

State of Washington
DRAFT
REPORT OF EXAMINATION
FOR WATER RIGHT APPLICATION

PRIORITY DATE 2/12/2011	WATER RIGHT NUMBER S1-28683
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MAILING ADDRESS PEACH MOUNTAIN ORGANICS 1560 RICHLAND ROAD SPRING VALLEY OH 45370	SITE ADDRESS (IF DIFFERENT) 1971 ROCHE HARBOR RD FRIDAY HARBOR WA 98250
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Quantity Authorized for Diversion		
DIVERSION RATE	UNITS	ANNUAL QUANTITY (AF/YR)
0.033	CFS	12.14*

PURPOSE	DIVERSION RATE			ANNUAL QUANTITY (AF/YR)		PERIOD OF USE (mm/dd)
	ADDITIVE	NON-ADDITIVE	UNITS	ADDITIVE	NON-ADDITIVE	
IRRIGATION	0.033	0	CFS	0	12.14*	04/15 - 10/31

*The total combined annual quantity of S1-28683 and G1-28682 shall not exceed 12.14 acre-feet/year.

IRRIGATED ACRES		PUBLIC WATER SYSTEM INFORMATION	
ADDITIVE	NON-ADDITIVE	WATER SYSTEM ID	CONNECTIONS
0	10**	N/A	N/A

** The total combined irrigated acreage of S1-28683 and G1-28682 shall not exceed 10 acres.

Source Location			
COUNTY	WATERBODY	TRIBUTARY TO	WATER RESOURCE INVENTORY AREA
SAN JUAN	UNNAMED POND	UNNAMED STREAM	2-SAN JUAN

SOURCE	PARCEL	WELL TAG	TOWNSHIP	RANGE	SECTION	QQ Q	LATITUDE	LONGITUDE
UNNAMED POND	350343001000	N/A	35N	03W	03	SW SE	N 48.5528	123.0467 W

Datum: NAD83/WGS84

Place of Use (See Attached Map)
PARCELS (NOT LISTED FOR SERVICE AREAS) 350343001000

LEGAL DESCRIPTION OF AUTHORIZED PLACE OF USE
That portion of the North Half of the Southwest Quarter of the Southeast Quarter of Section 3, Township 35 North, Range 3 West, W.M., described as follows:

Beginning at the Northeast corner of said subdivision, thence South 00°2'27" West 661.51 feet to the

Southeast corner of said subdivision, thence North 89°43'14" West 791.61 feet, thence North 04°35'57" East 532.35 feet, thence South 89°36'50" West 31.00 feet, thence North 00°50'16" East 130.89 feet, thence South 89°43'59" East 778.48 feet to the point of beginning;

Situated within San Juan County, Washington.

ALSO KNOWN As Lot 2 of the Lyn Dan Short Plat, San Juan County Auditor's File Number 20051107008, in Volume 7 of Short Plats, Pages 69 and 69A.

Proposed Works

A single diversion works, with a 6.5 HP pump, providing water to a drip irrigation (3 acres) system and an overhead sprinkler (7 acres) irrigation system.

Development Schedule

BEGIN PROJECT	COMPLETE PROJECT	PUT WATER TO FULL USE
January 1, 2016	December 31, 2020	December 31, 2028

Measurement of Water Use

How often must water use be measured?	Monthly
How often must water use data be reported to Ecology?	Annually (Jan 31)
What volume should be reported?	Total Annual Volume
What rate should be reported?	Annual Peak Rate of Diversion (cfs)

Provisions

Measurements, Monitoring, Metering and Reporting

An approved measuring device shall be installed and maintained for each of the sources identified by this water right in accordance with the rule "Requirements for Measuring and Reporting Water Use", WAC 173-173, which describes the requirements for data accuracy, device installation and operation, and information reporting. It also allows a water user to petition the Department of Ecology for modifications to some of the requirements.

Recorded water use data shall be submitted via the Internet. To set up an Internet reporting account, contact the Northwest Regional Office. If you do not have Internet access, you can still submit hard copies by contacting the Northwest Regional Office for forms to submit your water use data.

Proof of Appropriation

The water right holder shall file the notice of Proof of Appropriation of water (under which the certificate of water right is issued) when the permanent distribution system has been constructed and the quantity of water required by the project has been put to full beneficial use. The certificate will reflect the extent of the project perfected within the limitations of the permit. Elements of a proof inspection may include, as appropriate, the source(s), system instantaneous capacity, beneficial use(s), annual quantity, place of use, and satisfaction of provisions.

Schedule and Inspections

Department of Ecology personnel, upon presentation of proper credentials, shall have access at reasonable times, to the project location, and to inspect at reasonable times, records of water use, wells, diversions, measuring devices and associated distribution systems for compliance with water law.

Water Use Efficiency

The water right holder is required to maintain efficient water delivery systems and use of up-to-date water conservation practices consistent with RCW 90.03.005.

Findings of Facts

Upon reviewing the investigator's report, I find all facts, relevant and material to the subject application, have been thoroughly investigated. Furthermore, I concur with the investigator that water is available from the source in question; that there will be no impairment of existing rights; that the purpose of use is beneficial; and that there will be no detriment to the public interest.

Therefore, I ORDER approval of Application No. S1-28683, subject to existing rights and the provisions specified above.

Your Right To Appeal

You have a right to appeal this Order to the Pollution Control Hearings Board (PCHB) within 30 days of the date of receipt of this Order. The appeal process is governed by Chapter 43.21B RCW and Chapter 371-08 WAC. "Date of receipt" is defined in RCW 43.21B.001(2).

To appeal you must do the following within 30 days of the date of receipt of the Order:

- File your appeal and a copy of this Order with the PCHB (see addresses below). Filing means actual receipt by the PCHB during regular business hours.
- Serve a copy of your appeal and this Order on Ecology in paper form - by mail or in person. (See addresses below.) E-mail is not accepted.

You must also comply with other applicable requirements in Chapter 43.21B RCW and Chapter 371-08 WAC.

Street Addresses	Mailing Addresses
Department of Ecology Attn: Appeals Processing Desk 300 Desmond Drive SE Lacey, WA 98503	Department of Ecology Attn: Appeals Processing Desk PO Box 47608 Olympia, WA 98504-7608
Pollution Control Hearings Board 1111 Israel RD SW Ste 301 Tumwater, WA 98501	Pollution Control Hearings Board PO Box 40903 Olympia, WA 98504-0903

Signed at Bellevue, Washington, this _____ day of _____ 2014.

Jacqueline Klug, Section Manager

For additional information visit the Environmental Hearings Office Website: <http://www.eho.wa.gov>. To find laws and agency rules visit the Washington State Legislature Website: <http://www1.leg.wa.gov/CodeReviser>.

INVESTIGATOR'S REPORT

Application for Water Right – Peach Mountain Organics

Water Right Control Number S1-28683

Ria Berns, Department of Ecology

BACKGROUND

This report serves as the written findings of fact concerning Water Right Application Number S1-28683.

Peach Mountain Organics applied for a water right to appropriate surface water on February 12, 2011. This application was submitted along with complementary groundwater application G1-28682. Peach Mountain Organics plans to conjunctively use groundwater and surface water to irrigate a total of 10 acres of mixed crops during the irrigation season (April 15 – October 31). Groundwater application G1-28682 will serve as the primary water right. These two water right applications will be used in tandem to irrigate a single project and S1-28683 will have a non-additive Q_a . The surface water diversion is located in the SW $\frac{1}{4}$ SE $\frac{1}{4}$ of Section 3, Township 35 North, Range 3 West. This report describes the proposed project, discusses the area's geology and climate, investigates potential impairments, and evaluates water availability issues raised by the project.

Table 1. Summary of Requested Water Right

Applicant Name:	Peach Mountain Organics
Date of Application:	2/12/2011
Place of Use	See Attachment 1

County	Waterbody	Tributary To	WRIA
San Juan	Unnamed Pond	Unnamed Stream (seasonal)	2-San Juan

Purpose	Rate	Unit	Ac-ft/yr	Begin Season	End Season
Irrigation	0.033	CFS	0*	04/15	10/31

Source Name	Parcel	Well Tag	Township	Range	Section	QQ Q	Latitude	Longitude
Unnamed Pond	350343001000	N/A	35N	03W	03	SW SE	N 48.5528	123.0467 W

Datum: NAD83/WGS84

CFS = Cubic Feet per Second; Ac-ft/yr = Acre-feet per year; QQ Q = Quarter-quarter of a section; WRIA = Water Resource Inventory Area

*S1-28683 has a non additive annual quantity. The total combined annual quantity of G1-28682 and S1-28683 shall not exceed 12.14 acre-feet/year and the total irrigated acreage shall not exceed 10 acres.

Legal Requirements for Approval of Appropriation of Water**Public Notice**

RCW 90.03.280 requires that notice of a water right application be published once a week, for two consecutive weeks, in a newspaper of general circulation in the county or counties where the water is to be stored, diverted and used. Notice of this application was published in the *Journal of the San Juan Islands* on June 8, 2011 and June 15, 2011.

Consultation with the Department of Fish and Wildlife

The Department must give notice to the Washington Department of Fish and Wildlife (WDFW) of applications to divert, withdraw or store water. On May 8, 2013, Ecology provided notice to WDFW's Mr. Stephen Boessow. As of this date, WDFW submitted no comments concerning the proposed

diversion. However, WDFW provided limited comments on associated water right application G1-28682. WDFW noted that Beaverton Valley Creek and its tributaries are not known to be inhabited by fish.

State Environmental Policy Act (SEPA)

A surface water right application is subject to a SEPA threshold determination (i.e., an evaluation of whether there are likely to be significant adverse environmental impacts) if the application is greater than 1 cfs. However, if the project is for agricultural irrigation, the threshold is increased to 50 cfs, so long as the irrigation project will not receive public subsidies. Because this application does not meet these conditions and because it is not part of a larger project that would trigger SEPA, the application is considered to be categorically exempt from SEPA and a threshold determination is not required.

INVESTIGATION

The following investigation is based on a May 21, 2013 site visit to Peach Mountain Organics with Water Resource Program hydrogeologist, John Rose. During the site visit, we met San Juan Conservation District employee Bruce Gregory, who prepared the farm plan for Peach Mountain Organics and showed us the proposed points of diversion and withdrawal (see G1-28682) and discussed the proposed farm plan. The investigation also draws on (1) follow-up conversations with Peach Mountain Organics co-owner Doug Seibert, (2) water rights office research, (3) geological and geographical overview of the site, and (4) materials listed in the References section.

Proposed Use and Basis of Water Demand

Peach Mountain Organics plans to irrigate a 10-acre organic farm on San Juan Island using both surface water and groundwater. The well associated with water right application G1-28682 will be the primary irrigation source and the pond diversion associated with this application will be a secondary source to irrigate a portion of the acreage, as needed.

Farm Plan and Crop Irrigation Requirements

Peach Mountain Organics proposes to irrigate 10 acres of mixed commercial crops, including:

- ½ acre of mixed fruit orchard;
- 2½ acres of vegetable row crops grown in hoop houses and outside; and
- ~7 acres of grain/feedstock.

Peach Mountain Organics plans to regularly rotate crops, so water duties will vary seasonally. The farm has not settled on an exact crop rotation or ratio; Thus, Ecology will conservatively estimate water duty to allow Peach Mountain Organics the flexibility to grow into their farm plan.

The Department of Ecology uses the Washington Irrigation Guide (WIG) to determine crop water duties when the actual volume of water applied per acre is not known, or to assess whether actual use is reasonable for a given crop (see Table 2). Application efficiency (EA) values are from *GUID-1210, Determining Irrigation Efficiency and Consumptive Use*. Assumptions made for the consumptive irrigation requirement (CIR) of each crop are discussed below.

The farm plans to irrigate a half acre of mixed fruit trees; however, because the exact tree types are unknown, the CIR for apple trees with groundcover is used. Apples have a similar water duty to other fruit and nut trees that are commonly grown on San Juan Island and thus, their water duty is used as a proxy to calculate CIR. For the 2.5 acres of rotating vegetable crops, the CIR for carrots is used. Carrots

are a medium-to-high water duty crop and thus, will provide Peach Mountain some flexibility when planting both more and less water intensive vegetable crops. Lastly, the farm plans to irrigate seven acres of grain/feedstock. Water duty for the 1992 WIG for pasture/turf is used to calculate the CIR, which is a high water duty crop compared to other feedstock crops that Peach Mountain may rotate.

Precipitation data from the Olga, Washington weather station on Orcas Island is used for the CIR calculations. Annual precipitation data from this station aligns closely with the observed precipitation data at the Peach Mountain Organics site (USGS, 2002).

Table 2. Calculation of Total Irrigation Requirements for Peach Mountain Organics

<i>Crop and System Type</i>	<i>Total Irrigation Requirement (TIR) (CIR ÷ Ea)</i>
Crop : Apple Trees w/Groundcover System: Microirrigation: Trickle/Drip Area: .5 acres CIR: 1.37 ac-ft/ac Ea: 88%	1.37 ac-ft/ac ÷ 88% = 1.56 ac-ft/ac
Crop : Mixed Vegetable Row Crops System: Microirrigation: Trickle/Drip Area: 2.5 acres CIR: 0.6 ac-ft/ac Ea: 88%	0.6 ac-ft/ac ÷ 88% = 0.68 ac-ft/ac
Crop : Rotating Pasture Crops System: Sprinkler: Solid-Set (Overtree) Area: 7 acres CIR: 0.94 ac-ft/ac Ea: 70%	0.94 ac-ft/ac ÷ 70% = 1.38 ac-ft/ac
Total Irrigation Requirement All Acres	$TIR * No. of Crop Acres$ $(1.56 * .5) + (0.68 * 2.5) + (1.38 * 7) = 12.14 ac - ft/yr$

Abbreviation Key: Ea – the ratio of the average depth of water infiltrated and stored in the root zone to the average depth of water applied, expressed as a percentage; TIR – water supplied by irrigation to satisfy evapotranspiration, miscellaneous water requirements, and irrigation efficiency; CIR – water supplied by irrigation to satisfy evapotranspiration that is not provided by water stored in the soil and precipitation.

Irrigation System Design

The irrigation system is still in the design state. However, Doug Seibert, co-owner of Peach Mountain Organics, has indicated that the farm will use conservation practices and irrigate using drip irrigation for 3 (and possibly more) acres of vegetable and fruit crops. The remaining 7 acres of feedstock crops will be irrigated with overhead sprinklers. The pump at the diversion location will be a Honda Gorman-Rupp pump with a 6.5 HP engine. The diameters of the irrigation lines are unknown.

Source Water

The source water is an unnamed pond in the Beaverton Valley, south and down-gradient from the proposed place of use. The pond volume is relatively constant and fed by a seasonal stream, upland runoff, and shallow groundwater discharge. The date of pond construction is unknown; although, it predates the current owner. A small dam on the eastern side of the pond impounds water year-round. The dam is approximately 6 to 8 feet high. During the winter months, water spills over the dam into the seasonal streambed. The stream to the east and west is mostly dry during the summer months. WDFW has no evidence of fish habitat in the Beaverton Valley Creek or its tributaries.

The area of the pond is roughly 64,000 ft² (GIS calculation). At the deepest point, the pond is roughly 15 feet and fairly shallow along the edges. It can be assumed that an average pond depth is approximately 7 feet. Based on pond storage capacity estimates from GIS and site observations, this pond does not require a reservoir permit per RCW 90.03.370.

San Juan Island Geology, Hydrogeology, and Climate

Geological Overview of the San Juan Islands

Bounded by the Strait of Juan de Fuca to the south, Rosario Strait to the east, Haro Strait to the west, and Boundary Pass to the north, the San Juan Islands archipelago has a complex geologic history. Radiometric dating indicates that the San Juan Islands were accreted to North America sometime prior to the Late Jurassic Period. However, the Late Cretaceous period most dramatically shaped the Islands' bedrock geology. A major suture, known as the Haro Thrust zone, formed during the late Cretaceous Period and joined the Wrangellia terrane of Vancouver Island and the San Juan-Cascade nappes (Brandon, 1989). The San Juan Islands consist of a thick sequence of Late Cretaceous thrust faults, referred to as the San Juan thrust system, containing a diverse group of rocks (terrane) ranging from early Paleozoic to middle Cretaceous in age. A terrane is a fault-bounded package of rocks with a distinctive stratigraphy, structure and geologic history. Formed in compressed tectonic zones (e.g., subduction zones), a nappe is a large sheet of rock with a horizontal or sub-horizontal axial plane that has moved due to faulting or folding.

Wrangellia is a large allochthonous terrane that underlies most of Vancouver Island and parts of Alaska. On Vancouver Island it is characterized as a coherent Paleozoic-to-Lower Jurassic stratigraphic sequence that is dominantly volcanic. The thrust system straddles the southeastern edge of the Wrangellia terrane of Vancouver Island. The San Juan-Cascade nappes are northwest-trending belts that are bounded by the Skagit metamorphic core. In the San Juan Islands, five terranes (Haro, Turtleback, Deadman Bay, Garrison, and Decatur) were thrust and stacked upon each other and on top of the Wrangellia Terrane. The San Juan-Cascade nappes are thought to represent an old accretionary system formed by the successive arrival of these far-traveled terranes (Brandon, 1989).

The bedrock geology of the San Juan Islands has been greatly modified by the three major glacial advances, including the Double Bluff Glaciation (earliest), Possession Glaciation, and Fraser Glaciation (latest) (Russell et al, 1975). However, erosion beneath the glaciers was likely guided by the topography formed by the fracture and fault zones already in existence. It is probable that a fault of considerable magnitude occupies each of the major San Juan channels.

San Juan Island Hydrogeology and Climate

San Juan Island is the second largest of the San Juan Islands and has an aerial extent of about 55 square miles. About 40 percent of San Juan Island is overlain by Quaternary glacial deposits, but only as thin, discontinuous sheets, with thicknesses generally less than 30 feet. The glacial deposits, where saturated, generally yield large quantities of water to wells, but the bedrock is nonporous, and water occurs primarily in joints and fractures (Russell et al, 1975).

Peach Mountain Organics is located in the Beaverton Valley, an east-west oriented valley that cuts through the center of San Juan Island. The geology in the vicinity of the Peach Mountain Organics well is part of the Late Jurassic Constitution Formation (referred to as KJmm and Jc), which includes ophiolitic plutonic rocks, mid-oceanic-ridge basalt, ribbon chert, and arc-derived mudstone-sandstone (Brown et al, 2007). The Constitution Formation is the predominant geologic formation on San Juan Island.

Overlying the constitution formation in the Beaverton Valley at the Peach Mountain Organics site are two glacial formations, the Pleistocene Era Qgd and Qgdm(es) formations. The Qgd is undifferentiated glacial drift from the Fraser glaciation. The Qgdm_{es} formation underlies the Qgd and consists of glaciomarine drift from the Everson Glaciomarine Drift (Dragovich et al, 2002).

The mean annual precipitation for Peach Mountain Organics is 30-32 inches/year. Average annual recharge to the ground water system for this area ranges from 4 to 7 inches (Orr, 2002).

Other Rights Appurtenant to the Place of Use

The Department of Ecology has record of 14 water rights or water right claims within a half mile radius of the Peach Mountain Organics proposed points of diversion and withdrawal (See Table 3 and Attachment 3). Of the water rights considered for the impairment analysis, 4 are state-issued water right certificates (3 for groundwater, 1 for reservoir storage), 1 is a new application for groundwater, and 9 are claims (5 short- and 4 long-form claims).

A water right claim is a *claim* to a water right for a beneficial use which predates the state water code (1917 for surface water and 1945 for groundwater) and is not authorized by a state-issued permit or certificate. Water right claims can only be confirmed through adjudication by the Washington State Superior Court. The Department of Ecology cannot verify a claim's validity. Many of the below-listed claims represent uses allowable under the groundwater permit exemption (RCW 90.44.050).

Table 3. Record of Water Rights within a Half Mile Radius from the Points of Diversion and Withdrawal

Control Number	Name on Document	Document Type	Priority Year	Purpose	Q _i (gpm)	Q _a (ac-ft/yr)
G1-019783CL	Harold W. Livesley	Claim L		DG		
G1-064523CL	Mildred J. Ervin	Claim L		DG		
G1-064524CL	Mildred J. Ervin	Claim L		DG		
G1-079617CL	Edward R. King	Claim S		DG		
G1-079618CL	Harold W. Livesley	Claim S		DG, ST		
S1-080097CL	Al Sundstrom	Claim S		DG, ST		
G1-089364CL	Lorena L Buchanan	Claim S		IR, ST		
G1-093667CL	Thomas C Wilmer	Claim L		DG, IR		
G1-140006CL	John W King	Claim S		DS, ST		
G1-23330CWRIS	Roger Sandwith	Cert	1979	DS, ST	10	.6
G1-23453GWRIS	Richard Wright	Cert	1979	DS, IR, ST	5	2.1
G1-23509CWRIS	John W King	Cert	1979	DM	10	13
R1-23959CWRIS	Al Sundstrom	Cert	1981	RE, ST, WL		85
G1-28602	Taylor Reality	New App	2009	DM	52	23

Abbreviation Key: Q_i – instantaneous quantity, Q_a – annual quantity, gpm – gallons per minute, Claim L – long form claim, Claim S – short form claim, Cert – Certificate, New App – New application, DS – domestic single, DG – Domestic General, DM – Domestic multiple, IR – Irrigation, RE – recreation and beautification, ST – stockwater, WL – wildlife propagation.

In addition to the above-listed water right claims, there are approximately 30 water wells located within a half mile radius of the Peach Mountain Organics points of diversion and withdrawal. This information was obtained using the Department of Ecology's well log database. Many of these wells overlap with the above-listed water right claims.

FINDINGS

Under Washington State law, the following four criteria must be met for an application to be approved:

- There must be no impairment of existing rights
- Water must be available
- The water use must be beneficial
- The water use must not be detrimental to the public interest

Impairment Considerations

Impairment is an adverse impact on the physical availability of water for a beneficial use that is entitled to protection. A water right application may not be approved if it would:

- Interrupt or interfere with the availability of water to an adequately constructed groundwater withdrawal facility of an existing right. An adequately constructed groundwater withdrawal facility is one that (a) is constructed in compliance with well construction requirements and (b) fully penetrates the saturated zone of an aquifer or withdraws water from a reasonable and feasible pumping lift.
- Interrupt or interfere with the availability of water at the authorized point of diversion of a surface water right. A surface water right conditioned with instream flows may be impaired if a proposed use or change would cause the flow of the stream to fall to or below the instream flow more frequently or for a longer duration than was previously the case.
- Interrupt or interfere with the flow of water allocated by rule, water rights, or court decree to instream flows.
- Degrade the water quality of the source to the point that the water is unsuitable for beneficial use by existing users (e.g., via sea water intrusion).

No instream flow rules or other withdrawal limitations affect diversions on San Juan Island. Moreover, Peach Mountain Organics plans to follow organic farming principles and water conservation methods. Thus, neither water availability concerns nor water quality impairment concerns are anticipated.

Water right application G1-28602 is senior to Peach Mountain Organics water right application S1-28683; however, the wells are upgradient and over a half mile from the diversion location. This surface water diversion will not impact the proposed G1-28602 wells located within the confined aquifer. Thus, I find that no senior water right holders will be impaired by this proposed diversion.

Water Availability

For water to be available for appropriation, it must be both physically and legally available.

Physical Availability

For water to be physically available for appropriation there must be ground or surface water present in quantities and quality and on a sufficiently frequent basis to provide a reasonably reliable source for the requested beneficial use or uses. In addition, the following factors are considered:

- Volume of water represented by senior water rights, including federal or tribal reserved rights or claims;
- Water right claims registered under Chapter 90.14 RCW;
- Ground water uses established in accordance with Chapter 90.44 RCW, including those that are exempt from the requirement to obtain a permit;

- Potential riparian water rights, including non-diversionary stock water; and
- Lack of data indicating water usage can also be a consideration in determining water availability, if the department cannot ascertain the extent to which existing rights are consistently utilized and cannot affirmatively find that water is available for further appropriation.

At this point, Peach Mountain Organics has not established the diversion point. However, a 6.5 HP Honda Gorman-Rupp pump is planned for the chosen site (see above-listed latitude/longitude coordinates). The applicant has used this pump for a similar sized project and the pump has the capacity to divert the requested .033 cfs. This Q_i is additive to the 15 gpm requested under water right application G1-28682.

The annual quantity (Q_a) was calculated using the WIG, as discussed above. The calculated 12.14 ac-ft/yr is a reasonable conservative estimate which will allow Peach Mountain Organics some flexibility to grow into their farm plan. However, this Q_a is a non-additive annual quantity. The total combined annual quantity of G1-28682 and S1-28683 shall not exceed 12.14 acre-feet/year and the total irrigated acreage shall not exceed 10 acres.

Together, direct and anecdotal evidence supports the physical availability of the requested .033 cfs from this pond. The WIG supports the calculated non-additive annual quantity of 12.14 ac-ft/yr.

Legal Availability

To determine whether water is legally available for appropriation, the following factors are considered:

- Regional water management plans – which may specifically close certain water bodies to further appropriation.
- Existing rights – which may already appropriate physically available water.
- Fisheries and other instream uses (e.g., recreation and navigation). Instream needs, including instream and base flows set by regulation. Water is not available for out of stream uses where further reducing the flow level of surface water would be detrimental to existing fishery resources.
- The Department may deny an application for a new appropriation in a drainage where adjudicated rights exceed the average low flow supply, even if the prior rights are not presently being exercised. Water would not become available for appropriation until existing rights are relinquished for non-use by state proceedings.

There are no regulatory closures or restrictions affecting water availability on San Juan Island and WDFW did not submit concerns or comments on this proposed diversion. Therefore, I find water is legally available for appropriation.

Beneficial Use

Irrigation is considered a beneficial use under RCW 90.54.020(1).

Public Interest Considerations

No protests were filed against this application and no potential for detriment to the public interest was identified during the investigation of this application.

Conclusions

In accordance with chapter RCW 90.03, I conclude that there is water available from the source in question, the purpose of use is beneficial, there will be no impairment of existing rights, and there will be no detriment to the public interest.

RECOMMENDATIONS

Based on the above investigation and conclusions, I recommend that this request for a water right be approved in the amounts and within the limitations listed below and subject to the provisions listed above.

Purpose of Use and Authorized Quantities

The amount of water recommended is a maximum limit and the water user may only use that amount of water within the specified limit that is reasonable and beneficial:

- .033 cfs
- 0 ac-ft/yr (the combined Q_a of G1-28682 and S1-28683 shall not exceed 12.14 ac-ft/yr)
- Irrigation (April 15 – October 31)

Point of Diversion

SW $\frac{1}{4}$, SE $\frac{1}{4}$, Section 3, Township 35 North, Range 3 West, W.M.

Place of Use

That portion of the North Half of the Southwest Quarter of the Southeast Quarter of Section 3, Township 35 North, Range 3 West, W.M., described as follows:

Beginning at the Northeast corner of said subdivision, thence South 00°2'27" West 661.51 feet to the Southeast corner of said subdivision, thence North 89°43'14" West 791.61 feet, thence North 04°35'57" East 532.35 feet, thence South 89°36'50" West 31.00 feet, thence North 00°50'16" East 130.89 feet, thence South 89°43'59" East 778.48 feet to the point of beginning;

Situated within San Juan County, Washington.

ALSO KNOWN As Lot 2 of the Lyn Dan Short Plat, San Juan County Auditor's File Number 20051107008, in Volume 7 of Short Plats, Pages 69 and 69A.

Ria Berns, Report Writer

Date

Reviewed by Jerry Lizsak, L.Hg

Date

If you need this publication in an alternate format, please call Water Resources Program at (360) 407-6600. Persons with hearing loss can call 711 for Washington Relay Service. Persons with a speech disability can call 877-833-6341.

Selected References

Brandon, M.T., 1989. *Geology of the San Juan-Cascade Nappes, Northwestern Cascade Range and San Juan Islands*. Geologic guidebook for Washington and adjacent areas: Washington Division of Geology and Earth Resources Information Circular 86, 26 pages.

http://earth.geology.yale.edu/~markb/Eprints/Brandon1989DGER_FieldGuide.pdf

Brown E.H., et al, 2007. *Tectonic Evolution of the San Juan Islands Thrust System, Washington*. The Geological Society of America, Field Guide 9, 35 pages.

<http://myweb.facstaff.wvu.edu/bernieh/reprints/brown-gsa-cord-07-san-juans.pdf>

Dion, N.P., and Sumioka, S.S., 1984. *Seawater intrusion into coastal aquifers in Washington, 1978*. State of Washington Department of Ecology Water Supply Bulletin 56, 24 pages.

<https://fortress.wa.gov/ecy/publications/publications/wsb56.pdf>

Dragovich, Joe D. et al, 2002. *Geologic Map of Washington – Northwest Quadrant*. Washington Division of Geology and Earth Resources, Washington State Department of Natural Resources, 80 pages.

http://www.dnr.wa.gov/publications/ger_gm34_geol_map_sw_wa_250k.pdf

Kelly, Doug, 2005. *Seawater Intrusion Topic Paper, In Island County Water Resource Management Plan*.

McLellan, R.D., 2006. *Geology of the San Juan Islands, University of Washington Publications in Geology*.

http://www.cr.nps.gov/history/online_books/geology/publications/state/wa/uw-1927-2/intro.htm

Orr, L.A., Bauer, H.H. and Wayenberg, J.A. 2002. *Estimates of Ground-Water Recharge from Precipitation to Glacial-Deposit and Bedrock Aquifers on Lopez, San Juan, Orcas, and Shaw Islands, San Juan County, Washington*. U.S. Geological Survey Water-Resources Investigations Report 02-4114, 114 pages.

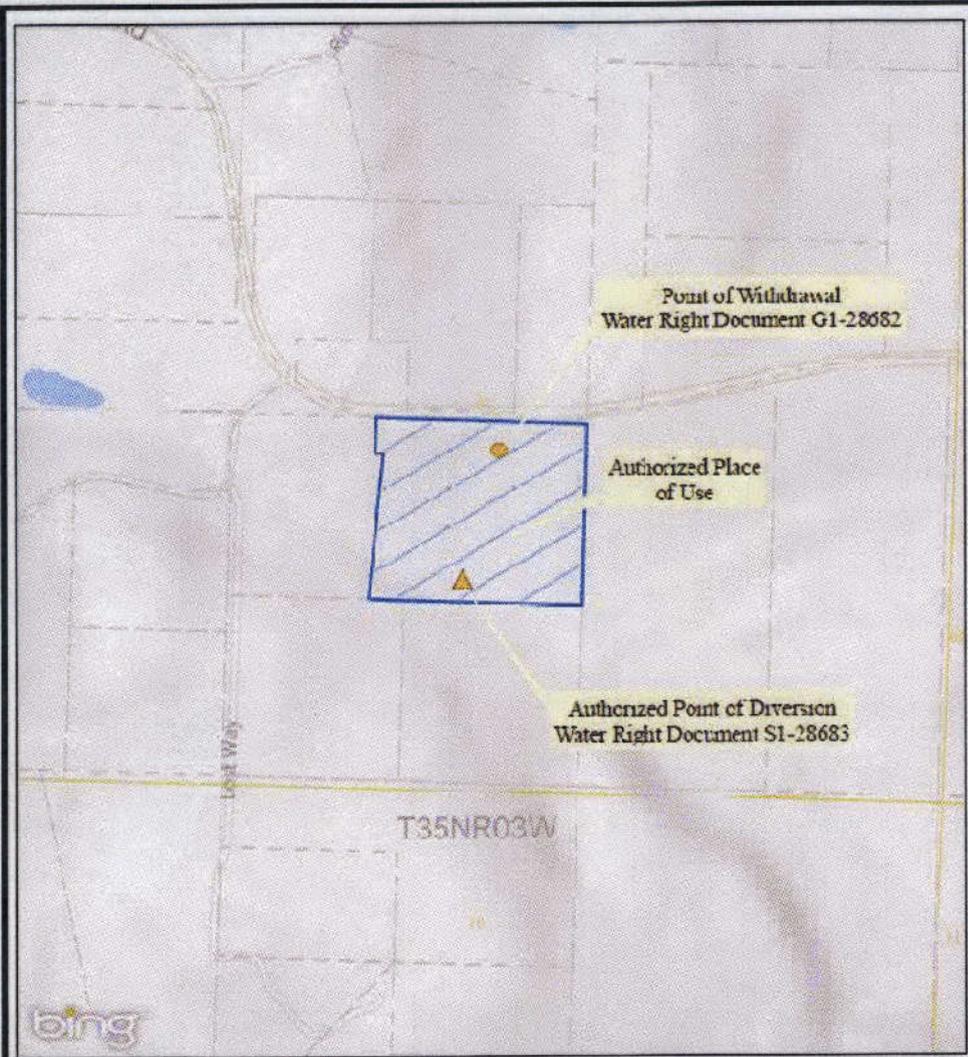
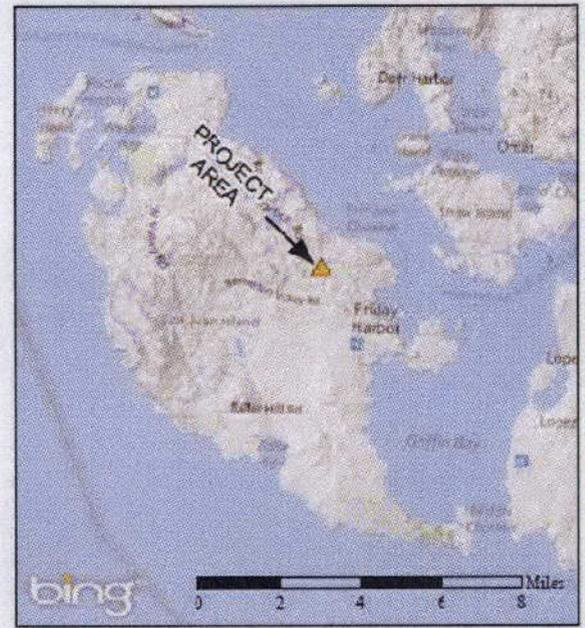
Russell, R.H. ed., 1975. *Geology and Water Resources of the San Juan Islands, San Juan County, Washington*. Washington Department of Ecology Water Supply Bulletin No 46, 171 pages.

Washington Department of Natural Resources. *Geology of Washington: Puget Lowland*. Modified from: Lasmanis, R., 1991. *The Geology of Washington: Rocks and Minerals*, v.66, no. 4, P. 262-277.

<http://www.dnr.wa.gov/ResearchScience/Topics/GeologyofWashington/Pages/lowland.aspx>

Attachment 1: Place of Use Map

Peach Mountain Organics
 Water Right S1-28683
 Section 3 T 35N R 03W W.M.
 WRIA 2 - San Juan Island - San Juan County



- Legend**
- Authorized Place of Use
 - Authorized Point of Diversion
 - Point of Withdrawal Water Right Document G1-28682
 - Parcels
 - Water Body
 - Townships
 - Sections

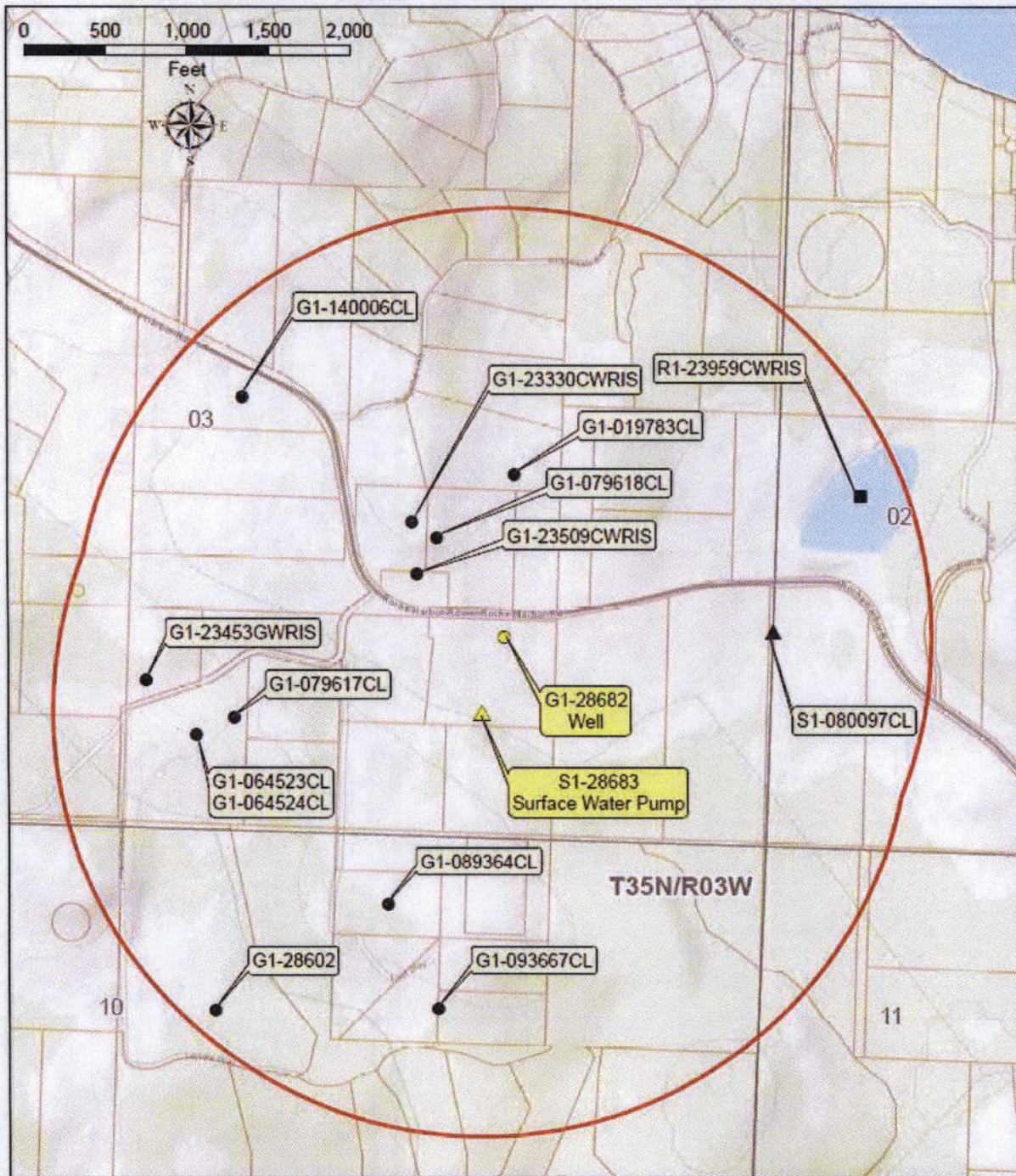


Map Date: 5/6/2014



Place of use and point(s) of diversion are as defined on the cover sheet under the headings, 'LOCATION OF DIVERSION' and 'LEGAL DESCRIPTION OF PROPERTY ON WHICH WATER IS TO BE USED.'

Attachment 2: Impairment Map



- G1-28682
- ▲ S1-28683
- Half Mile Radius
- Ground Water Right Document
- Reservoir Water Right Document
- ▲ Surface Water Right Document



DEPARTMENT OF
ECOLOGY
State of Washington

Water Right Documents within
One-Half Mile of Water Right Documents
G1-28682 and S1-28683
Peach Mountain Organics
Sec 3, T 35N, R 3W, W.M.
WRIA 2, San Juan County, San Juan Island