



WATER USE EFFICIENCY WEBINAR February 18, 2021 9:00 a.m.

Agenda

•	9:00 a.m.	Welcome and webinar information Sheryl Howe, ODW	

- 9:05 a.m. Water Use Efficiency Success Story, Zella West Nob Hill Water Association, Yakima
- 10:00 a.m. Water Level Measuring, Jon Turk, Hydrogeologist, Aspect Consulting
- 10:45 a.m. 5-minute stretch break. Please do not log off
- 10:50 a.m. Water Level Data, Sheryl Howe, ODW
- 11:15 a.m. Water Data for the CRB Water Supply and Demand Forecast,
 Julie Padowsksi, Ph.D, Assistant Director, Center for Environmental
 Research, Education & Outreach, Washington State University

Reminder from Op Cert

Operators that have not paid their annual renewal and late fees by February 28th will be inactivated the first week of March and will lose their CEUs and waterworks certifications.

Questions? Contact Deni Gray at

dwopcert@doh.wa.gov

Helpful Information

- Please type your questions in the question box below the control panel. We will monitor the questions and pass them on to the presenter.
- We are recording this webinar and a link will be posted to our WUE page on the Office of Drinking Water site. We cannot give credits for listening to the recording, however.
- Please do not log off! This is how we track/award credits.

Zella West, Manager Nob Hill Water Association Yakima, WA

New Questions

- Water Level Data
- Water Shortage
 Response Plan
- Monthly Volume





Water Level Data

Month	Date of Measurement	Static Water Level Depth below measuring point	Dynamic Water Level Depth below measuring point
January			

Well Logs

- Below this table are questions related to the well. This information can be found on your well log. Well logs can be found at Dept of Ecology's web site:
- https://appswr.ecology.wa.gov/wellconstructi on/map/wclswebMap/default.aspx
- If you do not have a well log available, you may have to leave these questions blank



Laws, Regs and Rules Map Search Text Search Forms Site Info Contact Us

Well Construction and Licensing Search Tools

Washington State Well Report Viewer

Welcome to the Department of Ecology Well Report Viewer. A *Well Report* describes the location, ownership, construction details and lithology of a completed well. This web site enables you to search for wells which have well reports and to view the well report using a variety of search tools.

<u>Tell a friend!</u>

Map Search Search for well reports by navigating a Washington State map.



Please Note: Water well locations within this site are not exact locations. Please read the <u>Disclaimer</u>.

Water Well Log

WATER WELL REPORT	CURRENT	
Original & 1st copy - Ecology, 2nd copy - owner, 3nd copy - driller	Notice of Intent No.	2.3
ECOLOGY Construction/Decommission ("x" in circle)	Unique Ecology Well ID Tag No	
○ Construction	Water Right Permit No.	
☐ Decommission ORIGINAL INSTALLATION	Property Owner Name	
Notice of Intent Number PROPOSED USE: Domestic Industrial Municipal	Well Street Address	
DeWater Infigation Test Well Other		
TYPE OF WORK: Owner's number of well (if more than one)	City County	
New well	(s, t, r Still REQUIRED)	EWM ⊠
DIMENSIONS: Diameter of well 6 inches, drilled 139 ft.	6, CI Sun REQUIRED	WWM [
Depth of completed well 139ft.	Tatifferen Tatifferen Latifferen	
CONSTRUCTION DETAILS Casing Welded 6 ⁿ Diam, from ±1.5 ft. to 139 ft.	Lat/Long Lat Deg Lat Min/Sec	
Installed: Liner installed" Diam, fromft. toft.	Tax Parcel No. (Required)	11 -
	Long Deg Long Min/Sec Tax Parcel No. (Required)	- in the second
Perforations: ☐ Yes ☒ No Type of perforator used	CONSTRUCTION OR DECOMMISSION PRO	OCEDURE
SIZE of perfsin, byin, and no. of perfsfromft; toft.	Formation: Describe by color, character, size of material and str- nature of the material in each stratum penetrated, with at least or of information. (USE ADDITIONAL SHEETS IF NECESSAR	se entry for each change
Screens: Yes No K-Pac Location		
Manufacturer's Name	MATERIAL F Brown sandy loam 0	ROM TO
Type Model No	Boulder, brown fine sand,	
Diam. Slot size from ft. to ft. Diam. Slot size from ft. to ft.	and silt	3
Gravel/Filter packed: ☐ Yes ☒ No Size of gravel/sand	Brown silty sand, gravel, 3 cobbles	17
Materials placed fromft. toft.		7
Surface Seal: Yes No To what depth? 19ft.	clay brinder	36
Material used in seal Bentonite Chips		6
Did any strata contain unusable water?	moist Multi-colored gravel, coarse	55
Type of water? Depth of strata Method of sealing strata off	brown sand, water	78
PIOMPs Manufactorier's Name		8 102
Type: H.P.	the state of the s	02 112
WATER LEVELS: Land-surface elevation above mean sea level 489 ft.	Multi-colored gravel, 1 coarse brown sand, water	12 139
Static level 40th below top of well. Date 9/22/2014	Source State Control of March	1.00
Artesian pressure Ibs. per square inch Date		
Artesian water is controlled by (cap, valve, etc.)		
WELL TESTS: Drawdown is amount water level is lowered below static level		
Was a pump test made? Yes No If yes, by whom? Yield:gal/min. withft. drawdown afterhrs.		/ED
Yield:gal/min.withft, drawdown afterhrs.	RECEI	VEU
Yield;gal/min. withft. drawdown afterhrs. Recovery data (time taken as zero when pump turned off) (water level measured from		2011
well top to water level)	SEP 291	2014
Time Water Level Time Water Level Time Water Level	WA State Der	artment
	of Ecology (
Date of test		
Bailer testgal/min. wiftft. drawdown afterhus. Airtest 20 gal/min, with stem set at 120ft, for 1hrs.		
Artesian flow g.p.m. Date	Start Date 9/22/2014 Completed Date	9/22/2014
Temperature of water 49 Was a chemical analysis made? Yes No	State Date 7/22/2011	
Tomporarute or mater 12 mas a ensumed analysis mader. [2] 140 [20 190		
WELL CONSTRUCTION CERTIFICATION: I constructed and/or accept respi	onsibility for construction of this well, and its compliance with	all Washington well
eonstruction standards. Materials used and the information reported above are to Driller Reporte	rue to my best knowledge and bellef. Drilling Company Arcadia Drilling Inc.	
Driller Engineer Trainee Many Print 68h Koapp	Address Po Bex 1/90	
Driller or trainee License No. 2874	City, State, Zip Shelton , Wa, 98:	184
IF TRAINEE: Driller's License No:	Contractor's Pariletration No. 4 P.CA DDIOSEVI. Data 9/22/	2014

ECY 050-1-20 (Rev 02/10) If you need this document in an alternate format, please call the Water Resources Program at 360-407-6872.

Persons with hearing loss can call 711 for Washington Relay Service. Persons with a speech disability can call 877-833-6341.

Ecology Well ID: XXX-123

Amend 208.

NT

of Intent No.:

W233928

Ecology Well I.D. No

APP871

ight Permit Number:

MESA, TOWN OF

RADD POBOX 146

SW 1/4

MESA, WA 99343

REGE

SEP 28

DEPARTMENT C

d

flesa, WA 99343

NW 1/4 Sec 36

T 13 R

County: Franklin

R 30

j: ill Lat Deg

Lat Min/Sec

ED)

Long Deg

Long Min/Se

cel No.:

CONSTRUCTION OR DECOMMISSION PROCEDURE

n: Describe by color, character, size of material and structure. Show s of aquifiers and the kind and nature of the material in each stratumed. Show at least one entry for each change in formation.

aterial	From	
NUED	0	
	0	
SE SAND GRAVEL W/COBBLES	3	

Well Depth

VATER WELL REPORT

Log No. **Nashington** Date Printed: 30-Jul-2012 42506 tion / Decommission: Original Construction Notice ction SED USE: MUNICIPAL 1PG1 WORK: Owners's Well Number: (If more than one well) W WELL Method: ROTARY IONS: Diameter of well: 10 inches 163 ft. Depth of completed well 162 Casing installed WELDED **UCTION DETAILS:** 10 " Dia from +2 ft. to istalled: 126 ft. to 8 " Dia from ia from ft. to ft. 152 ft. to 8 " Dia from No ions: Used In: perforator used in. by in. perforations Perforations from ft. to ft. Perforations from ft. to ft. Perforations from ft. to ft.

K-Pac Location: 126

ture's Name

Well completion: cased 380' screened 340-355'

Deepened		Cable [ם כ
Recondition	ned □	Rotary []](
DIMENSIONS:	Diamete Depth of c	er of well 20" to	2002 180
CONSTRUCTION DE	TAILS:	}	
Casing installed: 20 Threaded Welded 16	Diam. Diam. Diam. Diam.	from +2 ft. from 242 ft. from 3.50 ft.	to
Perforations: Yes			
Type of perforator use			
SIZE of perforations			
perforatio			
perforatio	ns from	ft. to	
Screens: Yes No	John ss wir 250	SON Ce: Model No. from 340 ft.	301 to 31
Gravel placed from			
Surface seal: Yes [7] Material used in seal.	No 🔲 🦪 Semor	o what depth?	250 566
Did any strata conta	in unusab	le water? Ye	s 🗌
Memo of motor?			

Well Completion – Cased to 19'

LOCATION OF WELL: County LINCOCN		- SW W NW W Sec 15 T.	ZY N., R.:	36.w.w
STREET ADDDRESS OF WELL (or nearest address) Kockey	IN I	Kd		
PROPOSED USE: Domestic Industrial		(10) WELL LOG or ABANDONMENT PROCEDU	RE DESC	RIPTIO
☐ DeWater Test Well ☐ Other TYPE OF WORK: Owner's number of well		Formation: Describe by color, character, size of material an thickness of aquifers and the kind and nature of the material in ea with at least one entry for each change of information.	id structure, ach stratum	, and sho penetrate
(II IIIOTA (IIAII OIIA)		MATERIAL	FROM	то
Abandoned New well Method: Dug Bored Deepened Drive	n 🗌	TOPSOIL	0	1,
Reconditioned 🗆 Rotary 🔼 Jette	d Li	BRN, CLAY 5 COBBLE	<u></u>	4
DIMENSIONS: Diameter of well 6 in	ches.	BASACT-MED.	4	8
7.4	ft.	BASACT-HARD, SRACTS.	8	200
Drilledfeet. Depth of completed well		RASACT-VERY HARD	200	250
CONSTRUCTION DETAILS:	BASALT HARD, FRACTSWICLAY	250	300	
Casing installed: 6 Diam. from + 1 11. to 19	ft.	WATER		
Welded Diem from ft. to		200100		
Liner installed Threaded Diam. from ft. to				J
Perforations: Yes No No				
Type of perforator used				
SIZE of perforations in. by	in.			
perforations fromft. to	ft.			
perforations fromft. to	ft.			
perforations fromft. to				
Screens: Yes No.				
Many traditionals Manua				

Lat Long Information

te of Intent No. WE16093			
ue Ecology Well ID Tag No. AAS 254			
r Right Permit No. G3-30320			
erty Owner Name City of Ritzville			
Street Address 104 East 10th Avenue			
Ritzville County Adams			
tion <u>NE1/4-1/4 SE1/4 Sec 23 Twn 19 R 3</u> r Still REQUIRED)	<u>5</u> ew		
Long Lat Deg <u>47</u> Lat Min/Sec Long Deg <u>118</u> Long Min/Se Parcel No. (Required) <u>1935230615701</u>			
CONSTRUCTION OR DECOMMISSION I mation: Describe by color, character, size of material and are of the material in each stratum penetrated, with at leas nformation. (USE ADDITIONAL SHEETS IF NECESS.)	structure, and t one entry for		
MATERIAL	FROM		
e attached formation log.			
ner assembly:			
eceptor & 18x16 bell	875		
nni/	97G		

Last Two Questions

- 7. Water level parameter name this is relative to how you took the measurement.
 For example: depth below the top of casing or depth below the ground surface
- 8. Elevation of top of casing OR elevation of measuring point – if available, this is found on the well log in the top right column.

Water Shortage Response

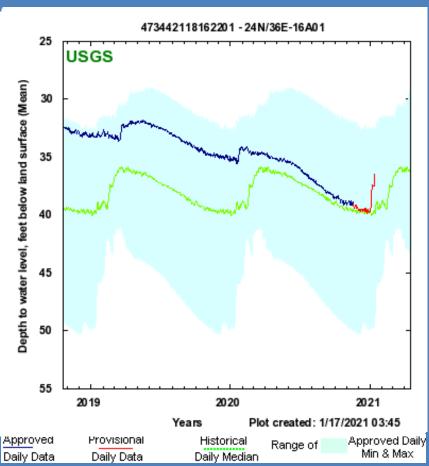
•	Did you activate any level of water shortage response plan the previous year? Yes No There was no need to
•	If you activated a water shortage response plan in the previous year, what level did you activate?
•	○ Advisory Conservation○ Mandatory Conservation○ Rationing○ Other
•	What factors caused your water shortage the previous year? Check all that apply:
•	○ Drought ○ Fire ○ Landslides ○ Earthquakes ○ Flooding○ Water Supply limitations ○ Other

Groundwater Conditions as of Jan. 17, 2021

Groundwater Watch:

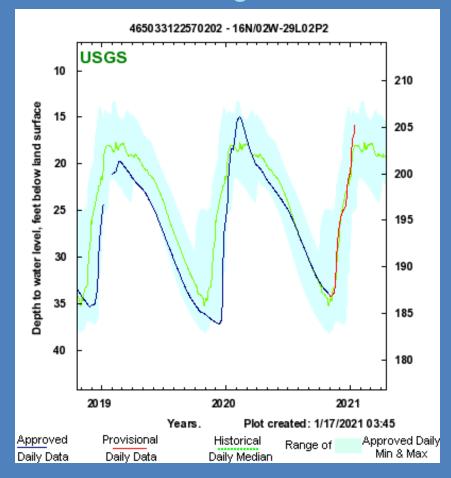
Davenport well (east)

- 117-ft deep
- Wanapum Basalt



Scatter Creek well (west)

- 82-ft deep
- Sand and gravel





Questions?

Sheryl Howe (360) 507-6108 sheryl.howe@doh.wa.gov