



Ministry of Environment

DRILLWELL ENTERPRISES LTD.

4994 Polkey Road
Duncan, BC V9L 6W5
Phone: 250-746-5268

Ministry Well ID Plate Number: 60023
Ministry Well Tag Number:
Confirmation/alternative specs. attached
Original well construction report attached

Red lettering indicates minimum mandatory information. See reverse for notes & definitions of abbreviations.

Owner name: Earth Corporation
Mailing address: 9021-500 Eau Claire Ave SW Town Calgary Prov. AB Postal Code T2P 3R8
Well location (see note 2): Address: Street no. Street name Goldstream Heights Town Sooke
Legal description: Lot 25 Plan EPP-78349 D.L. Block 352 Sec. Twp. Rg. Land District 29
PID: 020-838-819 Description of well location (attach sketch, if nec.):

NAD 83: Zone: 10U UTM Easting: 0457895 m Latitude (see note 4):
UTM Northing: 5372673 m Longitude:
Method of drilling: dual rotary
Orientation of well: vertical
Class of well (see note 6): Water Supply Sub-class of well: Domestic
Water supply wells: private domestic

Lithologic description (see notes 8-13) or closure description (see notes 14 and 15)

Table with columns for From ft (bgl), To ft (bgl), Surficial Material, Bedrock Material, Colour, Hardness, Water Content, and Observations. Includes handwritten notes like 'Weathered unstable fracture @ 84' 3490' 160m @ 305' 5.5 @ 490' No pump below 485'.

Casing details

Table with columns: From ft (bgl), To ft (bgl), Dia in, Casing Material/Open Hole (see note 17), Wall Thickness in, Drive Shoe. Includes handwritten entries for steel removed and open hole.

Surface seal: Type: Bentonite Depth: 18 ft
Method of installation: Poured Thickness: 2 in
Backfill: Type: Depth: ft
Liner: PVC Other (specify):
Diameter: in Thickness: in
From: ft (bgl) To: ft (bgl) Perforated: From: ft (bgl) To: ft (bgl)

Screen details

Table with columns: From ft (bgl), To ft (bgl), Dia in, Type (see note 18), Slot Size. Includes handwritten entries for uncased hole.

Intake: Screen Open bottom Uncased hole
Screen type: Telescope Pipe size
Screen material: Stainless steel Plastic Other (specify):
Screen opening: Continuous slot Slotted Perforated pipe
Screen bottom: Bail Plug Plate Other (specify):
Filter pack: From: ft To: ft Thickness: in
Type and size of material:

Developed by:

Air lifting Surging Jetting Pumping Bailing
Other (specify): Total duration: 1 hrs
Notes:

Well yield estimated by:

Pumping Air lifting Bailing Other (specify):
Rate: 5.5 USgpm Duration: 1 hrs
SWL before test: ft (btoc) Pumping water level: ft (btoc)

Obvious water quality characteristics:

Fresh Salty Clear Cloudy Sediment Gas
Colour/odour: Gray Water sample collected:

Well driller (print clearly):

Name (first, last) (see note 19): Scott Davidson
Registration no. (see note 20): WD15052001
Consultant (if applicable; name and company):

Final well completion data:

Total depth drilled: 520 ft Finished well depth: 520 ft (bgl)
Final stick up: 18 in Depth to bedrock: 4 ft (bgl)
SWL: 20.3 ft (btoc) Estimated well yield: 5.5 USgpm
Artesian flow: USgpm, or Artesian pressure: ft
Type of well cap: Weld on Well disinfected: Yes No
Where well ID plate is attached: ON CASING

Well closure information:

Reason for closure:
Method of closure: Poured Pumped
Sealant material: Backfill material:
Details of closure (see note 16):

Date of work (YYYY/MM/DD):

Started: 2020/05/14 Completed: 2020/05/18
Comments:

DECLARATION: Well construction, well alteration or well closure, as the case may be, has been done in accordance with the requirements in the Water Act and the Ground Water Protection Regulation.

Signature of Driller Responsible

PLEASE NOTE: The information recorded in this well report describes the works and hydrogeologic conditions at the time of construction, alteration or closure, as the case may be. Well yield, well performance and water quality are not guaranteed as they are influenced by a number of factors, including natural variability, human activities and condition of the works, which may change over time.

white: Customer copy
canary: Driller copy
pink: Ministry copy
Sheet 1 of 1

Sept 3, 2020

Attention: Earth Corporation (Devin Hawes)

Re: Lot 25 Goldstream Heights. ID# 60923 Well Pump Test.

Devin,

On August 12, 2020 service technicians from Wellmaster Pumps and Water Systems Ltd. were contracted to pump test a well located at Lot 25 Goldstream Heights. The well was drilled to 520 feet but due to instability the well was measured 465 feet deep with a static level of 15.8 feet, well ID# 60923.

A rental pump was installed to 440 feet. The well was pumped for a period of 170 minutes where the water level dropped from the initial 15.8 feet from surface to a stabilized level of +/- 393 feet. The stabilized level was held for a period of 50 minutes at a pump rate of ~7.3 US gallons / min. The water was coloured for most of the test but cleared near the end. There was no odor detected at this time. The estimated well inflow rate currently is 7.0 US gallons/ min.

Water samples were taken to the lab for Bacteria and Mineral analysis.

Wellmaster Pumps does not certify nor warrant these results. These results are based on years of experience in the groundwater industry. Please consider these results can and will be affected by seasonal changes, geologic events, industrial occurrences and population growth in the area.

Kindest Regards

Chris Dutnall  
Wellmaster Pumps.

Client/Code

Wellmaster Pumps - M  
 \*A  
 PO Box 221  
 Cobble Hill, BC  
 V0R 1L0

Date 13Aug20 1:48p  
 Source Well  
 Type of Sample water  
 No. of Samples 1

No. W155768 pg2

TEL: chris@wellmasterpumps.com  
 Comments Arrival temp.: 8.3C  
 Amended: 22Sep20

Sample: Goldstream Heights - Lot 25 ID 60923 12Aug20 02:30p

ELEMENTS		SAMPLE	UNITS	Maximum Limits Permissible In Drinking Water*
1) Aluminium	Al	0.144	mg/L	no limit listed
2) Antimony	Sb	2.48	ug/L	6.00 ug/L
3) Arsenic	As	<0.500	ug/L	10.0 ug/L
4) Barium	Ba	0.056	mg/L	1.00 mg/L
5) Beryllium	Be	<0.003	mg/L	no limit listed
6) Boron	B	0.121	mg/L	5.00 mg/L
7) Cadmium	Cd	<0.010	ug/L	5.00 ug/L
8) Calcium	Ca	57.6	mg/L	200 mg/L
9) Chromium	Cr	<0.010	mg/L	0.050 mg/L
10) Cobalt	Co	<0.020	mg/L	no limit listed
11) Copper	Cu	<0.008	mg/L	1.00 mg/L
12) Gold	Au	<0.040	mg/L	no limit listed
13) Iron	Fe	0.173	mg/L	0.300 mg/L
14) Lanthanum	La	<0.020	mg/L	no limit listed
15) Lead	Pb	<0.500	ug/L	5.00 ug/L
16) Magnesium	Mg	3.61	mg/L	50.0 mg/L
17) Manganese	Mn	0.030	mg/L	0.120 MAC 0.020 AO
18) Molybdenum	Mo	<0.020	mg/L	no limit listed
19) Nickel	Ni	<0.050	mg/L	no limit listed
20) Phosphorus	P	0.053	mg/L	no limit listed
21) Potassium	K	0.450	mg/L	no limit listed
22) Scandium	Sc	<0.050	mg/L	no limit listed
23) Silicon	Si	6.88	mg/L	no limit listed
24) Silver	Ag	<0.010	mg/L	no limit listed
25) Sodium	Na	9.78	mg/L	200 mg/L
26) Strontium	Sr	0.420	mg/L	no limit listed
27) Titanium	Ti	<0.010	mg/L	no limit listed
28) Tungsten	W	<0.050	mg/L	no limit listed
29) Vanadium	V	<0.010	mg/L	no limit listed
30) Zinc	Zn	0.013	mg/L	5.00 mg/L
Hardness (mg/L CaCO3)		159	mg/L	150-300 mg/L = hard
pH		7.66	units	7.0 to 10.5

\* As per Canadian or B.C. Health Act Safe Drinking Water Regulation BC Reg 230/92, & 390 Sch 120, 2001. Task Force of the Canadian Council of Resource and Environment Ministers - Guidelines for Canadian Drinking Water Quality, 2019.

Comments:

All constituents tested meet Canadian and B.C. drinking water standards.

\_\_\_\_\_  
 R. Bilodeau  
 Analytical Chemist

  
 \_\_\_\_\_  
 H. Hartmann  
 Sr. Analytical Chemist



Client/Code

Wellmaster Pumps - M  
\*A  
PO Box 221  
Cobble Hill, BC  
VOR 1L0

Date 13Aug20 1:48p No. W155768  
Source Well  
Type of Sample water  
No. of Samples 1

TEL: chris@wellmasterpumps.com  
Comments Arrival temp.: 8.3C  
Amended: 22Sep20

Sample: Goldstream Heights

Site Code	Date	Time	CFU/100 ml		CFU/100 ml		CFU/100 ml
			TC	T-NC	FC	F-NC	E.coli
Lot 25 ID 60923	12Aug20	02:30p	0	0	0	0	0

TC = total coliform bacteria  
FC = fecal coliform bacteria (aka thermotolerant coliforms)  
NC = non-coliform bacteria  
CFU/100 ml = colony forming units per 100 milli-litres

Results may be adversely affected if samples are submitted to the laboratory more than 24 to 30 hours after collection.

E. coli = Escherichia coli, FDA/BAM 8th ed, 1995 + Revision A, 1998  
Bergey's Manual of Systematic Bacteriology vol 1, AOAC 1984; J.Clin.Micro., J.Intern.Systm.Bact.


Comments:

For Interpretation of Results:

Total or Fecal Coliforms present greater than 0 CFU/100mL (0 CFU/mL):  
IF Coliform numbers exceed safe limits for drinking water-  
water is not suitable for drinking without treatment.

Total Non-coliform bacteria (=Lactose Fermentors) equal to or greater than  
200 CFU/100mL (2.0 CFU/mL):  
IF the number of organisms present exceed recommended guidelines for  
drinking water; treatment is strongly recommended.

- see following page for chemistry results -

  
\_\_\_\_\_  
W. Riggs  
Sr. Microbiologist





**Report 1 - Detailed Well Record**

Well Tag Number: 88334	Construction Date: 2007-02-27 00:00:00
Owner: GOLDSTREAM HEIGHTS	Driller: Drillwell Enterprises
Address:	Well Identification Plate Number: 21623
Area:	Plate Attached By:
WELL LOCATION:	Where Plate Attached: CLAMPED TO CASING
MALAHAT Land District	PRODUCTION DATA AT TIME OF DRILLING:
District Lot: 8 Plan: Lot: 25	Well Yield: 2 (Driller's Estimate) U.S. Gallons per Minute
Township: Section: Range:	Development Method: Air lifting
Indian Reserve: Meridian: Block:	Pump Test Info Flag: N
Quarter:	Artesian Flow:
Island:	Artesian Pressure (ft):
BCGS Number (NAD 83): 092B053114 Well: 5	Static Level: 20 feet
Class of Well: Water supply	WATER QUALITY:
Subclass of Well: Domestic	Character:
Orientation of Well: Vertical	Colour:
Status of Well: New	Odour:
Licence General Status: UNLICENSED	Well Disinfected: Y
Well Use: Private Domestic	EMS ID:
Observation Well Number:	Water Chemistry Info Flag: N
Observation Well Status:	Field Chemistry Info Flag:
Construction Method:	Site Info (SEAM): N
Diameter: inches	Water Utility: N
Casing drive shoe: N N	Water Supply System Name:
Well Depth: 305 feet	Water Supply System Well Name:
Elevation: 1294 feet (ASL)	SURFACE SEAL:
Final Casing Stick Up: 24 inches	Flag: N
Well Cap Type: STEEL	Material: Bentonite clay
Bedrock Depth: 4 feet	Method: Poured
Lithology Info Flag: N	Depth (ft): 18 feet
File Info Flag: N	Thickness (in): 2 inches
Sieve Info Flag: N	Liner from To: feet
Screen Info Flag: N	WELL CLOSURE INFORMATION:
Site Info Details:	Reason For Closure:
Other Info Flag:	Method of Closure:
Other Info Details:	Closure Sealant Material:
	Closure Backfill Material:
	Details of Closure:
Screen from to feet Type Slot Size	
Casing from to feet Diameter Material Drive Shoe	
0 18 6 Steel N	
0 4 10 null N	
GENERAL REMARKS:	
80' 1/2 GPM, 130' 1 GPM, 260' 2 GPM.	
LITHOLOGY INFORMATION:	
From 0 to 4 Ft. Loose FILL brown	
From 4 to 305 Ft. Medium BEDROCK, GRANITE grey	