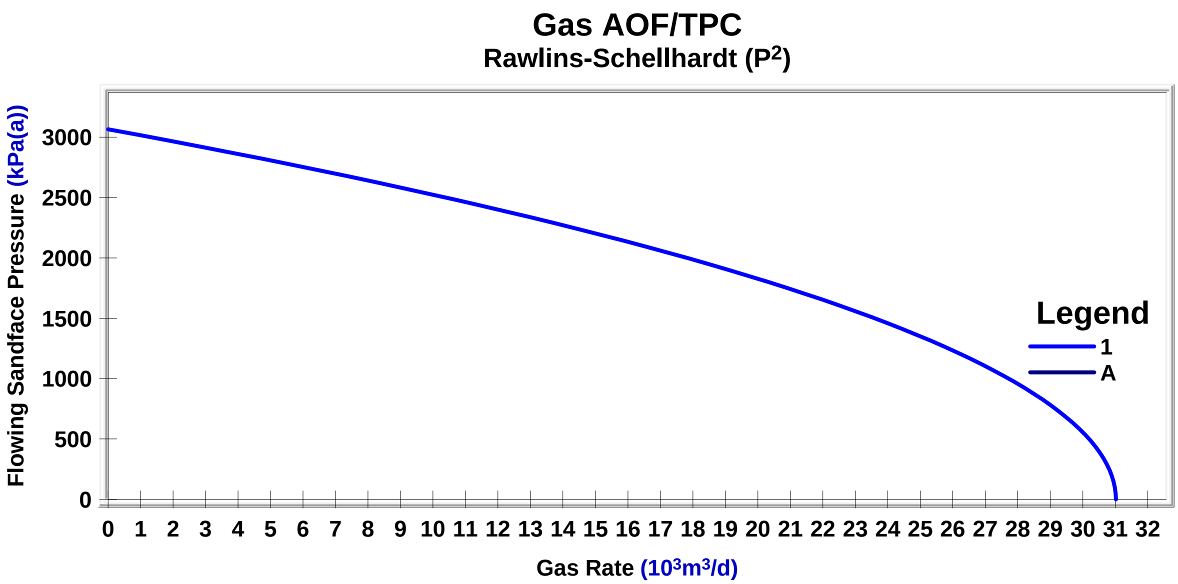
Fluid Data		
OGR:		$m^3/10^3m^3$
CGR:		$m^3/10^3m^3$
WGR		$m^3/10^3m^3$

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	$10^3m^3/d$	kPa(a)	kPa(a)	
Wellhead	31.0	99	2827	
Sandface	31.0	124	2964	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Grainger #1 AOF data

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	kPa(a)	$(10^3m^3/d)/(kPa^2)^n$		$10^3m^3/d$
1	3065	3.3011e-06	1.000	31.0

Gas TPC Data:

Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	kPa(a)	$m^3/10^3m^3$	$m^3/10^3m^3$	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	m/s	$10^3m^3/d$	m/s	m/s	m/s

Bayfield Pool Reservoir Engineering Report

Schedule 5

AOF and Deliverability Plots – Vertical, Deviated,

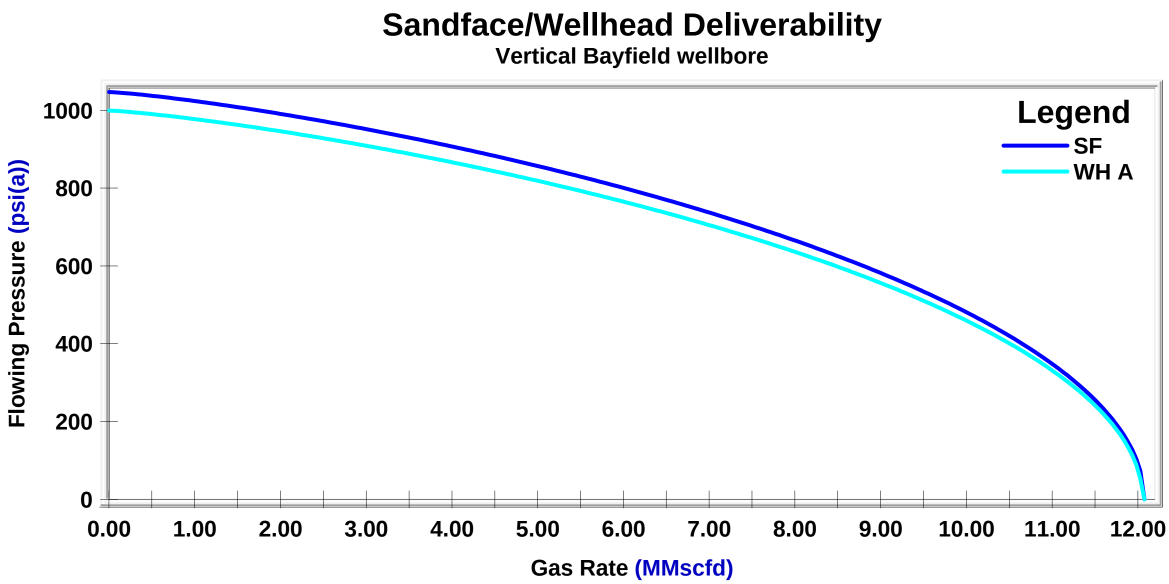
and Horizontal IW Wells

F.A.S.T. VirtuWell

SF/WH Analysis

Vertical Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	psi(a)		MMscfd	
Sandface	1047.0	0.796	12.076	
Wellhead A	999.4	0.791	12.056	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		MMscfd
WH Pressure:		psi(a)
SF Pressure:		psi(a)

Wellbore Fluids:

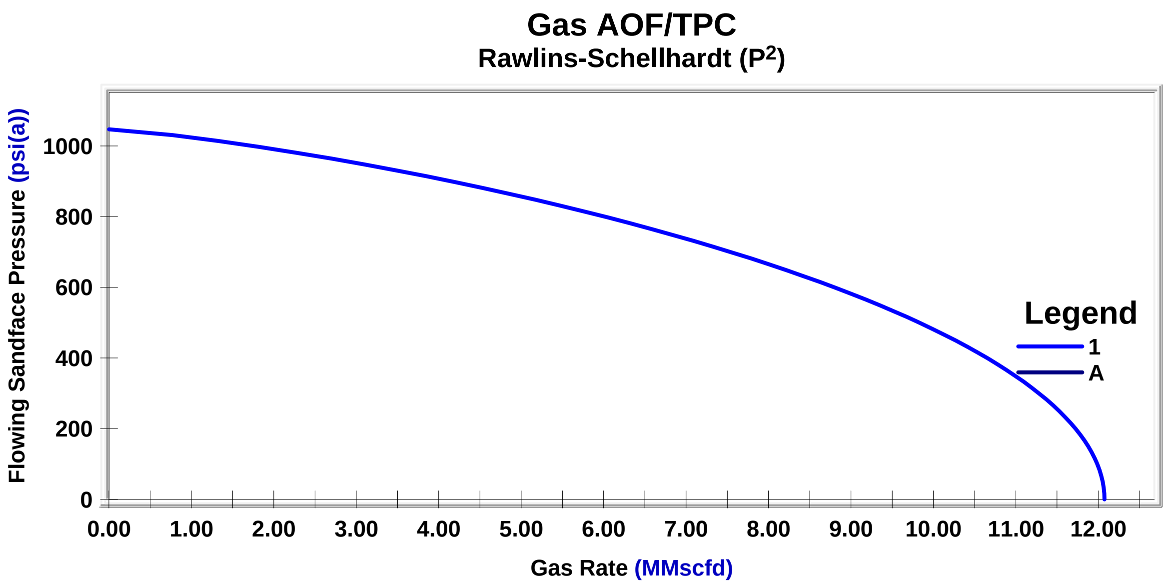
Fluid Data		
OGR:		bbl/MMscf
CGR:		bbl/MMscf
WGR		bbl/MMscf

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	MMscfd	psi(a)	psi(a)	
Wellhead			144.4	
Sandface			150.3	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Vertical Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	psi(a)	MMscfd/(psi^2)^n		MMscfd
1	1047.0	1.8800e-04	0.796	12.076

Gas TPC Data:

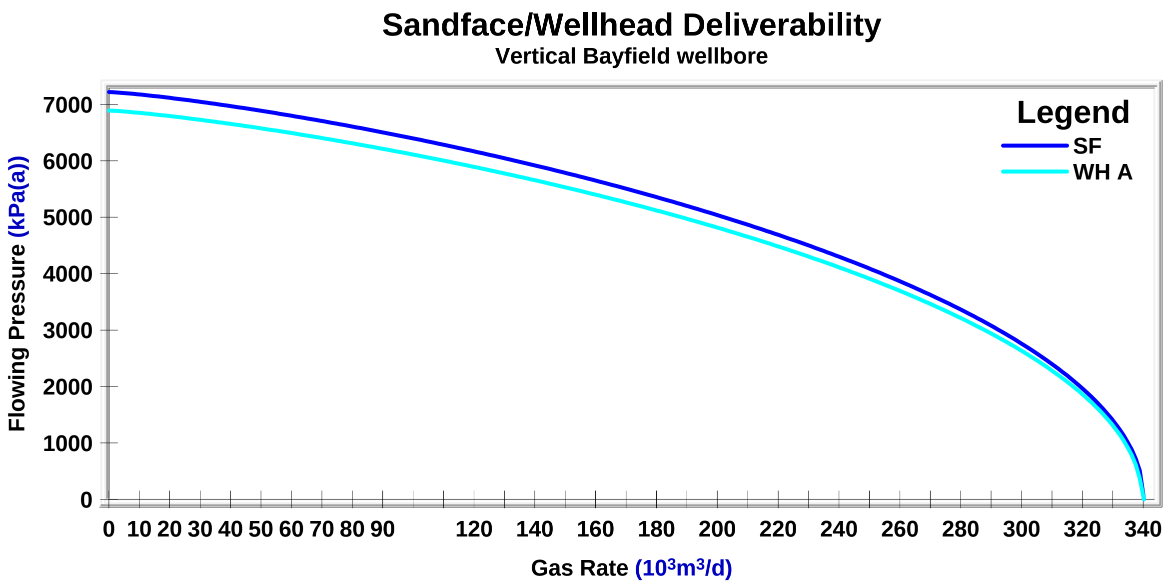
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	psi(a)	bbl/MMscf	bbl/MMscf	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	ft/s	MMscfd	ft/s	ft/s	ft/s

F.A.S.T. VirtuWell
SF/WH Analysis
Vertical Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	kPa(a)		$10^3m^3/d$	
Sandface	7219	0.796	340.2	
Wellhead A	6890	0.791	339.7	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		$10^3m^3/d$
WH Pressure:		kPa(a)
SF Pressure:		kPa(a)

Wellbore Fluids:

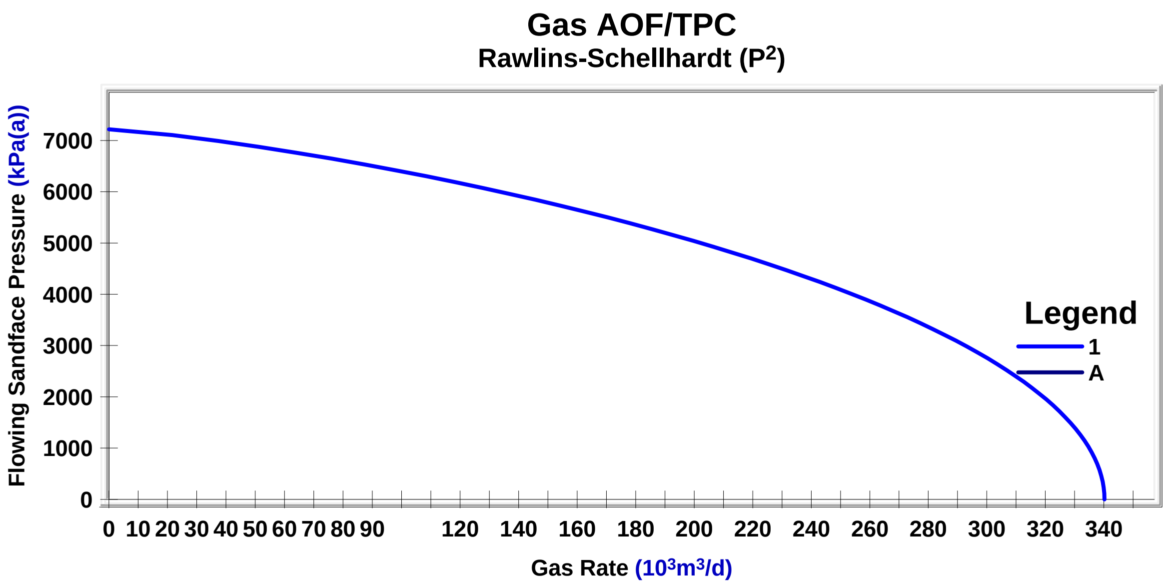
Fluid Data		
OGR:		$m^3/10^3m^3$
CGR:		$m^3/10^3m^3$
WGR		$m^3/10^3m^3$

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	$10^3m^3/d$	kPa(a)	kPa(a)	
Wellhead			996	
Sandface			1036	
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
Vertical Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	kPa(a)	$(10^3m^3/d)/(kPa^2)^n$		$10^3m^3/d$
1	7219	2.4495e-04	0.796	340.2

Gas TPC Data:

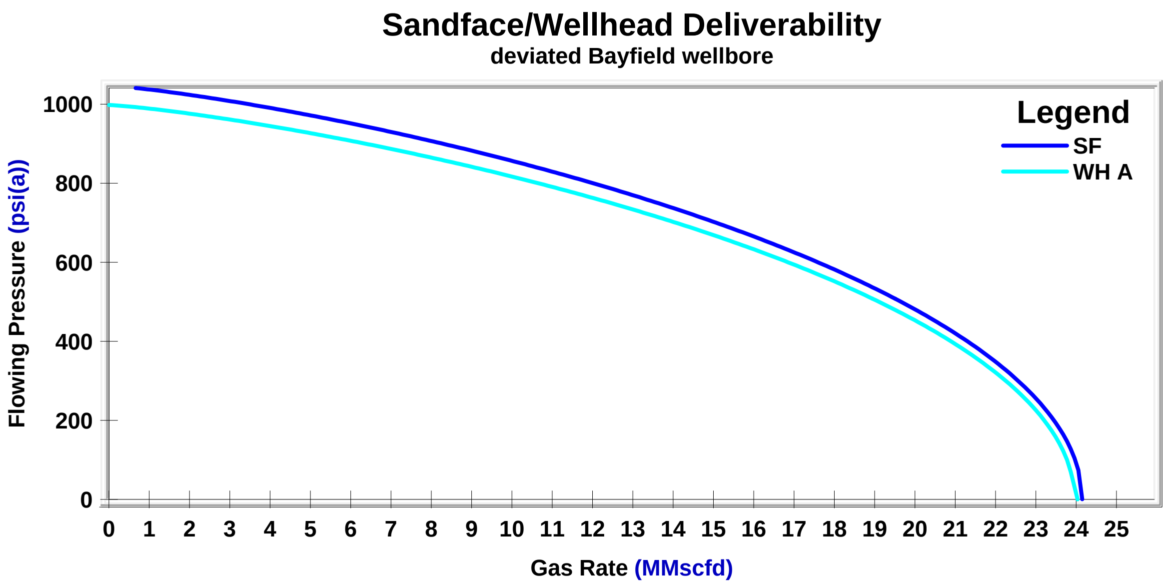
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	kPa(a)	$m^3/10^3m^3$	$m^3/10^3m^3$	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	m/s	$10^3m^3/d$	m/s	m/s	m/s

F.A.S.T. VirtuWell
SF/WH Analysis
deviated Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	psi(a)		MMscfd	
Sandface	1047.0	0.796	24.150	
Wellhead A	998.2	0.787	23.960	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		MMscfd
WH Pressure:		psi(a)
SF Pressure:		psi(a)

Wellbore Fluids:

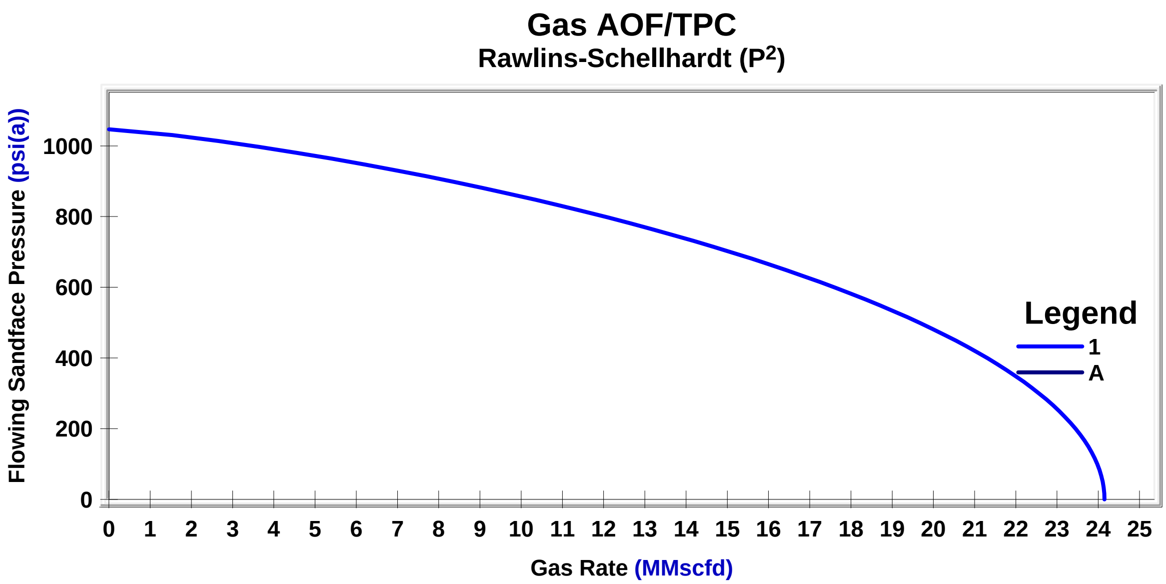
Fluid Data		
OGR:		bbl/MMscf
CGR:		bbl/MMscf
WGR		bbl/MMscf

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	MMscfd	psi(a)	psi(a)	
Wellhead				
Sandface				
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
deviated Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	psi(a)	MMscfd/(psi^2)^n		MMscfd
1	1047.0	3.7600e-04	0.796	24.151

Gas TPC Data:

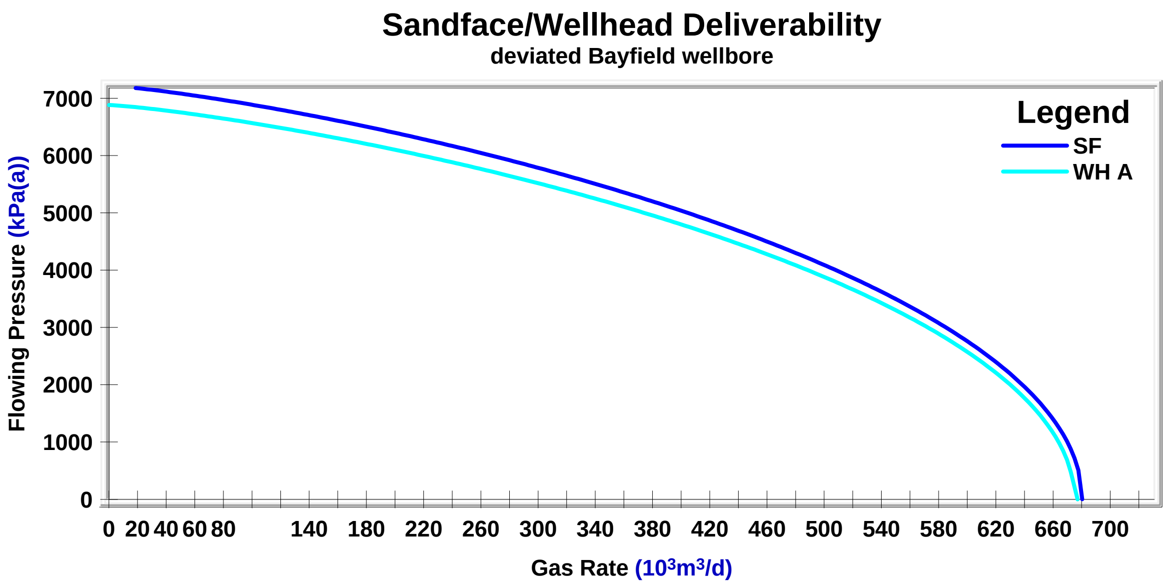
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	psi(a)	bbl/MMscf	bbl/MMscf	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	ft/s	MMscfd	ft/s	ft/s	ft/s

F.A.S.T. VirtuWell
SF/WH Analysis
deviated Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	kPa(a)		$10^3m^3/d$	
Sandface	7219	0.796	680.4	
Wellhead A	6882	0.787	675.0	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		$10^3m^3/d$
WH Pressure:		kPa(a)
SF Pressure:		kPa(a)

Wellbore Fluids:

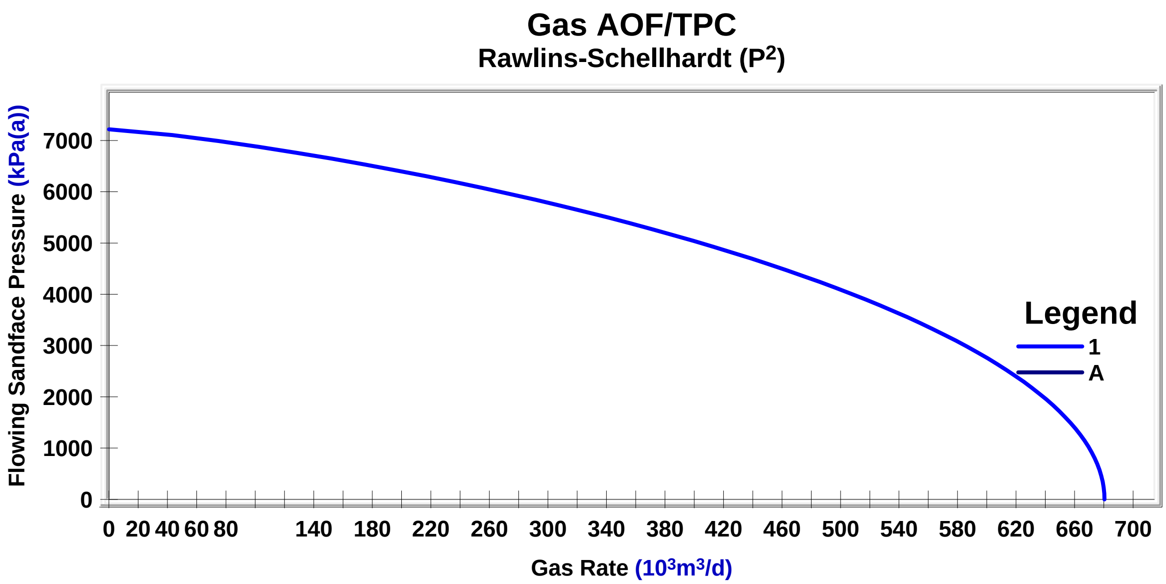
Fluid Data		
OGR:		$m^3/10^3m^3$
CGR:		$m^3/10^3m^3$
WGR		$m^3/10^3m^3$

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	$10^3m^3/d$	kPa(a)	kPa(a)	
Wellhead				
Sandface				
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
deviated Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	kPa(a)	$(10^3m^3/d)/(kPa^2)^n$		$10^3m^3/d$
1	7219	4.8991e-04	0.796	680.4

Gas TPC Data:

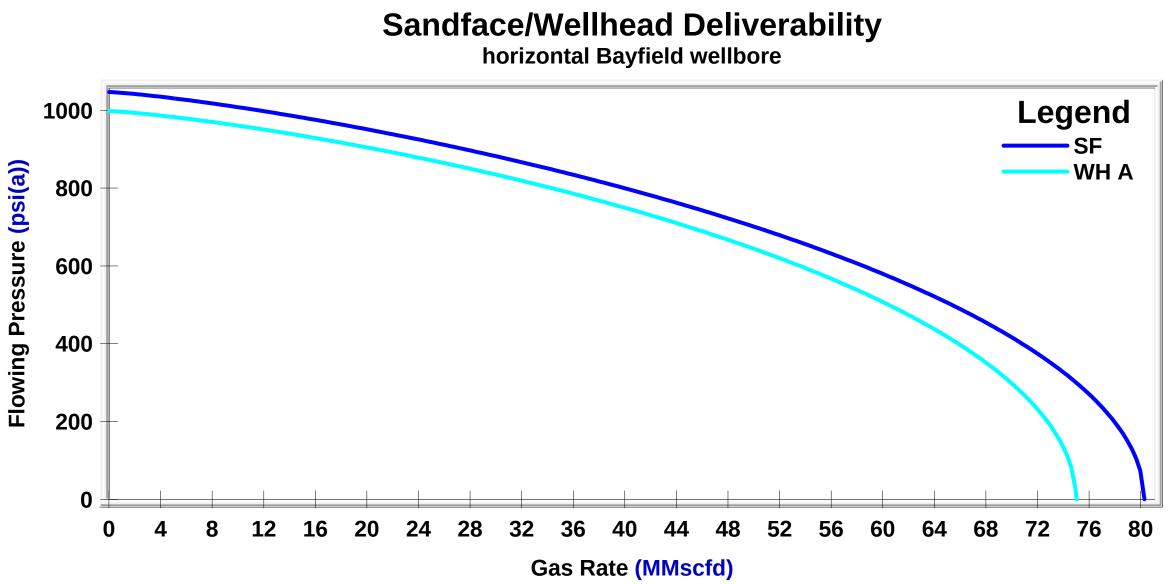
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	kPa(a)	$m^3/10^3m^3$	$m^3/10^3m^3$	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	m/s	$10^3m^3/d$	m/s	m/s	m/s

F.A.S.T. VirtuWell
SF/WH Analysis
horizontal Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	psi(a)		MMscfd	
Sandface	1047.0	0.796	80.290	
Wellhead A	998.2	0.759	74.988	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		MMscfd
WH Pressure:		psi(a)
SF Pressure:		psi(a)

Wellbore Fluids:

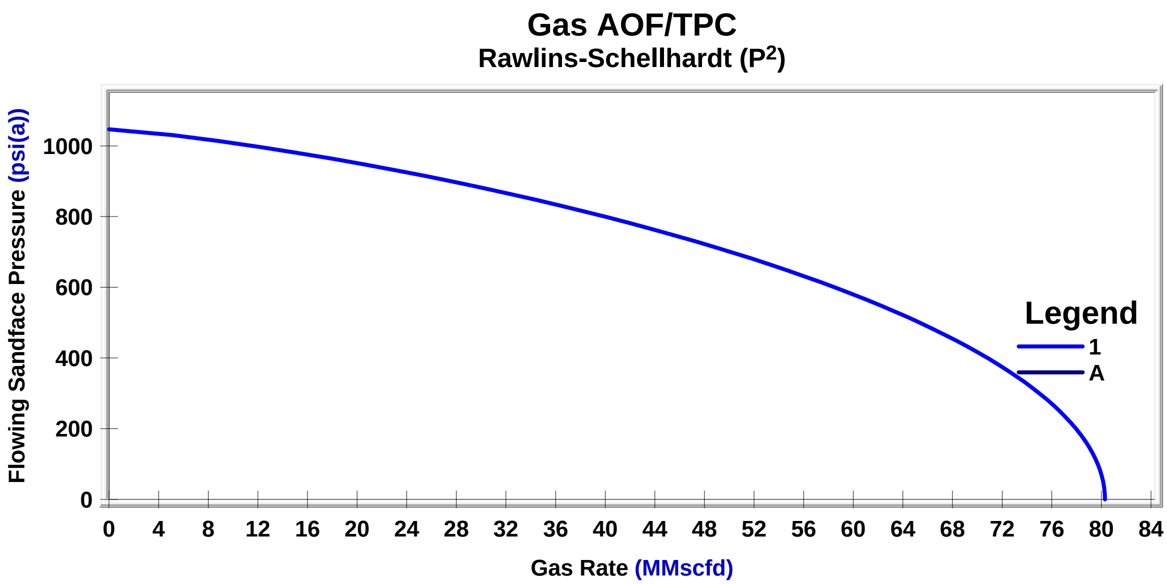
Fluid Data		
OGR:		bbl/MMscf
CGR:		bbl/MMscf
WGR		bbl/MMscf

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	MMscfd	psi(a)	psi(a)	
Wellhead				
Sandface				
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
horizontal Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	psi(a)	MMscfd/(psi²)ⁿ		MMscfd
1	1047.0	1.2500e-03	0.796	80.291

Gas TPC Data:

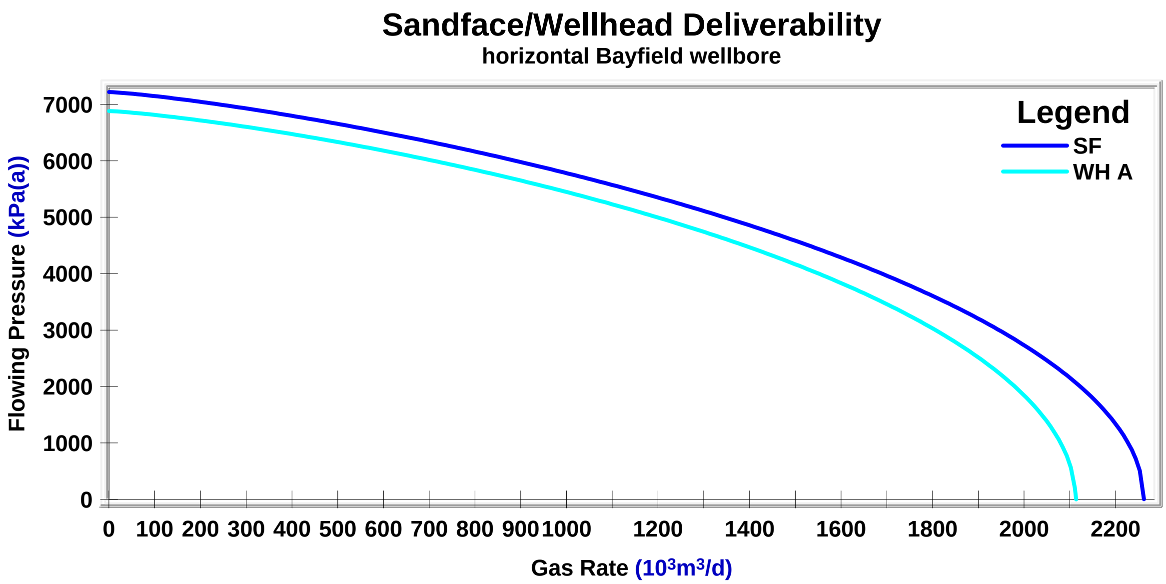
Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	psi(a)	bbl/MMscf	bbl/MMscf	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	ft/s	MMscfd	ft/s	ft/s	ft/s

F.A.S.T. VirtuWell
SF/WH Analysis
horizontal Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Sandface/Wellhead AOF:

Pressure Data				
	Shut-in Press	n	AOF	Flowpath
	kPa(a)		$10^3m^3/d$	
Sandface	7219	0.796	2262.1	
Wellhead A	6882	0.759	2112.7	Casing
Wellhead B				Tubing
Wellhead C				Tubing
Wellhead D				Tubing

Flow Test Results:

Test Data		
Gas Flowrate:		$10^3m^3/d$
WH Pressure:		kPa(a)
SF Pressure:		kPa(a)

Wellbore Fluids:

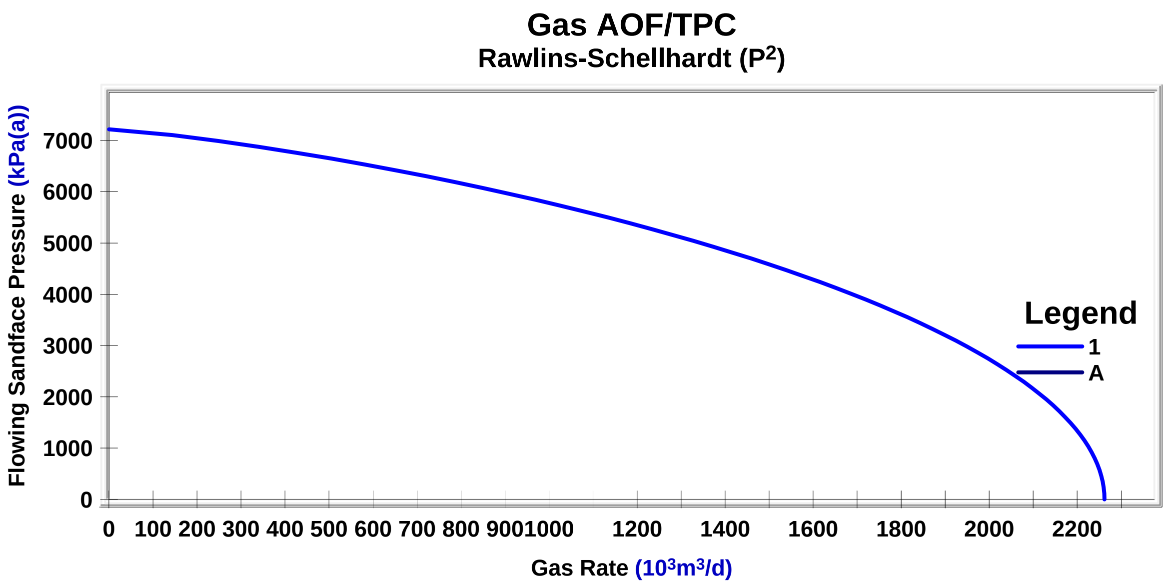
Fluid Data		
OGR:		$m^3/10^3m^3$
CGR:		$m^3/10^3m^3$
WGR		$m^3/10^3m^3$

Sandface Pressure Calculator:

Sandface Calculations Data				
	Test Rate	Flowing Press	Shut-in Press	n
	$10^3m^3/d$	kPa(a)	kPa(a)	
Wellhead				
Sandface				
Wellhead				
Sandface				

F.A.S.T. VirtuWell
Gas AOF/TPC Analysis
horizontal Bayfield wellbore

Pressure Loss Correlation: Fanning Gas



Gas AOF Data:

Absolute Open Flow Data				
AOF	Reservoir Press	C	n	AOF
	kPa(a)	$(10^3m^3/d)/(kPa^2)^n$		$10^3m^3/d$
1	7219	1.6287e-03	0.796	2262.1

Gas TPC Data:

Tubing Performance Curve Data				
TPC	WH Press	CGR/OGR	WGR	Flow Path
	kPa(a)	$m^3/10^3m^3$	$m^3/10^3m^3$	
A				Casing
B				Tubing
C				Tubing
D				Tubing

Critical Liquid Lift:

Gas AOF/TPC Results Data					
TPC	Turner Vel (EOT)	Min Gas Rate (EOT)	Turner Vel (WH)	Actual Vel (WH)	Erosion Vel (WH)
	m/s	$10^3m^3/d$	m/s	m/s	m/s

Assessment of Neighbouring Activities

Bayfield Pool Development

September 2009

Jim McIntosh Petroleum Engineering Ltd.

On behalf of

Tribute Resources Inc. and Bayfield Resources Inc.

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Introduction

This report has been completed to comply with the requirements of Clause 7.2 of standard CAN/CSA Z341.1-06 – Storage of Hydrocarbons in Underground Formations – Reservoir Storage ("CSA Z341.1-06") and to support an application to the Ontario Energy Board for Authorization to Inject, Store and Remove Gas for the proposed Bayfield Pool Project (the "Bayfield Project"). Clause 7.2 states:

A thorough evaluation of all subsurface activities and their potential impact on the integrity of the storage facility shall be conducted, including assessment of

a) existing or abandoned wells within a 1 km radius of the subsurface perimeter of the storage zone, including activities such as fracture treatments that took place within the wells;

b) existing operations within a 5 km radius of the proposed storage scheme, including their purpose, mode of operation, and minimum and maximum operating pressures; and

c) the integrity of any existing well that penetrates the storage zone, including casing, cement, and the hydraulic isolation of the storage zone from any overlying porous zones.

Jim McIntosh Petroleum Engineering Ltd. was retained by Tribute Resources Inc. and Bayfield Resources Inc., ("Bayfield Resources") to prepare an Assessment of Neighbouring Activities for the application to develop the Bayfield Natural Gas Storage Pool ("Storage Pool").

Bayfield Resources is developing the Storage Pool to meet increasing demand for natural gas storage services. This Storage Pool is located in the geographic township of Stanley, approximately 3 km southeast of Bayfield, Ontario. An NPS 16" transmission pipeline will connect the Storage Pool to Union Gas Limited's ("Union") existing Lobo B compressor station situated in the vicinity of Ivan. A Compressor Station will also be constructed and located in the vicinity of Zurich, Municipality of Bluewater.

Wells and facilities for the Project will be designed, constructed, operated, maintained and abandoned in accordance with the CSA Z341-06 and in accordance with the *Oil, Gas and Salt Resources Act*, its Regulations and Provincial Operating Standard.

Location

The Bayfield Guelph pinnacle reef (the " Bayfield Pool") is located in Lots 7, 8, 9, Concession North of Bayfield Road, and South of Bayfield Road, Stanley Township, Huron County, Ontario. A general location map is provided as Figure 1.

Regional Geology

The Bayfield Pool lies on the southeast rim of the intracratonic Michigan Basin. The present day Michigan Basin is roughly circular in shape and underlies the Great Lakes region of Canada and the United States. Silurian rocks outcrop around the entire basin. It has been well documented in literature that the Silurian Guelph-Lockport (and their correlatives) carbonate sequence allows for the recognition of three broad depositional belts arranged in a concentric pattern around the Michigan Basin.

This concentric configuration reflects the differential rates of subsidence taking place during deposition of these sediments. The slow rate of subsidence of the stable arches on the periphery of the basin allowed organic activity to spread laterally resulting in buildups of relatively large areal rather than vertical extent. The shelf area underwent moderate to accelerated rates of subsidence. Organic activity formed incipient and pinnacle reefs in order to keep up to the increased rate of subsidence. Subsidence was fastest in the basin centre which was not ideal for reefal development.

Recent work has refined the interpretation as it pertains to southwestern Ontario. Three distinct carbonate platforms were identified. The outer platform ranges up to 40 meters in thickness. The middle platform ranges from 40 to 60 meters in thickness and the inner platform averages 80 meters thick.

Reef development took place on all three platforms. The greatest concentration of pinnacle reefs occurs on the outer platform, however some were discovered on the middle platform. Extensive patch reefs developed on the inner platform, up to 80 meters in height above the surrounding sea floor.

Pinnacle reefs are defined as having a gross reef buildup greater than 50 meters. Incipient reefs have characteristics and distribution similar to pinnacle reefs but are defined as having buildups of less than 50 meters. The Bayfield Pool has an interpreted total reef buildup of approximately 115 meters and is therefore classified as a pinnacle reef by this definition.

Reservoir History

The Bayfield Pool was discovered with the drilling of the Bluewater Oil and Gas - Porter No. 1: Stanley 7-BRN well in 1956. The discovery well was followed up with a second well, Bluewater Oil and Gas - Grainger No. 1: Stanley 8-BRN in 1957. All production from the pool has been through these two wells. No other wells were drilled into the reef until the Tribute Resources et al #30: Stanley 9-7-NBR well, which is a lost hole due to shallow mechanical problems and has been plugged. Both the Bluewater Oil and Gas - Porter No. 1 and Bluewater Oil and Gas - Grainger No. 1 wells are being evaluated to determine their suitability for conversion to natural gas storage observation wells or will be plugged in accordance with CSA Z341-06 if they are not converted.

Reservoir Features

The geological interpretations of the Bayfield Pool are based on the available well data and supported by 2-D and 3-D seismic surveys. Based on structural mapping of the Guelph Formation, the reef buildup is located in the central portion of the outer carbonate platform previously described.

Utilizing geologic mapping and 2-D and 3-D seismic control, the total amount of reef buildup is approximately 115 meters. The area covered by the reef base is estimated to be approximately 66 acres.

No water was encountered in the reservoir during the drilling of any of the reef wells. However, minor oil was present in one of the reef wells. The Bluewater Oil & Gas – Porter No. 1 well exhibited a minor oil show.

Due to the limited access of technical electric logs in this pool, the connate water saturation is estimated to be 20% based on a review of the literature for a number of similar type gas reservoirs.

Reservoir gas properties are based on samples acquired from the nearby Stanley reef gas wells and analyzed by the former Consumers Gas Company of Toronto. The gas is characterized by a specific gravity of 0.664, Nitrogen content of 6.13%, and a gross heating value of 40.01 MJ/m^3 (1075 Btu/ft^3).

The majority of the lower portion of the Guelph zone in the Bluewater Oil and Gas - Porter No. 1 well was cored when the well was drilled. The porosity on this core varies from under 2% to 18.7%, with the average porosity of 5.8%. The open-hole geophysical logs indicate that the porosity above the start of coring is higher and more consistent than the cored interval. Considering this better porosity higher in the Guelph section, the 7.7% average porosity value used for the gas pay zones of storage reefs in Ontario, based on a statistical review of 29 core analyses from 18 storage reefs, is a reasonable estimate for the average porosity in the Bayfield Pool.

Caprock

The cap rock of anhydrite overlying pinnacle reef reservoirs provides an excellent seal against vertical migration of hydrocarbons. The Bayfield Reef A2 Anhydrite cap is comprised of 2.8 meters in the Bluewater Oil and Gas – Grainger No. 1 well, and 4.5 meters in the Bluewater Oil and Gas – Porter No. 1 well.

The estimated overburden pressure of the Bayfield reef is approximately 10.3 MPa (1500 psi) based on a fracture gradient of 22.6 kPa/m (1 psi/ft). A core of the A2 Anhydrite caprock will be cut as part of drilling the initial Injection/Withdrawal wells in the Bayfield Pool. Analysis of this caprock core will confirm that the A2 Anhydrite acts as an excellent seal against vertical migration of hydrocarbons up to at least the estimated 22.6 kPa/m (1 psi/ft) fracture gradient. To provide a safety factor for the delta pressuring the Bayfield Pool, a maximum delta pressure gradient of 15.8 kPa/m (.7 psi/ft) is being applied for.

The Bayfield Reef is sealed laterally by tight A-1 Carbonate limestones and dolomites. Although there are no off- reef wells nearby the Bayfield Pool, offset wells to other reefs in the area indicate no gas, oil or water shows within the A-1 Carbonate verifying a good lateral seal over the pinnacle reefs in the area.

Existing Wellbores Penetrating the proposed Storage Zone

All existing wellbores penetrating the proposed Storage Zone are evaluated to ensure that they comply with CSA Z341-06 standards. There has been no fracture or well stimulating operations on any of the wells in the proposed storage zone. A map showing the location of wells in the Bayfield Pool proposal is included in Figure 2.

Bluewater Oil and Gas - Porter No. 1 – Stanley 7-BRN

The Bluewater Porter #1 well will be evaluated to determine suitability as an observation well for the Bayfield Pool. The workover/convert to observation well program and the wellbore schematic before and after the workover is included in Appendix A. If the existing 178mm casing in the well is deemed in poor condition, the well will be plugged and abandoned to CSA Z341-06 standards. In the event the well is plugged and abandoned, the plugging program included in Appendix A will be followed.

Bluewater Oil and Gas - Grainger No. 1 – Stanley 8-BRN

The Bluewater Grainger #1 well will also be evaluated to determine suitability as an observation well. The workover/convert to observation well program and the wellbore schematic before and after the workover is included in Appendix A. If the existing 140mm casing in this well is deemed in poor condition, this well will be plugged and abandoned to CSA Z341-06 standards. In the event the well is plugged and abandoned, the plugging program included in Appendix A will be followed.

Tribute Resources et al #30 – Stanley 9-7-NBR

The Tribute et al #30: Stanley 9-7-NBR well was being drilled to obtain a core of the A2 Anhydrite cap rock for stress analysis, and to be potentially used as an Injection/Withdrawal well for the pool. The well encountered uphole mechanical problems, with drilling suspended. The well has been plugged and a new well will need to be drilled at a later date to obtain the caprock core.

Existing/Abandoned Wells within 1 km of Storage Zone

There is only one well located within 1 km of the subsurface perimeter of the proposed storage zone, Imperial 523 – Weston No. 1 – Stanley 10-BRN. A map showing the location of Imperial 523 – Weston No. 1 along with the proposed Designated Storage Area ("DSA") is included as Figure 2.

Imperial 523 – Weston #1 – Stanley 10-RCB

Imperial 523 – Weston #1 was drilled by Imperial Oil in 1955. The well was drilled into the Cabot Head with a TD of 611mRF (2005 ft) and was plugged and abandoned as an unsuccessful Guelph test. No shows were reported through the Salina or Guelph sections of the well. A small Reynales salt water show was noted. No fracture or well stimulating operations were performed on Weston No. 1. The well was plugged with a combination of lead plugs and lead plugs capped with cement as illustrated by the attached plugging record and wellbore schematic included in Appendix B. Although the well was not plugged to CSA Z341-06 standards, with no Guelph shows in this well the above mentioned plugging technique does not represent a potential crossflow conduit for the Bayfield Pool.

Subsurface Operations within 5km Radius of Storage Zone

All existing operations within a 5 km radius of the storage proposal have been evaluated, including operation, and minimum and maximum operating pressures. There is one underground natural gas storage operation within a 5km radius of the Bayfield Pool proposal, the Tipperary underground natural gas storage facility, as well as a number of plugged and abandoned wells. A map showing the locations of the Bayfield Pool proposal and the Tipperary underground natural gas storage facility is included as Figure 1. Figure 3 illustrates the 1 kilometer and 5 kilometer radii around the Bayfield Pool and indicates the plugged and abandoned wells within this area.

Tipperary Underground Storage Pool

The Tipperary South and Tipperary North gas storage pools were placed on gas storage by Tipperary Gas Corporation during 2008. All wells within the two storage pools are either completed to CSA Z341-06 standards or have been plugged and abandoned. The maximum and minimum operating pressures for the Tipperary storage pools are 7557 kPaa (1,096 psia), and 2068 kPaa (300 psia) respectively.

<u>Plugged and Abandoned wells</u>

A number of wells have been drilled within the 5 kilometer radius of the Bayfield Pool. With the exception of the Tipperary Storage Pool, none of these wells tested commercial quantities of gas from the Guelph zone, and all have been abandoned.

Conclusions and Recommendations

The Bayfield Pool is a closed container that eventually will be protected by an approved DSA. The technical information reviewed indicates that there is minimal risk for potential migration of natural gas from the Bayfield Pool through any known existing or abandoned wells within 1 km of the pool, or due to any existing operations within 5 km of the Bayfield Pool once the workovers have been completed on the Bluewater Oil and Gas - Porter No. 1 and Bluewater Oil and Gas - Grainger No. 1 wells.

The wells and facilities associated with the Bayfield Pool will be designed, constructed, operated, maintained and abandoned in accordance with CSA Z341-06 Storage of Hydrocarbons in Underground Formations and in accordance with the *Oil, Gas and Salt Resources Act*, its regulations and Provincial Operating Standards.

A thorough evaluation of all subsurface activities and their potential impact on the integrity of the Bayfield Pool has been completed in accordance with Clause 7.2 of CSA Z341.1-06. None of the existing and abandoned wells within 1 km of the storage zone, other operations within 5 km of the storage zone, nor existing wellbores penetrating the storage zone will have any impact on the integrity of the storage facility once the 2 workovers discussed above are completed.

Once operational, it is necessary to monitor the risk elements in order to detect problems early so that they may be remedied with minimal consequence. A regular evaluation and maintenance program will ensure equipment is in good working condition. This will reduce malfunctions, and ensure that no landowner water wells could potentially be impacted by the storage operation. A comprehensive Emergency Response Plan will limit any consequences or effects and prepare the Operator to respond quickly and efficiently. Adequate insurance coverage will protect affected property, persons and livelihoods through compensation in the event of injury as a result of storage operations. With proper procedures and controls, proper programs to monitor and maintain the integrity of the storage wells and the storage pool, and documented programs to periodically sample landowner water wells, the Operator will mitigate the risks as much as practically possible.

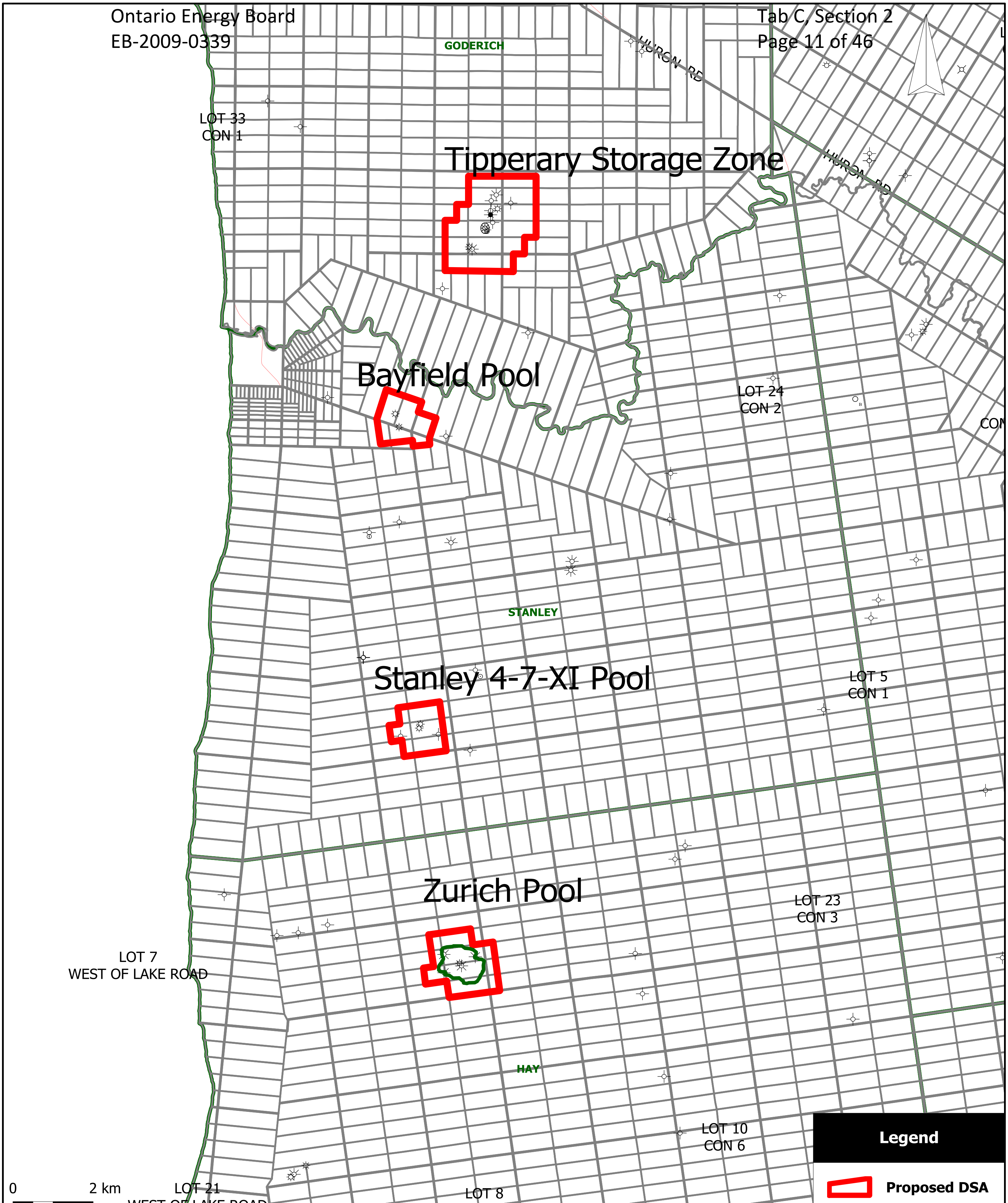


Figure 1.
General Location Map

Drawn by: S. Lewis   Date: March 2009

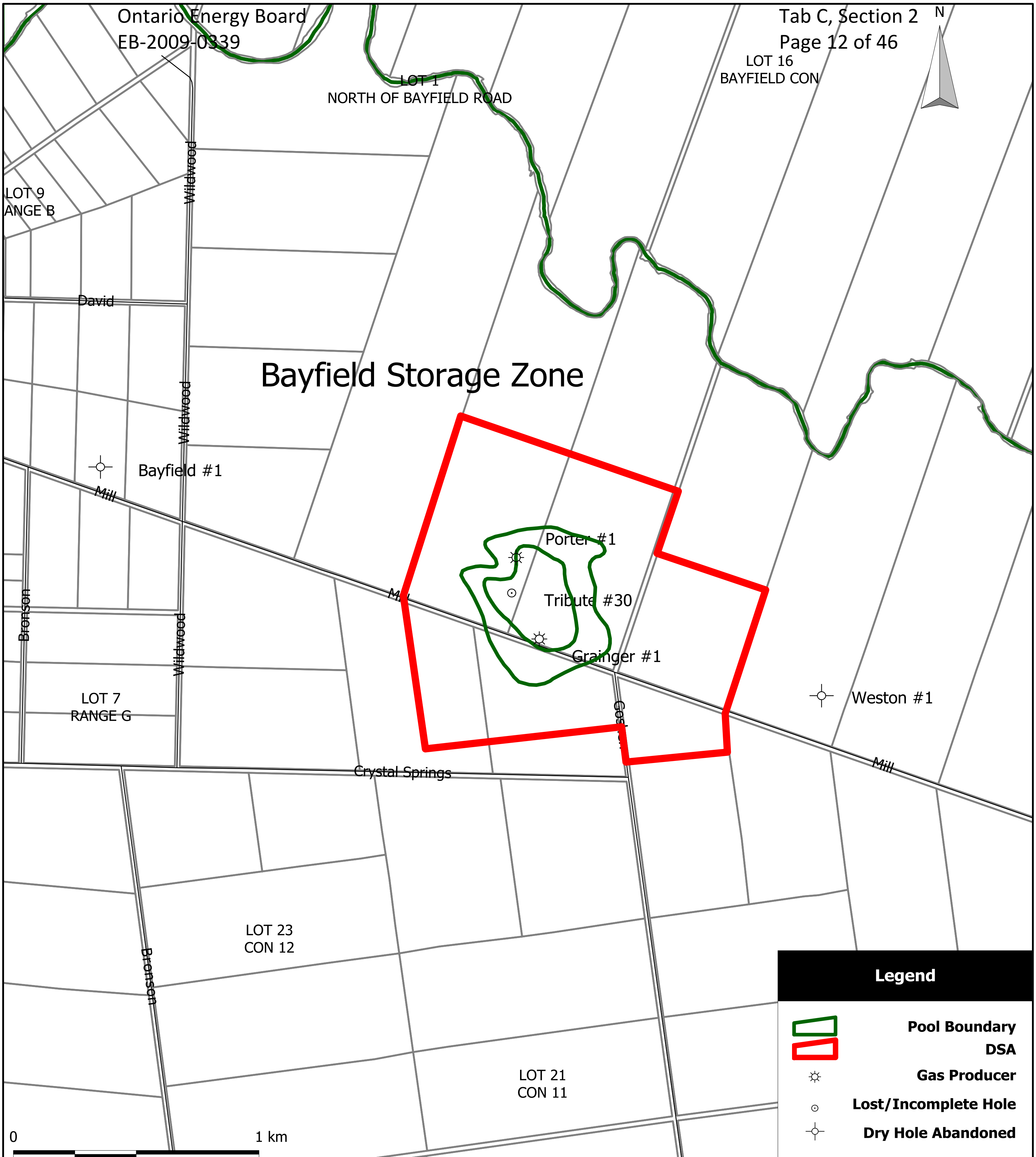


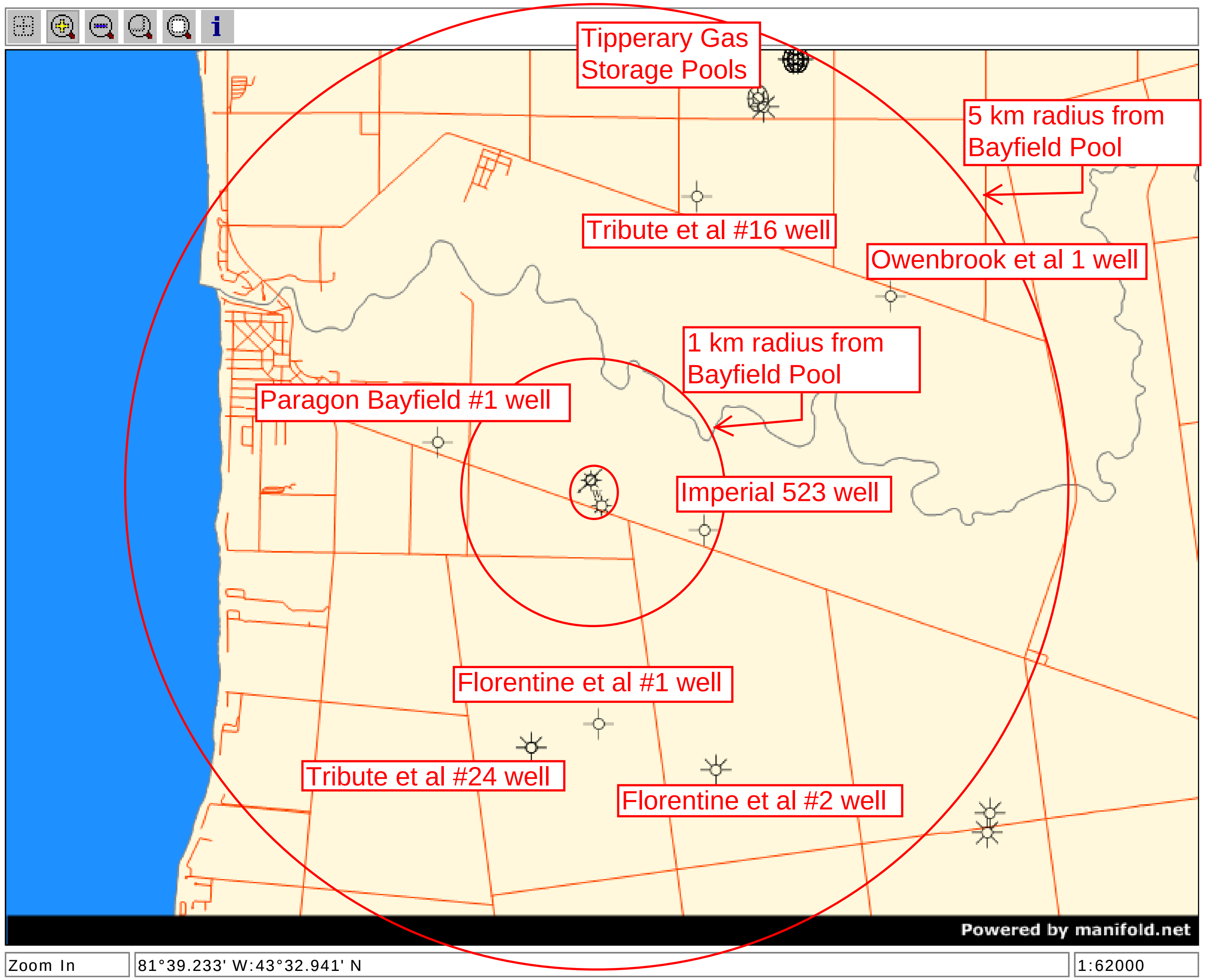
Figure 2
Well Location Map

Drawn By: S. Lewis Date: March 2009

Figure 3: Map of Activities within 5 kilometers of the Bayfield Pool

Oil, Gas & Salt Resources Library

Ontario Petroleum Wells GIS (IMS)



Assessment of Neighboring Activities

Bayfield Pool Development

Appendix A

Well Information on Wells Within the Storage Zone

Workover/Convert to Observation well Program
Bluewater Grainger #1: Stanley 8-BRN
License #8753

Well Data:	
RF elev:	247.5m (812 ft)
Gd elev:	246.9m (810 ft)
TD:	580.9mRF (1906ftRF) (driller), 580.9mRF (1906ftRF) (logger).
Spud:	Nov 14, 1956
RR:	Feb 21, 1957
Casings:	
Surface:	339mm 71kg (13 3/8" 45#) D&D to 61.9mRF (203ftRF).
Inter 1:	273mm 60.3kg (10 ¾" 40.5#) set at 121.9mRF (400ftRF) set on shoe. All recovered.
Inter 2:	219mm (8 5/8") set at 271.6mRF (891ftRF) set on shoe. All recovered.
Inter 3:	178mm (7") set at 387.1mRF (1270ftRF) on bottom hole packer.
Production:	140mm 20.8kg (5 ½" 14#) set at 455.7mRF (1495ftRF) cemented. Cement quantity unknown.
Tubing:	No tubing in well.
Shows:	12mRF (40ftRF): Glacial till Fresh water, 9m (30 ft) FRF. 67mRF (220ftRF): Dundee Fresh water, 47m (155 ft) FRF. 496.2–499.8, 534.6-535.2, 544.3-545.6, 555.9-562.9, 563.2-563.9, 568.1-580.9mRF (1628–1640, 1754-1756, 1786-1790, 1824-1847, 1848-1850, 1864-1906ftRF)). Guelph gas, 34 10^3m^3/D (1.2 MMcfd), 2827kPa (410 psig) SIP.
Volumes:	

339mm (13 3/8") capacity:	. 0806m^3/m
339mm/178mm annulus:	.0558 m^3/m
317mm (12 ½") OH capacity:	.0791m^3/m
254mm (10") OH capacity:	.0506 m^3/m
254mm OH/178mm annulus:	.0264 m^3/m
254mm OH/60.3mm annulus:	.0483 m^3/m
203mm (8") OH capacity:	.0332 m^3/m
203mm OH/178mm annulus:	.0084 m^3/m
203mm OH/60.3mm annulus:	.0304 m^3/m
178mm (7") capacity:	.0217 m^3/m
178mm/140mm annulus:	.0063 m^3/m
178mm/60.3mm annulus:	.0183 m^3/m
140mm (5 ½") capacity:	.0127 m^3/m
140mm/60.3mm annulus:	.0099 m^3/m
60.3mm (2 3/8") capacity:	.0020 m^3/m

Purpose: Pressure test the 5 ½” casing, run a bond log to check for cement top, then convert the well to an observation well by cementing the casing annuli.

Program

1) Move on service rig complete with tank for swabbing. Rig up completely and lay steel line from wellhead to swab tank. Bleed off any pressure from casing.

2) Remove fittings from above 140mm master valve. Install pin down 140mm x 178mm top thread tubing head and 178mm/179mm 14MPa crossover flange on master valve, then rig up BOP’s on crossover flange. Function test BOP’s.

3) Drift, tally, and RIH 60.3mm tubing w/psn and 140mm casing scraper on bottom to 440mRF. Watch weight indicator for indications of fines or junk on casing that might indicate poor quality 5 ½” casing. POOH tubing and lay down casing scraper.

4) Make up and RIH retrievable 140mm bridge plug on tubing and set at 440mRF. POOH tubing. Dump 2 sacs sand on bridge plug to protect retrieving head.

5) Fill up 5 ½” casing above bridge plug with water. Hole volume for fillup is 5.6m^3. Let air escape from casing, then pressure test casing above bridge plug to 500 psi. If pressure bleeds off quickly or if the casing cannot be filled up because water is feeding through a hole in the casing into an uphole aquifer, the program may be modified and the well potentially plugged. The balance of this program assumes the pressure test holds and the well is converted to an observation well.

6) Rig out BOP’s and 140/178mm wellhead. Install 140mm nipple and collar into top of master valve, and stretch 140mm casing sufficiently to take tension off clamps below 140mm master valve and to install slips on top of 178mm casing collar to hold 140mm casing below master valve. It is unknown if the 140mm casing is currently in tension, neutral, or compression. If possible, stretch casing sufficiently to allow a backup pipe wrench/chain tong to fit on 140mm casing above slips and below master valve. Unscrew 140mm master valve. Install 140mm collar on pin, then install pup and collar on newly installed collar. Hook elevators on upper collar and stretch 140mm casing sufficiently to unset slips. Assuming the 140mm cement top is at about 400m (1300 ft), the 140mm string weight above the cement top would be about 8320 kg (18,200 lbf). A casing pull of 13,600 kg (30,000#) over string weight should stretch the 140mm casing about 100mm (4”). Each additional 4500 kg (10,000#) of pull should stretch the casing about 33mm (1.3”). Once slips are unset, slack off tension on 140mm casing.

7) Install pin down 178mm x 178mm threaded top casing bowl on 178mm collar. Install 178mm x 179mm 14MPa crossover flange on casing head, then re-install BOP's on 179mm 14MPa flange. Change pipe rams in BOP's to 140mm. Remove top collar on 140mm casing above BOP's and re-install 140mm master valve.

8) Rig up Weatherford Wireline to run CBL log on 5 ½" casing. Run CBL from bridge plug to surface to check for cement top. Temporarily rig out Weatherford. Based on cement top depth, pull sufficient stretch into 140mm casing to have free point at cement top and apply left hand torque to casing, then set 140mm slips above BOP's. Re-rig up Weatherford. RIH 140mm string shot backoff tool and fire string shot across from first collar above cement top. Monitor 178mm/140mm annulus on wellhead for signs casing has backed off. POOH Wireline. Attempt to rotate 140mm casing to the left at loosened collar. If casing does not rotate, pull stretch and re-apply left hand torque, set slips, re-rig up Weatherford and shoot a second string shot across from free collar to back off 140mm casing. Once 140mm casing rotates, release Weatherford.

9) POOH and lay down 140mm casing from above backed off collar. Install 60.3mm rams back in BOP's.

10) RIH 178mm casing scraper on 60.3mm tubing and collars to 140mm back off depth. POOH casing scraper. RIH retrievable 178mm bridge plug on tubing to just above 140mm back off depth or 380m, whichever is shallower. Set bridge plug, then release setting tool from bridge plug. Circulate 178mm casing to remove air from wellbore then close BOP's. Pressure test 178mm casing and bridge plug to 500 psi. POOH tubing and bridge plug setting tool. Dump 2 bags sand down 178mm casing to protect fishing neck of bridge plug.

11) Rig up Weatherford Wireline. RIH and tag sand on bridge plug to ensure it is there. RIH with .5m charges and perforate 178mm casing just above sand tag. POOH Wireline and release Weatherford.

12) Install return line from 340mm/178mm casing head to rig tank. Top up 178mm casing with water and attempt feed rate down 178mm casing and up annulus. If returns are received up annulus, circulate 3 to 4m^3 to remove any trapped air and to ensure good circulation rates.

13) Rig up Schlumberger. Mix and pump sufficient RFC light cement with semnet to cement from perfs to surface behind 178mm casing, with 50% excess. Underdisplace by 10 to 15m to ensure good cement at perfs. Monitor return line out 340mm/178mm annulus for cement returns. If cement returns are not received, the annulus will need to be grouted to bring the cement top to surface. Rig out Schlumberger.

14) WOC at least 24 hours. Rig up 159mm tooth bit on collars and 60.3mm tubing to drill out underdisplaced cement. RIH and drill out cement above squeezed off perfs. Work bit past perfs, then close in BOP's on tubing and pressure test squeezed perfs to 500 psi. If a feed rate can still be obtained, a cement plug will need to be spotted across from the perfs and the perfs re-squeezed prior to continuing. POOH tubing, collars, and bit.

15) RIH 178mm bridge plug retrieving tool on tubing. Reverse circulate sand off of bridge plug, then latch onto and release bridge plug. POOH and lay down 178mm bridge plug.

16) RIH wire brush tool to clean threads on collar on 140mm casing. Work wire brush inside collar to clean threads, then POOH and lay down wire brush tool.

17) Change pipe rams in BOP's back to 140mm rams. RIH new 140mm 20.8kg (5 ½" 14#) casing with stage tool on bottom to cleaned collar downhole. Torque guide: Minimum – 1290 ft-lb, Optimum – 1720 ft-lb, Maximum – 2150 ft-lb. Screw into collar and torque up to regular 140mm casing torque. Pull sufficient torque on casing to confirm correct installation into 140mm collar downhole.

18) Rig up Schlumberger. Ensure 140mm casing is chained down since annular friction will be significant during cement job. Drop dart that shifts sleeve open, then install plug loading head with stage tool closing plug loaded. Pressure up on dart to shift sleeve open. Cement in 140mm casing from stage tool to surface with Class G cement with 20% excess. Monitor 178mm/140mm annulus at surface for cement returns.

19) Rig out BOP's and casing head from 178mm collar at surface. Cut off 178mm casing below collar and install slip-on weld-on 178mm x 179mm 14MPa casing bowl. Set slips and primary packing for 140mm casing in casing bowl, then cut off and bevel 140mm casing, install secondary seals, then install 179mm 14MPa x 179mm 14MPa tubing spool on casing bowl. Install flanged 60.3mm 14MPa wing valves off of tubing spool, and threaded surface casing vent off casing bowl. Rig up BOP's to tubing spool. Pressure test casing and BOP's to 1000 psi.

20) RIH 121mm tooth bit on collars and tubing to wiper plug from 140mm cement job. Drill out wiper plug, cement, and dart. Work bit past stage tool to clean off burrs. POOH bit. RIH casing scraper on collars and bit and work past stage tool to clean. POOH scraper.

21) Rig up Baker Atlas. Run CBL log and Vertilog from the sand on the 140mm bridge plug to surface. Run and pressure pass if necessary for the bond log. Rig out Baker Atlas.

22) Top up fluid inside 140mm casing to surface then close in blind rams. Pressure test wellhead and 140mm casing to bridge plug to 1250 psi for a stabalization period of at least 4 hours. Either install an electronic pressure recorder or write down 15 minute pressure readings during this pressure test. If pressure initially falls below 1200 psi, top up pressure and re-start pressure test.

23) RIH tubing with 140mm bridge plug retrieving head on. Tag sand on bridge plug and reverse circulate out sand. Do not latch onto bridge plug yet. Pull up 1 joint and rig to swab. Swab fluid level down as low as possible prior to releasing bridge plug. Fluid volume with bridge plug at 440m is $5.2m^3$. Once the fluid level is lowered, latch onto and unset bridge plug. POOH and lay down 140mm bridge plug.

24) RIH 60.3mm tubing with PSN on bottom and tag TD. Pull up 1 joint and rig to swab. Swab all available fluid from well. POOH and lay down tubing.

25) Rig out BOP’s and install 179mm 14MPa master valve on tubing spool, then 179mm 14MPa blind flange on master valve. Ensure a ½” tap is installed in blind flange to allow pressure above valve to be bled off prior to unbolting blind flange.

26) Rig out service rig.

Contact phone list:

Tribute:

Daily reports:	Bothwell office:	(519) 695-3811	
Supervisor:	Jim McIntosh:	(519) 878-1006	
	Peter Miller:	(519) 671-0876	
	Ron Livingston:	(519) 359-1106	
London office:	Bill Blake:	(519) 871-0334	
	Jane Lowrie:	(519) 871-0876	

Cementers:

Schlumberger:	Bill Partanen:	Office:	(519) 652-5053
		Cell:	(519) 660-9186
	Jay	Cell:	(519) 494-5292

Loggers:

Baker Atlas:	Yomi Obiri:	Office:	(519) 332-8030
		Cell:	(519) 339-6783
Weatherford:	Dave Tipping:	Office:	(877) 683-5070
		Cell:	(519) 436-3541

Bits, mills, stage tools, scrapers, etc:

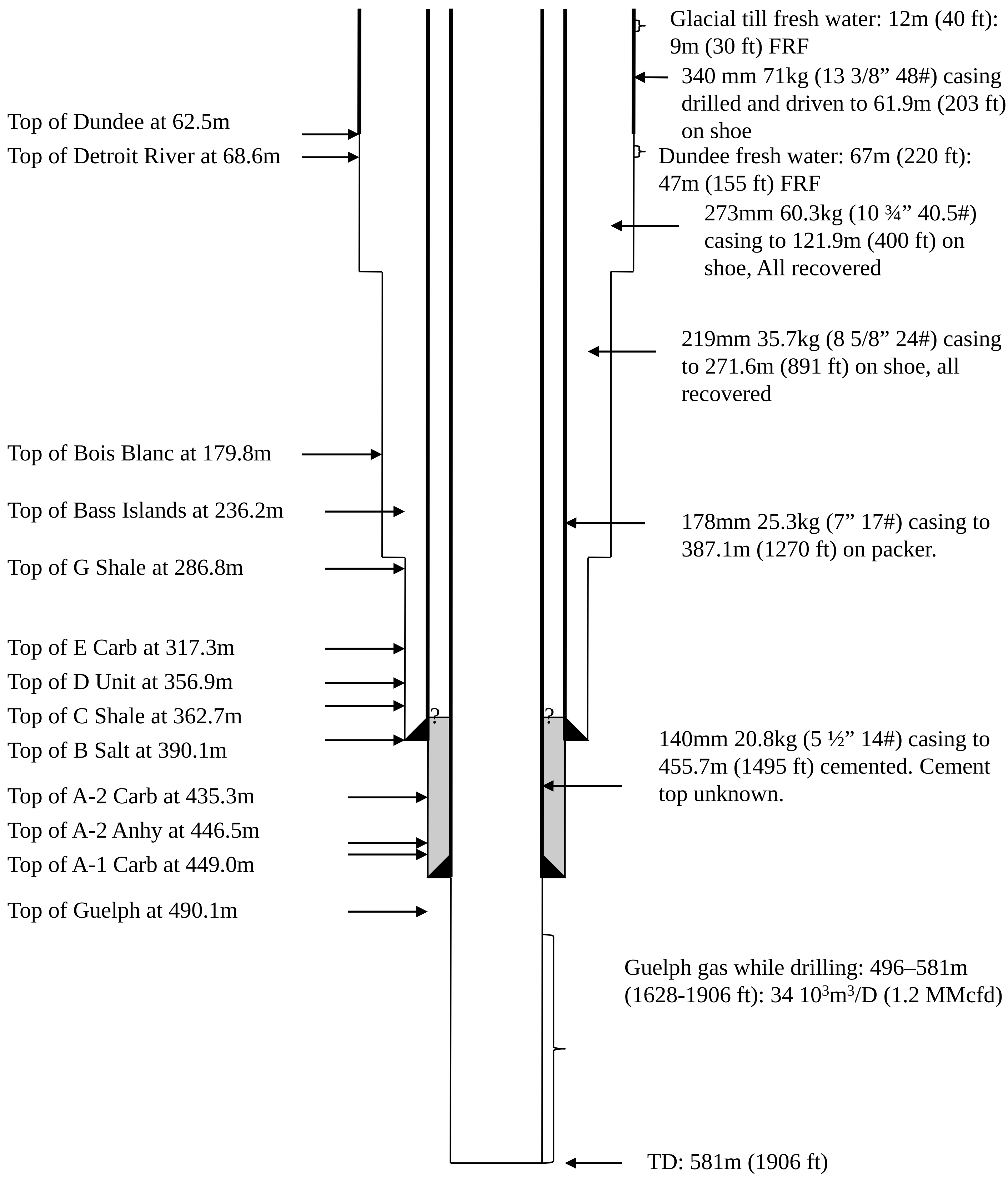
Holland Testers:	Dale Holland:	Cell:	(519) 322-8015
	Derrick Holland:	Cell:	(519) 322-8439
Beaver Oil Tools:	Don Falkner:	Cell:	(740) 360-2000

Overshot casing tools, patches:

Weatherford:	Andrew Fisher:	Office:	(780) 955-7933

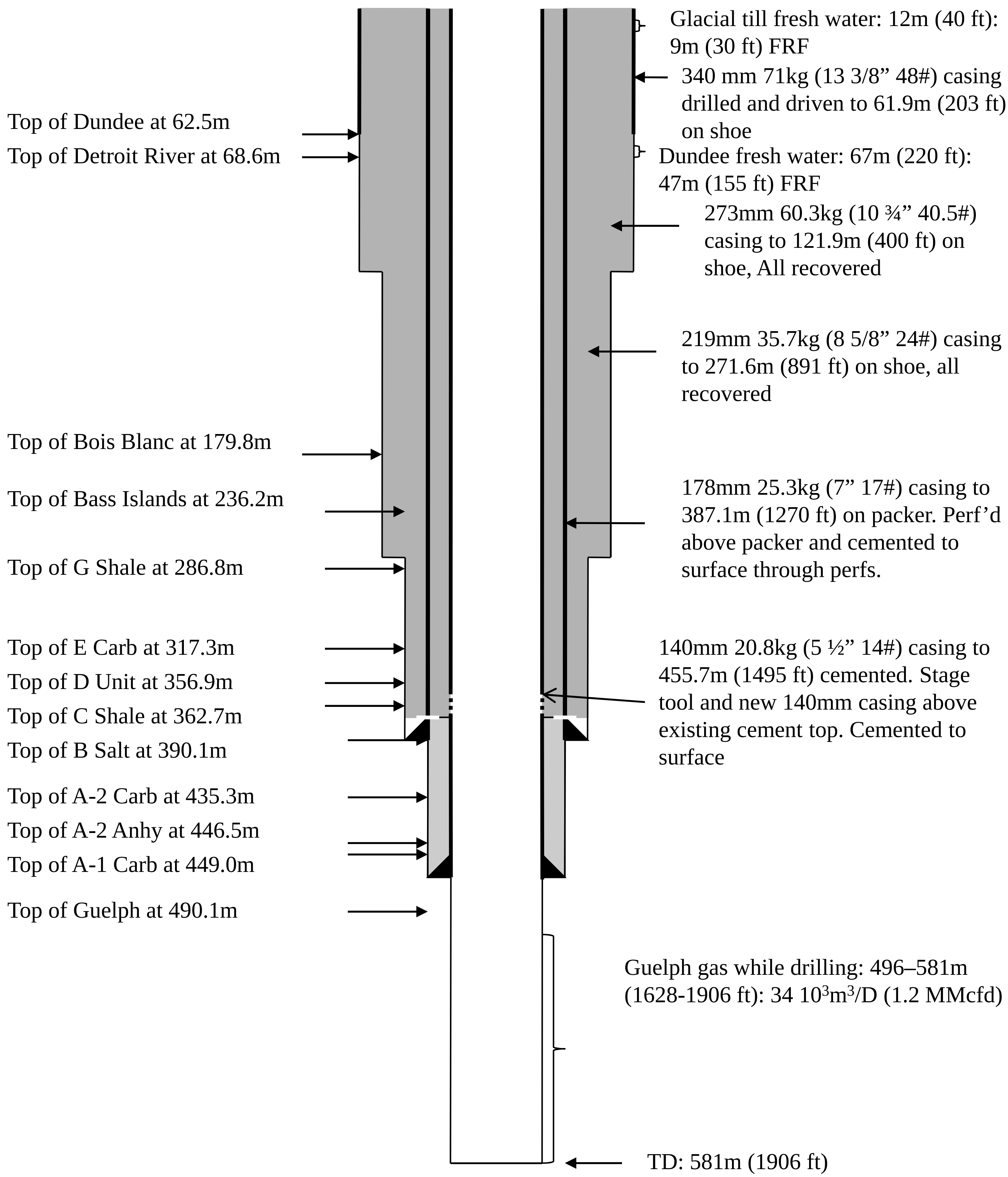
Wellbore Schematic Diagram

Bluewater Grainger #1: Stanley 8-BRN Wellbore



Wellbore Schematic Diagram

Bluewater Grainger #1: Stanley 8-BRN Wellbore after Workover



Plug and Abandon well Program
Bluewater Grainger #1: Stanley 8-BRN
License #8753

Well Data:

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Gd elev:	246.9m (810 ft)
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Shows:	12mRF (40ftRF): Glacial till Fresh water, 9m (30 ft) FRF. 67mRF (220ftRF): Dundee Fresh water, 47m (155 ft) FRF. 496.2–499.8, 534.6-535.2, 544.3-545.6, 555.9-562.9, 563.2-563.9, 568.1-580.9mRF (1628–1640, 1754-1756, 1786-1790, 1824-1847, 1848-1850, 1864-1906ftRF)). Guelph gas, 34 $10^3m^3/D$ (1.2 MMcfd), 2827kPa (410 psig) SIP.

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203mm OH/60.3mm annulus:	.0304 m^3/m
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178mm/140mm annulus:	.0063 m^3/m
178mm/60.3mm annulus:	.0183 m^3/m
140mm (5 ½") capacity:	.0127 m^3/m
140mm/60.3mm annulus:	.0099 m^3/m
60.3mm (2 3/8") capacity:	.0020 m^3/m

Purpose: Pressure test the 5 ½" casing, run a bond log to check for cement top, then convert the well to an observation well by cementing the casing annuli.

Program

1) Move on service rig complete with tank for swabbing. Rig up completely and lay steel line from wellhead to swab tank. Bleed off any pressure from casing.

2) Remove fittings from above 140mm master valve. Install pin down 140mm x 178mm top thread tubing head and 178mm/179mm 14MPa crossover flange on master valve, then rig up BOP's on crossover flange. Function test BOP's.

3) Drift, tally, and RIH 60.3mm tubing w/psn and 140mm casing scraper on bottom to 440mRF. Watch weight indicator for indications of fines or junk on casing that might indicate poor quality 5 ½" casing. POOH tubing and lay down casing scraper.

4) Make up and RIH retrievable 140mm bridge plug on tubing and set at 440mRF. POOH tubing. Dump 2 sacs sand on bridge plug to protect retrieving head.

5) Fill up 5 ½" casing above bridge plug with water. Hole volume for fillup is 5.6m^3. Let air escape from casing, then pressure test casing above bridge plug to 500 psi. If pressure bleeds off quickly or if the casing cannot be filled up because water is feeding through a hole in the casing into an uphole aquifer, the program may be modified and the well potentially plugged. The balance of this program assumes the pressure test fails and the wellbore is to be abandoned.

6) Rig out BOP's and 140/178mm wellhead. Install 140mm nipple and collar into top of master valve, and stretch 140mm casing sufficiently to take tension off clamps below 140mm master valve and to install slips on top of 178mm casing collar to hold 140mm casing below master valve. It is unknown if the 140mm casing is currently in tension, neutral, or compression. If possible, stretch casing sufficiently to allow a backup pipe wrench/chain tong to fit on 140mm casing above slips and below master valve. Unscrew 140mm master valve. Install 140mm collar on pin, then install pup and collar on newly installed collar. Hook elevators on upper collar and stretch 140mm casing sufficiently to unset slips. Assuming the 140mm cement top is at about 400m (1300 ft), the 140mm string weight above the cement top would be about 8320 kg (18,200 lbf). A casing pull of 13,600 kg (30,000#) over string weight should stretch the 140mm casing about 100mm (4"). Each additional 4500 kg (10,000#) of pull should stretch the casing about 33mm (1.3"). Once slips are unset, slack off tension on 140mm casing.

7) Install pin down 140mm x 178mm threaded top casing bowl on 140mm collar. Install 178mm x 179mm 14MPa crossover flange on casing head, then re-install BOP's on 179mm 14MPa flange.

8) Rig up Weatherford Wireline to run CBL log on 140mm casing. Run CBL from bridge plug to surface to check for cement top. Rig out Weatherford Wireline.

9) RIH tubing with plug retrieving head on. Reverse circulate sand from on top of bridge plug, then latch onto, unset, and retrieve bridge plug. Install tubing-set permanent bridge plug on tubing and run in hole and set bridge plug where retrievable bridge plug was set. POOH tubing. RIH tubing with packer on bottom and set packer above bridge plug inside 140mm casing. Fill tubing with water and pressure test bridge plug to 7MPa for 10 minutes. Unset packer and POOH tubing and packer.

10) RIH open ended tubing to bridge plug. Mix and pump 14 sacs Class G + 2%$CaCl_2$ down tubing, displaced with .8m^3 water as a 30m cement cap to the bridge plug (10% excess). POOH tubing.

11) If the cement top from CBL log is above the top of the Salina G shale at 287m, the Salina G plug will need to be set through perforations. This program assumes the cement top is below the G Shale top.

12) Rig up Weatherford Wireline. RIH 140mm casing cutter and cut casing above cement top. Make sure 140mm casing is free then release Weatherford. Rig BOP's off of 140mm casing and install casing head on 178mm casing. Reinstall BOP's on 178mm casing. POOH and lay down 140mm casing.

13) If the cement top for the 140mm casing was below the 178mm casing seat at 387mRF, a cement plug will be required to isolate the 178mm casing shoe. This program assumes the 140mm cement top is above the 178mm casing seat.

14) Fill 178mm casing with water and pressure test casing to 7MPa.

15) Rig up Weatherford Wireline. RIH 178mm casing cutting tool and position across from Salina G Shale top at 287mRF. Cut casing at 287m, then POOH wireline. Attempt to pull on 178mm casing to see if it is free. With the large section of uncemented open hole above the G Shale top, it is unlikely that the 178mm casing will be free. If casing is free, carefully and slowly POOH 90m of 178mm casing above casing part. If the casing is not free, slowly pull on casing while monitoring block tension, measuring casing stretch to estimate the free point for the casing.

16) If 90m of 178mm casing could be pulled, re-hang the 178mm casing in slips and re-hook up BOP's to casing. RIH tubing to 287m, then mix and pump 50 sacs Class G, displaced with .4m^3 water as Silurian G Shale Plug #2 (20% excess). POOH tubing, then continue to POOH and lay down 178mm casing.

17) If 178mm casing could not be pulled, RIH open ended tubing to casing cut, circulate casing to fluid, and attempt a feed rate through the casing cut into the annulus outside the 178mm casing. If a feed rate can be achieved, mix and pump 47 sacs Class G cement, displaced with .4m3 water as Plug #2 (20% excess). POOH tubing, WOC, and tag plug above casing cut at 287m.

18) If the 178mm casing could be retrieved from above the casing cut, all other plugs will be set in open hole. The balance of the program is written assuming the 178mm casing could not be retrieved and the 178mm casing will need to be re-cut to set the fresh water plug (#3).

19) Rig up Weatherford Wireline. RIH 178mm casing cutting tool to 120mRF. Cut 178mm casing, then POOH wireline. Rig out Weatherford. Attempt to pull 178mm casing as before. If casing is free, slowly pull and lay down casing. Once casing is retrieved, RIH tubing to 120m and set plug #3 with 88 sacs Class G (20% excess) displaced .15m^3 water to balance plug. POOH tubing, WOC, and tag plug above 90m.

20) The balance of the program assumes the 178mm casing is not free at 120m either. Fill well and close blind rams. Attempt a feed rate down the 178mm casing and through the casing cut. If a feed rate can be achieved, mix and pump 3.7t Class G down casing and through cut, displaced with 1.6m3 water. WOC and tag plug above casing cut at 120m.

21) Run grout string down 340mm/178mm annulus to 70m. Mix and pump 66 sacs Class G down grout string as Plug #4a across the bedrock top (20% excess). POOH grout string, WOC, and tag cement top in the annulus above the base of the 340mm casing at 62m. Once annulus is cemented off, RIH tubing to 70m and set a 24 sac Class G plug inside 178mm casing as Plug #4b (10% excess).

22) Dig around wellhead to expose all casings. Cut casings off 1.5m below ground level. Install cement bags as bridges between the casing annuli and set 1m cement plugs at surface.

23) Rig out service rig. Restore location.

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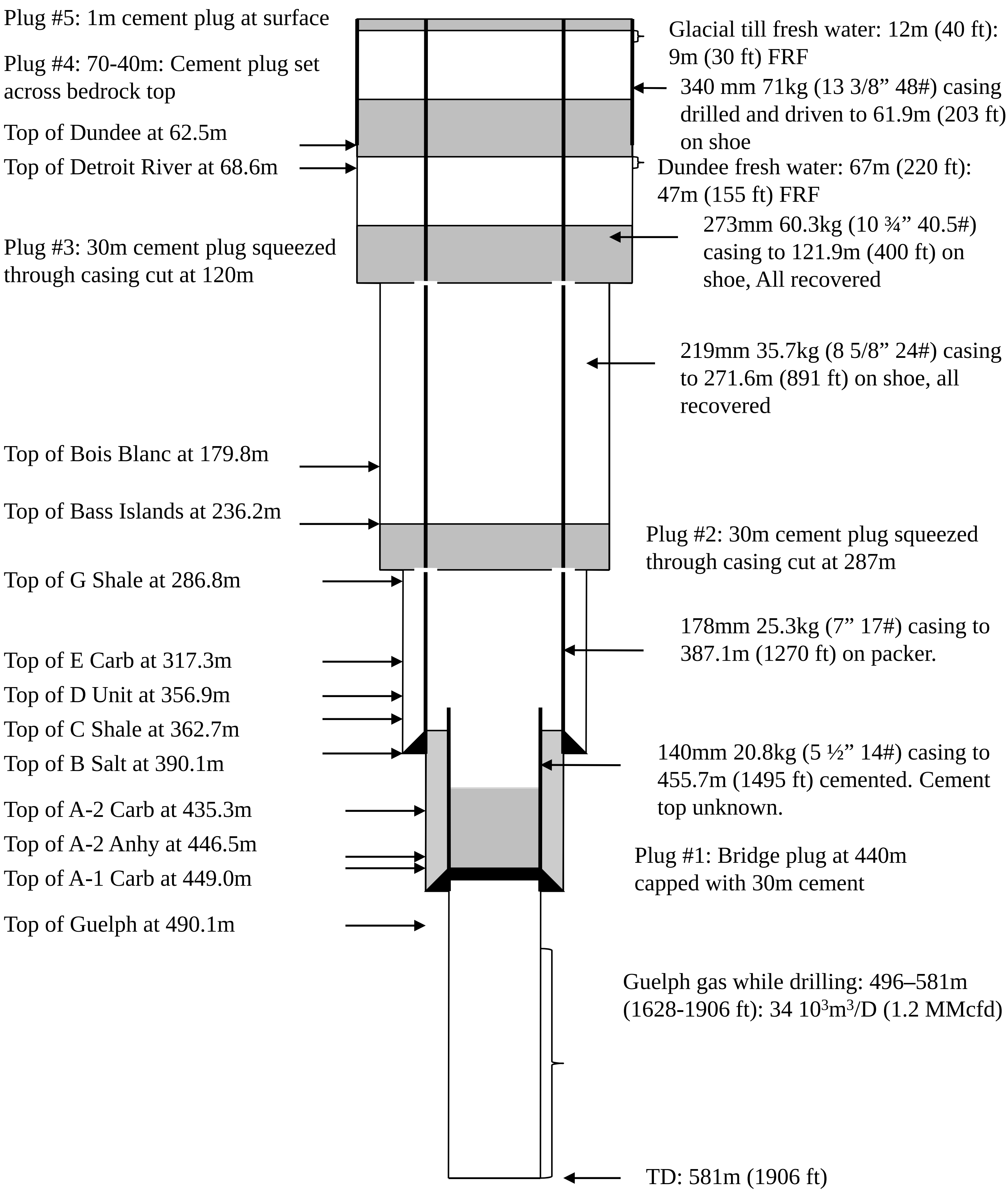
Wellbore Schematic Diagram

Bluewater Grainger #1: Stanley 8-BRN Wellbore after Plugging



Workover/Convert to Observation well Program
Bluewater Porter #1: Stanley 7-BRN
License #8752

Well Data:

RF elev:	242.6m (796 ft)
Gd elev:	242.0m (794 ft)
TD:	592.2mRF (1943ftRF) (driller), 592.2mRF (1943ftRF) (logger). Note: Wheatley tagged TD at 565mGd (565.6mRF/1856ftRF) on July 29, 2008. The open hole section was likely plugged back after initial drilling and this plug back never noted on the Form 107's.
Spud:	July 10, 1956
RR:	Oct 8, 1956
Casings:	
Surface:	339mm (13 3/8") D&D to 52.7mRF (173ftRF).
Intermediate 1:	273mm (10 ¾") set at 121.9mRF (400ftRF) set on shoe.
Intermediate 2:	219mm (8 5/8") set at 277.0mRF (909ftRF) set on shoe.
Production:	178mm (7") set at 375.2mRF (1231ftRF) cemented. Cement quantity unknown.
Tubing:	No tubing in well.
Shows:	61.0mRF (200ftRF): Upper Detroit River Fresh water, 38m (125 ft) FRF. 222.5mRF (730ftRF): Bois Blanc Sulphur water, 30m (100 ft) FRF. 300.2mRF (985ftRF): F Shale Salt water, 3m (10 ft) FRF. 463.0–463.3mRF (1519–1520ftRF). 1 Mcfd A-1 gas show. 500.5–576.7mRF (1642–1892ftRF). Guelph gas, 232 10^3m^3/D (8.2 MMcfd), 2820kPa (409 psig) SIP. 576.7–586.1mRF (1892–1923ftRF). Guelph oil show.
Comments:	Buildup ran from July 29th to Aug 19th shows reservoir pressure of 216 kPag (31.3 psig) at 537.0mGd.

Volumes:

339mm (13 3/8") capacity:	. 0806m^3/m
339mm/273mm annulus:	.0221 m^3/m
273mm (10 ¾") capacity:	.0512 m^3/m
273mm/219mm annulus:	.0135 m^3/m
273mm/60.3mm annulus:	.0483 m^3/m
219mm (8 5/8") capacity:	.0332 m^3/m
219mm/178mm annulus:	.0084 m^3/m
219mm/60.3mm annulus:	.0304 m^3/m
178mm (7") capacity:	.0211 m^3/m
178mm/114mm annulus:	.0109 m^3/m
178mm/60.3mm annulus:	.0183 m^3/m
114mm (4 ½") capacity:	.0085 m^3/m

114mm/60.3mm annulus: .0056 m^3/m
60.3mm (2 3/8") capacity: .0020 m^3/m

Purpose: Pressure test the 7" casing, run a bond log to check for cement top, then convert the well to an observation well by cementing the casing annuli and running and cementing new 4 ½" casing in the well.

Program

1) Move on service rig complete with tank for swabbing. Rig up completely and lay steel line from wellhead to swab tank. Bleed off any pressure from casing.

2) Remove split flange which is centering the 7" collar on the larger casings. Look carefully down annulus outside 7" collar for indications of 8 5/8", 10 ¾", and/or 13 3/8" casings close to surface. There is no records of any of these casings being pulled and recovered. Remove all fittings, swages, and valves down to the 7" collar. Run in small siphon strings down outside of 7" collar to check for casings prior to rigging up BOP's. Install 178mm pin down tubing head, crossover flange and BOP's on 178mm collar. Function test BOP's.

3) Drift, tally, and RIH 60.3mm tubing w/psn and 178mm casing scraper on bottom to 370mRF. Watch weight indicator for indications of fines or junk on casing that might indicate poor quality 7" casing. POOH tubing and lay down casing scraper.

4) Make up and RIH retrievable 178mm bridge plug on tubing and set at 370mRF. POOH tubing. Dump 2 sacs sand on bridge plug to protect retrieving head.

5) Fill up 7" casing above bridge plug with water. Hole volume for fillup is 7.8m^3. Let air escape from casing, then pressure test casing above bridge plug to 500 psi. If pressure bleeds off quickly or if the casing cannot be filled up because water is feeding through a hole in the casing into an uphole aquifer, the program may be modified and the well potentially plugged. The balance of this program assumes the pressure test holds and the well is converted to an observation well.

6) Rig up Weatherford Wireline to run CBL log on 7" casing. Run CBL from bridge plug to surface to check for cement top. Load 1m casing gun with big hole charges and perforate 7" casing just above cement top. Monitor fluid level inside 7" to confirm it falls. POOH Wireline and release Weatherford.

7) Dig around wellhead at surface to expose casings outside 7" casing. If necessary, install joints to tie casings back to near surface level. If 8 5/8" casing is present, weld steel plate between the 8 5/8" and 7" casings, with a 2" port welded into the side of the 8 5/8" casing. If 10 ¾" casing is

present, weld steel plate between 10 ¾” and 8 5/8” casings with 2” port welded into the side of the 10 ¾” casing. If 13 3/8” casing is present, weld steel plate between the 13 3/8” and 10 ¾” casings and weld a 2” port into the side of the 13 3/8” casing.

8) Run in tubing to just above perforations, close pipe rams and circulate through perfs, up 8 5/8”/7” annulus, and out 2” port below welded plate. If annular returns are not received after $3m^3$ water is pumped, shut down pumping. If perforations in the 7” casing were above 277m (base of 8 5/8” casing), monitor 2” port into side of 10 ¾” casing as well. The balance of the program assumes no fluid returns are received up either annulus. POOH tubing.

9) Rig off BOP’s to leave 7” collar exposed at surface.

10) Rig up Schlumberger. Hook up 7” x 2” swage to 7” casing, then mix and pump cement down 7” casing, through perforations, and up 8 5/8”/7” annulus to attempt to cement annulus to surface. If cement returns are received at surface and perforations were above 277m, close in 2” port off 8 5/8” casing and look for returns out 2” port off 10 ¾” casing. If no returns were received and the casing is on a strong vacuum, only displace cement in 7” down to about 100m, otherwise, displace cement down to within 20m of perforations. The balance of the program assumes no fluid returns are received during the cement job.

11) WOC, then RIH sandline and tag cement inside 7” casing above perforations.

12) Open up 2” port on 8 5/8” casing and attempt to fill 8 5/8”/7” annulus with water or to confirm feed rate. Assuming a feed rate can still be achieved, pump $3m^3$ water to confirm feed rate, then shut down pump.

13) Rig up Schlumberger. Hook up to 2” port off 8 5/8” casing, then mix and pump cement down 8 5/8”/7” annulus to top squeeze annulus. Hesitation squeeze cement toward the end of the cement job to ensure a lock up with the RFC cement. Leave 2” port off 10 ¾” casing open during this cement squeeze and monitor for air blow or fluid returns. Close 2” valve off 8 5/8” casing after the cement job and WOC.

14) Open 2” valve into 8 5/8”/7” annulus and attempt to fill annulus with water. If cement level is still at surface, continue with balance of program. If the annulus cannot be filled, a second top side cement squeeze may be required to cement the annulus to surface.

15) Hook up service rig line to 2” port into 10 ¾”/8 5/8” annulus. Fill annulus with water or establish a feed rate down annulus. If a feed rate can be established, pump at least $4m^3$ water to ensure the feed rate is sustainable.

16) Rig up Schlumberger. Hook up to 2” port off 10 ¾” casing, then mix and pump cement down 10 ¾”/8 5/8” annulus to top squeeze annulus. Hesitation squeeze cement toward the end of the cement job to ensure a lock up with the RFC cement. Leave 2” port off 13 3/8” casing open during this cement squeeze and monitor for air blow or fluid returns. Close 2” valve off 10 ¾” casing after the cement job and WOC.

17) Open 2” valve into 10 ¾”/8 5/8” annulus and attempt to fill annulus with water. If cement level is still at surface, continue with balance of program. If the annulus cannot be filled, a second top side cement squeeze may be required to cement the annulus to surface.

18) Hook up service rig line to 2” port into 13 3/8”/10 ¾” annulus. Fill annulus with water or establish a feed rate down annulus. If a feed rate can be established, pump at least $3m^3$ water to ensure the feed rate is sustainable.

19) Rig up Schlumberger. Hook up to 2” port off 13 3/8” casing, then mix and pump cement down 13 3/8”/10 3/4” annulus to top squeeze annulus. Hesitation squeeze cement toward the end of the cement job to ensure a lock up with the RFC cement. Close 2” valve off 13 3/8” casing after the cement job and WOC.

20) Open 2” valve into 13 3/8”/10 ¾” annulus and attempt to fill annulus with water. If cement level is still at surface, continue with balance of program. If the annulus cannot be filled, a second top side cement squeeze may be required to cement the annulus to surface.

21) Run in 6 ¼” tooth bit on drill collars and tubing to cement top inside 7” casing. Hook up power swivel and drill out underdisplaced cement from the first cement job. Work bit past perfs to

ensure the cement sheath is drilled/knocked off. Once cement is drilled out, close pipe rams and pressure test perforations to 500 psi. If the perfs leak, a small cement squeeze may be required to cement off perfs. POOH tubing, lay down collars and bit.

22) Rig out BOP's and wellhead. Install slip-on weld on 7" x 7 1/16" 2000# casing bowl on 7" casing at surface. Rig up crossover spool if necessary, then service rig BOP's on crossover spool. Top up casing and pressure test wellhead to 1000 psi for 10 minutes.

23) RIH tubing with bridge plug retrieving tool on bottom. Tag sand on bridge plug, then circulate out sand and work retrieving tool down to fishing neck. Circulate casing clean.

24) Rig to swab fluid level down inside 7" casing prior to unsetting bridge plug. Swab out 5m^3 fluid to lower fluid level down to about 250m. Latch onto and unset bridge plug. Monitor 7" at surface for a vacuum caused by water falling downhole. POOH tubing and lay down retrievable bridge plug.

25) Rig up Weatherford Wireline. RIH Wireline set bridge plug and set plug close to the top of the Guelph at 472mRF (1550 ftRF). Cap bridge plug with 1 pail hydromite. Release Weatherford.

26) RIH tubing with PSN on bottom to tag hydromite. Do not place much weight on hydromite to risk cracking it. Pull up 1 joint and fill hole with water. Theoritical volume to full well from 465m is 9.4m^3. Once well is full, shut down pumps and monitor fluid level to ensure hydromite/bridge plug is not leaking. POOH tubing.

27) Rig floor to run 114mm (4 ½") casing. RIH 114mm 14.1kg/m J-55 ST&C Rge 2 or 3 casing with float shoe on bottom, float collar above shoe joint, then casing to surface. Install centralizers on shoe joint and at least every 100m to surface. Casing make-up torque: Minimum – 760 ft-lbs, Optimum – 1010 ft-lbs, Maximum – 1260 ft-lbs. Tally in casing such that float shoe is hanging at 461mRF (1512 ftRF). No not tag hydromite. Set casing in slips in casing bowl.

28) Install either Schlumberger cement head or swage on 114mm casing at surface and circulate casing with service rig pump.

29) Rig up Schlumberger. Cement in 114mm casing as per program with fluid returns directed to service rig tank. Watch for signs of cement returns and mix sugar in cement returns to prevent setup in service rig tank. Drop plug and displace wiper plug with 3.8m^3 water to land plug. Pressure test casing to 7MPa over final displacement pressure, ensuring the landing pressure is well below burst pressure (casing burst pressure = MPa). Bleed off pressure and check that floats are holding. Rig out Schlumberger.

30) WOC at least 48 hours until cement has developed sufficient compressive strength to run a bond log. Cut 114mm stickup about 1 foot above casing bowl and rig out crossover spool from casing bowl. Re-cut 114mm stickup for correct length to fit inside tubing spool then install primary packing, secondary seals, and tubing spool. Rig up service rig BOP's to 7 1/16" 2000# flange on tubing spool. Pressure test tubing spool and valves off spool to at least 10 MPa (1450 psi) and monitor pressure for 15 minutes to confirm a good pressure test.

31) RIH tubing with 98mm tooth bit on bottom to check for cement on top of wiper plug. If cement is present, rig up power swivel and drill cement down to top of wiper plug. Circulate casing clean, then POOH and rack tubing.

32) Rig up Baker Atlas. Run Vertilog from the wiper plug to surface to verify casing quality. Run a CBL log from the wiper plug to surface to verify cement bond. Rig out Baker Atlas.

33) Run in 98mm tooth bit on tubing to wiper plug. Drill out wiper plug and shoe joint down to just outside 114mm float shoe. Do not drill up bridge plug. Circulate well free of cement, then close in pipe rams and run a PIT on the cement job to 3800 kPa.

34) Rig to swab. Swab out as much fluid as possible through the bit on bottom to lower fluid level in well. POOH tubing sideways and lay down tooth bit.

35) Rig out service rig BOP's and install tubing bonnet on 7 1/16" top flange. Rig out service rig.

36) Move on cable tool rig and rig up for drilling with 4" tools. Install blind ram and annular on 7 1/16" 2000# flange. String in hole with bailer to confirm and mark string depth. Bail as much water from above the remaining cement and hydromite as possible prior to drilling.

37) Drill ahead through cement and hydromite on top of bridge plug and drill up bridge plug. Once bridge plug is loosened and drops to bottom, drill up the remains of the plug on bottom. Bail the bottom of the hole as completely as possible to remove chunks of bridge plug and rubber.

38) With gas pressure bled off and well venting, rig out blind rams and annular and install tubing bonnet on wellhead. After bonnet is installed, close all valves off wellhead and bull plug all outlets.

39) Rig out cable tool rig. Operations complete.

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Overshot casing tools, patches:			
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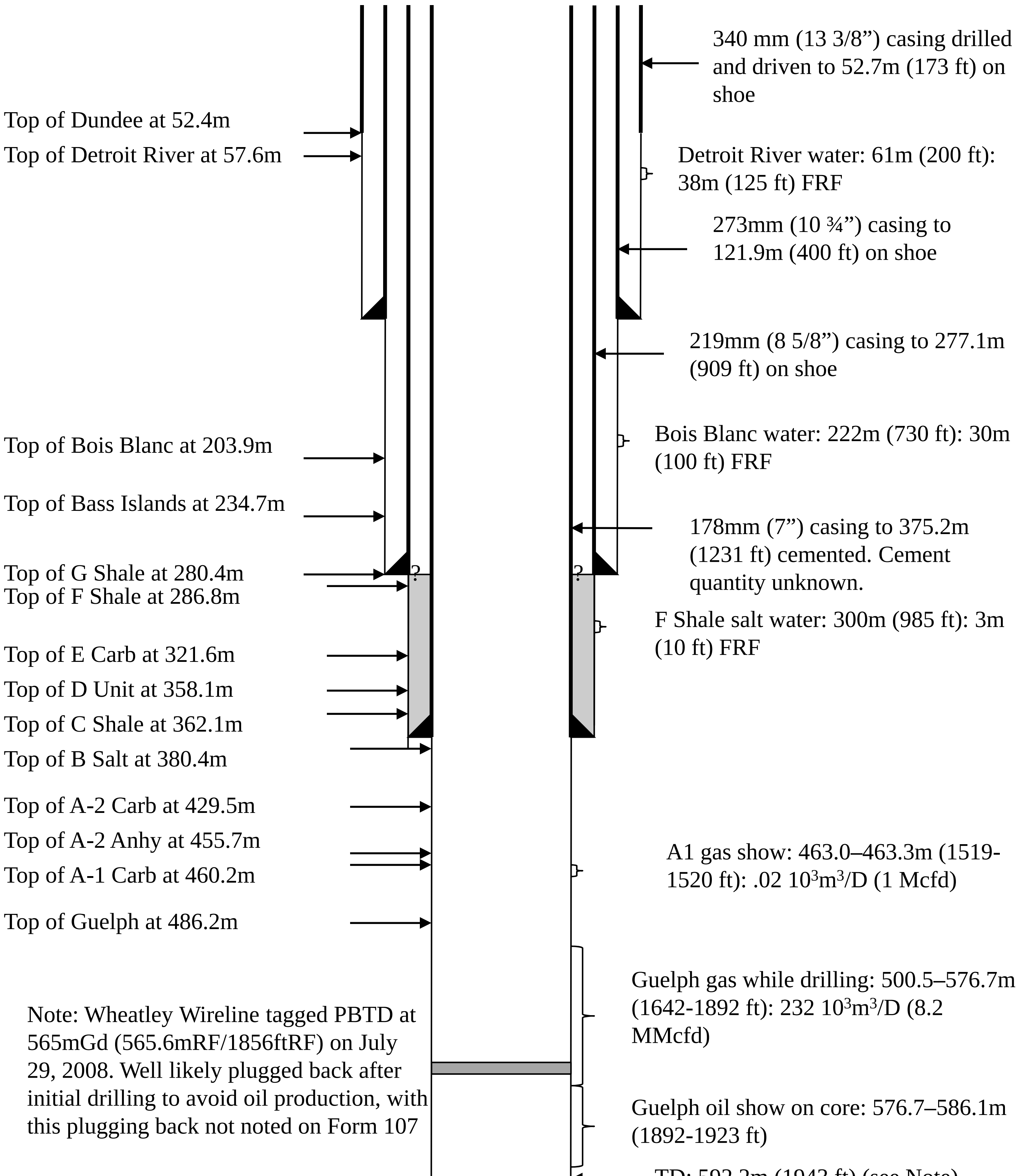
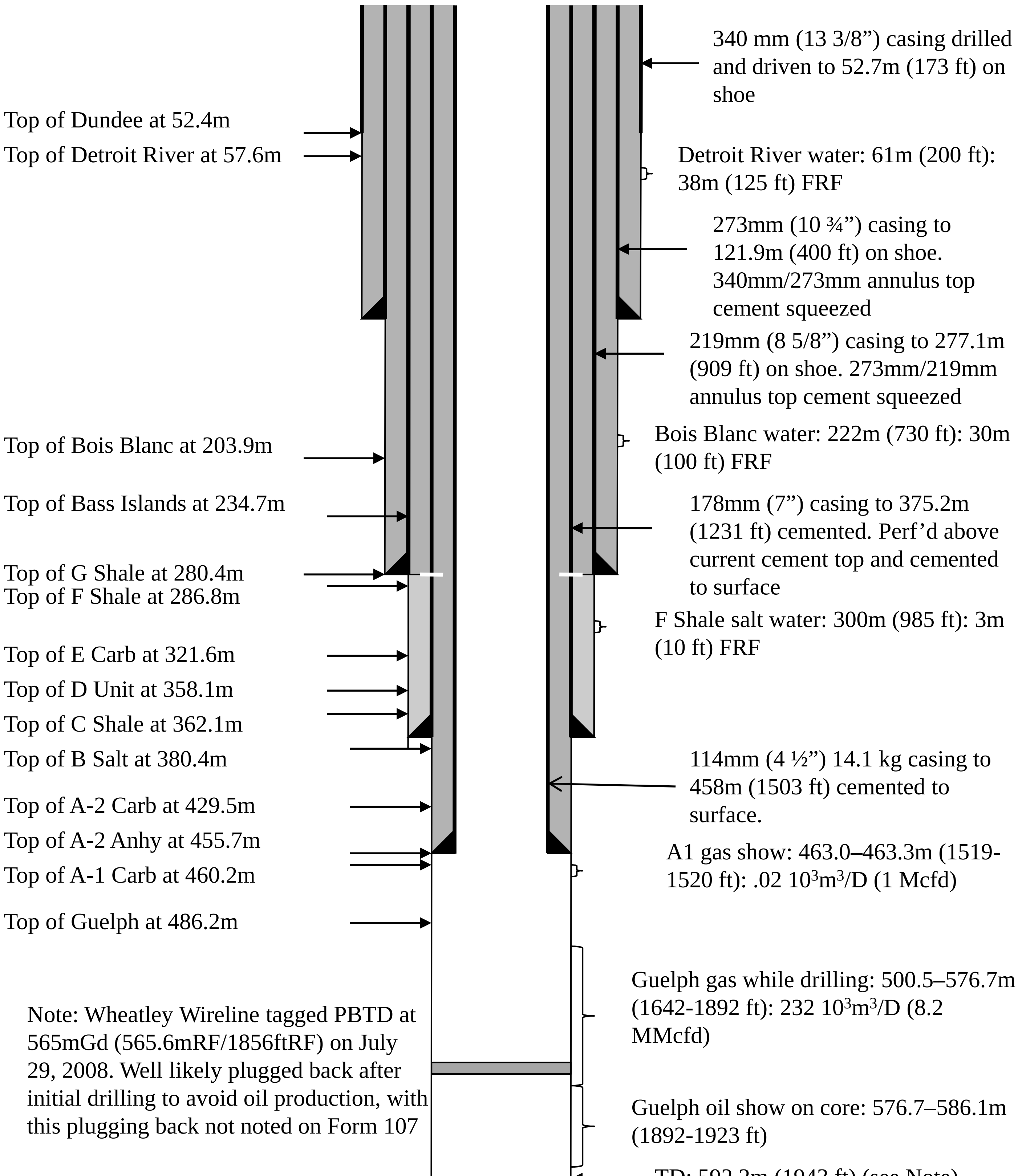
Wellbore Schematic Diagram

Bluewater Porter #1: Stanley 7-BRN Wellbore



Wellbore Schematic Diagram

Bluewater Porter #1: Stanley 7-BRN Wellbore after Workover



Plug and Abandon well Program
Bluewater Porter #1: Stanley 7-BRN
License #8752

Well Data:

RF elev:	242.6m (796 ft)
Gd elev:	242.0m (794 ft)
TD:	592.2mRF (1943ftRF) (driller), 592.2mRF (1943ftRF) (logger).
	Note: Wheatley tagged TD at 565mGd (565.6mRF/1856ftRF) on July 29, 2008. The open hole section was likely plugged back after initial drilling and this plug back never noted on the Form 107's.
Spud:	July 10, 1956
RR:	Oct 8, 1956
Casings:	
Surface:	339mm (13 3/8") D&D to 52.7mRF (173ftRF).
Intermediate 1:	273mm (10 ¾") set at 121.9mRF (400ftRF) set on shoe.
Intermediate 2:	219mm (8 5/8") set at 277.0mRF (909ftRF) set on shoe.
Production:	178mm (7") set at 375.2mRF (1231ftRF) cemented. Cement quantity unknown.
Tubing:	No tubing in well.
Shows:	61.0mRF (200ftRF): Upper Detroit River Fresh water, 38m (125 ft) FRF.
	222.5mRF (730ftRF): Bois Blanc Sulphur water, 30m (100 ft) FRF.
	300.2mRF (985ftRF): F Shale Salt water, 3m (10 ft) FRF.
	463.0–463.3mRF (1519–1520ftRF). 1 Mcfd A-1 gas show.
	500.5–576.7mRF (1642–1892ftRF). Guelph gas, 232 $10^3 m^3$/D (8.2 MMcfd), 2820kPa (409 psig) SIP.
	576.7–586.1mRF (1892–1923ftRF). Guelph oil show.
Comments:	Buildup ran from July 29^{th} to Aug 19^{th} shows reservoir pressure of 216 kPag (31.3 psig) at 537.0mGd.

Volumes:

339mm (13 3/8") capacity:	. 0806m^3/m
339mm/273mm annulus:	.0221 m^3/m
273mm (10 ¾") capacity:	.0512 m^3/m
273mm/219mm annulus:	.0135 m^3/m
273mm/60.3mm annulus:	.0483 m^3/m
219mm (8 5/8") capacity:	.0332 m^3/m
219mm/178mm annulus:	.0084 m^3/m
219mm/60.3mm annulus:	.0304 m^3/m
178mm (7") capacity:	.0211 m^3/m
178mm/114mm annulus:	.0109 m^3/m
178mm/60.3mm annulus:	.0183 m^3/m
114mm (4 ½") capacity:	.0085 m^3/m

114mm/60.3mm annulus:	.0056 m^3/m
60.3mm (2 3/8”) capacity:	.0020 m^3/m

Purpose: Pressure test the 7” casing, run a bond log to check for cement top. Assuming the 7” casing below the cement top is in poor condition, the well will be plugged.

Program

1) Move on service rig complete with tank for swabbing. Rig up completely and lay steel line from wellhead to swab tank. Bleed off any pressure from casing.

2) Remove split flange which is centering the 7” collar on the larger casings. Look carefully down annulus outside 7” collar for indications of 8 5/8”, 10 ¾”, and/or 13 3/8” casings close to surface. There is no records of any of these casings being pulled and recovered. Remove all fittings, swages, and valves down to the 7” collar. Run in small siphon strings down outside of 7” collar to check for casings prior to rigging up BOP’s. Install 178mm pin down tubing head, crossover flange and BOP’s on 178mm collar. Function test BOP’s.

3) Drift, tally, and RIH 60.3mm tubing w/psn and 178mm casing scraper on bottom to 370mRF. Watch weight indicator for indications of fines or junk on casing that might indicate poor quality 7” casing. POOH tubing and lay down casing scraper.

4) Make up and RIH retrievable 178mm bridge plug on tubing and set at 370mRF. POOH tubing. Dump 2 sacs sand on bridge plug to protect retrieving head.

5) Fill up 7” casing above bridge plug with water. Hole volume for fillup is 7.8m^3. Let air escape from casing, then pressure test casing above bridge plug to 500 psi. If pressure bleeds off quickly or if the casing cannot be filled up because water is feeding through a hole in the casing into an uphole aquifer, the program may be modified and the well potentially plugged. The balance of the program assumes the pressure test fails, the well is deemed to not be convertible to an observation well, and the wellbore is to be plugged.

6) Rig up Weatherford Wireline to run CBL log on 7” casing. Run CBL from bridge plug to surface to check for cement top. POOH Wireline and release Weatherford.

7) RIH bridge plug retrieving tool on tubing to sand above bridge plug. Reverse circulated sand from bridge plug. Once sand is removed from well, latch onto and release bridge plug. POOH and rack tubing and lay down bridge plug.

8) RIH open ended tubing to above the well plug-back depth of 565mGd. Do not tag PBTD. Rig up cementers, then mix and pump 5.8 t Class G + 2%$CaCl_2$ plus cemnet down tubing, displaced with .75 m3 water to place a balanced plug from PBTD to 30m above the A2 Anhydrite cap rock at 456mRF (50% excess). Pull up tubing to at least 200m, WOC for at least 4 hours or until cement samples are hard, then RIH and tag Plug #1 at or above 426mRF. If tag is below 426m, top up Plug #1 to ensure tag is at least at 426m or shallower.

9) Circulate well to water, then close in pipe rams and pressure test open hole section and plug #1 to 7MPa for 10 minutes.

10) Pull up tubing to 385mRF. Mix and pump plug #2: 31 sacs Class G as a 30m plug across the base on the 178mm casing (50% excess) displaced with .6 m_3 water. If the CBL on the 178mm casing indicated the cement top above the Silurian G Shale, pull up tubing to 290mRF then mix and pump Plug #3: 21 sacs Class G as a plug across from the top of the Salina section in the well, displaced with .4m^3 water. If the CBL on the 178mm casing showed the cement top below 280mRF, POOH tubing. In this case, the top of Salina plug will be set in open hole and across the 219mm casing seat once the 178mm casing is cut and retrieved.

11) Dig around wellhead at surface to expose casings outside 7” casing. If necessary, install joints to tie casings back to near ground level. If 8 5/8” casing is present, tie casing back to ground level and install an 8 5/8” casing head. If 10 ¾” casing is present, tie casing back to ground level and install a 10 ¾” casing head.

12) Rig up Weatherford Wireline. RIH 178mm casing cutter tool and correlate to CBL log run earlier. Position cutter above 178mm cement top and part 178mm casing. POOH wireline. Confirm 178mm casing is free prior to releasing Weatherford, then release Weatherford. POOH and lay down 178mm casing from above part. Note: If cement top from CBL log is below G Shale top at 280mRF, part and retrieve 178mm casing prior to setting plug #3 and set plug #3 as a 50 sac Class G plug across from the Silurian G top from 290 – 260mRF (50% excess) in open hole, displaced with .4m^3 water.

13) Rig up Weatherford Wireline. RIH 219mm casing cutter tool and position below the 273mm casing seat at 130mRF. Cut casing and POOH cutting tool. Rig out Weatherford. Attempt to POOH and lay down 219mm casing from above cut. With karsting and rubble zones in the Bayfield area, it is possible the 219mm casing will not be free above the casing cut. If the casing cannot be retrieved, Plug #4 will be set as a 51 sac cement plug spotted above the casing cut and squeezed through the cut to isolate the zones below the 273mm casing seat with a 30m

plug (10% excess). If the casing can be pulled, POOH and lay down 219mm casing from above cut, then RIH open ended tubing and set Plug #4 as a 30m long open hole plug with 56 sac cement. POOH tubing, WOC, and tag cement above 110m.

14) If 219mm casing could not be retrieved in step 13, rig up Weatherford and re-cut 219mm casing at 60m. POOH cutting tool. POOH and lay down 219mm casing from above casing cut.

15) Rig up Weatherford. RIH .5m perf gun and perforate 273mm casing just below the bedrock top at 55m. POOH perf gun and rig out Weatherford. RIH open ended tubing to 55m and mix and spot Plug #5 with 80 sacs Class G (30m plug with 10% excess). POOH tubing, install swage on 273mm casing at surface, and squeeze cement through perfs into 340mm/273mm annulus to seal off the annulus across from the bedrock top. WOC and tag this plug above the perfs at 55m.

16) Dig around wellhead at surface and expose all casings. Cut off casings 1.5m below ground level. Use bags from cement jobs to create a bridge between the casing annulus and install a 1 meter cement plug inside all casings.

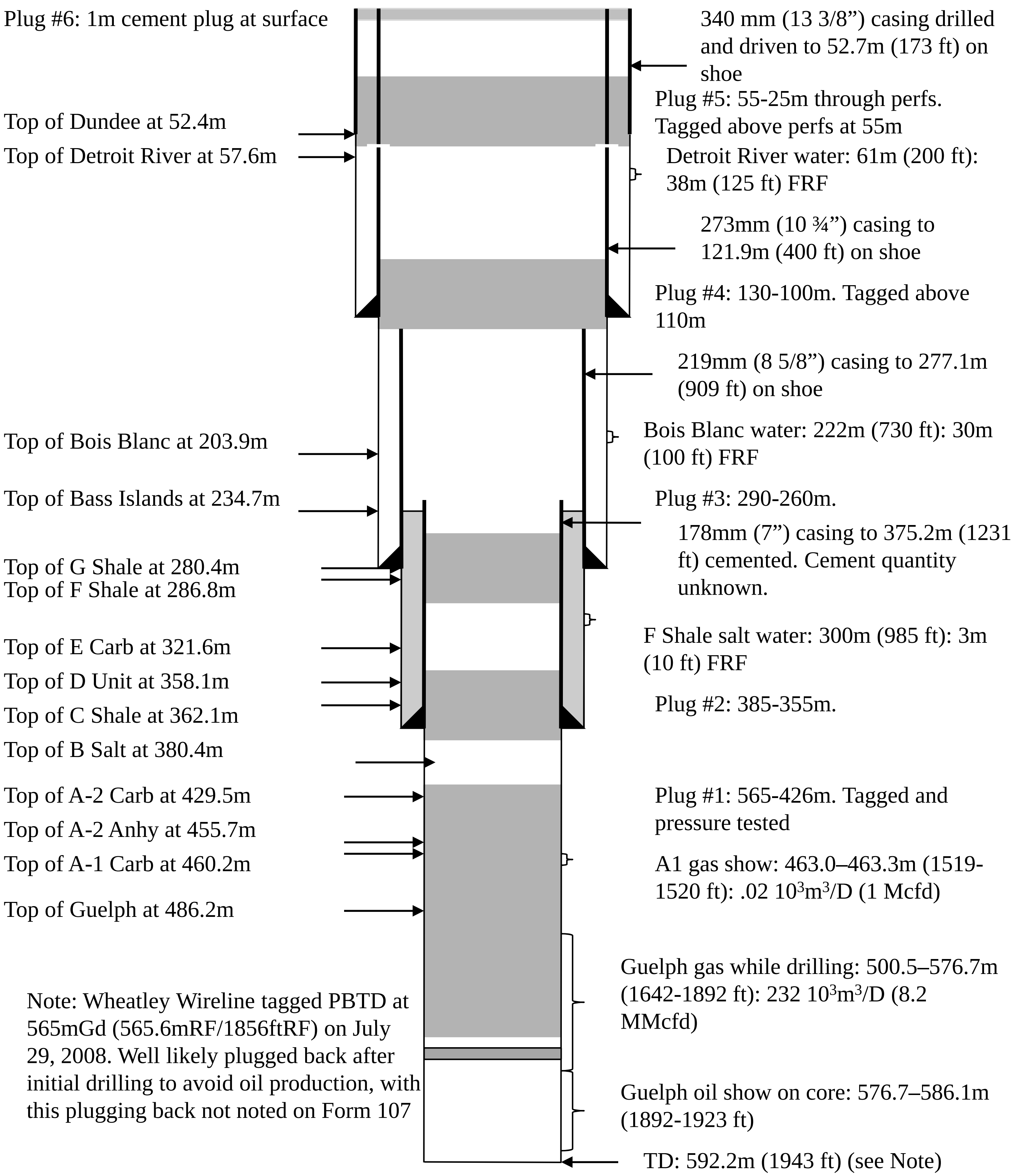
17) Move off service rig and restore location.

Contact phone list:

Tribute:			
Daily reports:	Bothwell office:	(519) 695-3811	
Supervisor:	Jim McIntosh:	(519) 878-1006	
	Peter Miller:	(519) 671-0876	
	Ron Livingston:	(519) 359-1106	
London office:	Bill Blake:	(519) 871-0334	
	Jane Lowrie:	(519) 871-0876	
Cementers:			
Schlumberger:	Bill Partanen:	Office:	(519) 652-5053
		Cell:	(519) 660-9186
	Jay	Cell:	(519) 494-5292
Loggers:			
Baker Atlas:	Yomi Obiri:	Office:	(519) 332-8030
		Cell:	(519) 339-6783
Weatherford:	Dave Tipping:	Office:	(877) 683-5070
		Cell:	(519) 436-3541
Bits, mills, stage tools, scrapers, etc:			
Holland Testers:	Dale Holland:	Cell:	(519) 322-8015
	Derrick Holland:	Cell:	(519) 322-8439
Beaver Oil Tools:	Don Falkner:	Cell:	(740) 360-2000
Overshot casing tools, patches:			
Weatherford:	Andrew Fisher:	Office:	(780) 955-7933

Wellbore Schematic Diagram

Bluewater Porter #1: Stanley 7-BRN Wellbore after Plugging



Assessment of Neighboring Activities

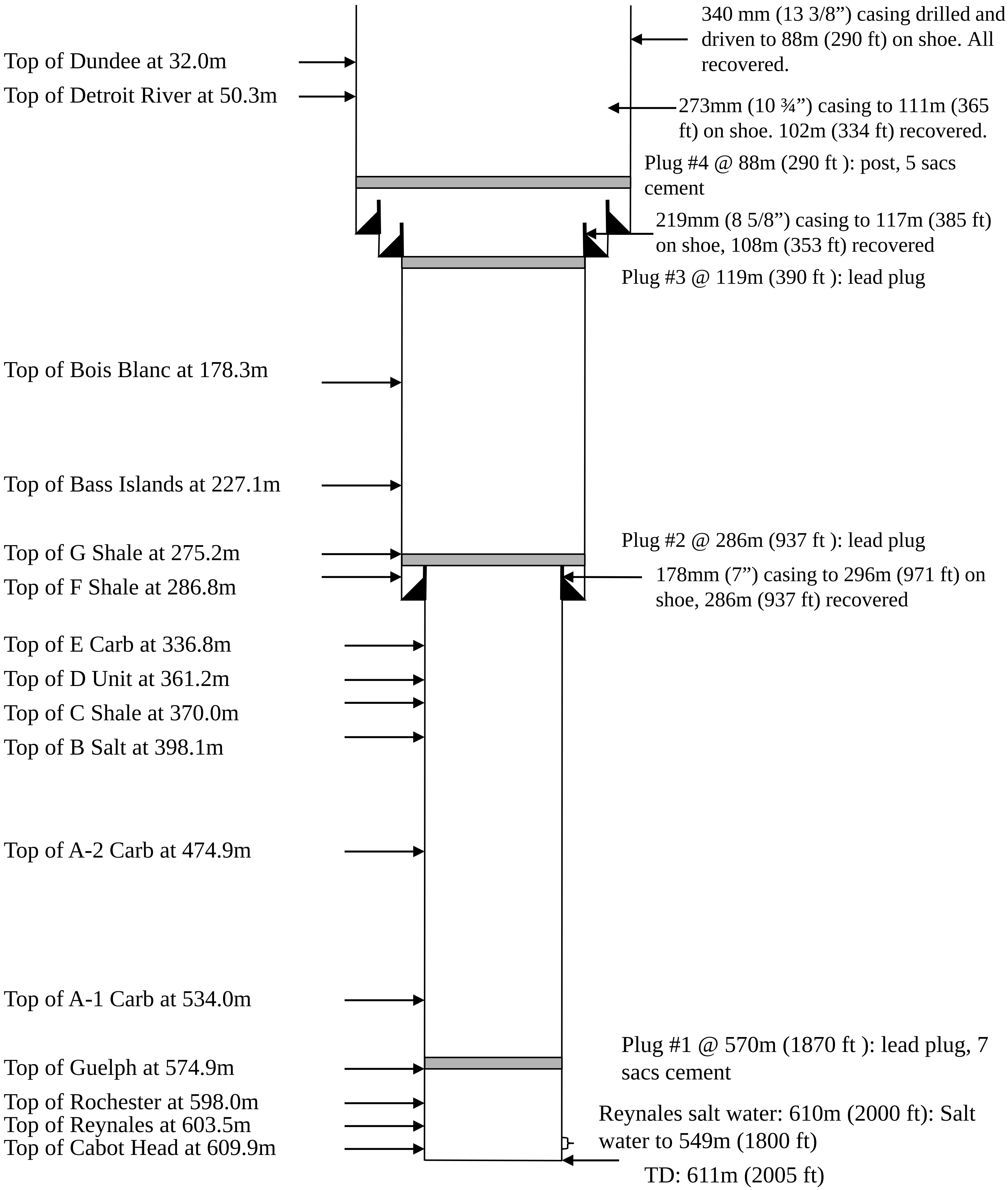
Bayfield Pool Development

Appendix B

Well Information on Wells Within 1 kilometer of the Storage Zone

Wellbore Schematic Diagram

Imperial 523 – Weston #1: Stanley 10-RCB Wellbore



Tab D

Bayfield Pool
Wells and Connecting Pipelines
Summary

The Bayfield Pool currently consists of Bluewater Oil and Gas – Porter No. 1, Stanley 8-7-NBR and Bluewater Oil and Gas – Grainger No. 1, Stanley 9-8-NBR. Both of these wells will be upgraded to CSA Z341-06 gas storage standards and will be utilized as either Observation wells or Injection/Withdrawal (I/W) wells.

Bayfield Resources Inc. (Bayfield Resources) plans to drill Bayfield Resources et al #1, Stanley 9-7-NBR to obtain a core of the Silurian A2 Anhydrite for stress analysis. To increase the deliverability potential from this I/W well, a horizontal drainhole, Bayfield Resources et al #1 (Horiz. #1), Stanley 9-7-NBR will be drilled from the vertical wellbore to increase the porosity contacted by the well. Bayfield Resources et al #2 (Horiz. #1), Stanley 9-8-NBR will be drilled as the second I/W well for the pool, with a lateral, Bayfield Resources et al #2 (Horiz. #1-Lat. #1), Stanley 9-8-NBR drilled from the horizontal drainhole in the well to increase the deliverability potential of the well.

The I/W wells, Bayfield Resources et al #1, Bayfield Resources et al #1 (Horiz. #1), Bayfield Resources et al #2 (Horiz. #1), Bayfield Resources et al #2 (Horiz. #1-Lat. #1) and possibly Bluewater Oil and Gas – Porter No. 1 will be tied into the Pool Meter, Pressure, and Volume Control station (the “PMPVC Station”) at the Bayfield Pool site with NPS 8 pipeline as the gathering system for the pool. The PMPVC Station will interconnect with the Bayfield Pipeline Corp. gas transmission system, which connects the Bayfield and Stanley 4-7-XI pools through a compressor/dehydrator station near Zurich to the Union Gas transmission system at the Lobo compressor station.

Nearby ground water well monitoring and reservoir monitoring programs are discussed in Tab D, Sections 6 and 7 respectively.

D 2-1

Application for Well License

Bayfield Resources et al #1, Stanley 9-7-NBR

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Oil, Gas and Salt Resources Act

Phone Number of Landowner

Ministry of Natural Resources / Ministère des Richesses naturelles
Ontario

Application for a Well Licence

Form 1

To the Minister of Natural Resources

v.2000-08-18

The undersigned operator applies for a well licence under the Oil, Gas and Salt Resources Act and the Regulations thereunder and submits the following information, together with the application fee of $100 + 7%GST.

1. WELL NAME **Bayfield Resources et al #1, Stanley 9-7-NBR** Target Formation Guelph

Purpose of Proposed Well (Well Type) Injection/Withdrawl

2. NAME OF OPERATOR Bayfield Resources Inc. Tel # 519-657-2151

Address 309 Commissioners Rd. W. Unit E, London, ON, N6J 1Y4 Fax # 519-657-4296

3. LOCATION County Huron Township Stanley

Tract **9** Lot **7** Concession **NBR** Lake Erie: Block ____ Tract ____

Lake Erie licence or lease number ____

Bottom-hole location Bottom-hole Latitude N43 32' 59.414" Bottom-hole Longitude W81 39' 20.192"

Surface location metres from Lot Boundaries 172.15 m North [X] South [ ] Latitude N43 32' 59.414"

43.25 m East [ ] West [X] Longitude W81 39' 20.192"

Within 1.6 km of Designated Storage Area? Yes [ ] No [X] Off-target? Yes [X] No [ ]

4. WELL PARTICULARS Vertical [X] Horizontal [ ] Directional [ ] Deepening [ ] Re-entry [ ] Lateral [ ]

Rig Type: Rotary [X] Cable [ ] Well to be cored? Yes [X] No [ ] Formation at TD Rochester

Ground Elevation 244.4 Proposed Depth 600m Proposed Depth TVD 600m Proposed Start Date 1-Jan-10

5. LANDOWNER Stephen Eilers Tel # 519-236-4408

Address 73418 Blind Line, RR#1, Zurich, ON, N0M 2T0

Spacing unit shown on attached survey plan is pooled (see O.Reg.245/97 definitions: "pooled spacing unit") Yes [X] No [ ]

6. DRILLING CONTRACTOR (if known) unknown

Address

7. PROPOSED CASING AND CEMENTING PROGRAM

Hole Size (mm)	Casing O.D. (mm)	Weight (kg/m)	Grade	New, Used or in-hole	Setting Depth TVD	Setting Formation	CASING SETTING INFORMATION: How Set	Cement Type	Cement Top KB / RF
508	406	96.7	H-40	New	57m	Bedrock-Dundee	Cement	RFClight	surface
384	340	81.10	LS	New	120m	Detroit River	Cement	RFClight/G	surface
311	244	53.6	J55	New	295m	F-Shale	Cement	RFClight/G	surface
222	178	29.76	K55	New	480m	Guelph	Cement	G	surface

8. BLOW-OUT PREVENTION EQUIPMENT 11" blind and pipe rams, 2000 psi annular preventor, rotating head spool and valves fill-up and flare lines (or equivalent to meet standards).

9. WELL SECURITY

Name of Trustee Giffen & Partners Address 465 Waterloo Street, London,Ontario N6B 2K4

Tel # 519-679-4700 Fax # 519-432-8003 Total # unplugged wells 0 Current Balance $56,000

10. REMARKS

Well in Unitized Stanley 7-BNR Pool (Bayfield Pool)

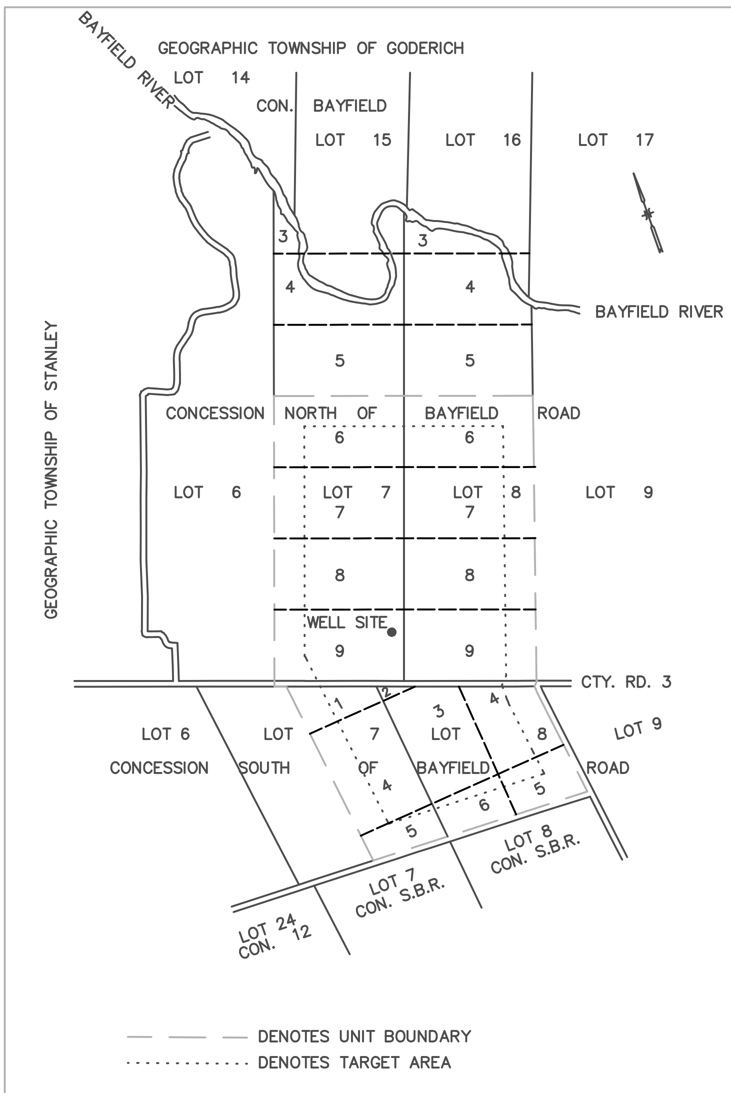
Well required to obtain stratigraphic information (cap rock core, etc) necessary for completing DSA application.

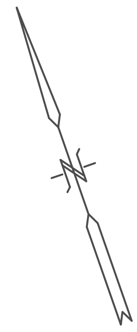
11. ENCLOSURES: Fee [X] Location Plan [X] (Land wells only) Drilling Program [X]

12. AUTHORITY: The undersigned certifies that the information provided herein is complete and accurate, the operator has the right to drill or operate a well in the above location, and he/she has authority to bind the operator.

Date 15-Sep-09 Name J. Lowrie Signature J Lowrie

Date of Birth Feb. 12, 1955. Title President



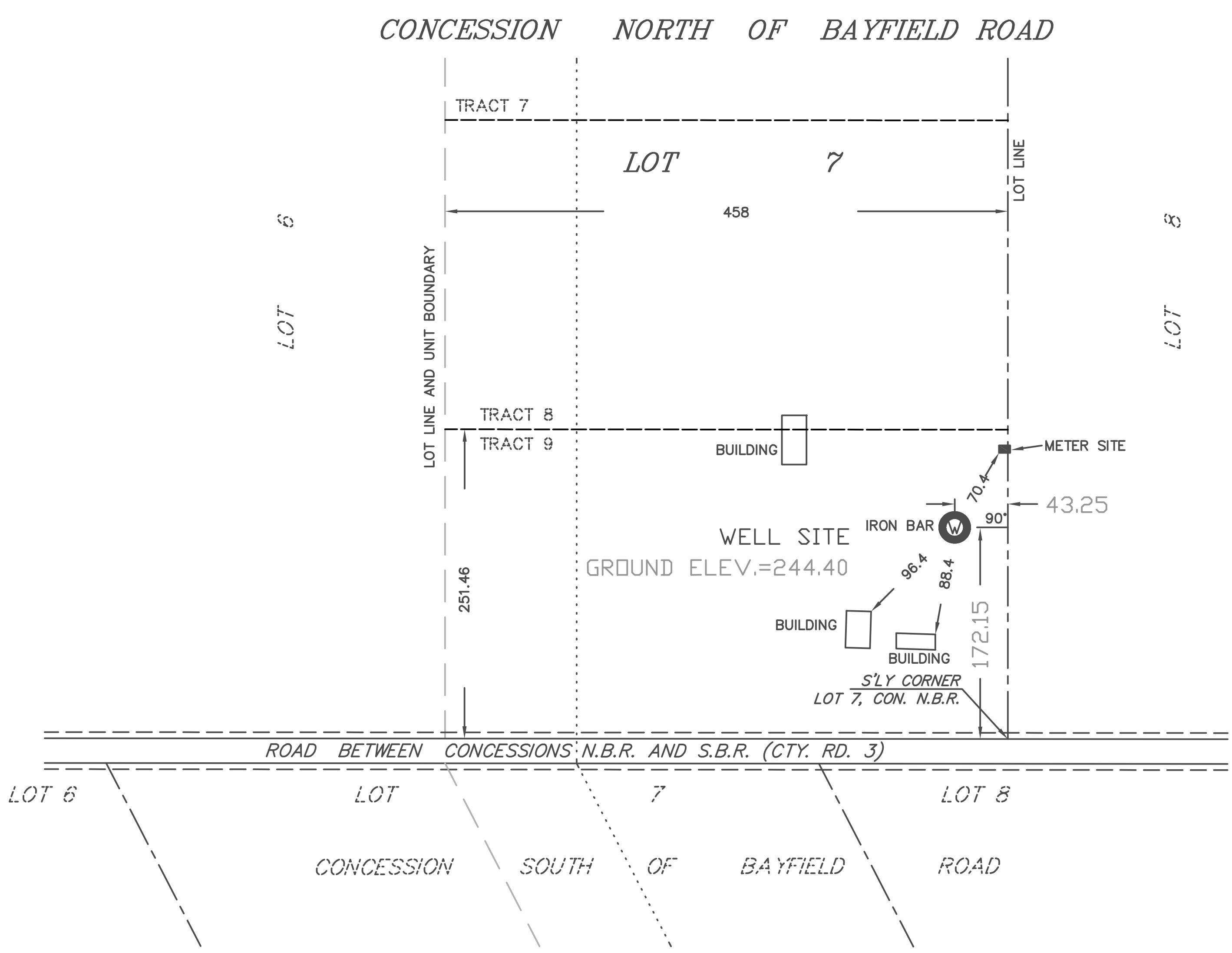


PLAN OF PROPOSED WELL
LOT 7
CONCESSION NORTH OF BAYFIELD ROAD
GEOGRAPHIC TOWNSHIP OF STANLEY
MUNICIPALITY OF CENTRAL HURON
COUNTY OF HURON

SCALE 1:5000

WELL NAME
BAYFIELD RESOURCES et. al. #1 – STANLEY – 9 – 7 – N.B.R.

NOTE (WELL SITE) CO-ORDINATES
LATITUDE N.43°32'59.414" LONGITUDE W.81°39'20.192"
U.T.M. N.4 822 085.0 E.447 041.3



— — — DENOTES UNIT BOUNDARY
.... DENOTES TARGET AREA

NOTE GEODETIC HORIZONTAL CONTROL
U.T.M. CO-ORDINATES ARE GEODETIC (DATUM NAD 83)
AND REFERRED TO MONUMENTS
00819711196 AND 00819711197

NOTE BENCH MARK
ELEVATIONS ARE REFERRED TO GEODETIC DATUM AND
REFERENCE BENCH MARK BEING
MONUMENT No.72U095 BAYFIELD
ELEVATION = 199.914

NOTE METRIC
DISTANCES SHOWN ON THIS PLAN ARE IN METERS AND
CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

PREPARED BY
BRISCO AND O'ROURKE
1425331 ONTARIO LIMITED
SERVING THE PETROLEUM INDUSTRY
THROUGHOUT ONTARIO
WELLS,CONSTRUCTION AND TECHNICAL SURVEYING
DIGITAL MAPPING
LAND AND LEASE SURVEYS
OFFICE (519) 351-5073
CELL (519) 401-5073
FAX (519) 351-3119
P.O.BOX 327 – N7M-5K4
CHATHAM , ONTARIO

PREPARED FOR
BAYFIELD RESOURCES INC.

FILE NO. 09-4926	PLAN NO. BAY6260.DWG

SEPTEMBER 16, 2009

TIMOTHY J. O'ROURKE C.S.T. A.C.E.T.

AUTHORIZED BY THE MINISTER OF NATURAL RESOURCES
UNDER THE PETROLEUM RESOURCES ACT OF ONTARIO

BAYFIELD RESOURCES ET AL #1
STANLEY 9-7-NBR

DRILLING PROGRAM
(Version 2: 178mm 20m into reef)

TABLE OF CONTENTS

SECTION 1.0 – GENERAL DATA

Section 1.1 – Well Summary

Well Name:	Bayfield Resources et al #1 Stanley 9-7-NBR
Operator:	Bayfield Resources Inc.
Surface Hole Location:	Lot 7, Concession North Bayfield Road, Stanley Township, Huron County
Surface Hole Coordinates:	172.15m North; 43.25m West Lat: N43^o 32’ 59.414”, Long: W81^o 39’ 20.192”
Bottom Hole Location:	Lot 7, Concession North Bayfield Road, Stanley Township, Huron County
Bottom Hole Coordinates:	172.15m North; 43.25m West Lat: N43^o 32’ 59.414”, Long: W81^o 39’ 20.192”
Ground Elevation:	244.4m
KB Elevation:	248.0m
Total Depth:	569mKB
Target Formation:	Guelph
Logging Program:	CBL-Gr – 340mm csg and 245mm csg CNL-Z Density-Gr-Cal on 2nd intermediate hole and main hole, Gr-Neutron to surface.
Cored Interval:	A2 Anhydrite: Estimated cored interval: 458 – 467mKB
Spud Date:	Unknown

Section 1.2 – Potential Problems

1) There are gravel, boulders, and sand in the overburden that will cause hole cleaning problems and may contain fresh water. The glacial till must be shut off with the conductor casing or a cement squeeze or problems will be experienced drilling the surface hole. The gravel and sand zone is from surface to the top of the bedrock at 57 meters.

2) The bedrock surface is karsted and fractured so the wellbore face will not likely support a column of fresh water. Fluid losses should be expected. If the uphole gravels and sands are not completely shut off with the conductor casing and/or cement squeezes prior to entering the bedrock, the gravels and sands could be pulled into the hole once the lost circulation is encountered, with potential stuck drill string and casing running problems.

3) Local fresh ground water wells withdraw from about the 220 to 240 ft (67 to 73m) depth at the bedrock surface and in the Dundee. The aquifer transition from fresh water to sulphur water is within the top of the Lucas formation. The surface hole needs to be TD'd prior to entering the sulphur water, yet below all potable water. Stop drilling surface hole at any indication of sulphur water or at 120m, whichever is shallower.

4) There is potential for hole caving and instability from the bedrock surface to about 160m due to karsting. Depending upon the severity of the caving/hole instability, consideration will be given to cement squeezes and/or plugging the hole back in stages, to provide stability to the hole and to reduce losses during the cementing of the casing.

5) There is potential for loss circulation while cementing the 340mm and 245mm casings. Depending upon the severity of the problem, consideration will be given to running 200%± excess cement.

6) Up to 50 meters of B Salt will be present while drilling through the Salina section. The drilling fluid will need to be switched to saturated brine prior to drilling this section of the well if fluid drilling is used.

7) Due to the low reservoir pressure, loss circulation may be encountered while drilling through the Guelph reef. The saturated brine used to drill the 2nd intermediate hole will need to swapped out for fresh water to minimize hydrostatic on the porosity in the reef. If loss circulation is experienced while drilling the 159mm main hole, haul in additional fluid to keep up with losses rather than trying to heal up the loss circulation with LCM material. Since the Guelph reef is the target, we cannot plug up permeability with LCM material with the hope of being able to remove the LCM material during completion operations.

8) The well is to be cased as a vertical well with 178mm casing set about 20m below the cap A2 Anhydrite in the salt plugged A1/Guelph. If any gas shows are encountered or lost circulation experienced within the top 20m of the Guelph, the 2nd intermediate hole will need to be TD'd at that depth and 178mm casing installed there.

Section 1.3 – Contact Numbers

Bayfield Resources Inc.

Jane Lowrie	-	President	-	Office (519) 657-2151 Fax (519) 657-4296 Mobile (519) 871-9096
Neil Hoey	-	Geologist	-	Office (519) 472-4776 Fax (519) 472-4776 Mobile (519) 649-6918
Jim McIntosh	-	Supervisor/Examiner	-	Office (519) 657-2151 Fax (519) 472-7897 Mobile (519) 871-9542

Schlumberger Well Services

Jay Rookes	-	Cell Leader	-	Office (519) 652-5053 Fax (519) 652-6002 Mobile (519) 494-5292

Holland Water Hauling Ltd.

Cliff Holland	-	Owner/Operator	-	Office (519) 798-3929 Mobile (519) 524-0824

Wellmaster Pipe and Supply

Bill Hedges	-	Sales	- `	Office (519) 688-0500 Fax (519) 688-0563

Government & Other Agencies

MNR	-	Petroleum Resources	-	Office (519) 873-4634 Fax (519) 873-4645
MOE	-	Spills Reporting	-	(800) 268-6060
MOL	-	Health & Safety	-	(800) 265-1676
OPP	-	Communication Center		(800) 265-7191 911

Section 2.0 – Geological Prognosis

Well: Bayfield Resources et al #1

Location: Stanley 9-7-NBR

Ground Elevation: 244.4 m

KB Elevation: 248.0 m

Geological Formation	Formation Depth (mMD)	(mTVD)	Elevation (m ss)	Thickness (mTVD)	Fluid Type	Fluid Depth (mFRF)	Oil/ Gas	Depth (mTVD)	Pressure (kPa)
Drift	3.6	3.6	244.4	51.8					
Dundee	55.4	55.4	192.6	5.2	Fresh	65			
Lucas	60.6	60.6	187.4	146.3					
Bois Blanc	206.9	206.9	41.1	30.8	Sulphur	226			
Bass Islands	237.7	237.7	10.3	45.7					
G Unit	283.4	283.4	-35.4	6.4					
F Unit	289.8	289.8	-41.8	34.8	Salt	300			
E Unit	324.6	324.6	-76.6	36.5					
D Unit	361.1	361.1	-113.1	4.0					
C Unit	365.1	365.1	-117.1	18.3					
B Salt	383.4	383.4	-135.4	49.1					
A-2 Carbonate	432.5	432.5	-184.5	26.2					
A-2 Anhydrite	458.7	458.7	-210.7	4.5					
A-1 Carbonate	463.2	463.2	-215.2	0.0					
Guelph	463.2	463.2	-215.2	105.8			Gas	500-569	
Total Depth	569.0	569.0	-321.0						

Section 3.0 – Casing and Cementing Summary

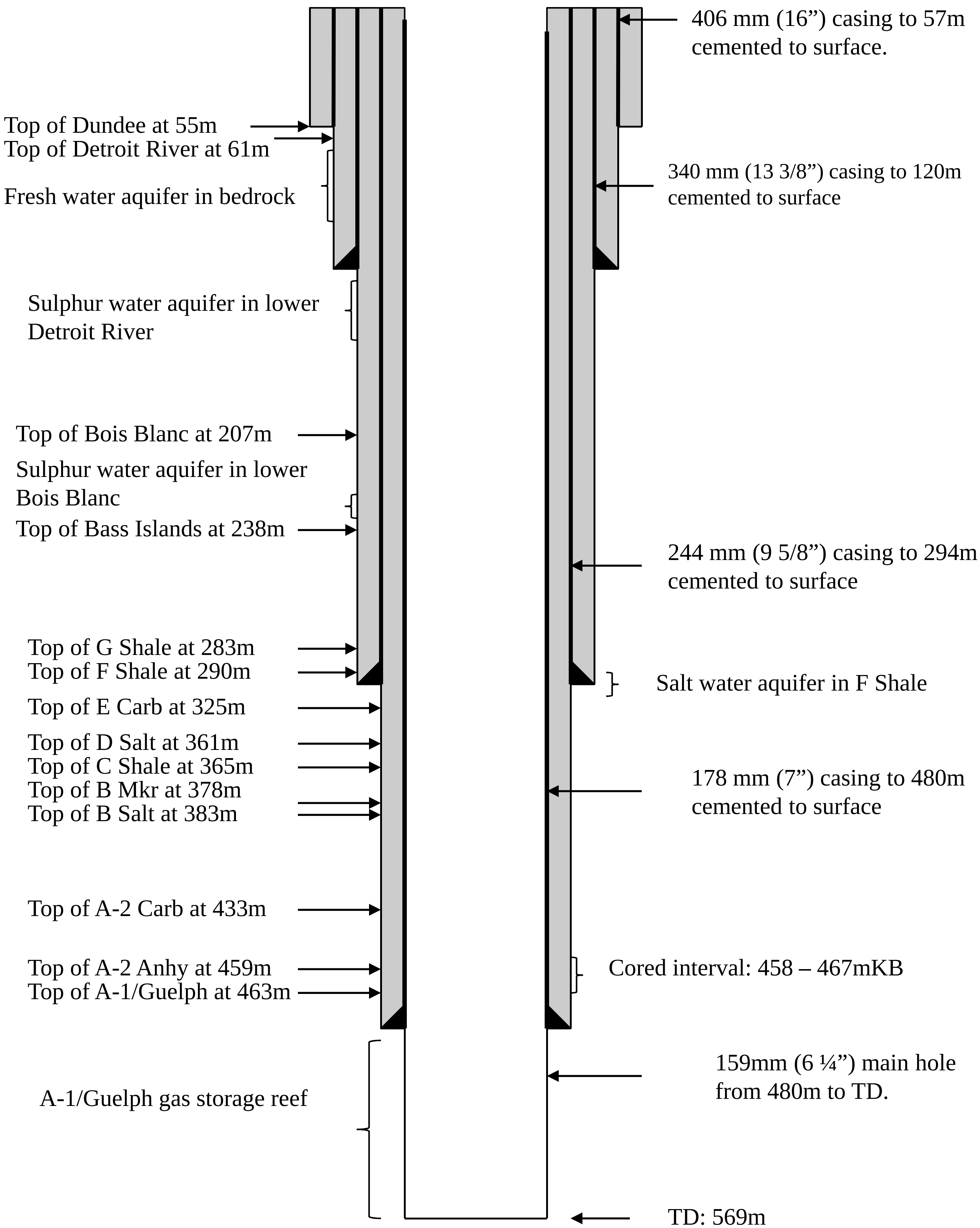
Section 3.1 - Summary

Hole Size (mm)	Casing Size (mm)	Casing Grade	Casing Weight (kg/m)	Setting Depth (mKB)	How Set
508	406	H-40	96.7	57	Cemented to surface with RFC Light plus 2% $CaCl_2$ plus Cemnet. Cement volumes will be calculated with a minimum 200% excess.
384	340	LS	81.1	120	Cemented to surface with RFC Light plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$ plus Cemnet. Cement volumes will be calculated with a minimum 200% excess. Top squeeze or spaghetti string the annulus if cement returns not received on main job.
311	244	J-55	53.6	295	Cemented to surface with RFC Light plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$. Cement volumes will be calculated with a minimum 150% excess on the RFC Light cement and a minimum 50% excess on the neat cement.
222	178	K-55	29.76	480	Cemented to surface with Class G 0-1-0% plus 20% salt tailed in with Class G 0-1-0% plug 2%$CaCl_2$. Cement volumes will be calculated with a minimum 50% excess. Depending upon hole conditions, consideration may be given to running gel cement across porous zone(s).

Main Hole: The 159mm main hole will be drilled from the 178mm casing seat to the vertical well total depth of 569m. A retrievable whipstock will be set inside the 178mm casing below the Guelph top and a horizontal drainhole will be drilled from there to intersect additional porosity and permeability. The drilling program for this horizontal drainhole is included in the Bayfield Resources et al 1 (Horiz. #1) drilling program.

Wellbore Schematic Diagram

Bayfield Resources et al #1: Stanley 9-7-NBR Wellbore



Section 4.0 - Drilling Procedures

Section 4.1 - PreSpud

1) Fresh Water Well Samples

Samples from fresh water wells will be taken in compliance with Bayfield Resources Inc.'s fresh water well sampling policy as developed by Stantec. Ensure that copies of these reports are sent to the London office and to Eastern Oilfield Services' office in Bothwell.

2) Site Preparation

Prepare drilling location as follows:

a) Locate all drainage tiles crossing lease area.
b) Strip and properly stock pile all soil from the lease
c) Cut, block, and divert drainage tiles as required
d) Install fabric and stone to ensure minimal mud is tracked from the location in times of inclement weather.
e) Construct adequate berms around lease and access road as required.

Install an 1800mm by 2 meter long vertical culvert to stabilize the surface ground around the well.

3) Government Notification of Spud

48 hours prior to spud, notify the Ministry of Natural Resources – Petroleum Resources Section by fax @ (519) 873-4645 of the date of commencement of drilling operations.

4) Signs

Install rig signs on access road to lease.

5) Safety Meeting

Conduct a pre-spud safety meeting with each rig. Toolpush and all crew members must be present. A similar meeting shall be conducted with the remaining crew(s) as they come on duty. Additional safety meetings shall be conducted at the Well Site Supervisor's discretion.

Section 4.2 - Conductor Casing

1) Drilling Method

Move in and rig up water well pull-down rig. Mix up viscous spud mud with bentonite gel and hook up air pack. Drill 508mm conductor hole to bedrock top, to an approximate depth of 57m. Note any occurrence of water flows or fluid losses. Only drill into bedrock sufficient distance to obtain a casing seat. Work each joint sufficiently to stabilize that part of the conductor hole prior to making the next connection. Once conductor TD is reached and the hole is stable, dummy trip drill string to ensure the continued stability of the hole for running conductor casing.

2) Cement Squeeze (if necessary)

If major loss circulation or water flows are found in the drift and are not healed with the bentonite gel or if the sands and gravels become unstable, a lost circulation rate with drilling mud will be established and a cement squeeze will be performed, using the cement volumes determined by the Well Site Supervisor. WOC 12 hours and drill past the cement squeezed zone and monitor the mud returns to determine if the lost circulation or hole instability has been healed. If necessary, the process will be repeated until full circulation is regained.

3) Casing Installation

Once the conductor hole is stable, RIH 406mm conductor casing, welding each joint. Cut a mule shoe on bottom to assist in rotating in the casing if rotating becomes necessary to reach bedrock. Once bedrock is contacted, rotate casing sufficiently to obtain at least a partial seat. With the casing seated, carefully attempt to pump water down the inside of the 406mm casing to see if circulation can be obtained. If circulation can be obtained, cement in the conductor casing by pumping sufficient cement to cement the 508mm hole/406mm casing to surface with RFC Light cement plus Cemnet with 200% excess displaced with water to within 5 meters of the bedrock top. If cement returns are not received at surface, the annulus between the cement top and surface will be filled with bentonite pellets to secure the conductor. Wait on cement 12 hours to allow RFC to gain as much compressive strength as possible.

Section 4.3 - Surface Hole & Surface Casing

1) Drilling Method

Drill a 384mm hole to approximately 120m to drill past all possible fresh water zones with gel mud and/or air as required. Ensure the drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Record on daily drilling reports any lost circulation zones and associated static levels and any unusual hole conditions. If lost circulation is encountered, cement squeezes may be necessary to seal off the zone sufficiently to ensure a successful surface casing cement job. If sulphur water returns or sulphur water smells are noted prior to reaching the projected 120m surface hole total depth, stop drilling immediately and install the surface casing at that depth. Dummy trip the drill string up to the conductor casing prior to pulling out to run surface casing.

2) Cement Squeeze (if necessary)

If major loss circulation is found in the karsted Dundee and Lucas and is not healed with the bentonite gel, an injection rate will be established and a cement squeeze will be performed, using the cement volumes determined by the Well Site Supervisor. WOC 12 hours and drill past the cement squeezed zone and monitor the mud returns to determine if the lost circulation has been healed. If necessary, the process will be repeated until full circulation is regained.

3) Casing Installation

Depending upon hole conditions encountered, the 340mm casing will be run in the following manner:

- Guide Shoe
- Centralizers coincident with the shoe of the conductor casing
- 340mm casing to surface
- Thread lock guide shoe and top of 1st joint.

Move in and rig up cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Chain the surface casing and elevators to the rig floor to prevent/minimize hydraulicing. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using the rig pump. The casing and the hole will be circulated with fresh water by the water well rig for 15 minutes to clean the borehole. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 2.0m3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle, and end of the cement job. Mix and pump RFC Light plus Cemnet plus 2% $CaCl_2$ lead cement followed by Class G 0-1-0% neat cement plus 2% $CaCl_2$. A minimum of 200% excess RFC cement and 200% excess neat cement will be pumped to ensure that the 340mm casing is cemented to surface. Displace cement with sufficient water to have cement top inside 340mm casing about 5m above shoe. Close valves and bleed off surface line pressure. Wait on cement at least 12 hours before slacking off casing and checking level in the 406mm/340mm annulus.

Section 4.4 - 1st Intermediate Hole & Intermediate Casing

1) Annular Cement Level Check

If cement is not visible at surface between the 406mm and 340mm casings, run in annulus with spaghetti string and determine the cement top. Move in and rig up cementers and grout annulus to surface with cement. The wait on cement time will be extended a further 48 hours to compensate for pumping of the additional cement. Once 406mm/340mm cement top is at surface, rig out and move off water well pull-down rig.

2) Move on and rig up rotary drilling rig

Move on and rig up rotary drilling rig to drill the balance of the well. Rig up completely. Measure and record the distance from KB to ground and the KB elevation – include these measurements on the daily reports and the next morning report. If necessary, cut 340mm casing stickup and weld on a slip-on weld-on collar, then install a 340mm 8rd by 346mm 14MPa casing bowl at surface. Ensure 60mm side outlets on casing bowl have XH nipples and valves installed.

3) BOP Installation

Monitor cement samples for hardness. If cement samples are set to the satisfaction of the Wellsite Supervisor, proceed with the installation of the BOP’s. Install BOP’s on the 346mm 14MPa casing flange as per MNR requirements.

4) Logging

Move in and rig up Weatherford Wireline Inc. With hole full of fresh water, run in hole with cement bond log tool and bond log the 340mm casing cement job. Be prepared to perform a pressure pass if required. Rig out Weatherford Wireline and release.

5) Pressure Testing

All pressure tests will be done using fresh water:

- Pressure test casing, blind rams, HCR, and choke manifold to 3500kPa for 10 minutes each and record the results on the daily drilling reports.
- Run in hole drill string with 311mm bit. Pressure test pipe rams and annular to 3500kPa or as high as possible without hydraulicing out the drill string. Drill out cement and 0.5m of new formation. With the hole full of fresh water perform a pressure integrity test to a bottom hole pressure equivalent to 18 kPa per meter and record results on the daily drilling reports.

6) Drilling Method

Drill a 311mm hole 5m ± into the F Shale formation, to an approximate depth of 295m. Run single shot directional surveys at a minimum every 50 meters to record any hole deviation. Depending upon the severity of loss circulation and/or caving of the hole, consideration will be given to squeezing cement to heal the loss zones and to provide stability to the hole.

Ensure that drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Record on daily reports any influx of fluids (water and/or hydrocarbons), any loss circulation and its rate, and any unusual hole conditions.

7) Casing Installation

Depending upon hole conditions encountered, the 244mm casing will be run in the following manner:

- Guide Shoe
- 244mm joint of casing
- Float Insert or Float Collar
- Centralizers will be installed on the 2nd, 5th, and 8th joint and every 10 joints to surface
- 244mm casing to surface
- Thread lock guide shoe, float collar, and 1st joint.

8) Cementing Procedures

Move in and rig up Cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using rig pump. The casing and the hole will be circulated with fresh water for

15 minutes to clean the borehole prior to cementing. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 3.0m^3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle and end of the cement job. Mix and pump sufficient RFC Light lead cement plus 2%$CaCl_2$ plus Cemnet followed by Class “G” 0-1-0% cement plus 2%$CaCl_2$ plus Cemnet to cement the 244mm casing to surface using 150% excess on the lead cement and 50% excess on the neat cement. Displace cement and bump plug to 3500kPa over final pumping pressure – do not exceed 60% of internal yield pressure of casing. Once plug is bumped, bleed off landing pressure and close cement head valves. Flush out BOP stack to clear stack of cement. Wait on cement at least 12 hours before slacking off casing and checking cement level in the 340mm x 244mm annulus.

Section 4.5 – 2nd Intermediate Hole

1) Annular Cement Level Check

If cement is not visible at surface between the 340mm and 244mm casings, run in annulus with spaghetti tubing and determine the cement top. Move in and rig up cementers and grout annulus to surface with cement. The wait on cement time will be extended a further 48 hours to compensate for the pumping of additional cement.

2) Installation of the BOP’s

Check cement samples for hardness – if cement samples are set to the satisfaction of the Wellsite Supervisor, proceed with rigging up the second intermediate hole BOP’s. Rig out the 346mm BOP’s, unscrew the 346mm 14MPa x 340mm casing bowl, cut off the 244mm casing stickup and install the 244mm slip on/weld on x 279mm 14MPa casing bowl and BOP’s. Install BOP’s as per MNR requirements. Stump test BOP’s prior to installation.

3) Logging

Move in and rip up Weatherford Wireline. With hole full of fresh water, run in hole with cement bond log tool and bond log the 244mm casing. Be prepared to perform a pressure pass if required. Rig out Weatherford and release.

4) Pressure Testing

Pressure test BOP stack using fresh water – do not proceed to the next step until each component of the stack passes the pressure test:

- Pressure test blind rams, kill lines and manifold to 1400 kPa low and 7000 kPa high for 10 minutes each and record results on tower sheets
- Run in hole 222mm drill bit, drill collars, and drill pipe.
- Pressure test pipe rams, Kelly cock, standpipe, swivel, safety valves, etc to 1400 kPa low and 7000 kPa high to 10 minutes each and record results on tower sheets.
- Pressure test annular preventer to 1400 kPa low and 7000 kPa high for 10 minutes and record results on tower sheets
- Drill out cement, plug, and 0.5m of new formation and with the hole full of fresh water, perform a pressure integrity test to a bottom hole pressure equivalent to 18 kPa per meter and record the results on the tower sheets. Drill out as slowly and carefully as possible with a minimum weight on bit.

5) Drilling Method

Drill a 222mm hole to the core point at about 458m as directed by the wellsite geologist. Switch drilling fluid to saturated brine at 350m then continue drilling with saturated brine. Continue to run single point deviation surveys at a minimum every 50 meters. Core point is to be picked by the wellsite geologist. Ensure that drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Drillers will be required to record information regarding connections, depth, drill breaks, down time, etc. and all data regarding operations or changes to operations on the geolograph charts. Record on daily tower sheets any influx of fluids (water and/or hydrocarbons), loss circulation (rate and depth) and any unusual hole conditions.

At the core point, circulate the hole clean, run a deviation survey and strap out of the hole. Pick up 9m core barrel, install 216mm core bit and run in the hole with the coring assembly.

Drop core ball and cut a 9m long core of the A2-Anhydrite cap rock to the Guelph reef. Once core barrel is full, pull up to confirm a core break, then POOH and lay down core. Geologist will inspect core on surface to ensure A2-Anhydrite was cored. If the core was obtained too shallow, re-run core barrel and cut a second 9m core. If core contains A-2 Anhydrite caprock, service and lay down core barrel.

Run in hole 222mm bit, ream past cored interval, then continue to drill into the Guelph reef with a projected 222mm 2nd intermediate hole TD of 480mKB. If fluid losses or gas shows in fluid returns are noted within the Guelph prior to reaching the 480m TD, stop drilling immediately and circulate up cuttings samples. If the samples indicate non-salt plugged porous reef, the 2nd intermediate hole will be TD'd there and production casing run. If no loss circulation or gas shows are noted, drill 222mm hole to 480mKB.

Circulate the hole clean and perform a flow check prior to tripping. Fast tripping of the drill string is to be avoided in order to eliminate high annular velocities, pressure surges and swabbing (maximum rate of 27 meters per minute). Keeping hole full of brine water, trip out of hole racking drill string.

6) Logging

Rig up Baker Atlas wireline unit. RIH Gr-Z Density-CNL log-Cal and log from 222mm hole TD to the base of the 244mm casing. Continue with Gr-CNL to surface. Rig out Baker Atlas.

Section 4.6 – Production Casing & Main Hole

1) Casing Installation

The 178mm casing will be run in the following manner:

- 178mm guide shoe
- 1 joint 178mm casing
- 178mm float collar
- 178mm casing to surface
- Centralizers will be installed on the 1st, 2nd, 5th, and 8th joint and every 10 joints to surface.
- Thread lock guide shoe, float collar and 1st joint.

2) Cementing Procedures

Move in and rig up Cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using rig pump. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 3m^3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle, and end of the cement job. Mix and pump sufficient Class “G” 0-1-0% cement mixed in 20% salt water with a density of 1933 kg/m^3 tailed with sufficient Glass “G” 0-1-0 neat cement with 2% $CaCl_2$, with a density of 1901 kg/m^3 to cement the 178mm casing to surface plus 50% excess and to have the Class G tail cement top up to at least the base of the C Unit. If loss circulation is a concern, consideration will be given to running gel cement across the porous zone(s) or using Cemnet throughout the job. Displace cement and bump plug to 3500kPa over final displacement pressure – do not exceed 60% of internal yield pressure of casing. Bleed casing pressure back, close cement head valves and bleed off surface line pressure. Flush any cement out of BOP’s with water. Wait on cement at least 24 hours before slacking off casing.

3) Installation of the BOP's and Pressure Testing

Once cement samples are set, especially the salt cement samples, slack off 178mm casing, unbutton BOP's, lift stack, set 178mm casing slips in 279mm casing bowl, then cut 178mm casing above casing bowl. Dress cut, install primary packing and secondary seals, then install 279mm 14MPa x 179mm 14MPa casing spool.

Install BOPs as per MNR requirements, including the addition of a rotating head. After BOPs are installed and the cement samples indicate that the cement is competent, the rig will proceed to pressure test the BOPs and the casing and the integrity of the cement at the shoe. All pressure tests will be done using fresh water:

- Pressure test blind rams, kill lines and manifold to 1400 kPa low and 7000 kPa high for 10 minutes each and record results on tower sheets.
- Run in hole with 159mm bit, drill collars, and drill pipe.
- Pressure test casing, pipe rams, annular preventer, Kelly cock, standpipe, swivel, safety valves, etc. to 1400 kPa low and 7000 kPa high for 10 minutes each and record the results on the tower sheets
- Drill out cement, plug and 0.5m of new formation and with the hole full of fresh water. Perform a pressure integrity test to a bottom hole pressure equivalent to 18kPa per meter and record results on the tower sheets. Drill out as slowly as possible with a minimum weight on bit.

4) Drilling Method

Drill the Guelph reef section from 480m with 159mm bit using fresh water to a projected total depth of 569mKB. Monitor returns for signs of excessive fluid losses. If drilling fluid losses are minor, continue to drill ahead. If fluid losses become severe or fluid returns are lost completely, drilling may be stopped or air drilling may be required. At total depth, circulate the hole clean and perform a flow check prior to tripping. Fast tripping of the drill string is to be avoided in order to eliminate high annular velocities, pressure surges and swabbing (maximum rate of 27 meters per minute). Keeping hole full of water, trip out of hole laying down drill string.

5) Logging

Rig up Baker Atlas wireline unit. RIH Gr-Z Density-CNL log and log from TD to the base of the 178mm casing. If there is poor Guelph reef porosity contacted by the vertical wellbore or if additional Guelph reef porosity is required/desired for a good I/W, a horizontal drainhole will be drilled from just below the Guelph formation top to intersect better pay and porosity. The drilling program for Bayfield et al #1 (Hor 1) covers this drilling procedure. Notify the MNR that the horizontal drainhole will be drilled, then continue with the Bayfield et al #1 (Hor 1) drilling program.

If the reef porosity is deemed adequate and any potential horizontal drainhole drilled from the vertical well will not be drilled or will be delayed, rig up 178mm wireline set retrievable bridge plug and RIH and set at 475mKB, just above the 178mm casing seat. Rig out Baker Atlas.

6) Rig out

Fill casing above bridge plug with fresh water. Pressure test bridge plug to 3,500 kPa. Rig out BOP's, install 179mm x 60.3mm tubing bonnet and master valve, and rig out drilling rig.

7) Evaluation

After the drilling rig has been moved off location, a service rig will be moved on. The 178mm casing will be pressure tested, bond logged, and Vertilogged with the service rig on the well, then the rig will swab fluid from above the bridge plug, retrieve the plug, and configure the wellhead as an I/W well.

SECTION 5.0 – REPORTING PROCEDURES

Section 5.1 – Tower Sheets

Shall be completed daily and shall include:

1. Bit size, fluid type and weight, weight on bit, deviation surveys, depth at the beginning of the shift and end of each shift.
2. Casing size, grade, weight, and number of joints, centralizers, cement baskets, total length, and setting depth.
3. Cementing information – Service Company, cement type, amount, slurry density, additives, annular fluid returns, volume of displacement fluid and plug down time.
4. Water, gas or oil – type, depth encountered, depth of sample collected and the static level and/or rate of flow.
5. Pressure tests – individually, subsurface pressures, fluid density used in the tests, bleed off rate and duration of test.
6. Logging Details – type and interval.
7. Abandonment details – intervals, amount and type of cement, top of plug and time felt.
8. Rig release – date and time.

Section 5-2 – Worker Injury

Every work related accident or injury shall be reported immediately to the Wellsite Supervisor. The Supervisor shall immediately contact the Ministry of Labour @ 1-800-265-5140 and the Ministry of Natural Resources @ 519-873-4634. The verbal report shall be followed with a written report as per the Occupation Health and Safety Act and the Oil, Gas, & Salt Resources Act and Section 13 of the Operational Standards. The Supervisor will also be responsible for notifying the Operator (Bayfield Resources Inc.) and shall be responsible for the completion of Bayfield's Accident Report Form.

SECTION 6.0 – SAFETY AND PROCEDURES

Section 6.1 – General Safety

1. All works at the well site shall be in compliance with the Occupational Health and Safety Act and the Oil, Gas, & Salt Resources Act and all associated legislation. In addition, all work at the well site shall be done in compliance with good oil field practices. All verbal notification given to and approvals received from government agencies shall be recorded on the tower sheets.
2. Safety meetings are to be held with each crew, at the start of the well and periodically while drilling – meetings shall also be held prior to cementing and upon arrival of the logging company, prior to commencing of directional drilling operations and before the start of underbalanced drilling operations.
3. The Well Site Supervisor shall ensure that the operations are in compliance with all applicable government regulations and shall complete daily walk around rig inspections.

Section 6.2 – Well Control

All blowout prevention systems are to be in strict compliance with MNR regulations. Those function and pressure testing procedures as required by the regulatory bodies, such as daily function testing of the pipe rams, will be strictly adhered to.

1. All pressure tests of blowout prevention equipment will be conducted with fresh water.
2. The following pressure test will be conducted with fresh water prior to drilling out each casing string (except surface casing, which will have 3500kPa high):
   a. The blind rams, kill lines and choke manifold will be tested to 1400kPa low and 7000kPa high for 10 minutes each.
   b. The pipe rams, annular preventer, Kelly cock, stand pipe, swivel, safety valves, etc. will be tested to 1400 kPa low and 7000 kPa high for 10 minutes each.
3. Upon drilling out the casing, drill 0.5m to 1.0m of new hole and test the formation to a minimum bottom hole pressure of 18kPa per meter.
4. After one day of drilling below the casing shoe, check the entire blowout prevention system and tighten all bolts.
5. Crews should be kept alert and familiar with the blowout prevention equipment. At least one member of the crew who has been trained in blowout prevention and well control procedures must be on the floor at all times.
6. Conduct blowout prevention drills prior to drilling out casing and once per week thereafter. Ensure that the drills are recorded in the tour book.

7. Ensure trip sheets are completed prior to trips, with trip tank monitored to ensure hole is maintaining an adequate fluid level.
8. The blowout preventers are to be function tested once per tour. Ensure that the function test is recorded on the daily tour sheets.

D 2-2

Application for Well License

Bayfield Resources et al #1 (Horiz. #1), Stanley 9-7-NBR

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Oil, Gas and Salt Resources Act

Phone Number of Landowner

Ministry of Natural Resources / Ministère des Richesses naturelles
Ontario

Application for a Well Licence

Form 1

To the Minister of Natural Resources

v.2000-08-18

The undersigned operator applies for a well licence under the Oil, Gas and Salt Resources Act and the Regulations thereunder and submits the following information, together with the application fee of $100 + 7%GST.

1. WELL NAME Bayfield Resources et al #1(Horiz.#1), Stanley 9-7-NBR Target Formation Guelph

Purpose of Proposed Well (Well Type) Injection/Withdrawal

2. NAME OF OPERATOR Bayfield Resources Inc. Tel # 519-657-2151

Address 309 Commissioners Rd. W. Unit E, London, ON, N6J 1Y4 Fax # 519-657-4296

3. LOCATION County Huron Township Stanley

Tract 9 Lot 7 Concession NBR Lake Erie: Block ____ Tract ____

Lake Erie licence or lease number ____

Bottom-hole location Bottom-hole Latitude N43 32' 52.327" Bottom-hole Longitude W81 39' 17.053"

Surface location metres from Lot Boundaries 172.15 m North [X] South [ ] Latitude N43 32' 59.414"

43.25 m East [ ] West [X] Longitude W81 39' 20.192"

Within 1.6 km of Designated Storage Area? Yes [ ] No [X] Off-target? Yes [X] No [ ]

4. WELL PARTICULARS Vertical [ ] Horizontal [X] Directional [ ] Deepening [ ] Re-entry [ ] Lateral [ ]

Rig Type: Rotary [X] Cable [ ] Well to be cored? Yes [ ] No [ ]X Formation at TD Guelph

Ground Elevation 244.4 Proposed Depth 748m Proposed Depth TVD 571m Proposed Start Date 1-Jan-10

5. LANDOWNER Stephen Eilers Tel # 519-236-4408

Address 73418 Blind Line, RR#1, Zurich, ON, N0M 2T0

Spacing unit shown on attached survey plan is pooled (see O.Reg.245/97 definitions: "pooled spacing unit") Yes [X] No [ ]

6. DRILLING CONTRACTOR (if known) unknown

Address

7. PROPOSED CASING AND CEMENTING PROGRAM

Hole Size (mm)	Casing O.D. (mm)	Weight (kg/m)	Grade	New, Used or in-hole	Setting Depth TVD	Setting Formation	CASING SETTING INFORMATION		
							How Set	Cement Type	Cement Top KB / RF
508	406	96.7	H-40	New	57m	Bedrock-Dundee	Cement	RFClight	surface
384	340	81.10	LS	New	120m	Detroit River	Cement	RFClight/G	surface
311	244	53.6	J55	New	295m	F-Shale	Cement	RFClight/G	surface
222	178	29.76	K55	New	480m	Guelph	Cement	G	surface

8. BLOW-OUT PREVENTION EQUIPMENT 11" blind and pipe rams, 2000 psi annular preventor, rotating head spool and valves fill-up and flare lines (or equivalent to meet standards).

9. WELL SECURITY

Name of Trustee Giffen & Partners Address 465 Waterloo Street, London,Ontario N6B 2K4

Tel # 519-679-4700 Fax # 519-432-8003 Total # unplugged wells 0 Current Balance $56,000

10. REMARKS

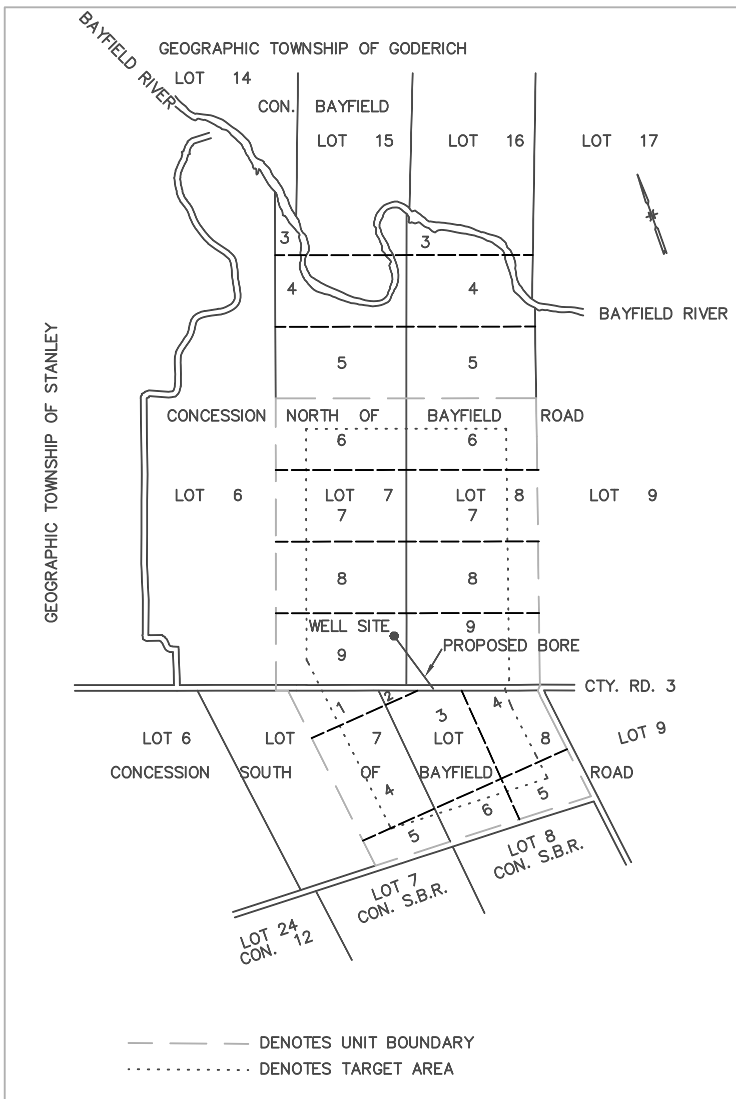
Well in Unitized Stanley 7-BNR Pool (Bayfield Pool)

11. ENCLOSURES: Fee [X] Location Plan [X] (Land wells only) Drilling Program [X]

12. AUTHORITY: The undersigned certifies that the information provided herein is complete and accurate, the operator has the right to drill or operate a well in the above location, and he/she has authority to bind the operator.

Date 15-Sep-09 Name J. Lowrie Signature

Date of Birth Feb. 12, 1955. Title President



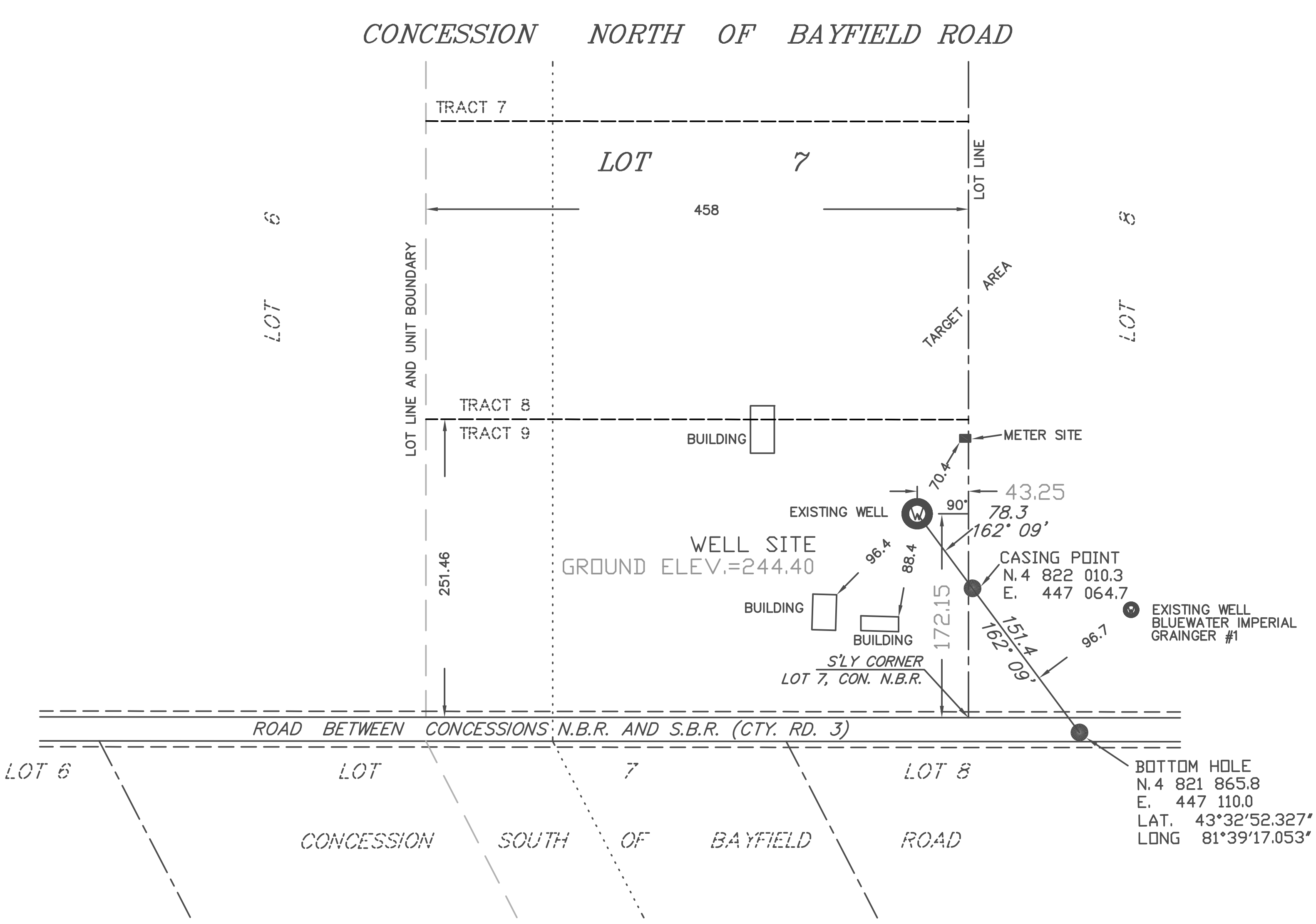
PLAN OF PROPOSED WELL
LOT 7
CONCESSION NORTH OF BAYFIELD ROAD
GEOGRAPHIC TOWNSHIP OF STANLEY
MUNICIPALITY OF CENTRAL HURON
COUNTY OF HURON

SCALE 1:5000

WELL NAME
BAYFIELD RESOURCES et. al. #1 (HORIZ. #1) – STANLEY – 9 – 7 – N.B.R.

NOTE (WELL SITE) CO-ORDINATES
LATITUDE N.43°32'59.414" LONGITUDE W.81°39'20.192"
U.T.M. N.4 822 085.0 E.447 041.3

DENOTES UNIT BOUNDARY
DENOTES TARGET AREA



NOTE GEODETIC HORIZONTAL CONTROL
U.T.M. CO-ORDINATES ARE GEODETIC (DATUM NAD 83)
AND REFERRED TO MONUMENTS
00819711196 AND 00819711197

NOTE BENCH MARK
ELEVATIONS ARE REFERRED TO GEODETIC DATUM AND
REFERENCE BENCH MARK BEING
MONUMENT No.72U095 BAYFIELD
ELEVATION = 199.914

PREPARED BY
BRISCO AND O'ROURKE
1425331 ONTARIO LIMITED
SERVING THE PETROLEUM INDUSTRY
THROUGHOUT ONTARIO
WELLS,CONSTRUCTION AND TECHNICAL SURVEYING
DIGITAL MAPPING
LAND AND LEASE SURVEYS
OFFICE (519) 351-5073
CELL (519) 401-5073
FAX (519) 351-3119
P.O.BOX 327 - N7M-5K4
CHATHAM , ONTARIO

BEARING NOTE
ALL AZIMUTH BEARINGS HEREON ARE REFERRED TP TRUE NORTH.

NOTE METRIC
DISTANCES SHOWN ON THIS PLAN ARE IN METERS AND CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

PREPARED FOR
BAYFIELD RESOURCES INC.

FILE NO. 09-4926	PLAN NO. BAY6310.DWG

T J O'Rourke

SEPTEMBER 15, 2009

TIMOTHY J. O'ROURKE C.S.T. A.C.E.T.

AUTHORIZED BY THE MINISTER OF NATURAL RESOURCES UNDER THE PETROLEUM RESOURCES ACT OF ONTARIO

BAYFIELD RESOURCES ET AL #1 (Horiz. #1)
STANLEY 9-7-NBR

DRILLING PROGRAM

TABLE OF CONTENTS

SECTION 1.0 – GENERAL DATA

Section 1.1 – Well Summary

Well Name:	Bayfield Resources et al #1 (Horiz. #1) Stanley 9-7-NBR
Operator:	Bayfield Resources Inc.
Surface Hole Location:	Lot 7, Concession North Bayfield Road, Stanley Township, Huron County
Surface Hole Coordinates:	172.15m North; 43.25m West Lat: N43^{o} 32’ 59.414”, Long: W81^{o} 39’ 20.192”
Bottom Hole Location:	Under the road allowance between Lot 7, Concession North Bayfield Road and Lot 8, Concession South Bayfield Road (County Road 3/Mill Road), Stanley Township, Huron County
Bottom Hole Coordinates:	Lat: N43^{o} 32’ 52.327”, Long: W81^{o} 39’ 17.053”
Ground Elevation:	244.4m
KB Elevation:	248.0m
Total Depth:	748mMD (571.0mTVD)
Target Formation:	Guelph
Logging Program:	Nil
Spud Date:	Directly after finishing drilling of Bayfield Resources et al #1

Section 1.2 – Potential Problems

1) Due to the low reservoir pressure, loss circulation may be encountered while drilling through the Guelph reef. If loss circulation is experienced while drilling the 159mm main hole, haul in additional fluid to keep up with losses rather than trying to heal up the loss circulation with LCM material. Since the Guelph reef is the target, we cannot plug up permeability with LCM material with the hope of being able to remove the LCM material during completion operations.

Section 1.3 – Contact Numbers

<u>Bayfield Resources Inc.</u>

Jane Lowrie	-	President	-	Office (519) 657-2151 Fax (519) 657-4296 Mobile (519) 871-9096
Neil Hoey	-	Geologist	-	Office (519) 472-4776 Fax (519) 472-4776 Mobile (519) 649-6918
Jim McIntosh	-	Supervisor/Examiner	-	Office (519) 657-2151 Fax (519) 472-7897 Mobile (519) 871-9542

<u>Schlumberger Well Services</u>

Jay Rookes	-	Cell Leader	-	Office (519) 652-5053 Fax (519) 652-6002 Mobile (519) 494-5292

<u>Holland Water Hauling Ltd.</u>

Cliff Holland	-	Owner/Operator	-	Office (519) 798-3929 Mobile (519) 524-0824

<u>Wellmaster Pipe and Supply</u>

Bill Hedges	-	Sales	- `	Office (519) 688-0500 Fax (519) 688-0563

<u>Government & Other Agencies</u>

MNR	-	Petroleum Resources	-	Office (519) 873-4634 Fax (519) 873-4645
MOE	-	Spills Reporting	-	(800) 268-6060
MOL	-	Health & Safety	-	(800) 265-1676
OPP	-	Communication Center		(800) 265-7191 911

Section 2.0 – Geological Prognosis

Well: Bayfield Resources et al #1 (Horiz. #1)

Location: Stanley 9-7-NBR

Ground Elevation: 244.4 m

KB Elevation: 248.0 m

Geological Formation	Formation Depth (mMD)	(mTVD)	Elevation (m ss)	Thickness (mTVD)	Fluid Type	Fluid Depth (mFRF)	Oil/ Gas	Depth (mTVD)	Pressure (kPa)
Drift	3.6	3.6	244.4	51.8					
Dundee	55.4	55.4	192.6	5.2	Fresh	65			
Lucas	60.6	60.6	187.4	146.3					
Bois Blanc	206.9	206.9	41.1	30.8	Sulphur	226			
Bass Islands	237.7	237.7	10.3	45.7					
G Unit	283.4	283.4	-35.4	6.4					
F Unit	289.8	289.8	-41.8	34.8	Salt	300			
E Unit	324.6	324.6	-76.6	36.5					
D Unit	361.1	361.1	-113.1	4.0					
C Unit	365.1	365.1	-117.1	18.3					
B Salt	383.4	383.4	-135.4	49.1					
A-2 Carbonate	432.5	432.5	-184.5	26.2					
A-2 Anhydrite	458.7	458.7	-210.7	4.5					
A-1 Carbonate	463.2	463.2	-215.2	0.0					
Guelph	463.2	463.2	-215.2	107.8			Gas	500-571	
Total Depth	748.5	571.0	-323.0						

Section 3.0 – Casing and Cementing Summary (from Bayfield Resources et al #1)

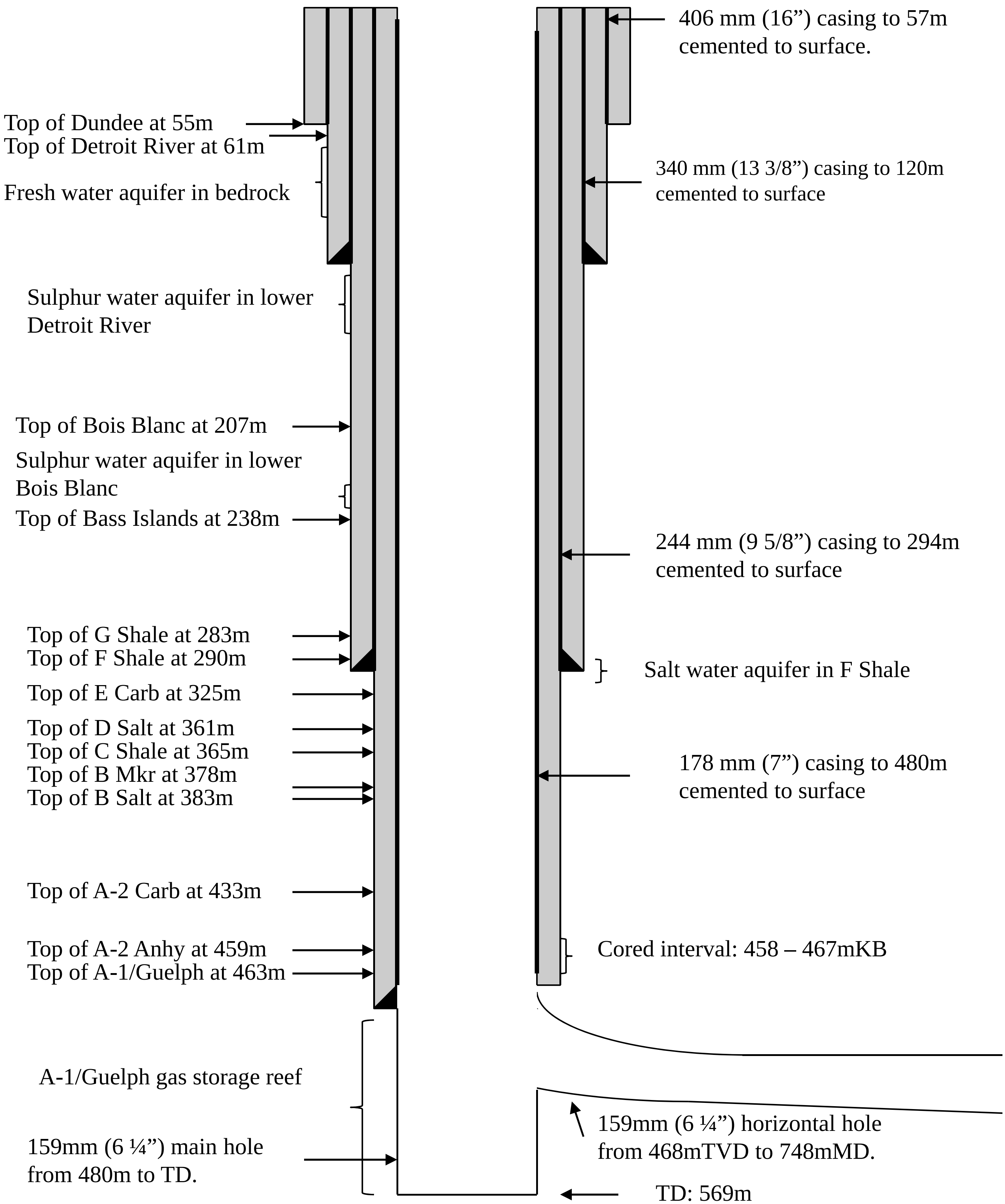
Section 3.1 - Summary

Hole Size (mm)	Casing Size (mm)	Casing Grade	Casing Weight (kg/m)	Setting Depth (mKB)	How Set
508	406	H-40	96.7	57	Cemented to surface with RFC Light plus 2% $CaCl_2$ plus Cemnet. Cement volumes will be calculated with a minimum 200% excess.
384	340	LS	81.1	120	Cemented to surface with RFC Light plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$ plus Cemnet. Cement volumes will be calculated with a minimum 200% excess. Top squeeze or spaghetti string the annulus if cement returns not received on main job.
311	244	J-55	53.6	295	Cemented to surface with RFC Light plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$. Cement volumes will be calculated with a minimum 150% excess on the RFC Light cement and a minimum 50% excess on the neat cement.
222	178	K-55	29.76	480	Cemented to surface with Class G 0-1-0% plus 20% salt tailed in with Class G 0-1-0% plug 2%$CaCl_2$. Cement volumes will be calculated with a minimum 50% excess. Depending upon hole conditions, consideration may be given to running gel cement across porous zone(s).

Main Hole: A retrievable whipstock will be set inside the 178mm casing below the Guelph top and a window cut through the side of the 178mm casing. The 159mm horizontal drainhole will be drilled through this window.

Wellbore Schematic Diagram

Bayfield Resources et al #1 (Horiz. #1): Stanley 9-7-NBR Wellbore



TRIBUTE RESOURCES INC.

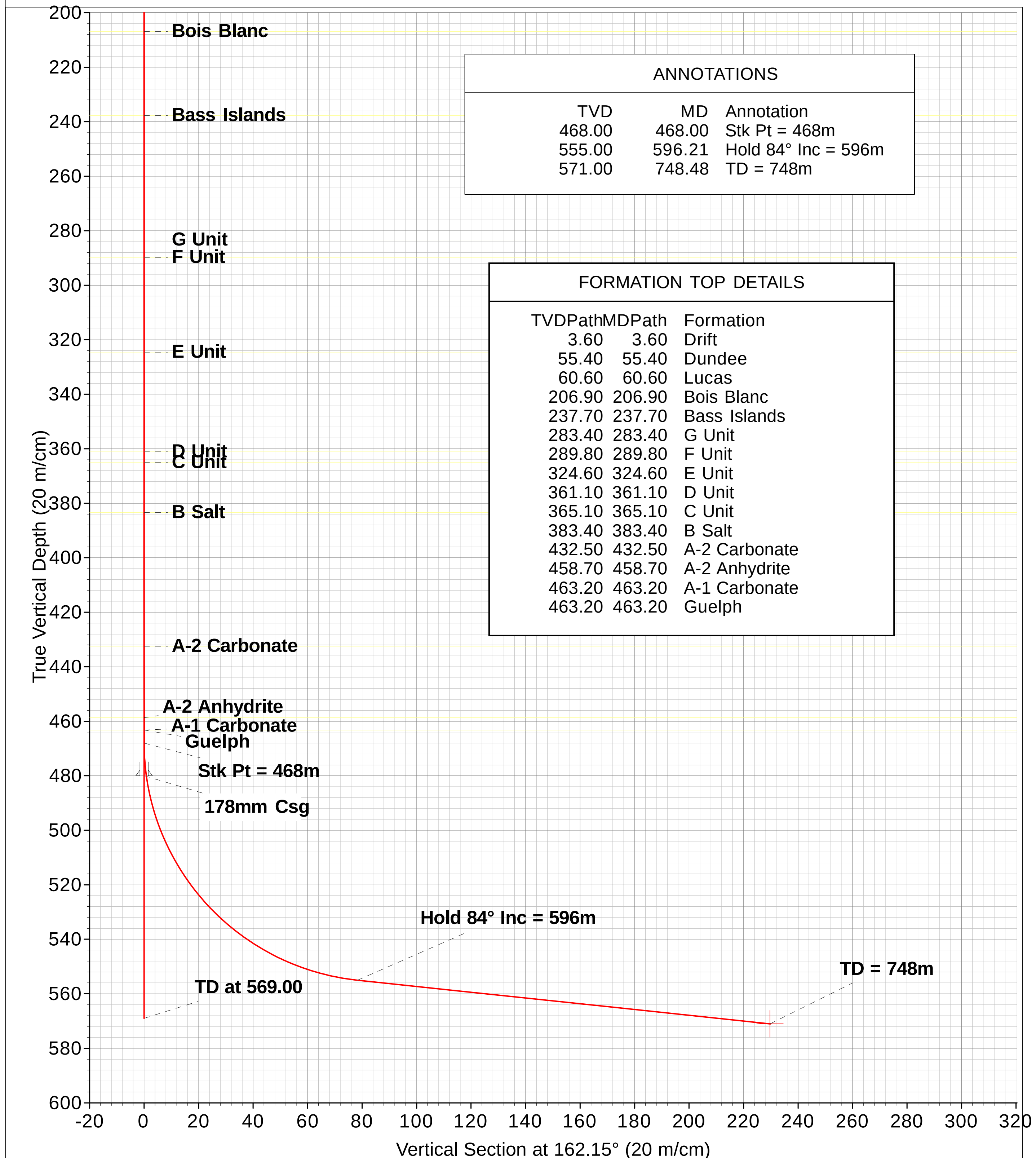
Project: BAYFIELD
Site: (Stanley 9-7-NBR) Bayfield et al # 1
Well: Tribute Bayfield et al # 1
Wellbore: Bayfield et al # 1 Hz Stk
Design: 9166313 P1 Hz Stk P1 (MB/GJ)

PHOENIX TECHNOLOGY SERVICES LP

Ground Elevation: 244.40m
Est. KB Elevation: 248.00m

WELLBORE TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Shape
BF # 1 TD	571.00	-218.65	70.43	Point

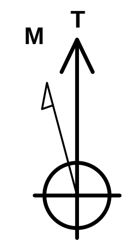


ANNOTATIONS

TVD	MD	Annotation
468.00	468.00	Stk Pt = 468m
555.00	596.21	Hold 84° Inc = 596m
571.00	748.48	TD = 748m

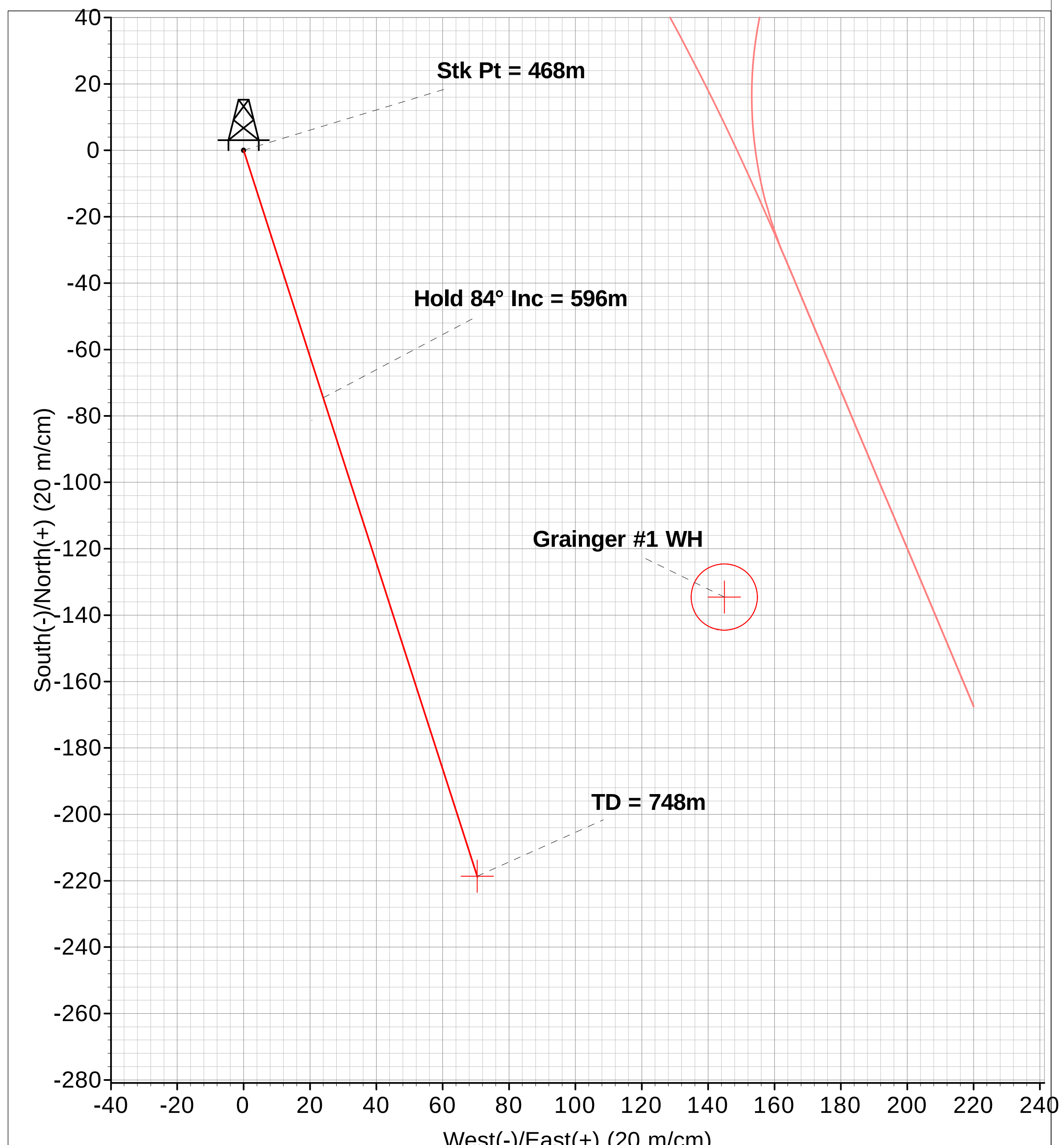
FORMATION TOP DETAILS

TVDPath	MDPath	Formation
3.60	3.60	Drift
55.40	55.40	Dundee
60.60	60.60	Lucas
206.90	206.90	Bois Blanc
237.70	237.70	Bass Islands
283.40	283.40	G Unit
289.80	289.80	F Unit
324.60	324.60	E Unit
361.10	361.10	D Unit
365.10	365.10	C Unit
383.40	383.40	B Salt
432.50	432.50	A-2 Carbonate
458.70	458.70	A-2 Anhydrite
463.20	463.20	A-1 Carbonate
463.20	463.20	Guelph



Azimuths to True North
Magnetic North: -8.74°

Magnetic Field
Strength: 54930.8snT
Dip Angle: 70.59°
Date: 9/10/2009
Model: IGRF200510



SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.000	0.00	0.00	
2	468.00	0.00	0.00	468.00	0.00	0.00	0.000	0.00	0.00	
3	596.21	83.97	162.15	555.00	-74.53	24.00	19.648	162.15	78.29	
4	748.48	83.97	162.14	571.00	-218.65	70.43	0.002	-110.12	229.71	BF # 1 TD

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-7-NBR) Bayfield et al # 1
Company:	TRIBUTE RESOURCES INC.	**TVD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Project:	BAYFIELD	**MD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Site:	(Stanley 9-7-NBR) Bayfield et al # 1	**North Reference:**	True
Well:	Tribute Bayfield et al # 1	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	Bayfield et al # 1 Hz Stk		
Design:	9166313 P1 Hz Stk P1 (MB/GJ)		

Project	BAYFIELD		
Map System:	Universal Transverse Mercator	**System Datum:**	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Zone 17N (84 W to 78 W)		

Site	(Stanley 9-7-NBR) Bayfield et al # 1					
Site Position:		**Northing:**	4,822,085.00 m	**Latitude:**	43° 32' 59.414 N
From:	Map	**Easting:**	447,041.30 m	**Longitude:**	81° 39' 20.192 W
Position Uncertainty:	0.00 m	**Slot Radius:**		**Grid Convergence:**	-0.45 °

Well	Tribute Bayfield et al # 1						
Well Position	**+N/-S**	0.00 m	**Northing:**	4,822,085.00 m	**Latitude:**	43° 32' 59.414 N
	+E/-W	0.00 m	**Easting:**	447,041.30 m	**Longitude:**	81° 39' 20.192 W
Position Uncertainty		0.00 m	**Wellhead Elevation:**		**Ground Level:**	244.40 m

Wellbore Bayfield et al # 1 Hz Stk

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	9/10/2009	-8.74	70.59	54,931

Design 9166313 P1 Hz Stk P1 (MB/GJ)

Audit Notes:

Version: **Phase:** PROTOTYPE **Tie On Depth:** 0.00

Vertical Section:	Depth From (TVD) (m)	+N/-S (m)	+E/-W (m)	Direction (°)
	0.00	0.00	0.00	162.15

Plan Sections

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	+N/-S (m)	+E/-W (m)	Dogleg Rate (°/30m)	Build Rate (°/30m)	Turn Rate (°/30m)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.000	0.000	0.000	0.00	
468.00	0.00	0.00	468.00	0.00	0.00	0.000	0.000	0.000	0.00	
596.21	83.97	162.15	555.00	-74.53	24.00	19.648	19.648	0.000	162.15	
748.48	83.97	162.14	571.00	-218.65	70.43	0.002	-0.001	-0.002	-110.12	BF # 1 TD

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-7-NBR) Bayfield et al # 1
Company:	TRIBUTE RESOURCES INC.	**TVD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Project:	BAYFIELD	**MD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Site:	(Stanley 9-7-NBR) Bayfield et al # 1	**North Reference:**	True
Well:	Tribute Bayfield et al # 1	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	Bayfield et al # 1 Hz Stk		
Design:	9166313 P1 Hz Stk P1 (MB/GJ)		

Planned Survey

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	Subsea Depth (m)	+N/-S (m)	+E/-W (m)	Vertical Section (m)	Dogleg Rate (°/30m)	Build Rate (°/30m)	Turn Rate (°/30m)
0.00	0.00	0.00	0.00	248.00	0.00	0.00	0.00	0.000	0.000	0.000
Drift										
3.60	0.00	0.00	3.60	244.40	0.00	0.00	0.00	0.000	0.000	0.000
Dundee										
55.40	0.00	0.00	55.40	192.60	0.00	0.00	0.00	0.000	0.000	0.000
Lucas										
60.60	0.00	0.00	60.60	187.40	0.00	0.00	0.00	0.000	0.000	0.000
Bois Blanc										
206.90	0.00	0.00	206.90	41.10	0.00	0.00	0.00	0.000	0.000	0.000
Bass Islands										
237.70	0.00	0.00	237.70	10.30	0.00	0.00	0.00	0.000	0.000	0.000
G Unit										
283.40	0.00	0.00	283.40	-35.40	0.00	0.00	0.00	0.000	0.000	0.000
F Unit										
289.80	0.00	0.00	289.80	-41.80	0.00	0.00	0.00	0.000	0.000	0.000
E Unit										
324.60	0.00	0.00	324.60	-76.60	0.00	0.00	0.00	0.000	0.000	0.000
D Unit										
361.10	0.00	0.00	361.10	-113.10	0.00	0.00	0.00	0.000	0.000	0.000
C Unit										
365.10	0.00	0.00	365.10	-117.10	0.00	0.00	0.00	0.000	0.000	0.000
B Salt										
383.40	0.00	0.00	383.40	-135.40	0.00	0.00	0.00	0.000	0.000	0.000
A-2 Carbonate										
432.50	0.00	0.00	432.50	-184.50	0.00	0.00	0.00	0.000	0.000	0.000
A-2 Anhydrite										
458.70	0.00	0.00	458.70	-210.70	0.00	0.00	0.00	0.000	0.000	0.000
A-1 Carbonate - Guelph										
463.20	0.00	0.00	463.20	-215.20	0.00	0.00	0.00	0.000	0.000	0.000
Stk Pt = 468m										
468.00	0.00	0.00	468.00	-220.00	0.00	0.00	0.00	0.000	0.000	0.000
480.00	7.86	162.15	479.96	-231.96	-0.78	0.25	0.82	19.648	19.648	0.000
510.00	27.51	162.15	508.41	-260.41	-9.41	3.03	9.89	19.648	19.648	0.000
540.00	47.15	162.15	532.14	-284.14	-26.65	8.58	27.99	19.648	19.648	0.000
570.00	66.80	162.15	548.41	-300.41	-50.47	16.25	53.02	19.648	19.648	0.000
Hold 84° Inc = 596m										
596.21	83.97	162.15	555.00	-307.00	-74.53	24.00	78.29	19.648	19.648	0.000
600.00	83.97	162.15	555.40	-307.40	-78.11	25.15	82.06	0.002	-0.001	-0.002
630.00	83.97	162.15	558.55	-310.55	-106.51	34.30	111.89	0.002	-0.001	-0.002
660.00	83.97	162.15	561.70	-313.70	-134.91	43.45	141.73	0.002	-0.001	-0.002
690.00	83.97	162.14	564.85	-316.85	-163.30	52.59	171.56	0.002	-0.001	-0.002
720.00	83.97	162.14	568.01	-320.01	-191.70	61.74	201.40	0.002	-0.001	-0.002
TD = 748m										
748.48	83.97	162.14	571.00	-323.00	-218.65	70.43	229.71	0.002	-0.001	-0.002

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-7-NBR) Bayfield et al # 1
Company:	TRIBUTE RESOURCES INC.	**TVD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Project:	BAYFIELD	**MD Reference:**	KB est @ 248.00m (Estimated KB Elev)
Site:	(Stanley 9-7-NBR) Bayfield et al # 1	**North Reference:**	True
Well:	Tribute Bayfield et al # 1	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	Bayfield et al # 1 Hz Stk		
Design:	9166313 P1 Hz Stk P1 (MB/GJ)		

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (m)	+N/-S (m)	+E/-W (m)	Northing (m)	Easting (m)	Latitude	Longitude
BF # 1 TD - plan hits target center - Point	0.00	0.00	571.00	-218.65	70.43	4,821,865.80	447,110.00	43° 32' 52.327 N	81° 39' 17.053 W

Formations

Measured Depth (m)	Vertical Depth (m)	Name	Lithology	Dip (°)	Dip Direction (°)
3.60	3.60	Drift		0.00	
55.40	55.40	Dundee		0.00	
60.60	60.60	Lucas		0.00	
206.90	206.90	Bois Blanc		0.00	
237.70	237.70	Bass Islands		0.00	
283.40	283.40	G Unit		0.00	
289.80	289.80	F Unit		0.00	
324.60	324.60	E Unit		0.00	
361.10	361.10	D Unit		0.00	
365.10	365.10	C Unit		0.00	
383.40	383.40	B Salt		0.00	
432.50	432.50	A-2 Carbonate		0.00	
458.70	458.70	A-2 Anhydrite		0.00	
463.20	463.20	A-1 Carbonate		0.00	
463.20	463.20	Guelph		0.00	

Plan Annotations

Measured Depth (m)	Vertical Depth (m)	Local Coordinates +N/-S (m)	Local Coordinates +E/-W (m)	Comment
468.00	468.00	0.00	0.00	Stk Pt = 468m
596.21	555.00	-74.53	24.00	Hold 84° Inc = 596m
748.48	571.00	-218.65	70.43	TD = 748m

Section 4.0 - Drilling Procedures (assuming a continuation from step 5 of Section 4.6 – Production Casing and Main Hole section of Bayfield Resources et al #1 drilling program)

Section 4.1 - Set Whipstock and Mill Window

1) Continuation from Bayfield Resources et al #1 Program

A horizontal drainhole will be drilled from just below the Guelph formation top to intersect additional pay and porosity.

2) RIH and Whipstock

Rig on Weatherford Fishing crew. Make up Weatherford QuickPak TSS Quick Cut casing exit system on drill string as directed by the Weatherford supervisor. RIH QuickPak system and hang such that window will be cut at 468mKB, about 5 meters below the top of the Guelph/A1 in the vertical well.

3) Orientate and set Whipstock

Rig up Weatherford wireline unit. RIH gyro on single conductor line and orientate the direction of the whipstock face so the window will be milled at a 162^{o} Azimuth. Rig out Weatherford Wireline. Rig up Kelly to orientated drill string at surface, shift whipstock into setting position, and hydraulically set whipstock. With the whipstock set, close pipe rams and pressure test whipstock plug to 7MPa. Monitor pressure for 15 minutes to ensure no falloff. Bleed off pressure, open rams, and pull sufficiently to shear bolt attaching mill assembly to whipstock.

4) Rotate drill string and circulate through mill to ensure bolt is sheared completely, then mill out window in 178mm casing under direction of Weatherford hand. Continue to mill through cement sheath and into formation sufficiently to remove metal from drill fluid downhole. Pull up mill and work through window to ensure all burrs, etc are milled off window. Pull and rack drill string. Lay down mill. Rig out Weatherford Fishing equipment.

Section 4.2 - Drill Bayfield Resources et al #1 (Horiz. #1) Main Hole

1) RIH directional BHA, build angle, and drill horizontal leg

Rig up Phoenix Directional equipment. Make up 159mm insert bit on bent sub, motor, and monels as directed by directional hand. Install MWD in monels at surface and ensure it is pulsing OK. RIH drill string and “feel” the window with the bit and bent sub. Rig up Weatherford Wireline and re-run gyro to ensure correct drill string orientation to build angle on a 162.1^{o}

Azimuth. Drill ahead 159mm hole, building angle at a 19.6°/30m build rate as per directional plans. Once hole is far enough away from metal of the 178mm casing, start using MWD to confirm tool orientation. Drill horizontal wellbore as per directional plans under the direction of the Phoenix directional hand.

Salt plugged Guelph reef is anticipated while building angle. Porous Guelph reef is anticipated once wellbore is built to about 84° inclination. Monitor fluid returns for signs of lost circulation as porous reef is penetrated. Do not attempt to heal up lost circulation zones with LCM material. Add fresh water as required to keep up with any fluid losses. If total lost circulation is encountered, drill ahead using mud pills to move cuttings up drainhole. If sticky hole becomes a problem, perform dummy trips back to inside 178mm casing to ensure no mud rings are being built uphole. Drill ahead to an anticipated TD of 748.5mMD (571.0mTVD).

2) Retrieve Whipstock

Circulate well at TD for 1 hour to remove cuttings from wellbore. Dummy trip back to vertical prior to trip out. POOH and rack drill string. Lay down monels, mud motors, bent sub, and bit. Make up Weatherford 3637 QuickPak retrieval hook and jars on drill string and RIH to whipstock. Wash out cuttings from hook recess in whipstock face and land retrieval hook in recess. Pull weight on recess hook to ensure it is engaged, and then jar whipstock to unset under the direction of the Weatherford fishing hand.

Once the whipstock is free, POOH and lay down whipstock and retrieval hook. Rig out Weatherford fishing tools.

3) Set Cased Hole Bridge Plug and rig out Drilling Rig

Make up and RIH 178mm cased hole retrievable bridge plug on drill string to about 460mKB. Set bridge plug and “J” off. Circulate well to fluid, then close pipe rams and pressure test bridge plug to 7MPa. Monitor for 15 minutes. POOH drill string sideways and lay down bridge plug setting tool.

Rig out BOP’s from 179mm flange. Install 179mm x 60.3mm tubing bonnet and master valve on tubing spool. Once well is secure, rig out drilling rig and move off location.

A service rig will be moved on to install the 179mm mater valve, retrieve the bridge plug, and stimulate both the vertical and horizontal sections of the well.

SECTION 5.0 – REPORTING PROCEDURES

Section 5.1 – Tower Sheets

Shall be completed daily and shall include:

1. Bit size, fluid type and weight, weight on bit, deviation surveys, depth at the beginning of the shift and end of each shift.
2. Casing size, grade, weight, and number of joints, centralizers, cement baskets, total length, and setting depth.
3. Cementing information – Service Company, cement type, amount, slurry density, additives, annular fluid returns, volume of displacement fluid and plug down time.
4. Water, gas or oil – type, depth encountered, depth of sample collected and the static level and/or rate of flow.
5. Pressure tests – individually, subsurface pressures, fluid density used in the tests, bleed off rate and duration of test.
6. Logging Details – type and interval.
7. Abandonment details – intervals, amount and type of cement, top of plug and time felt.
8. Rig release – date and time.

Section 5-2 – Worker Injury

Every work related accident or injury shall be reported immediately to the Wellsite Supervisor. The Supervisor shall immediately contact the Ministry of Labour @ 1-800-265-5140 and the Ministry of Natural Resources @ 519-873-4634. The verbal report shall be followed with a written report as per the Occupation Health and Safety Act and the Oil, Gas, & Salt Resources Act and Section 13 of the Operational Standards. The Supervisor will also be responsible for notifying the Operator (Bayfield Resources Inc.) and shall be responsible for the completion of Bayfield’s Accident Report Form.

SECTION 6.0 – SAFETY AND PROCEDURES

Section 6.1 – General Safety

1. All works at the well site shall be in compliance with the Occupational Health and Safety Act and the Oil, Gas, & Salt Resources Act and all associated legislation. In addition, all work at the well site shall be done in compliance with good oil field practices. All verbal notification given to and approvals received from government agencies shall be recorded on the tower sheets.
2. Safety meetings are to be held with each crew, at the start of the well and periodically while drilling – meetings shall also be held prior to cementing and upon arrival of the logging company, prior to commencing of directional drilling operations and before the start of underbalanced drilling operations.

3. The Well Site Supervisor shall ensure that the operations are in compliance with all applicable government regulations and shall complete daily walk around rig inspections.

Section 6.2 – Well Control

All blowout prevention systems are to be in strict compliance with MNR regulations. Those function and pressure testing procedures as required by the regulatory bodies, such as daily function testing of the pipe rams, will be strictly adhered to.

1. All pressure tests of blowout prevention equipment will be conducted with fresh water.
2. The following pressure test will be conducted with fresh water prior to drilling out each casing string (except surface casing, which will have 3500kPa high):
   a. The blind rams, kill lines and choke manifold will be tested to 1400kPa low and 7000kPa high for 10 minutes each.
   b. The pipe rams, annular preventer, Kelly cock, stand pipe, swivel, safety valves, etc. will be tested to 1400 kPa low and 7000 kPa high for 10 minutes each.
3. Upon drilling out the casing, drill 0.5m to 1.0m of new hole and test the formation to a minimum bottom hole pressure of 18kPa per meter.
4. After one day of drilling below the casing shoe, check the entire blowout prevention system and tighten all bolts.
5. Crews should be kept alert and familiar with the blowout prevention equipment. At least one member of the crew who has been trained in blowout prevention and well control procedures must be on the floor at all times.
6. Conduct blowout prevention drills prior to drilling out casing and once per week thereafter. Ensure that the drills are recorded in the tour book.
7. Ensure trip sheets are completed prior to trips, with trip tank monitored to ensure hole is maintaining an adequate fluid level.
8. The blowout preventers are to be function tested once per tour. Ensure that the function test is recorded on the daily tour sheets.

D 2-3

Application for Well License

Bayfield Resources et al #2 (Horiz. #1), Stanley 9-8-NBR

Table of Contents Page

Oil, Gas and Salt Resources Act

Phone Number of Landowner

Ministry of Natural Resources / Ministère des Richesses naturelles
Ontario

Application for a Well Licence

Form 1

To the Minister of Natural Resources

v.2000-08-18

The undersigned operator applies for a well licence under the Oil, Gas and Salt Resources Act and the Regulations thereunder and submits the following information, together with the application fee of $100 + 7%GST.

1. WELL NAME Bayfield Resources et al #2 (Horiz. #1), Stanley 9-8-NBR Target Formation Guelph

Purpose of Proposed Well (Well Type) Injection/Withdrawal

2. NAME OF OPERATOR Bayfield Resources Inc. Tel # 519-657-2151

Address 309 Commissioners Rd. W. Unit E, London, ON, N6J 1Y4 Fax # 519-657-4296

3. LOCATION County Huron Township Stanley

Tract 9 Lot 8 Concession NBR Lake Erie: Block Tract

Lake Erie licence or lease number

Bottom-hole location Bottom-hole Latitude N43 33' 05.339" Bottom-hole Longitude W81 39' 18.660"

Surface location metres from Lot Boundaries 84.10 m North [X] South [ ] Latitude N43 32' 53.986"

219.00 m East [X] West [ ] Longitude W81 39' 10.387"

Within 1.6 km of Designated Storage Area? Yes [ ] No [X] Off-target? Yes [X] No [ ]

4. WELL PARTICULARS Vertical [ ] Horizontal [X] Directional [ ] Deepening [ ] Re-entry [ ] Lateral [ ]

Rig Type: Rotary [X] Cable [ ] Well to be cored? Yes [ ] No [X] Formation at TD Guelph

Ground Elevation 246.2 Proposed Depth 848m Proposed Depth TVD 520m Proposed Start Date 1-Jan-10

5. LANDOWNER Stephen Eilers Tel # 519-236-4408

Address 73418 Blind Line, RR#1, Zurich, ON, N0M 2T0

Spacing unit shown on attached survey plan is pooled (see O.Reg.245/97 definitions: "pooled spacing unit") Yes [X] No [ ]

6. DRILLING CONTRACTOR (if known) unknown

Address

7. PROPOSED CASING AND CEMENTING PROGRAM

Hole Size (mm)	Casing O.D. (mm)	Weight (kg/m)	Grade	New, Used or in-hole	Setting Depth TVD	Setting Formation	CASING SETTING INFORMATION How Set	Cement Type	Cement Top KB / RF
508	406	96.7	H-40	New	66m	Bedrock-Dundee	Cement	RFClight	surface
384	340	81.10	LS	New	120m	Detroit River	Cement	RFClight/G	surface
311	244	53.6	J55	New	301m	F-Shale	Cement	RFClight/G	surface
222	178	29.76	K55	New	452m	A-2 Anhydrite	Cement	G	surface

8. BLOW-OUT PREVENTION EQUIPMENT 11" blind and pipe rams, 2000 psi annular preventor, rotating head spool and valves fill-up and flare lines (or equivalent to meet standards).

9. WELL SECURITY
Name of Trustee Giffen & Partners Address 465 Waterloo Street, London,Ontario N6B 2K4

Tel # 519-679-4700 Fax # 519-432-8003 Total # unplugged wells 0 Current Balance $56,000

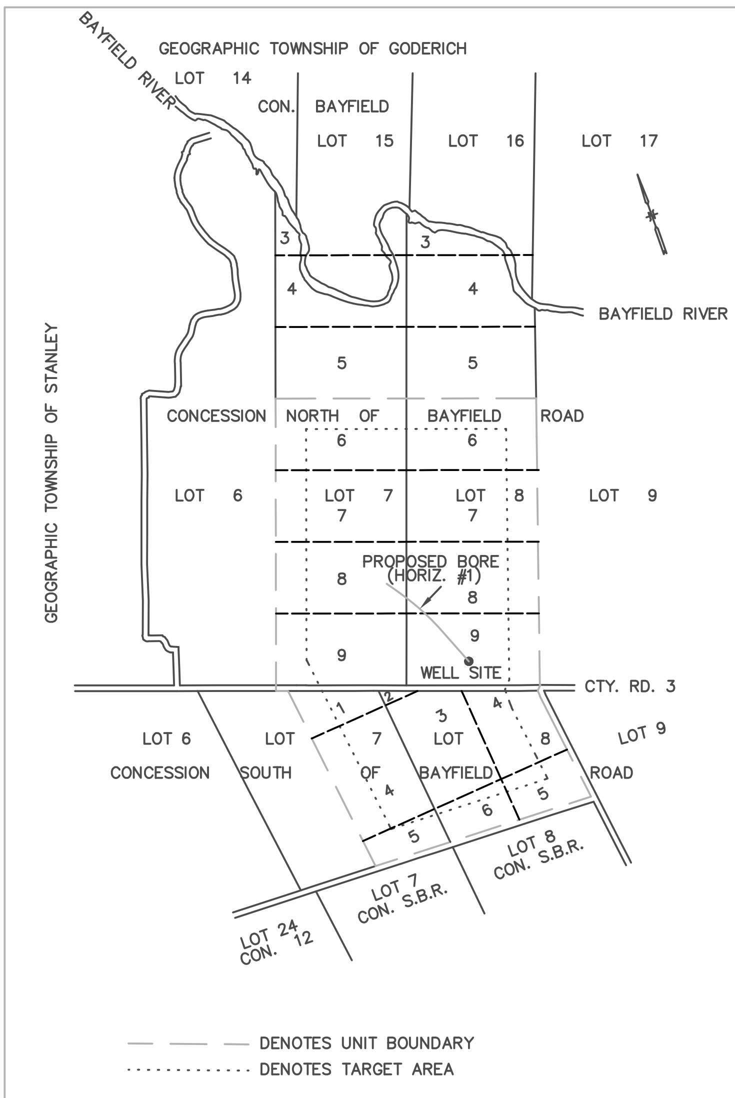
10. REMARKS
Well in Unitized Stanley 7-BNR Pool (Bayfield Pool)

11. ENCLOSURES: Fee [X] Location Plan [X] (Land wells only) Drilling Program [X]

12. AUTHORITY: The undersigned certifies that the information provided herein is complete and accurate, the operator has the right to drill or operate a well in the above location, and he/she has authority to bind the operator.

Date 15-Sep-09 Name J. Lowrie Signature Lowrie

Date of Birth Feb. 12, 1955. Title President

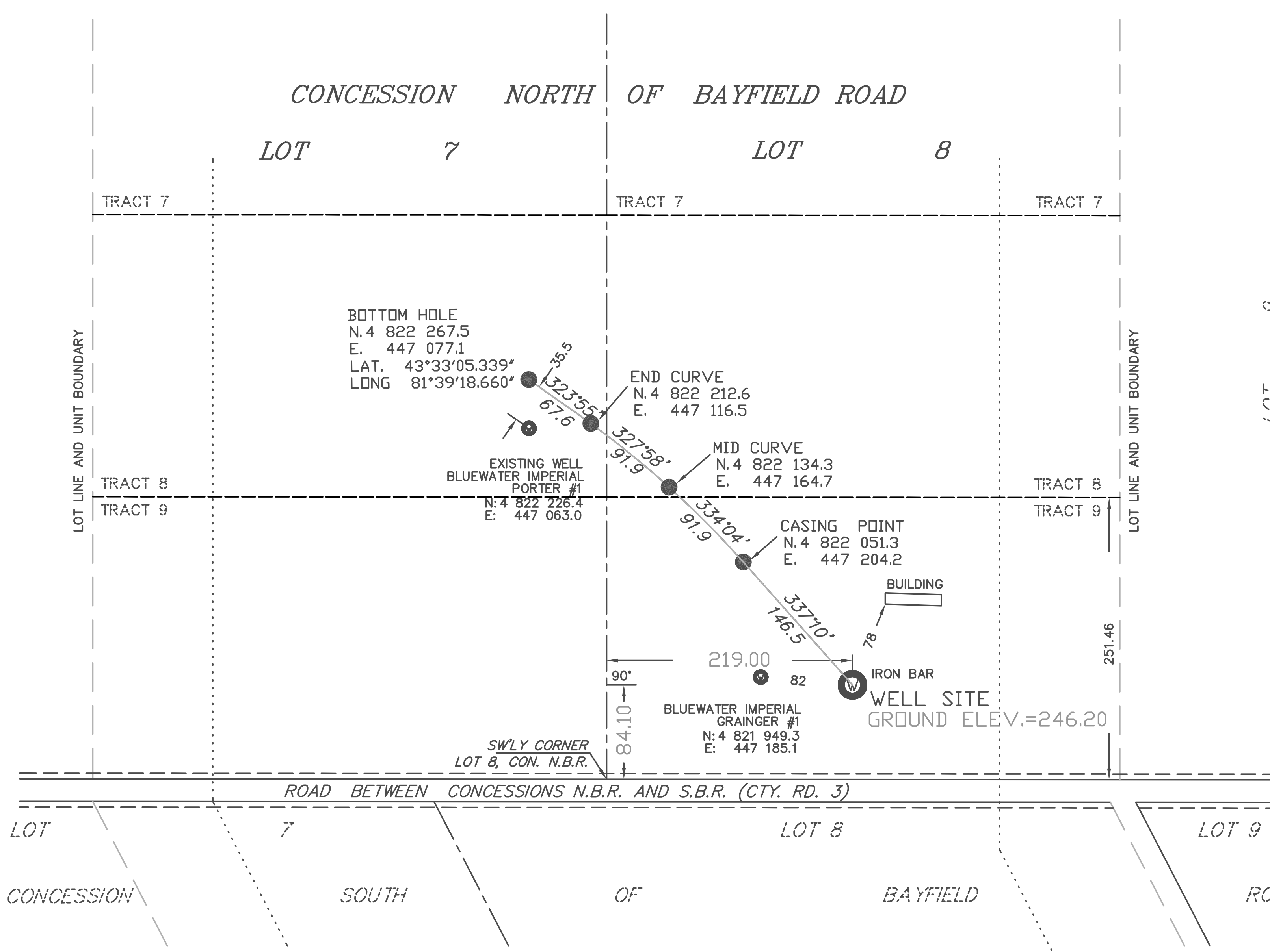


PLAN OF PROPOSED WELL
LOT 8
CONCESSION NORTH OF BAYFIELD ROAD
GEOGRAPHIC TOWNSHIP OF STANLEY
MUNICIPALITY OF CENTRAL HURON
COUNTY OF HURON

SCALE 1:5000

WELL NAME
BAYFIELD RESOURCES et. al. #2 (HORIZ. #1) – STANLEY – 9 – 8 – N.B.R.

NOTE (WELL SITE) CO-ORDINATES
LATITUDE N.43°32'53.986" LONGITUDE W.81°39'10.387"
U.T.M. N.4 821 915.8 E.447 260.0



NOTE GEODETIC HORIZONTAL CONTROL
U.T.M. CO-ORDINATES ARE GEODETIC (DATUM NAD 83) AND REFERRED TO MONUMENTS 00819711196 AND 00819711197

337°10' DENOTES TRUE NORTH AZIMUTH

NOTE METRIC
DISTANCES SHOWN ON THIS PLAN ARE IN METERS AND CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

NOTE BENCH MARK
ELEVATIONS ARE REFERRED TO GEODETIC DATUM AND REFERENCE BENCH MARK BEING MONUMENT No.72U095 BAYFIELD
ELEVATION = 199.914

PREPARED BY
BRISCO AND O'ROURKE
1425331 ONTARIO LIMITED
SERVING THE PETROLEUM INDUSTRY
THROUGHOUT ONTARIO
WELLS,CONSTRUCTION AND TECHNICAL SURVEYING
DIGITAL MAPPING
LAND AND LEASE SURVEYS
OFFICE (519) 351-5073
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PO.BOX 327 – N7M-5K4
CHATHAM , ONTARIO

PREPARED FOR
BAYFIELD RESOURCES INC.

FILE NO. 09-4926	PLAN NO. BAY6261.DWG

T.J. O'Rourke

SEPTEMBER 16, 2009

TIMOTHY J. O'ROURKE C.S.T. A.C.E.T.

AUTHORIZED BY THE MINISTER OF NATURAL RESOURCES UNDER THE PETROLEUM RESOURCES ACT OF ONTARIO

BAYFIELD RESOURCES ET AL #2 (Horiz. #1)
BAYFIELD RESOURCES ET AL #2 (Horiz. #1-Lat. #1)
STANLEY 9-8-NBR

DRILLING PROGRAM

TABLE OF CONTENTS

SECTION 1.0 – GENERAL DATA

Section 1.1 – Well Summary

Well Name:	Bayfield Resources et al #2 (Horiz. #1) Stanley 9-8-NBR Bayfield Resources et al #2 (Horiz. 1-Lat. #1) Stanley 9-8-NBR
Operator:	Bayfield Resources Inc.
Surface Hole Location:	Lot 8, Concession North Bayfield Road, Stanley Township, Huron County
Surface Hole Coordinates:	84.1m North; 219.0m East Lat: N43^{o} 32’ 53.986”, Long: E81^{o} 39’ 10.387”
Bottom Hole Location:	Hor 1: Lot 7, Concession North Bayfield Road, Stanley Township, Huron County Hor 1/Lat 1: Lot 8, Concession North Bayfield Road, Stanley Township, Huron County
Bottom Hole Coordinates:	Hor 1: Lat: N43^{o} 33’ 05.339”, Long: E81^{o} 39’ 18.660” Hor 1/Lat 1: Lat: N43^{o} 33’ 03.359”, Long: E81^{o} 39’ 10.621”
Ground Elevation:	246.2m
KB Elevation:	249.8m
Total Depth:	Horiz. #1: 847.7mMD/520.5mTVD Horiz. #1-Lat. #1: 776.8mMD/540.5mTVD
Target Formation:	Guelph
Logging Program:	CBL-Gr – 340mm csg, 245mm csg, and 178mm csg Gr-CNL-Z Density from 178mm casing seat to 245mm casing seat, Gr-CNL to surface Vertilog on 178mm casing
Spud Date:	As soon as OEB approvals are received for Bayfield pool conversion to storage

Section 1.2 – Potential Problems

1) There are gravel, boulders, and sand in the overburden that will cause hole cleaning problems and may contain fresh water. The glacial till must be shut off with the conductor casing or a cement squeeze or problems will be experienced drilling the surface hole. The gravel and sand zone is from surface to the top of the bedrock at 57 meters.

2) The bedrock surface is karsted and fractured so the wellbore face will not likely support a column of fresh water. Fluid losses should be expected. If the uphole gravels and sands are not completely shut off with the conductor casing and/or cement squeezes prior to entering the bedrock, the gravels and sands could be pulled into the hole once the lost circulation is encountered, with potential stuck drill string and casing running problems.

3) Local fresh ground water wells withdraw from about the 220 to 240 ft (67 to 73m) depth at the bedrock surface. The aquifer transitions from fresh water to sulphur water is within the top of the Lucas formation. The surface hole needs to be TD'd prior to entering the sulphur water, yet below all potable water. Stop drilling surface hole at any indication of sulphur water or at 120m, whichever is shallower.

4) There is potential for hole caving and instability from the bedrock surface to about 160m due to karsting. Depending upon the severity of the caving/hole instability, consideration will be given to cement squeezes and/or plugging the hole back in stages, to provide stability to the hole and to reduce losses during the cementing of the casing.

5) There is potential for loss circulation while cementing the 340mm and 244mm casings. Depending upon the severity of the problem, consideration will be given to running 200%± excess cement.

6) Up to 6 meters of D Salt and up to 50 meters of B Salt will be present while drilling through the Salina section. The drilling fluid will need to be switched to saturated brine prior to drilling this section of the well. The B Salt will be penetrated while building angle prior to setting the 178mm casing. If saturated brine is not used during this part of the hole, consistent build rates would be difficult since the fresh waters would wash out salt and undermine the drill bit and cause a drop in inclination angle.

7) Be cautious while building angle through the B Salt section to ensure we do not loose angle due to washouts since the formation is so soft relative to the other Salina zones.

8) Due to the low reservoir pressure, loss circulation may be encountered while drilling through the Guelph reef. If loss circulation is experienced, haul in

additional fluid to keep up with losses rather than trying to heal up the loss circulation with LCM material. Since the Guelph reef is the target, we cannot plug up permeability with LCM material with the hope of being able to remove the LCM material during completion operations. If complete lost circulation exists, be cautious while obtaining MWD mud pulse surveys that the drill string does not get differentially stuck while stationary. If partial circulation can be obtained, use viscous mud sweeps to try to keep the wellbore as clean as possible.

Section 1.3 – Contact Numbers

<u>Bayfield Resources Inc.</u>

Jane Lowrie	-	President	-	Office (519) 657-2151
				Fax (519) 657-4296
				Mobile (519) 871-9096
Neil Hoey	-	Geologist	-	Office (519) 472-4776
				Fax (519) 472-4776
				Mobile (519) 649-6918
Jim McIntosh	-	Supervisor/Examiner	-	Office (519) 657-2151
				Fax (519) 472-7897
				Mobile (519) 871-9542

<u>Schlumberger Well Services</u>

Jay Rookes	-	Cell Leader	-	Office (519) 652-5053
				Fax (519) 652-6002
				Mobile (519) 494-5292

<u>Holland Water Hauling Ltd.</u>

Cliff Holland	-	Owner/Operator	-	Office (519) 798-3929
				Mobile (519) 524-0824

<u>Wellmaster Pipe and Supply</u>

Bill Hedges	-	Sales	-	Office (519) 688-0500
			`	Fax (519) 688-0563

<u>Government & Other Agencies</u>

MNR	-	Petroleum Resources	-	Office (519) 873-4634
				Fax (519) 873-4645
MOE	-	Spills Reporting	-	(800) 268-6060
MOL	-	Health & Safety	-	(800) 265-1676

OPP	-	Communication Center	(800) 265-7191 911

Section 2.0 – Geological Prognosis

Well: Bayfield Resources et al #2 (Horiz. #1)

Location: Stanley 9-8-NBR

Ground Elevation: 246.2 m

KB Elevation: 249.8 m

Geological Formation	Formation Depth (mMD)	(mTVD)	Elevation (m ss)	Thickness (mTVD)	Fluid Type	Fluid Depth (mFRF)	Oil/ Gas	Depth (mTVD)	Pressure (kPa)
Drift	3.6	3.6	246.2	61.9	Fresh	15			
Dundee	65.5	65.5	184.3	6.1	Fresh	70			
Lucas	71.6	71.6	178.2	111.2					
Amherstburg									
Bois Blanc	182.8	182.8	67.0	56.4	Sulphur	232			
Bass Islands	239.2	239.2	10.6	50.6					
G Shale	289.8	289.8	-40.0	6.4					
F Shale	296.2	296.2	-46.4	24.1	Salt	310			
E Carbonate	320.3	320.3	-70.5	39.6					
D Salt	359.9	359.9	-110.1	5.8					
C Shale	365.7	365.7	-115.9	27.4					
B Salt	393.2	393.1	-143.3	45.2					
A-2 Carbonate	441.8	438.3	-188.5	11.2					
A-2 Shale									
A-2 Anhydrite	455.6	449.5	-199.7	2.5					
A-1 Carb/Guelph	458.9	452.0	-202.2	132.0			Gas	500-520	200kPa
Total Depth	847.7	520.5							

Horizontal section starts at 576mMD (508.5mTVD/-258.0mss) at displacement of 116.6mN,49.12mW of surface location.

Horiz. #1 TD at 848mMD (520.5mTVD/-270.0mss) at displacement of 350.3mN, 185.65mW of surface location.

Well: Bayfield Resources et al #2 (Horiz. #1-Lat. #1)

Location: Stanley 9-8-NBR

Ground Elevation: 246.2 m

KB Elevation: 249.8 m

Geological Formation	Formation Depth (mMD)	(mTVD)	Elevation (m ss)	Thickness (mTVD)	Fluid Type	Fluid Depth (mFRF)	Oil/ Gas	Depth (mTVD)	Pressure (kPa)
Drift	3.6	3.6	246.2	61.9	Fresh	15			
Dundee	65.5	65.5	184.3	6.1	Fresh	70			
Lucas	71.6	71.6	178.2	111.2					
Amherstburg									
Bois Blanc	182.8	182.8	67.0	56.4	Sulphur	232			
Bass Islands	239.2	239.2	10.6	50.6					
G Shale	289.8	289.8	-40.0	6.4					
F Shale	296.2	296.2	-46.4	24.1	Salt	310			
E Carbonate	320.3	320.3	-70.5	39.6					
D Salt	359.9	359.9	-110.1	5.8					
C Shale	365.7	365.7	-115.9	27.4					
B Salt	393.2	393.1	-143.3	45.2					
A-2 Carbonate	441.8	438.3	-188.5	11.2					
A-2 Shale									
A-2 Anhydrite	455.6	449.5	-199.7	2.5					
A-1 Carb/Guelph	458.9	452.0	-202.2	132.0			Gas	500-540	200kPa
Total Depth	776.8	540.5							

Horizontal section starts at 576mMD (508.5mTVD/-258.0mss) at displacement of 116.6mN, 49.12mW of surface location.

Horiz. #1-Lat. #1 TD at 777mMD (540.5mTVD/-290.0mss) at displacement of 289.2mN, 5.24mW of surface location.

Section 3.0 – Casing and Cementing Summary

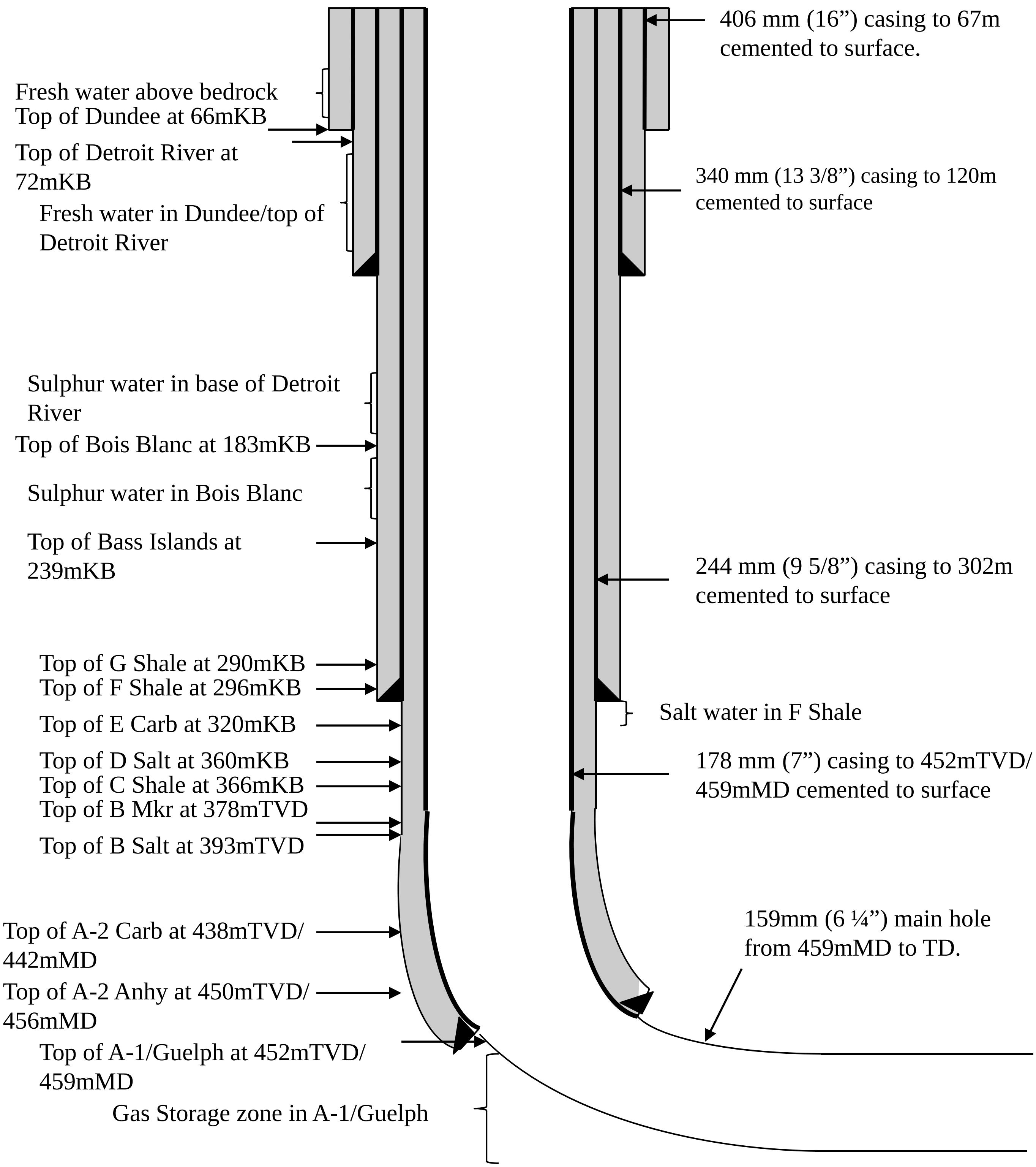
Section 3.1 - Summary

Hole Size (mm)	Casing Size (mm)	Casing Grade	Casing Weight (kg/m)	Setting Depth (mMD)	How Set
508	406	H-40	96.7	66	Cemented to surface with RFC Light plus 2% $CaCl_2$ plus Cemnet. Cement volumes will be calculated with a minimum 200% excess.
384	340	LS	81.1	120	Cemented to surface with RFC Light plus 2%Ca Cl_2 plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$. Cement volumes will be calculated with a minimum 200% excess. Top squeeze or spaghetti string the annulus if cement returns not received on main job.
311	244	J-55	53.6	301	Cemented to surface with RFC Light plus 2%Ca Cl_2 plus Cemnet tailed with Class G 0-1-0% plus 2%$CaCl_2$. Cement volumes will be calculated with a minimum 150% excess on the RFC Light cement and a minimum 50% excess on the neat cement.
222	178	K-55	29.76	459	Cemented to surface with Class G 0-1-0% plus 20% salt tailed in with Class G 0-1-0% plug 2%$CaCl_2$. Cement volumes will be calculated with a minimum 50% excess. Depending upon hole conditions, consideration may be given to running gel cement across porous zone(s).

Main Hole: Prior to setting the 178mm casing, hole angle will have been built to approximately 41^{o}. The 159mm main hole will continue to build angle until horizontal, with the 159mm Horiz. #1-Lat. #1 lateral drilled out of the side of the initial horizontal.

Wellbore Schematic Diagram

Bayfield Resources et al #2 (Horiz. #1): Stanley 9-8-NBR Wellbore



TRIBUTE RESOURCES

PHOENIX TECHNOLOGY SERVICES LP

Project: BAYFIELD
Site: (Stanley 9-8-NBR) BR et al 2
Well: BR et al
Wellbore: BR et al 2 Leg #1
Design: 9165951R Leg #1 P7 (mb/sh)

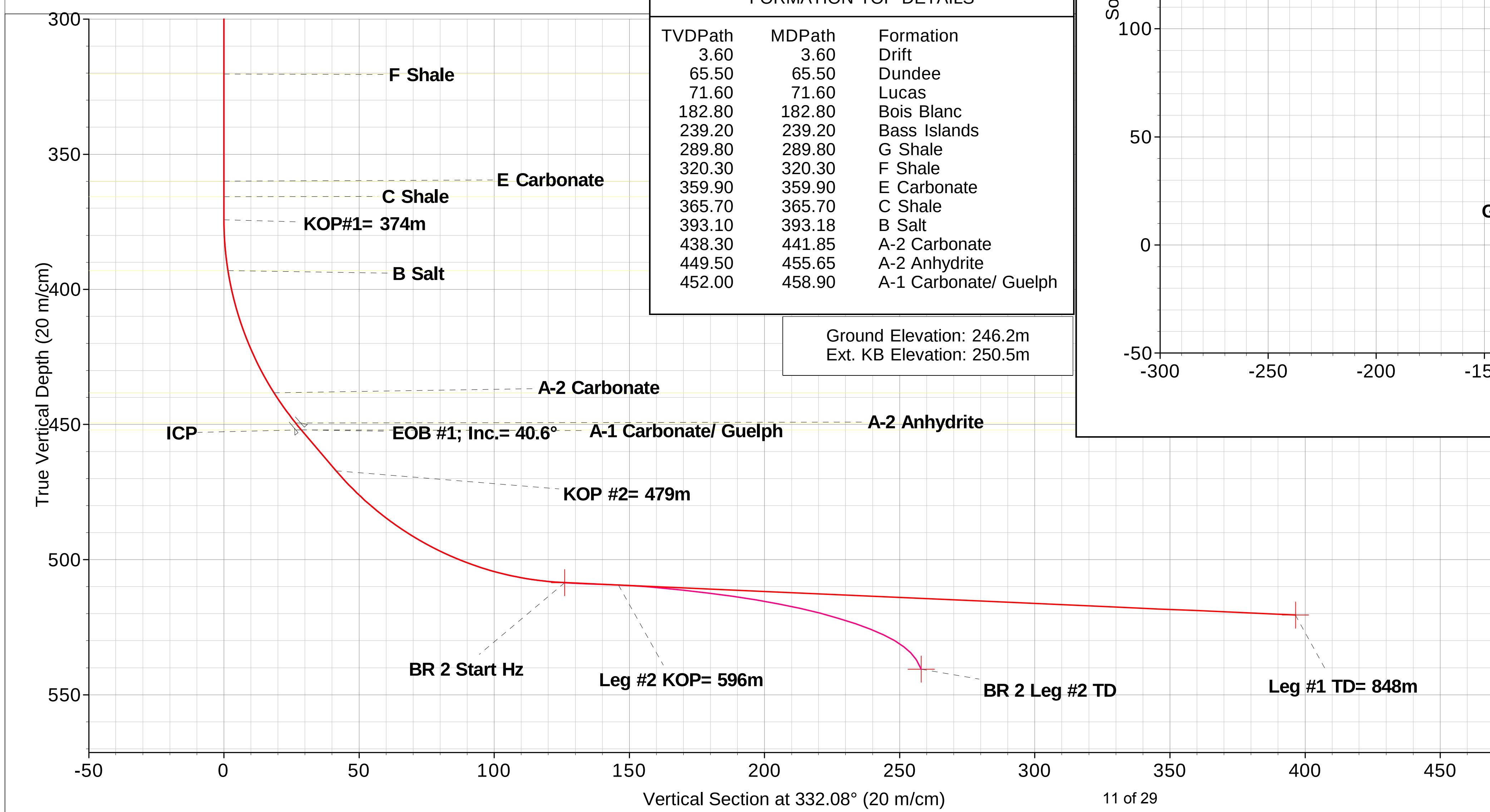
SECTION DETAILS

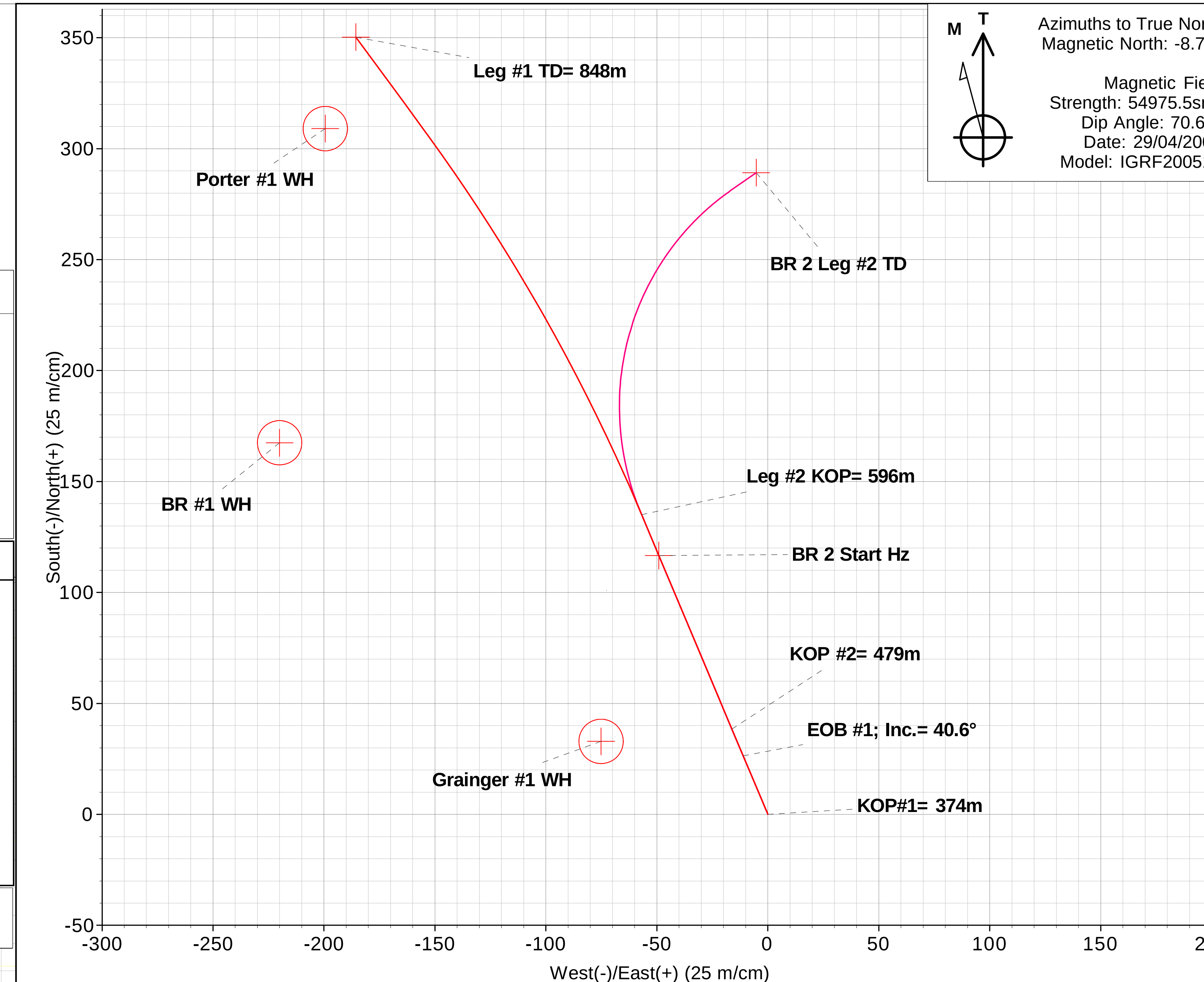
Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.00	0.00	0.00	0.00	0.00	0.00	0.000	0.00	0.00	
2	374.26	0.00	0.00	374.26	0.00	0.00	0.000	0.00	0.00	
3	458.83	40.55	337.16	451.94	26.45	-11.14	14.385	337.16	28.58	
4	478.83	40.55	337.16	467.14	38.43	-16.18	0.000	0.00	41.54	
5	575.92	87.48	337.16	508.50	116.64	-49.12	14.500	0.00	126.06	BR 2 Start Hz
6	595.92	87.48	337.16	509.38	135.05	-56.88	0.000	0.00	145.96	
7	796.33	87.48	323.79	518.24	308.87	-155.32	2.000	-90.31	345.65	
8	847.71	87.48	323.79	520.50	350.29	-185.65	0.000	0.00	396.44	BR 2 Leg #1 TD

FORMATION TOP DETAILS

TVDPath	MDPath	Formation
3.60	3.60	Drift
65.50	65.50	Dundee
71.60	71.60	Lucas
182.80	182.80	Bois Blanc
239.20	239.20	Bass Islands
289.80	289.80	G Shale
320.30	320.30	F Shale
359.90	359.90	E Carbonate
365.70	365.70	C Shale
393.10	393.18	B Salt
438.30	441.85	A-2 Carbonate
449.50	455.65	A-2 Anhydrite
452.00	458.90	A-1 Carbonate/ Guelph

Ground Elevation: 246.2m
Ext. KB Elevation: 250.5m





WELLBORE TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Shape
BR #1 WH	0.00	167.48	-220.02	Circle (Radius: 10.00)
Grainger #1 WH	0.00	32.91	-75.16	Circle (Radius: 10.00)
Porter #1 WH	0.00	309.04	-199.43	Circle (Radius: 10.00)
BR 2 Start Hz	508.50	116.64	-49.12	Point
BR 2 Leg #1 TD	520.50	350.29	-185.65	Point
BR 2 Leg #2 TD	540.50	289.20	-5.24	Point

ANNOTATIONS

TVD	MD	Annotation
374.26	374.26	KOP#1= 374m
451.94	458.83	EOB #1; Inc.= 40.6°
467.14	478.83	KOP #2= 479m
509.38	595.92	Leg #2 KOP= 596m
520.50	847.70	Leg #1 TD= 848m

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #1		
Design:	9165951R Leg #1 P7 (mb/sh)		

Project	BAYFIELD		
Map System:	Universal Transverse Mercator	**System Datum:**	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Zone 17N (84 W to 78 W)		

Site	(Stanley 9-8-NBR) BR et al 2					
Site Position:			**Northing:**	4,821,915.80 m	**Latitude:**	43° 32' 53.986 N
From:	Map		**Easting:**	447,260.00 m	**Longitude:**	81° 39' 10.386 W
Position Uncertainty:		0.00 m	**Slot Radius:**		**Grid Convergence:**	-0.45 °

Well	BR et al					
Well Position	**+N/-S**	0.00 m	**Northing:**	4,821,915.80 m	**Latitude:**	43° 32' 53.986 N
	+E/-W	0.00 m	**Easting:**	447,260.00 m	**Longitude:**	81° 39' 10.386 W
Position Uncertainty		0.00 m	**Wellhead Elevation:**		**Ground Level:**	246.20 m

Wellbore BR et al 2 Leg #1

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	29/04/2009	-8.74	70.62	54,975

Design 9165951R Leg #1 P7 (mb/sh)

Audit Notes:

Version:	**Phase:** PROTOTYPE	**Tie On Depth:**	0.00

Vertical Section:	Depth From (TVD) (m)	+N/-S (m)	+E/-W (m)	Direction (°)
	0.00	0.00	0.00	332.08

Plan Sections

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	+N/-S (m)	+E/-W (m)	Dogleg Rate (°/30m)	Build Rate (°/30m)	Turn Rate (°/30m)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.000	0.000	0.000	0.00	
374.26	0.00	0.00	374.26	0.00	0.00	0.000	0.000	0.000	0.00	
458.83	40.55	337.16	451.94	26.45	-11.14	14.385	14.385	0.000	337.16	
478.83	40.55	337.16	467.14	38.43	-16.18	0.000	0.000	0.000	0.00	
575.92	87.48	337.16	508.50	116.64	-49.12	14.500	14.500	0.000	0.00	BR 2 Start Hz
595.92	87.48	337.16	509.38	135.05	-56.88	0.000	0.000	0.000	0.00	
796.33	87.48	323.79	518.24	308.87	-155.32	2.000	-0.001	-2.002	-90.31	
847.71	87.48	323.79	520.50	350.29	-185.65	0.000	0.000	0.000	0.00	BR 2 Leg #1 TD

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #1		
Design:	9165951R Leg #1 P7 (mb/sh)		

Planned Survey

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	Subsea Depth (m)	+N/-S (m)	+E/-W (m)	Vertical Section (m)	Dogleg Rate (°/30m)
BR #1 WH - Grainger #1 WH - Porter #1 WH								
0.00	0.00	0.00	0.00	250.50	0.00	0.00	0.00	0.000
Drift								
3.60	0.00	0.00	3.60	246.90	0.00	0.00	0.00	0.000
Dundee								
65.50	0.00	0.00	65.50	185.00	0.00	0.00	0.00	0.000
Lucas								
71.60	0.00	0.00	71.60	178.90	0.00	0.00	0.00	0.000
Bois Blanc								
182.80	0.00	0.00	182.80	67.70	0.00	0.00	0.00	0.000
Bass Islands								
239.20	0.00	0.00	239.20	11.30	0.00	0.00	0.00	0.000
G Shale								
289.80	0.00	0.00	289.80	-39.30	0.00	0.00	0.00	0.000
F Shale								
320.30	0.00	0.00	320.30	-69.80	0.00	0.00	0.00	0.000
E Carbonate								
359.90	0.00	0.00	359.90	-109.40	0.00	0.00	0.00	0.000
C Shale								
365.70	0.00	0.00	365.70	-115.20	0.00	0.00	0.00	0.000
KOP#1= 374m								
374.26	0.00	0.00	374.26	-123.76	0.00	0.00	0.00	0.000
390.00	7.55	337.16	389.95	-139.45	0.95	-0.40	1.03	14.386
B Salt								
393.18	9.07	337.16	393.10	-142.60	1.38	-0.58	1.49	14.385
420.00	21.93	337.16	418.89	-168.39	7.97	-3.36	8.61	14.385
A-2 Carbonate								
441.85	32.41	337.16	438.30	-187.80	17.15	-7.22	18.54	14.385
450.00	36.32	337.16	445.03	-194.53	21.39	-9.01	23.12	14.385
A-2 Anhydrite								
455.65	39.03	337.16	449.50	-199.00	24.57	-10.35	26.56	14.385
EOB #1; Inc.= 40.6°								
458.83	40.55	337.16	451.94	-201.44	26.45	-11.14	28.59	14.367
A-1 Carbonate/ Guelph - ICP								
458.90	40.55	337.16	452.00	-201.50	26.49	-11.16	28.63	0.000
KOP #2= 479m								
478.83	40.55	337.16	467.14	-216.64	38.43	-16.19	41.54	0.000
480.00	41.12	337.16	468.03	-217.53	39.14	-16.48	42.30	14.549
510.00	55.62	337.16	487.90	-237.40	59.75	-25.16	64.57	14.500
540.00	70.12	337.16	501.55	-251.05	84.29	-35.50	91.10	14.500
570.00	84.62	337.16	508.09	-257.59	111.19	-46.83	120.18	14.500
BR 2 Start Hz								
575.92	87.48	337.16	508.50	-258.00	116.64	-49.12	126.06	14.500
Leg #2 KOP= 596m								
595.92	87.48	337.16	509.38	-258.88	135.05	-56.88	145.96	0.000
600.00	87.48	336.89	509.56	-259.06	138.80	-58.47	150.02	1.999
630.00	87.47	334.89	510.88	-260.38	166.16	-70.71	179.93	2.000
660.00	87.46	332.89	512.21	-261.71	193.07	-83.90	209.88	2.000
690.00	87.46	330.88	513.54	-263.04	219.50	-98.02	239.85	2.000
BR 2 Leg #2 TD								

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #1		
Design:	9165951R Leg #1 P7 (mb/sh)		

Planned Survey

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	Subsea Depth (m)	+N/-S (m)	+E/-W (m)	Vertical Section (m)	Dogleg Rate (°/30m)
704.92	87.46	329.89	514.20	-263.70	232.46	-105.39	254.75	2.000
720.00	87.46	328.88	514.86	-264.36	245.42	-113.06	269.80	2.000
750.00	87.46	326.88	516.19	-265.69	270.81	-128.99	299.68	2.000
780.00	87.47	324.88	517.52	-267.02	295.62	-145.81	329.48	2.000
796.33	87.48	323.79	518.24	-267.74	308.87	-155.32	345.65	2.000
810.00	87.48	323.79	518.84	-268.34	319.89	-163.39	359.16	0.000
840.00	87.48	323.79	520.16	-269.66	344.07	-181.09	388.82	0.000
Leg #1 TD= 848m								
847.70	87.48	323.79	520.50	-270.00	350.28	-185.64	396.43	0.000
BR 2 Leg #1 TD								
847.71	87.48	323.79	520.50	-270.00	350.29	-185.65	396.44	0.000

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (m)	+N/-S (m)	+E/-W (m)	Northing (m)	Easting (m)	Latitude	Longitude
BR #1 WH	0.00	0.00	0.00	167.48	-220.02	4,822,085.00	447,041.30	43° 32' 59.414 N	81° 39' 20.192 W
- plan misses target center by 276.51m at 0.00m MD (0.00 TVD, 0.00 N, 0.00 E)									
- Circle (radius 10.00)									
Grainger #1 WH	0.00	0.00	0.00	32.91	-75.16	4,821,949.30	447,185.10	43° 32' 55.053 N	81° 39' 13.736 W
- plan misses target center by 82.05m at 0.00m MD (0.00 TVD, 0.00 N, 0.00 E)									
- Circle (radius 10.00)									
Porter #1 WH	0.00	0.00	0.00	309.04	-199.43	4,822,226.40	447,063.00	43° 33' 4.003 N	81° 39' 19.274 W
- plan misses target center by 367.81m at 0.00m MD (0.00 TVD, 0.00 N, 0.00 E)									
- Circle (radius 10.00)									
BR 2 Start Hz	0.00	0.00	508.50	116.64	-49.12	4,822,032.82	447,211.80	43° 32' 57.767 N	81° 39' 12.576 W
- plan hits target center									
- Point									
BR 2 Leg #1 TD	0.00	0.00	520.50	350.29	-185.65	4,822,267.53	447,077.11	43° 33' 5.340 N	81° 39' 18.660 W
- plan hits target center									
- Point									
BR 2 Leg #2 TD	0.00	0.00	540.50	289.20	-5.24	4,822,205.03	447,257.03	43° 33' 3.360 N	81° 39' 10.620 W
- plan misses target center by 118.07m at 704.92m MD (514.20 TVD, 232.46 N, -105.39 E)									
- Point									

Casing Points

Measured Depth (m)	Vertical Depth (m)	Name	Casing Diameter (mm)	Hole Diameter (mm)
458.90	452.00	ICP		

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #1		
Design:	9165951R Leg #1 P7 (mb/sh)		

Formations

Measured Depth (m)	Vertical Depth (m)	Name	Lithology	Dip (°)	Dip Direction (°)
3.60	3.60	Drift		0.00	
65.50	65.50	Dundee		0.00	
71.60	71.60	Lucas		0.00	
182.80	182.80	Bois Blanc		0.00	
239.20	239.20	Bass Islands		0.00	
289.80	289.80	G Shale		0.00	
320.30	320.30	F Shale		0.00	
359.90	359.90	E Carbonate		0.00	
365.70	365.70	C Shale		0.00	
393.18	393.10	B Salt		0.00	
441.85	438.30	A-2 Carbonate		0.00	
455.65	449.50	A-2 Anhydrite		0.00	
458.90	452.00	A-1 Carbonate/ Guelph		0.00	

Plan Annotations

Measured Depth (m)	Vertical Depth (m)	Local Coordinates +N/-S (m)	Local Coordinates +E/-W (m)	Comment
374.26	374.26	0.00	0.00	KOP#1= 374m
458.83	451.94	26.45	-11.14	EOB #1; Inc.= 40.6°
478.83	467.14	38.43	-16.19	KOP #2= 479m
595.92	509.38	135.05	-56.88	Leg #2 KOP= 596m
847.70	520.50	350.28	-185.64	Leg #1 TD= 848m

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #2		
Design:	9165951R Leg #2 P7 (mb/sh)		

Project	BAYFIELD		
Map System:	Universal Transverse Mercator	**System Datum:**	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	Zone 17N (84 W to 78 W)		

Site	(Stanley 9-8-NBR) BR et al 2					
Site Position:			**Northing:**	4,821,915.80 m	**Latitude:**	43° 32' 53.986 N
From:	Map		**Easting:**	447,260.00 m	**Longitude:**	81° 39' 10.386 W
Position Uncertainty:		0.00 m	**Slot Radius:**		**Grid Convergence:**	-0.45 °

Well	BR et al					
Well Position	**+N/-S**	0.00 m	**Northing:**	4,821,915.80 m	**Latitude:**	43° 32' 53.986 N
	+E/-W	0.00 m	**Easting:**	447,260.00 m	**Longitude:**	81° 39' 10.386 W
Position Uncertainty		0.00 m	**Wellhead Elevation:**		**Ground Level:**	246.20 m

Wellbore BR et al 2 Leg #2

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF200510	29/04/2009	-8.74	70.62	54,975

Design 9165951R Leg #2 P7 (mb/sh)

Audit Notes:

Version: **Phase:** PROTOTYPE **Tie On Depth:** 595.92

Vertical Section:	Depth From (TVD) (m)	+N/-S (m)	+E/-W (m)	Direction (°)
	0.00	0.00	0.00	358.96

Plan Sections

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	+N/-S (m)	+E/-W (m)	Dogleg Rate (°/30m)	Build Rate (°/30m)	Turn Rate (°/30m)	TFO (°)	Target
595.92	87.48	337.16	509.38	135.05	-56.88	0.000	0.000	0.000	0.00	
601.92	86.08	339.59	509.72	140.62	-59.08	14.000	-6.987	12.152	120.00	
762.35	77.02	54.95	537.24	281.09	-16.80	14.000	-1.694	14.092	102.40	
776.84	77.02	54.95	540.50	289.20	-5.24	0.000	0.000	0.000	0.00	BR 2 Leg #2 TD

Phoenix Technology Services LP

Planning Report

Database:	Compass PHXDB	**Local Co-ordinate Reference:**	Site (Stanley 9-8-NBR) BR et al 2
Company:	TRIBUTE RESOURCES	**TVD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Project:	BAYFIELD	**MD Reference:**	ESt. KB @ 250.50m (Original Well Elev)
Site:	(Stanley 9-8-NBR) BR et al 2	**North Reference:**	True
Well:	BR et al	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	BR et al 2 Leg #2		
Design:	9165951R Leg #2 P7 (mb/sh)		

Planned Survey

Measured Depth (m)	Inclination (°)	Azimuth (°)	Vertical Depth (m)	Subsea Depth (m)	+N/-S (m)	+E/-W (m)	Vertical Section (m)	Dogleg Rate (°/30m)
Leg #2 KOP= 596m - BR 2 Start Hz								
595.92	87.48	337.16	509.38	-258.88	135.05	-56.88	136.06	0.000
600.00	86.53	338.81	509.59	-259.09	138.83	-58.40	139.86	14.000
601.92	86.08	339.59	509.72	-259.22	140.62	-59.08	141.67	14.000
630.00	83.39	352.47	512.30	-261.80	167.69	-65.82	168.86	14.000
660.00	80.89	6.38	516.43	-265.93	197.33	-66.13	198.50	14.000
690.00	78.91	20.46	521.71	-271.21	225.98	-59.31	227.02	14.000
BR 2 Leg #1 TD								
720.00	77.60	34.70	527.85	-277.35	251.95	-45.76	252.74	14.000
750.00	77.03	49.04	534.47	-283.97	273.68	-26.28	274.12	14.000
End Turn								
762.35	77.02	54.95	537.24	-286.74	281.09	-16.80	281.35	14.000
Leg #2 TD= 777m								
776.83	77.02	54.95	540.50	-290.00	289.19	-5.25	289.24	0.000
BR 2 Leg #2 TD								
776.84	77.02	54.95	540.50	-290.00	289.20	-5.24	289.25	0.002

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (m)	+N/-S (m)	+E/-W (m)	Northing (m)	Easting (m)	Latitude	Longitude
BR 2 Start Hz	0.00	0.00	508.50	116.64	-49.12	4,822,032.82	447,211.80	43° 32' 57.767 N	81° 39' 12.576 W
- plan misses target center by 20.00m at 595.92m MD (509.38 TVD, 135.05 N, -56.88 E)									
- Point									
BR 2 Leg #1 TD	0.00	0.00	520.50	350.29	-185.65	4,822,267.53	447,077.11	43° 33' 5.340 N	81° 39' 18.660 W
- plan misses target center by 171.15m at 720.00m MD (527.85 TVD, 251.95 N, -45.76 E)									
- Point									
BR 2 Leg #2 TD	0.00	0.00	540.50	289.20	-5.24	4,822,205.03	447,257.03	43° 33' 3.360 N	81° 39' 10.620 W
- plan hits target center									
- Point									

Casing Points

Measured Depth (m)	Vertical Depth (m)	Name	Casing Diameter (mm)	Hole Diameter (mm)
458.90	452.00	ICP		

Plan Annotations

Measured Depth (m)	Vertical Depth (m)	Local Coordinates +N/-S (m)	Local Coordinates +E/-W (m)	Comment
595.92	509.38	135.05	-56.88	Leg #2 KOP= 596m
762.35	537.24	281.09	-16.80	End Turn
776.83	540.50	289.19	-5.25	Leg #2 TD= 777m

Section 4.0 - Drilling Procedures

Section 4.1 - PreSpud

1) Fresh Water Well Samples

Samples from fresh water wells will be taken in compliance with Bayfield Resources Inc.'s fresh water well sampling policy as developed by Stantec. Ensure that copies of these reports are sent to the London office and to Eastern Oilfield Services' office in Bothwell.

2) Site Preparation

Prepare drilling location as follows:

a) Locate all drainage tiles crossing lease area.
b) Strip and properly stock pile all soil from the lease
c) Cut, block, and divert drainage tiles as required
d) Install fabric and stone to ensure minimal mud is tracked from the location in times of inclement weather.
e) Construct adequate berms around lease and access road as required.

Install an 1800mm by 2 meter long vertical culvert to stabilize the surface ground around the well.

3) Government Notification of Spud

48 hours prior to spud, notify the Ministry of Natural Resources – Petroleum Resources Section by fax @ (519) 873-4645 of the date of commencement of drilling operations.

4) Signs

Install rig signs on access road to lease.

5) Safety Meeting

Conduct a pre-spud safety meeting with each rig. Toolpush and all crew members must be present. A similar meeting shall be conducted with the remaining crew(s) as they come on duty. Additional safety meetings shall be conducted at the Well Site Supervisor's discretion.

Section 4.2 - Conductor Casing

1) Drilling Method

Move in and rig up water well pull-down rig. Mix up viscous spud mud with bentonite gel and hook up air pack. Drill 508mm conductor hole to bedrock top, to an approximate depth of 66m. Note any occurrence of water flows or fluid losses. Only drill into bedrock sufficient distance to obtain a casing seat. Work each joint sufficiently to stabilize that part of the conductor hole prior to making the next connection. Once conductor TD is reached and the hole is stable, dummy trip drill string to ensure the continued stability of the hole for running conductor casing.

2) Cement Squeeze (if necessary)

If major loss circulation of water flows are found in the drift and are not healed with the bentonite gel or if the sands and gravels become unstable, a drilling mud feed rate will be established and a cement squeeze will be performed, using the cement volumes determined by the Well Site Supervisor. WOC 12 hours and drill past the cement squeezed zone and monitor the mud returns to determine if the lost circulation or hole instability has been healed. If necessary, the process will be repeated until full circulation is regained.

3) Casing Installation

Once the conductor hole is stable, RIH 406mm conductor casing, welding each joint. Cut a mule shoe on bottom to assist in rotating in the casing if rotating becomes necessary to reach bedrock. Once bedrock is contacted, rotate casing sufficiently to obtain at least a partial seat. With the casing seated, carefully attempt to pump water down the inside of the 406mm casing to see if circulation can be obtained. If circulation can be obtained, cement in the conductor casing by pumping sufficient cement to cement the 508mm hole/406mm casing to surface with RFC Light cement plus 2%$CaCl_2$ plus Cemnet with 200% excess displaced with water to within 5 meters of the bedrock top. If cement returns are not received at surface, the annulus between the cement top and surface will be filled with bentonite pellets to secure the conductor. Wait on cement 12 hours to allow RFC to gain as much compressive strength as possible.

Section 4.3 - Surface Hole & Surface Casing

1) Drilling Method

Drill a 384mm hole to approximately 120m to drill past all possible fresh water zones with gel mud and/or air as required. Ensure the drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Record on daily drilling reports any lost circulation zones and associated static levels and any unusual hole conditions. If lost circulation is encountered, cement squeezes may be necessary to seal off the zone sufficiently to ensure a successful surface casing cement job. If sulphur water returns or sulphur water smells are noted prior to reaching the projected 120m surface hole total depth, stop drilling immediately and install the surface casing at that depth. Dummy trip the drill string up to the conductor casing prior to pulling out to run surface casing.

2) Cement Squeeze (if necessary)

If major loss circulation is found in the karsted Dundee and Lucas and is not healed with the bentonite gel, an injection rate will be established and a cement squeeze will be performed, using the cement volumes determined by the Well Site Supervisor. WOC 12 hours and drill past the cement squeezed zone and monitor the mud returns to determine if the lost circulation has been healed. If necessary, the process will be repeated until full circulation is regained.

3) Casing Installation

Depending upon hole conditions encountered, the 340mm casing will be run in the following manner:

- Guide Shoe
- Centralizers coincident with the shoe of the conductor casing
- 340mm casing to surface
- Thread lock guide shoe and 1st joint

Move in and rig up cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Chain the surface casing and elevators to the rig floor to prevent/minimize hydraulicing. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using the rig pump. The casing and the hole will be circulated with fresh water by the water well rig for 15 minutes to clean the borehole. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 2.0m^3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle, and end of the cement job. Mix and pump RFC Light plus Cemnet plus 2% $CaCl_2$ lead cement followed by Class G 0-1-0% neat cement plus Cemnet plus 2% $CaCl_2$. A minimum of 200% excess will be pumped to ensure that the 340mm casing is cemented to surface. Displace cement with sufficient water to have cement top inside 340mm casing about 5m above shoe. Close valves and bleed off surface line pressure. Wait on cement at least 12 hours before slacking off casing and checking level in the 406mm/340mm annulus.

Section 4.4 - 1st Intermediate Hole & Intermediate Casing

1) Annular Cement Level Check

If cement is not visible at surface between the 406mm and 340mm casings, run in annulus with spaghetti string and determine the cement top. Move in and rig up cementers and grout annulus to surface with cement. The wait on cement time will be extended a further 48 hours to compensate for pumping of the additional cement. Once 406mm/340mm cement top is at surface, rig out and move off water well pull-down rig.

2) Move on and rig up rotary drilling rig

Move on and rig up rotary drilling rig to drill the balance of the well. Rig up completely. Measure and record the distance from KB to ground and the KB elevation – include these measurements on the daily reports and the next morning report. If necessary, cut 340mm casing stickup and weld on a slip-on weld-on collar, then install a 340mm 8rd by 346mm 14MPa casing bowl at surface. Ensure 60mm side outlets on casing bowl have XH nipples and valves installed.

3) BOP Installation

Monitor cement samples for hardness. If cement samples are set to the satisfaction of the Wellsite Supervisor, proceed with the installation of the BOP's. Install BOP's on the 346mm 14MPa casing flange as per MNR requirements.

4) Logging

Move in and rig up Weatherford Wireline Inc. With hole full of fresh water, run in hole with cement bond log tool and bond log the 340mm casing cement job. Be prepared to perform a pressure pass if required. Rig out Weatherford Wireline and release.

5) Pressure Testing

All pressure tests will be done using fresh water:

- Pressure test casing, blind rams, HCR, and choke manifold to 3500kPa for 10 minutes each and record the results on the daily drilling reports.
- Run in hole drill string with 311mm bit. Pressure test pipe rams and annular to 3500kPa or as high as possible without hydraulicing out the drill string. Drill out cement and 0.5m of new formation. With the hole full of fresh water perform a pressure integrity test to a bottom hole pressure equivalent to 18 kPa per meter and record results on the daily drilling reports.

6) Drilling Method

Drill a 311mm hole 5m ± into the F Shale formation, to an approximate depth of 301m. Run single shot directional surveys at a minimum every 50 meters to record any hole deviation. Depending upon the severity of loss circulation and/or caving of the hole, consideration will be given to squeezing cement to heal the loss zones and to provide stability to the hole.

Ensure that drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Record on daily reports any influx of fluids (water and/or hydrocarbons), any loss circulation and its rate, and any unusual hole conditions.

7) Casing Installation

Depending upon hole conditions encountered, the 244mm casing will be run in the following manner:

- Guide Shoe
- 244mm joint of casing
- Float Insert or Float Collar
- Centralizers will be installed on the 2nd, 5th, and 8th joint and every 10 joints to surface
- 244mm casing to surface
- Thread lock guide shoe, float collar, and 1st joint

8) Cementing Procedures

Move in and rig up Cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using rig pump. The casing and the hole will be circulated with fresh water for

15 minutes to clean the borehole prior to cementing. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 3.0m^3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle and end of the cement job. Mix and pump sufficient RFC Light lead cement plus 2%$CaCl_2$ plus Cemnet followed by Class "G" 0-1-0% cement plus 2%$CaCl_2$ plus Cemnet to cement the 244mm casing to surface using 150% excess on the lead cement and 50% excess on the neat cement. Displace cement and bump plug to 3500kPa over final pumping pressure – do not exceed 60% of internal yield pressure of casing. Once plug is bumped, bleed off landing pressure and close cement head valves. Flush out BOP stack to clear stack of cement. Wait on cement at least 12 hours before slacking off casing and checking cement level in the 340mm x 244mm annulus.

Section 4.5 – 2nd Intermediate Hole & Production Casing

1) Annular Cement Level Check

If cement is not visible at surface between the 340mm and 244mm casings, run in annulus with spaghetti tubing and determine the cement top. Move in and rig up cementers and grout annulus to surface with cement. The wait on cement time will be extended a further 48 hours to compensate for the pumping of additional cement.

2) Installation of the BOP's

Check cement samples for hardness – if cement samples are set to the satisfaction of the Wellsite Supervisor, proceed with rigging up the second intermediate hole BOP's. Rig out the 346mm BOP's, unscrew the 346mm 14MPa x 340mm casing bowl, cut off the 244mm casing stickup and install the 244mm slip-on/weld-on x 279mm 14MPa casing bowl and BOP's. Install BOP's as per MNR requirements. Stump test BOP's prior to installation.

3) Logging

Move in and rip up Weatherford Wireline. With hole full of fresh water, run in hole with cement bond log tool and bond log the 244mm casing. Be prepared to perform a pressure pass if required. Rig out Weatherford and release.

4) Pressure Testing

Pressure test BOP stack using fresh water – do not proceed to the next step until each component of the stack passes the pressure test:

- Pressure test blind rams, casing, kill lines and manifold to 1400 kPa low and 7000 kPa high for 10 minutes each and record results on tower sheets
- Run in hole 222mm drill bit, drill collars, and drill pipe.
- Pressure test pipe rams, annular preventer, Kelly cock, standpipe, swivel, safety valves, etc to 1400 kPa low and 7000 kPa high to 10 minutes each and record results on tower sheets.
- Drill out cement, plug, and 0.5m of new formation and with the hole full of fresh water, perform a pressure integrity test to a bottom hole pressure equivalent to 18 kPa per meter and record the results on the tower sheets. Drill out as slowly and carefully as possible with a minimum weight on bit.

5) Drilling Method

Drill ahead 222mm 2nd intermediate hole with existing drilling mud to 350m. Circulate the drilling fluid over to saturated brine. Continue to drill a 222mm hole to the kick off point (KOP) of 374mKB. Circulate hole clean at 374m, then POOH drill string. Continue to run single point deviation surveys to the kick-off point. Ensure that drill cutting samples are taken every 3 meters and placed in the sample bags provided by the Ministry of Natural Resources. Drillers will be required to record information regarding connections, depth, drill breaks, down time, etc. and all data regarding operations or changes to operations on the geolograph charts. Record on daily tower sheets any influx of fluids (water and/or hydrocarbons), loss circulation (rate and depth) and any unusual hole conditions.

Pick up bit, bend sub, motors, monels, etc as directed by the directional hand and RIH to 374mKB. Orientate bit and build angle as per the directional planning report. Be aware of the thick B Salt section (45mTVD) to ensure the wellbore does not lose build rate. TD for the 2nd intermediate hole will be in the A2 Anhydrite at an approximate depth of 459mMD and inclination of 41^{o} as picked by the wellsite geologist.

Circulate hole clean at the 2nd intermediate hole TD, then POOH and lay down big collars, etc.

6) Logging

Rig up Baker Atlas wireline unit. RIH Gr-Z Density-CNL log and log from TD to the base of the 244mm casing. Continue with Gr-CNL to surface. Rig out Baker Atlas.

7) Casing Installation

The 178mm casing will be run in the following manner:

- 178mm Guide Shoe
- 1 joint 178mm casing
- 178mm float collar
- 178mm casing to surface
- Centralizers will be installed on the 2nd, 5th, and 8th joint and every 10 joints to surface.
- Thread lock guild shoe, float collar, and 1st joint.

8) Cementing Procedures

Move in and rig up Cementers. Ensure pressure recorder is rigged in and serviceable. Pressure charts will be attached to the job ticket. Conduct a pre-job safety meeting to confirm volumes and procedures. Establish circulation using rig pump and circulate with fresh water for 15 minutes to clean the borehole. Pressure test surface equipment to 60% of internal yield of casing. Pump preflush of 3m3 of fresh water, with the addition of loss circulation material if necessary. Ensure that a minimum of 4 cement samples are taken and represent the cement at the beginning, middle, and end of the cement job. Mix and pump sufficient Class “G” 0-1-0% cement mixed in 20% salt water with a density of 1933 kg/m^3 tailed with sufficient Glass “G” 0-1-0 neat cement with 2% $CaCl_2$, with a density of 1901 kg/m3 to cement the 178mm casing to surface plus 50% excess and to have the Class G tail cement top up to at least the base of the C Unit. If loss circulation is a concern, consideration will be given to running gel cement across the porous zone(s) or using Cemnet throughout the job. Displace cement and bump plug to 3,500kPa over final displacement pressure – do not exceed 60% of internal yield pressure of casing. Once plug is bumped, bleed casing pressure back, close cement head valves and bleed off surface line pressure. Flush any cement out of BOP’s with water. Wait on cement at least 24 hours before slacking off casing.

While waiting on cement, transfer brine from rig tanks and haul in clean fresh water.

Section 4.6 – Horiz. #1 Main hole, Horiz. #1-Lat. #1 Main hole

1) Pressure testing/Logging/Drill Out Procedures

Once cement samples are set, especially the salt cement samples, slack off 178mm casing, unbutton BOP’s, lift stack, set 178mm casing slips in 279mm casing bowl, then cut 178mm casing above casing bowl. Dress cut, install primary packing and secondary seals, then install 279mm 14MPa x 179mm 14MPa tubing spool. Install 179mm 14MPa double *g*ate BOP’s and annular on tubing spool. Pressure test blind rams, kill line and manifold to 1,400kPa low/7,000kPa high pressures. RIH 159mm button bit on drill string and tag cement top. Pressure test pipe rams and annular to 1,400kPa low/7,000kPa high. If underdisplaced cement is well above float collar, drill out cement down to within 5 meters of float collar. Circulate well to clean fresh water. POOH and rack drill string.

Fill casing to surface with water and ensure fluid is stable (no bubbles, etc). Ensure 103mm 14MPa and 52mm 14MPa wing valves are installed on tubing spool. Rig up high pressure pump and electronic pressure gauge to wellhead and pressure casing, wellhead and BOP’s to at least 10MPa. Hold pressure for at least 2 hours. Download electronic recorder data to ensure the recorders worked then bleed off casing pressure.

Rig up Baker Atlas. Run CBL log from cement top to surface. Lay down bond log tool and pick up Vertilog tool. Run base line Vertilog from cement top to surface. Rig out Baker Atlas.

RIH 159mm tooth bit on drill string with MWD, bent sub, and monels to cement top. Drill out underdisplaced cement and wiper plug and ½ meter new formation. Conduct pressure integrity test on 178mm cement job to a gradient of at least 18kPa/m.

2) Horizontal 1 Main hole drilling procedures

Review BOP shut-in procedures and run BOP drills with all crews prior to entering the Guelph gas storage zone. Drill with rotation for sufficient length below the 178mm casing seat to allow orientation without metal influence. Orientate bent sub and bit and continue to build angle to horizontal at a planned depth of 576mMD (508.5mTVD). Once wellbore is horizontal, drill ahead as per the directional drilling planning report (called “Leg #1” by Phoenix) subject to changes from the wellsite geologist. Ensure to build a small side door while drilling the Hor 1 wellbore to allow for the Horiz. #1-Lat. #1 wellbore to be started easily. Monitor flowline for signs of fluid losses once porous Guelph reef is contacted. Do not mix up LCM material to combat loss circulation. Continue to haul in fresh water if required to keep up with fluid losses. If necessary, mix up and pump gell plug sweeps to clean horizontal section to avoid cuttings settling and potential sticking. Drill ahead Horizontal 1 wellbore to planned total depth of 847.7mMD (520.5mTVD). Circulate at TD for 1 hour to move cuttings up horizontal section and hopefully out of the well.

3) Horizontal 1-Lateral 1 Main hole drilling procedures

Pull drill string up horizontal wellbore to Horiz. #1-Lat. #1 kick off depth of 569mMD (509.4mTVD). If necessary, POOH to adjust bent sub motor, then reposition bit at kick-off point. Orientate bent sub and bit and slowly dig the Horiz. #1-Lat. #1 wellbore out the side of the Horiz. #1 existing wellbore. Once the wellbore is away from the Horiz. #1 wellbore, add additional WOB and drill ahead Horiz. #1-Lat. #1 wellbore as per Phoenix planning report (called “Leg #2” by Phoenix) subject to changes from the wellsite geologist. Monitor flowline for signs of increased fluid losses. Do not mix up LCM material to combat loss circulation. Continue to haul in fresh water if required to keep up with fluid losses. If necessary, mix up and pump gell plug sweeps to clean horizontal section to avoid cuttings settling and potential sticking. Drill ahead Horiz. #1-Lat. #1 wellbore to planned total depth of 776.8mMD (540.5mTVD). Circulate at TD for 1 hour to move cuttings up horizontal section and hopefully out of the well.

4) Trip out and rig out procedures

Review BOP procedures for shutting in while tripping and prepare a trip sheet. POOH drill string sideways, keeping wellbore full to avoid kicks. Once drill string is pulled, continue to keep well topped up to avoid kicks.

Rig up Weatherford Wireline. Correlate to Baker CBL log and set a wireline set retrievable bridge plug toward the base of the 178mm casing at an approximate depth of 450mMD. POOH wireline and rig out Weatherford.

Pressure test bridge plug to 7MPa to ensure it is sealing. Once the pressure test is complete, bleed off pressure and rig down BOP’s. Install 179mm 14MPa x 52mm 14MPa tubing bonnet on tubing spool and rig out drilling rig. Move rig off location.

5) Evaluation

After the drilling rig has been moved off location, a service rig will be moved on. The wellhead will be configured as an I/W well (179mm master valve), then the rig will swab fluid from above the bridge plug, retrieve the bridge plug, and both the Horiz. #1 and Horiz. #1-Lat. #1 legs in the well will be acidized with endless tubing.

SECTION 5.0 – REPORTING PROCEDURES

Section 5.1 – Tower Sheets

Shall be completed daily and shall include:

1. Bit size, fluid type and weight, weight on bit, deviation surveys, depth at the beginning of the shift and end of each shift.
2. Casing size, grade, weight, and number of joints, centralizers, cement baskets, total length, and setting depth.
3. Cementing information – Service Company, cement type, amount, slurry density, additives, annular fluid returns, volume of displacement fluid and plug down time.
4. Water, gas or oil – type, depth encountered, depth of sample collected and the static level and/or rate of flow.
5. Pressure tests – individually, subsurface pressures, fluid density used in the tests, bleed off rate and duration of test.
6. Logging Details – type and interval.
7. Abandonment details – intervals, amount and type of cement, top of plug and time felt.
8. Rig release – date and time.

Section 5-2 – Worker Injury

Every work related accident or injury shall be reported immediately to the Wellsite Supervisor. The Supervisor shall immediately contact the Ministry of Labour @ 1-800-265-5140 and the Ministry of Natural Resources @ 519-873-4634. The verbal report shall be followed with a written report as per the Occupation Health and Safety Act and the Oil, Gas, & Salt Resources Act and Section 13 of the Operational Standards. The Supervisor will also be responsible for notifying the Operator (Bayfield Resources Inc.) and shall be responsible for the completion of Bayfield's Accident Report Form.

SECTION 6.0 – SAFETY AND PROCEDURES

Section 6.1 – General Safety

1. All works at the well site shall be in compliance with the Occupational Health and Safety Act and the Oil, Gas, & Salt Resources Act and all associated legislation. In addition, all work at the well site shall be done in compliance with good oil field practices. All verbal notification given to and approvals received from government agencies shall be recorded on the tower sheets.
2. Safety meetings are to be held with each crew, at the start of the well and periodically while drilling – meetings shall also be held prior to cementing and upon arrival of the logging company, prior to commencing of directional drilling operations and before the start of underbalanced drilling operations.

3. The Well Site Supervisor shall ensure that the operations are in compliance with all applicable government regulations and shall complete daily walk around rig inspections.

Section 6.2 – Well Control

All blowout prevention systems are to be in strict compliance with MNR regulations. Those function and pressure testing procedures as required by the regulatory bodies, such as daily function testing of the pipe rams, will be strictly adhered to.

1. All pressure tests of blowout prevention equipment will be conducted with fresh water.
2. The following pressure test will be conducted with fresh water prior to drilling out each casing string:
   a. The blind rams, kill lines and choke manifold will be tested to 1400kPa low and 7000kPa high for 10 minutes each.
   b. The blind rams, Kelly cock, stand pipe, swivel, safety valves, etc. will be tested to 1400 kPa low and 7000 kPa high for 10 minutes each.
   c. The annular preventer will be tested to 1400 kPa low and 7000 kPa high for 10 minutes each.
3. Upon drilling out the casing, drill 0.5m to 1.0m of new hole and test the formation to a minimum bottom hole pressure of 18kPa per meter.
4. After one day of drilling below the casing shoe, check the entire blowout prevention system and tighten all bolts.
5. Crews should be kept alert and familiar with the blowout prevention equipment. At least one member of the crew who has been trained in blowout prevention and well control procedures must be on the floor at all times.
6. Conduct blowout prevention drills prior to drilling out casing and once per week thereafter. Ensure that the drills are recorded in the tour book.
7. The blowout preventers are to be function tested once per tour. Ensure that the function test is recorded on the daily tour sheets.

D 2-4

Application for Well License

Bayfield Resources et al #2 (Horiz. #1-Lat. #1), Stanley 9-8-NBR

Table of Contents Page

Oil, Gas and Salt Resources Act

Phone Number of Landowner

Ministry of Natural Resources / Ministère des Richesses naturelles
Ontario

Application for a Well Licence

Form 1

To the Minister of Natural Resources

v.2000-08-18

The undersigned operator applies for a well licence under the Oil, Gas and Salt Resources Act and the Regulations thereunder and submits the following information, together with the application fee of $100 + 7%GST.

1. WELL NAME Bayfield Resources et al #2 (Horiz.#1-Lat.#1), Stanley 9-8-NBR — Target Formation: Guelph

Purpose of Proposed Well (Well Type): Injection/Withdrawal

2. NAME OF OPERATOR Bayfield Resources Inc. — Tel # 519-657-2151

Address: 309 Commissioners Rd. W. Unit E, London, ON, N6J 1Y4 — Fax # 519-657-4296

3. LOCATION County: Huron — Township: Stanley

Tract: 9 — Lot: 8 — Concession: NBR — Lake Erie: Block ____ Tract ____

Lake Erie licence or lease number: ____

Bottom-hole location — Bottom-hole Latitude: N43 33' 03.359" — Bottom-hole Longitude: W81 39' 10.621"

Surface location metres from Lot Boundaries: 84.10 m North [X] South [ ] — Latitude: N43 32' 53.986"

219.00 m East [X] West [ ] — Longitude: W81 39' 10.387"

Within 1.6 km of Designated Storage Area? Yes [ ] No [X] — Off-target? Yes [X] No [ ]

4. WELL PARTICULARS Vertical [ ] Horizontal [X] Directional [ ] Deepening [ ] Re-entry [ ] Lateral [X]

Rig Type: Rotary [X] Cable [ ] — Well to be cored? Yes [ ] No [X] — Formation at TD: Guelph

Ground Elevation: 246.2 — Proposed Depth: 777m — Proposed Depth TVD: 540m — Proposed Start Date: 1-Jan-10

5. LANDOWNER Stephen Eilers — Tel # 519-236-4408

Address: 73418 Blind Line, RR#1, Zurich, ON, N0M 2T0

Spacing unit shown on attached survey plan is pooled (see O.Reg.245/97 definitions: "pooled spacing unit") Yes [X] No [ ]

6. DRILLING CONTRACTOR (if known) unknown

Address

7. PROPOSED CASING AND CEMENTING PROGRAM

Hole Size (mm)	Casing O.D. (mm)	Weight (kg/m)	Grade	New, Used or in-hole	Setting Depth TVD	Setting Formation	CASING SETTING INFORMATION: How Set	Cement Type	Cement Top KB / RF
508	406	96.7	H-40	New	66m	Bedrock-Dundee	Cement	RFClight	surface
384	340	81.10	LS	New	120m	Detroit River	Cement	RFClight/G	surface
311	244	53.6	J55	New	301m	F-Shale	Cement	RFClight/G	surface
222	178	29.76	K55	New	452m	A-2 Anhydrite	Cement	G	surface

8. BLOW-OUT PREVENTION EQUIPMENT 11" blind and pipe rams, 2000 psi annular preventor, rotating head spool and valves fill-up and flare lines (or equivalent to meet standards).

9. WELL SECURITY
Name of Trustee: Giffen & Partners — Address: 465 Waterloo Street, London,Ontario N6B 2K4

Tel # 519-679-4700 — Fax # 519-432-8003 — Total # unplugged wells: 0 — Current Balance: $56,000

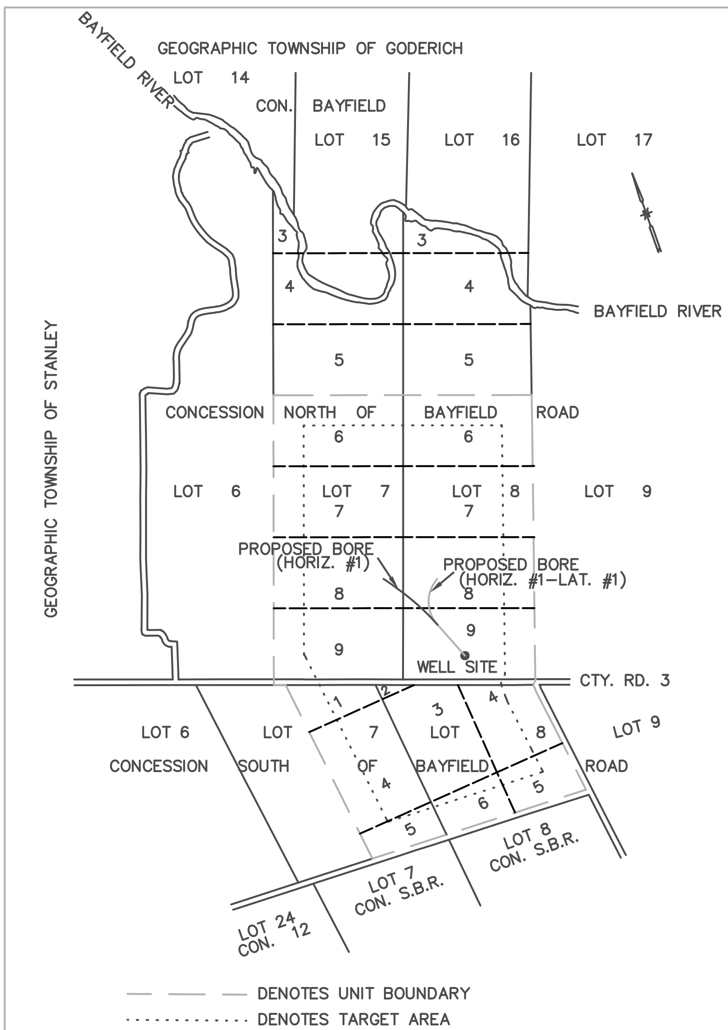
10. REMARKS
Well in Unitized Stanley 7-BNR Pool (Bayfield Pool)

11. ENCLOSURES: Fee [X] Location Plan [X] (Land wells only) Drilling Program [X]

12. AUTHORITY: The undersigned certifies that the information provided herein is complete and accurate, the operator has the right to drill or operate a well in the above location, and he/she has authority to bind the operator.

Date: 15-Sep-09 — Name: J. Lowrie — Signature: J Lowrie

Date of Birth: Feb. 12, 1955. — Title: President



PLAN OF PROPOSED WELL
LOT 8
CONCESSION NORTH OF BAYFIELD ROAD

GEOGRAPHIC TOWNSHIP OF STANLEY

MUNICIPALITY OF CENTRAL HURON

COUNTY OF HURON

SCALE 1:5000

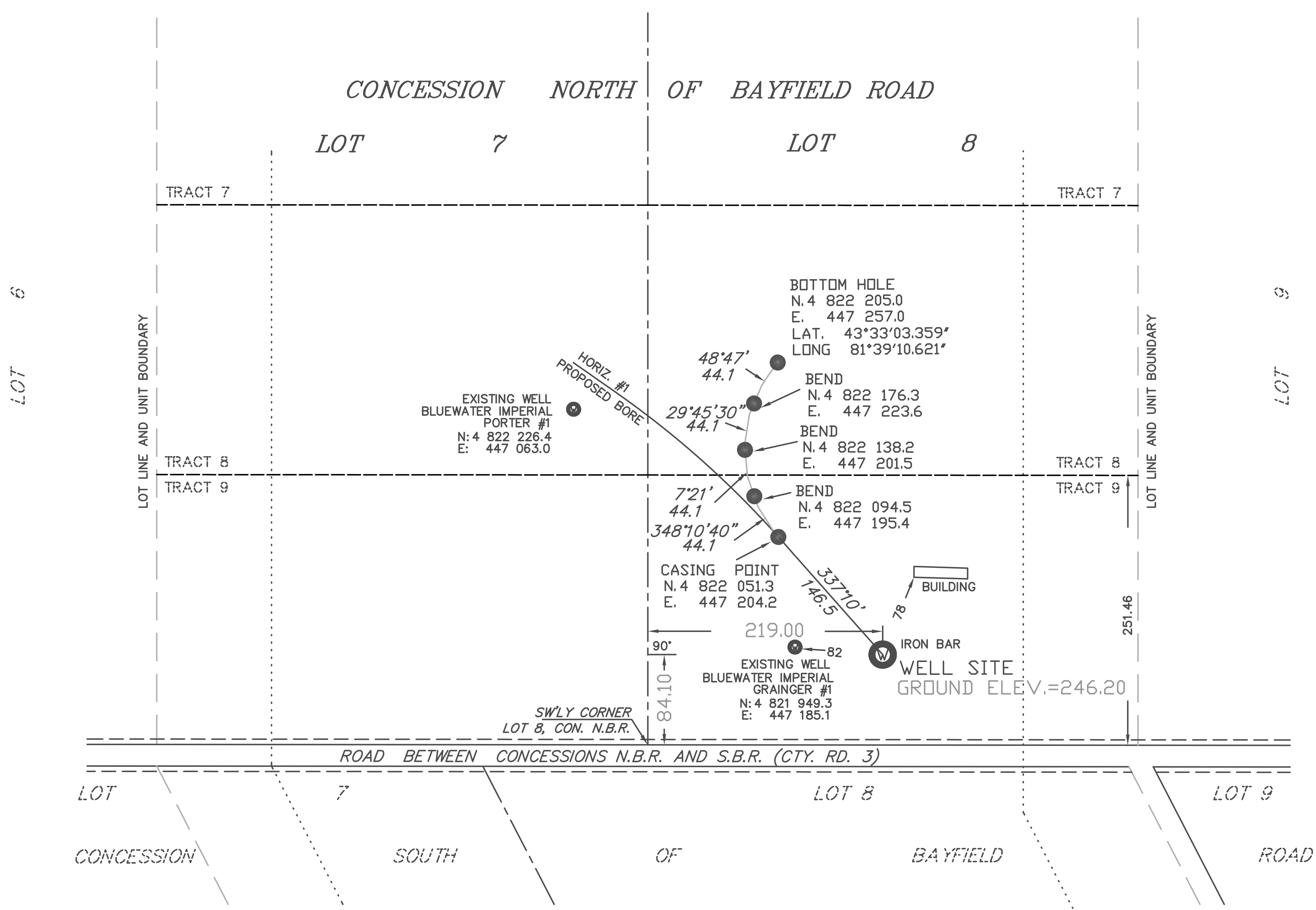
NOTE (WELL SITE) CO-ORDINATES

LATITUDE N.43°32'53.986" LONGITUDE W.81°39'10.387"

U.T.M. N.4 821 915.8 E.447 260.0

WELL NAME

BAYFIELD RESOURCES et. al. #2 (HORIZ. #1 – LAT. #1) – STANLEY – 9 – 8 – N.B.R.



337°10' DENOTES TRUE NORTH AZIMUTH

NOTE GEODETIC HORIZONTAL CONTROL

U.T.M. CO-ORDINATES ARE GEODETIC (DATUM NAD 83) AND REFERRED TO MONUMENTS 00819711196 AND 00819711197

NOTE BENCH MARK

ELEVATIONS ARE REFERRED TO GEODETIC DATUM AND REFERENCE BENCH MARK BEING MONUMENT No.72U095 BAYFIELD
ELEVATION = 199.914

NOTE METRIC

DISTANCES SHOWN ON THIS PLAN ARE IN METERS AND CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

PREPARED BY

BRISCO AND O'ROURKE

1425331 ONTARIO LIMITED

SERVING THE PETROLEUM INDUSTRY
THROUGHOUT ONTARIO
WELLS,CONSTRUCTION AND TECHNICAL SURVEYING
DIGITAL MAPPING
LAND AND LEASE SURVEYS
OFFICE (519) 351-5073
CELL (519) 401-5073
FAX (519) 351-3119
P.O.BOX 327 – N7M-5K4
CHATHAM , ONTARIO

PREPARED FOR

BAYFIELD RESOURCES INC.

FILE NO. 09-4926	PLAN NO. BAY6262.DWG

SEPTEMBER 16, 2009

TIMOTHY J. O'ROURKE C.S.T. A.C.E.T.

AUTHORIZED BY THE MINISTER OF NATURAL RESOURCES UNDER THE PETROLEUM RESOURCES ACT OF ONTARIO

BAYFIELD RESOURCES ET AL #2 (HORIZ. #1-LAT. #1), Stanley 9-8-NBR

DRILLING PROGRAM

Please refer to the drilling program appended to
Tab D, Section 2-3: Bayfield Resources et al #2 (Horiz. #1), Stanley 9-8-NBR application

Bayfield Pool

Connecting Pipeline and Metering Station

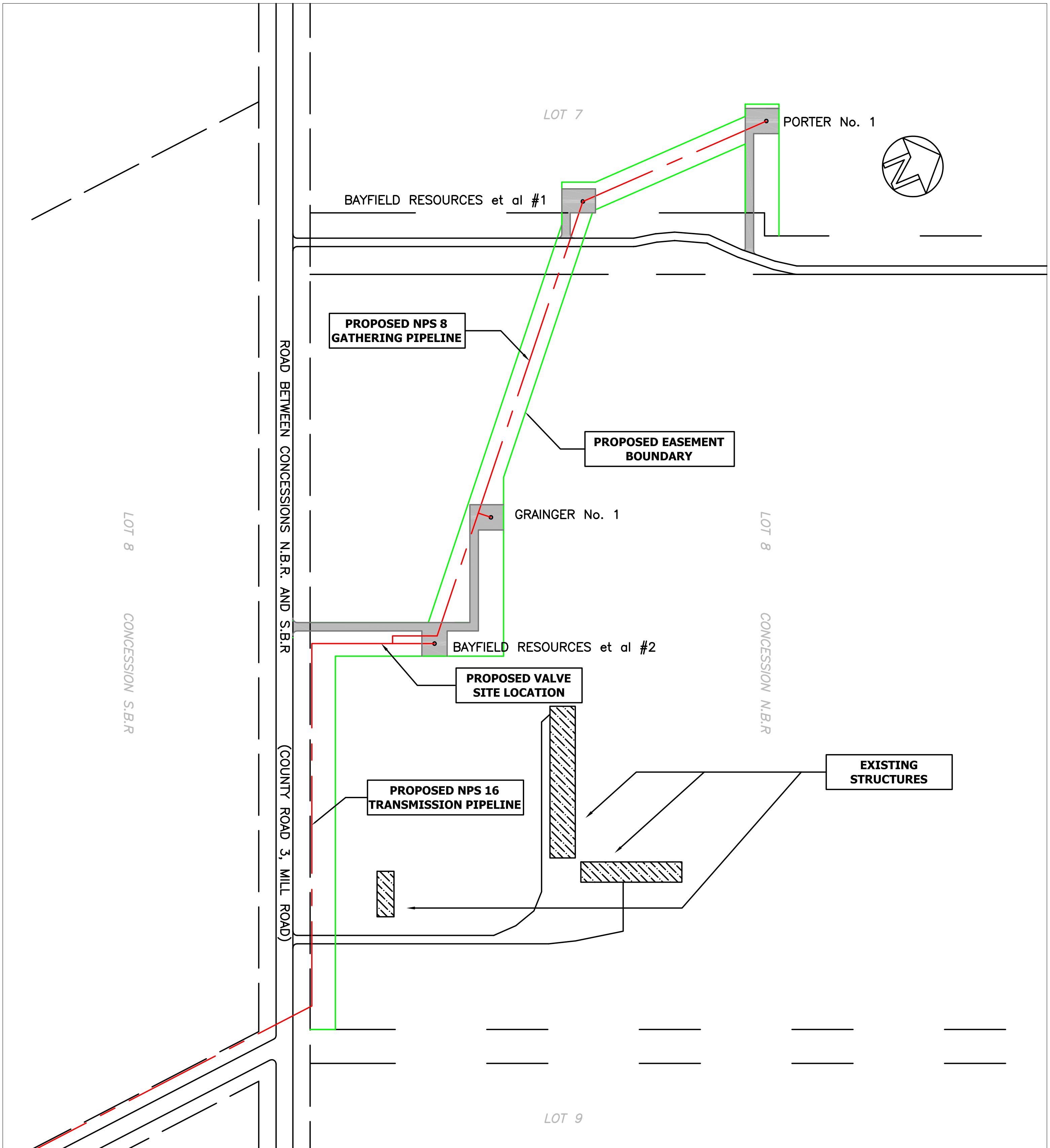
September-18-09

The Bayfield Pool will contain Injection/Withdrawal (I/W) wells with NPS8 pool gathering pipelines that connect the I/W wells to the Pool Meter, Pressure and Volume Control Station (PMPVC Station).

The PMPVC Station is designed to perform all functions outlined below:

1) Measure gas volumes on both injection into and withdrawal from the storage pool.
2) Measure pool gathering system pressures.
3) Remove all free water and other non-gaseous material from the gas stream on withdrawal.
4) Store all fluids recovered on withdrawal in a tank local to the PMPVC Station.
5) Provide control valve functioning to hold back injections into the storage pool to allow the other storage pool(s) in the system to preferentially accept more of the gas discharging from the compressor station.
6) Provide Emergency Shut-Down (ESD) capabilities to remotely shut in the pool.
7) Provide pig launching capabilities to allow the transmission line from the storage pool to be pigged.
8) Collect pressure measurements from the Observation Well(s) for the pool.
9) Send gas measurement and pressure data from the pool back to the central control system located at the compressor station. Receive signals from the central control system for control valve adjustment and ESD valve functioning.
10) House the cathodic protection rectifier that will provide cathodic protection to the I/W and Observation wells and to the storage pool gathering system.
11) Allow for tying-in additional I/W wells to the PMPVC Station piping if additional I/W wells are required in the future.

The major pieces of equipment at the PMPVC Station are a bi-directional ultrasonic meter, vertical coalescing filter/slug catcher, storage tank, ESD valve, and control valve. With the relatively small footprint of the equipment required in the PMPVC Station, Bayfield Resources plans to align the equipment parallel to one of the laneways serving the I/W wells to minimize the ground disturbance associated with permanent gas storage operations.



REVISIONS

NO.	DATE	BY	APP'D	REMARKS

CONNECTING PIPELINE AND METERING STATION PLAN - BAYFIELD POOL

DRAWN BY: C. BUTLER	DATE: 09/11/2009	SCALE: NTS
CHECKED BY:	DATE:	
APPROVED BY:	DATE:	SHEET: 1 of 1

Connecting Pipeline Design Specifications
(as per CSA Z662.07: Oil and Gas Pipeline Systems)

Location	Class 1	Class 2
Design Factor, F	0.8	0.8
Total Distance	< 1 kms	0.0 kms
Location Factor, L - General	1.000	0.900
Location Factor, L - Roads	0.750	0.625
Location Factor, L - Stations	0.625	0.625
Corrosion Allowance, ca	None	None
Isolation valve spacing	None req'd	25 kms
Maximum Allowable Operating Pressure	9930 kPa (1440 psi)	9930 kPa (1440 psi)
Test Medium	Water	Water
Minimum Test Duration	8 hrs	8 hrs
Minimum Strength Test Pressure	12500 kPa (1820 psi)	12500 kPa (1820 psi)
Valve/Flange Pressure Rating	PN 100 (ANSI 600)	PN 100 (ANSI 600)
Minimum Depth of Cover		
Along Road Allowances	1.5 m	1.5 m
Road Crossings	2.0 m	2.0 m
Stream/River Water Crossings	1.5 m	1.5 m
Drain Crossings	1.5 m	1.5 m
Agricultural Land	1.0 m	1.0 m

Pipe Specifications

	Metric Units	Imperial Units
Nominal Pipe Size	NPS8	NPS8
Pipe OD	219 mm	8.625 in
Wall Thickness - Class 1 General	4.0 mm	0.156 in
Wall Thickness - Class 1 roads	4.0 mm	0.156 in
Wall Thickness - Class 1 stations	5.2 mm	0.203 in
Wall Thickness - Class 2 roads	5.2 mm	0.203 in
Wall Thickness - Class 2 stations	5.2 mm	0.203 in
Grade	448	65,000
Category	II	II
Pipe Type	ERW	ERW
Coating	Yellow Jacket	Yellow Jacket

Stantec Consulting Ltd.
49 Frederick Street
Kitchener ON N2H 6M7
Tel: (519) 579-4410

Stantec

September 21, 2009
File: 1609-00533/04

Bayfield Resources Inc.
309 Commissioners Rd W., Unit E
London, Ontario, N6J 1Y4

Attention: Mr. Bill Blake

Dear Mr. Blake:

Reference: Private/Residential Well Monitoring Program
Bayfield Storage Pool Project

Stantec Consulting Ltd. (Stantec) is pleased to provide Bayfield Resources Inc. (Bayfield Resources) with the recommended monitoring program for private well monitoring in the vicinity of the Bayfield Storage Pool.

Bayfield Resources is currently developing the Bayfield Storage Pool which consists of two existing gas wells (Well T008752 and Well T008753) and two (2) proposed gas wells (Bayfield Resources et al #1, Stanley 9-7-NBR and Bayfield Resources et al #2 (Horiz.#1), Stanley 9-8-NBR). Drilling of proposed gas well Tribute et al #30 within the Bayfield Storage Pool began in December 2008 but the well has since been plugged and abandoned in accordance with current standards. Construction of the two (2) proposed gas wells (Bayfield Resources et al #1, Stanley 9-7-NBR and Bayfield Resources et al #2 (Horiz.#1), Stanley 9-8-NBR) has not commenced and timing is still being confirmed.

The following letter presents the proposed monitoring program for the Bayfield Storage Pool, which is intended to establish groundwater conditions for comparative purposes should groundwater interference complaints arise as a result of the future construction or operation of the proposed works.

Bayfield Storage Pool Monitoring Program

Baseline water quality monitoring was completed in October/November 2008 for residential wells within the Bayfield Storage Pool designated storage area (DSA) and/or within a 1 km radius of existing gas wells (Well T008752 and Well T008753) and proposed gas well Tribute et al #30 (Stantec, 2009[1]). The monitoring program included water quality sampling (general chemistry, metals, anions, methane, ethane, ethene, propane and hydrogen sulfide), and documenting water supply details and residential concerns. Following sampling, water quality results were provided in an individual letter to each resident.

Stantec recommends that prior to drilling of Bayfield Resources et al #1, Stanley 9-7-NBR and Bayfield Resources et al #2 (Horiz.#1), Stanley 9-8-NBR, the baseline monitoring program completed by Stantec (2009) be reassessed to evaluate if any additional baseline residential sampling is required prior to drilling. Additional sampling may be required if the extent of the 1 km radius is significantly altered based on the proposed locations of the two (2) gas wells.

Stantec also recommends residential water quality sampling, for the parameters detailed above, following drilling of the vertical component of Bayfield Resources et al #1, Stanley 9-7-NBR and

[1] Stantec, 2009. Residential/Private Well Monitoring Program, Bayfield Storage Pool. Prepared for Tribute Resources Inc., Feb. 2009.

Reference: Private/Residential Well Monitoring Program
Bayfield Storage Pool Project

Bayfield Resources et al #2 (Horiz.#1), Stanley 9-8-NBR and annual sampling in each of the five (5) years following the year in which natural gas is first injected into the Bayfield Storage Pool.

The proposed monitoring program for the Bayfield Storage Pool Project is similar in scope to previous storage pool monitoring programs completed by Stantec. The monitoring program should be modified to include any additional sampling required by the Ontario Energy Board (OEB).

We trust that this proposed monitoring program meets your current requirements. Individual work programs and cost estimates can be completed for the recommended monitoring as requested. If there are any questions or concerns, please do not hesitate to contact the undersigned.

Sincerely,

STANTEC CONSULTING LTD.

Lesley Veale
Hydrogeologist
Tel: (519) 585-7377
Fax: (519) 579-4239
lesley.veale@stantec.com

Roger Freymond
Senior Hydrogeologist
Tel: (519) 585-7381
Fax: (519) 579-4239
roger.freymond@stantec.com

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Bayfield Pool
Reservoir Monitoring Program
September-18-09

The Bayfield gas storage pool (the "Bayfield Pool") will be developed for gas storage with up to four (4) wellbore penetrations. The two existing wells in the pool, Bluewater Porter #1, Stanley 7-BRN and Bluewater Grainger #1, Stanley 8-BRN will be converted to Observation wells or Injection/Withdrawal (I/W) wells. If the wells cannot be brought up to current storage standards, they will be plugged and abandoned. Bayfield Resources et al #1, Stanley 9-7-NBR will be drilled as a vertical well to obtain a core of the Salina A2 Anhydrite cap rock to the Guelph reef. The well will be drilled to the base of the reef and cased as a vertical Injection/Withdrawal (I/W) well. A horizontal drainhole, Bayfield Resources et al #1 (Horiz. #1), Stanley 9-7-NBR will be drilled from the vertical well to contact additional high quality dolomite, with the well connected to both the initial vertical well as well as the horizontal drainhole. Bayfield Resources et al #2 (Hor 1), Stanley 9-8-NBR and Bayfield Resources et al #2 (Hor 1/Lat 1), Stanley 9-8-NBR will be drilled as a multilateral I/W well.

The Bayfield Pool Meter, Pressure, and Volume Control station (the "PMPVC Station") will be the interconnection point between the pool and the pipeline and compression system delivering gas to and from the Lobo interconnect with Union Gas. The PMPVC Station will, among other things, measure the gathering system pressure in the pool on a continuous basis. The gathering system is connected to the I/W wells, so this gathering system pressure will be a direct measure of the wellhead pressures for the I/W wells. In addition to the gathering system pressure monitoring, the PMPVC Station will also record and transmit pressure information from the Observation well(s) and flow rate information for injection and withdrawal rates to and from the pool. The Observation well pressures are a more direct measure of the Bayfield Pool reservoir pressure as they are not influenced by friction pressures, etc. The gathering system pressure, Observation well pressure(s), and flow rate information will be transmitted to the central control station at the compressor station and to the remote monitoring system.

The pressure and flow rate information will continually be plotted on a pressure versus volume material balance plot. During the first one or two injection and withdrawal seasons the pressure/volume plot will confirm the effective size of the Bayfield Pool. Pressures during subsequent injection and withdrawal seasons will plot along this established material balance line and will be used to quickly detect if there is any deviation from the established pressure/volume relationship. The relationship between the Observation well pressures and the equivalent gathering system pressures will be used as an indication of any changes in the injection or withdrawal potential of the I/W wells. Any changes in the effective gas permeability in the near wellbore area around the I/W wells as a result of fines migration or connate water movement through the pool will be noticeable by plotting the gathering system pressure versus the Observation well pressure(s). If the effective gas permeability near the I/W wellbores start to deteriorate, injection and withdrawal rates can be adjusted to lessen the rate of deterioration. As well, much of this permeability deterioration can be removed with re-stimulations of the I/W wells. By monitoring the relationship between the pressures, the need for any re-stimulation can be determined and the workover planned to coincide with shut in periods between injection and withdrawal cycles to maximize the use of the Bayfield Pool.

For planned end-of-season shut downs, downhole or surface pressure recorders can be installed on the individual I/W wells and the pressure falloff or buildup measured after the well is shut in. The reservoir data that will result from analysing the pressure data will also indicate any changes in the near wellbore permeability. This buildup/falloff data will indicate if any re-stimulation of the I/W wells is required.

As required under CSA Z341: Storage of Hydrocarbons in Underground Formations, casing inspection logs will be run on each I/W well and Observation well at least once every 5 years. The casing inspection log will be compared to the original casing inspection log run on the well to look for any deterioration in casing metal or any corrosion effects. If significant metal loss is noted (greater than 60% metal loss), the casing will be pressure tested to confirm casing integrity.

Casing cathodic protection will be applied to each I/W well and Observation well at the Pool Station. The effectiveness of the cathodic protection applied to each well will be confirmed by measuring potential at each well at least annually.

The I/W wells will be inspected regularly while the pool is on either gas injection or gas withdrawal. This inspection will include visually inspecting the well for leaks, rust buildup, as well as wellhead pressures. The surface casing vent between the 244mm and 178mm casings will be inspected as well to ensure no pressure develops, which could be an early sign of wellhead seal deterioration, etc. The Observation well(s) will be visually inspected on a regularly scheduled basis during the injection or withdrawal seasons. As with the I/W wells, any pressure that develops in the intermediate casing/production casing annulus will be an early indication of possible wellhead seal deterioration.