DEPARTMENT OF ECOLOGY
State of Washington

Application for a New Water Right Permit

Form No. ECY 040-1-14 (Rev 01-2020)

- Refer to accompanying guidance to complete this form.
- We strongly encourage applicants to seek pre-application consultation prior to applying.
- Incomplete applications will be returned.
- All fees are non-refundable (RCW 90.03.470(13))

Processing option you are choosing:

☐ Standard Processing (Department of Ecology)	☐ Cost Reimbursement Agreement Processing (Ecology Contractor)
A minimum $50 fee is required to apply. Additional fees may apply. Drought applications are exempt.	Contact Department of Ecology to obtain information on this option.

Submit all applications and fees to:		
DEPARTMENT OF ECOLOGY CASHIERING SECTION PO BOX 47611 OLYMPIA, WA 98504-7611 Check the box for the region where your project is located.	☐ Central Region	☐ Eastern Region
	☐ Northwest Region	☐ Southwest Region

Guidance to Applicants for New Water Right Permits

Instructions for Form No. ECY 040-1-14

January 2020
ECY 040-1-14A

Publication and Contact Information

This guidance document and related form are available on the Department of Ecology's website at:
https://fortress.wa.gov/ecy/publications/summarypages/ECY040114.html

For more information contact:

Water Resources Program
P.O. Box 47600
Olympia, WA 98504-7600
Phone: 360-407-6872

Washington State Department of Ecology — www.ecology.wa.gov

- Headquarters, Olympia 360-407-6000
- Northwest Regional Office, Bellevue 425-649-7000
- Southwest Regional Office, Olympia 360-407-6300
- Central Regional Office, Union Gap 509-575-2490
- Eastern Regional Office, Spokane 509-329-3400

To request ADA accommodation including materials in a format for the visually impaired, call Ecology at 360-407-6872 or visit https://ecology.wa.gov/accessibility. People with impaired hearing may call Washington Relay Service at 711. People with speech disability may call TTY at 877-833-6341.

Guidance to Applicants for New Water Right Permits

Instructions for Form No. ECY 040-1-14

Water Resources Program
Washington State Department of Ecology
Olympia, Washington

This page is purposely left blank

Table of Contents

Page

Guidance to Applicants for New Water Right Permits....1

Introduction....1

How to use this guidance....2

Processing option you are choosing....3

Applying for a new ground water or surface water permit....3

Date of pre-application consultation with Ecology....4

Section 1: Applicant Information....4

Section 2: Project Description....4

Section 3: Purpose(s) and Period of Use....5

Section 4: Point(s) of Diversion/Withdrawal....10

Section 5: Water Storage....13

Section 6: Place of Use....14

Section 7: Related Water Rights....15

Section 8: System Design and Operation....16

Section 9: Hydrogeologic Analysis....18

Section 10: Driving Directions....20

Section 11: Maps and Other Documentation....20

Section 12: Signatures....2

Attachment A: Drought Authorizations....2

Attachment B: Aquifer Storage and Recovery....4

Attachment C: Mitigation Plan....4

Guidance to Applicants for New Water Right Permits

Instructions for use with Form No. ECY 040-1-14 (Rev 01-2020)

Introduction

This document provides guidance to applicants as they prepare the *Application for a New Water Right Permit.* The water right application process is lengthy and complex, and certain types of applications have varied requirements. Therefore, we strongly encourage applicants to read through the entire application and this guidance document before preparing the water right application.

The intent of this document is to ensure that the applicant provides the information an investigator needs (whether from Ecology or a cost reimbursement contractor) to make a decision based on the science, laws, regulations, and case law related to water rights. If, in using this guidance document, you are unsure of how to proceed, you may contact the appropriate Ecology Regional Office for help and clarification.

We strongly recommend that you attend a pre-application consultation with the Washington Department of Ecology (Ecology) before completing and submitting a water right application. This meeting can save you valuable time, money, and effort by clearly identifying which parts of the water right application must be included, based on the facts of your unique proposal.

To request a pre-application consultation, fill out the following form and submit to Ecology via email:

Pre-Application Form No. ECY 070-440
(https://fortress.wa.gov/ecy/publications/summarypages/ecy070440.html)

NOTE #1: This guidance document is focused on application requirements for a new water right and does not include all permits and authorizations needed to legally divert, withdraw, or use water.

NOTE #2: The above referenced application (Form No. ECY 040-1-14 (Rev 01-2020)) and this guidance document should only be used to request a new water right permit.

DO NOT USE THIS FORM OR GUIDANCE DOCUMENT FOR THE FOLLOWING TYPES OF WATER RIGHT APPLICATIONS:

- Application for Change/Transfer of a Water Right – Use Form No. ECY 040-1-97
  https://fortress.wa.gov/ecy/publications/summarypages/ECY040197.html
- Seasonal Change Application – Use Form No. ECY 070-200
  https://fortress.wa.gov/ecy/publications/SummaryPages/ECY070200.html

- Donating Water into the Trust Water Rights Program – Use Form No. ECY 070-488
  https://fortress.wa.gov/ecy/publications/SummaryPages/ECY070488.html

NOTE #3: If you are applying for a **temporary drought permit,** complete Sections 1 through 4, Section 6 and 7, Sections 10 through 12, and Attachment A.

NOTE #4: If you are applying to **artificially store ground water** for an aquifer storage and recovery project, complete Sections 1 through 12, and Attachment B.

NOTE #5: If your new water right **would impair an existing right**, complete Sections 1 through 4, Sections 6 through 12, and Attachment C. New water rights that will impair an existing water right will be denied unless a mitigation plan is provided and approved. This includes impairment to instream flows established by Rule.

NOTE #6: Ecology will not accept an incomplete water right application for processing. In order to be considered complete, all necessary information and signatures must be included.

How to use this guidance

Throughout this document, items in bold are statements or headings found in the accompanying application and are intended to ensure that you can connect the guidance to the appropriate section of the application.

Blue, underlined text indicates hyperlinks to webpages or online documents. A full web address is also included.

Processing option you are choosing

Applications for new water right permits may be processed either by Ecology or by a cost-reimbursement contractor.

Option 1: Standard Processing

Under this option, Ecology staff review the application and develop the permit decision. Processing time depends on the complexity of the application, the number of competing applications filed before yours, and staff resources. A minimum fee of $50 is required to be submitted with your application, and additional fees may apply. You may estimate the total fee by using the Fee Estimator (https://ecology.wa.gov/Water-Shorelines/Water-supply/Water-rights/Fee-estimator).

As all fees are non-refundable, we DO NOT recommend sending in more than the minimum $50 fee before you have had a pre-application consultation.

If you are applying for a new temporary drought permit, no fees are required. See Note #3 above and the sections of the application listed in the note.

Option 2: Cost-Reimbursement Agreement Processing

You may choose a contractor from a list of cost-reimbursement contractors to process your application, or Ecology will assign one. Information about this process is available on our cost reimbursement web page (https://ecology.wa.gov/Water-Shorelines/Water-supply/Water-rights/Cost-reimbursement).

Under the cost reimbursement process, the contractor would do the work that Ecology's staff of hydrogeologists and permit writers would typically do. The contractor prepares a report of examination and advises Ecology on whether to approve the water right request. Ecology makes the final decision. The fees vary based on the complexity of the application, how many are being processed, and other factors, so no fee is required at the time of filing of the application.

Ecology must agree to enter into a cost reimbursement contract with the applicant before a contractor will be retained.

Applying for a new ground water or surface water permit

Check one box adjacent to either:

- New ground water right permit or
- New surface water right permit

If you are unsure about whether your source would be considered surface or ground water, look at the descriptions provided under Section 4. If still unsure, contact the appropriate Ecology regional office based on the location of your proposed water right permit.

If you are applying for a water use that will be of short duration (less than 4 months) and non-recurring, check the box next to Short-term water right permit. Then, identify the dates

bracketing the period when the water will be used. As a reminder, this period must be less than four months in duration.

If you are choosing to have your new water right application processed through a cost reimbursement agreement, check the box next to Cost reimbursement.

If you are applying for a temporary drought permit, check the box next to Drought.

Date of pre-application consultation with Ecology

If you have completed a pre-application consultation with Ecology prior to submittal of the application, the date of that meeting should be filled in. Pre-application consultations offer an opportunity to get questions answered and to obtain advice on which sections of the water right application to fill out in order to prevent unnecessary work.

Pre-Application Form No. ECY 070-440
(https://fortress.wa.gov/ecy/publications/summarypages/ecy070440.html)

Section 1: Applicant Information

This is important information and needs to be accurate so Ecology or a cost-reimbursement contractor can reach you if they have questions or need additional information for processing your application.

Applicant/Business Name

This can be either an individual or a business. Include all available requested information.

Contact Name

This is the person we will contact if we have questions about your application. If the contact is the same as the applicant, enter "same." Examples of a contact person could include an attorney, consultant, or representative of the applicant's business.

Section 2: Project Description

Section 2.1

Provide a brief narrative explaining the general nature and intent of the proposed water use.

This is a written narrative of how you intend to use water if your requested application is approved. You may wish to reference the maps you have prepared, as required in Section 11.

Section 2.2

If the proposed water use will include a diversion from a new or permitted reservoir, list any associated water rights, and the means of withdrawal. If your application does not include a reservoir, enter "NA" (not applicable).

A reservoir right authorizing the storage of water is often accompanied by a secondary right authorizing the diversion of water from the reservoir. If you have an existing reservoir, identify any such existing water rights associated with it. If you are proposing to construct a new reservoir, you should apply for both a new water right permit and a reservoir permit. See Section 5.1.

Identify if your application includes a reservoir that will be regulated by Ecology. Ecology regulates dams that store at least 10 acre-feet (3.2 million gallons) of water.

Section 2.3

Attach a copy of any SEPA checklists or environmental analyses related to this project with this application.

The State Environmental Policy Act (SEPA) includes categorical exemptions for certain water rights. Those can be found in the identified RCW and WACs.

- RCW 43.21C.035
  https://app.leg.wa.gov/RCW/default.aspx?cite=43.21C.035

- WAC 197-11-800 (4)
  https://apps.leg.wa.gov/wac/default.aspx?cite=197-11-800

- However, even if a project is categorically exempt, it can still require a threshold determination under WAC 197-11-305
  https://apps.leg.wa.gov/wac/default.aspx?cite=197-11-305

Indicate if the water use qualifies for a SEPA categorical exemption. If it does not, attach a copy of any pertinent SEPA checklist and threshold determination.

Section 2.4

Describe how you will measure and control the rate and volume of your diversion or withdrawal.

Suitable measurement devices can include things such as water flow meters, weirs, and flumes. Identify how often the flow meter will be read. Examples of methods of control include things like choosing a pump capable of producing the requested pumping rate at the total dynamic head of the system and use of a throttling valve, or installation of stop logs to control the water surface at a diversion point.

Section 3: Purpose(s) and Period of Use

There are four important components of your proposed water use covered in this section. They are the purpose(s) of use, maximum rate at which you can withdraw or divert water (known as the instantaneous rate or Qi), the total volume of water you can withdraw in a calendar year (known as the annual quantity or Qa) in units of acre-feet per year, and the period of use which is the time that water can actually be applied to the beneficial use.

Purpose of Use

A water right can have one or more purposes of use. List each unique purpose of use on a different row of the provided table. Examples of common purposes of use can be municipal – as defined in RCW 90.03.015 (https://app.leg.wa.gov/RCW/default.aspx?cite=90.03.015), single domestic, multiple domestic, stockwatering, irrigation, commercial and industrial, hydropower, or other purposes of use identified in RCW 90.54.020(1) (https://app.leg.wa.gov/RCW/default.aspx?cite=90.54.020).

Rate

If you are applying for a surface water right, the rate should be identified in cubic feet per second. If you are applying for a ground water right, the rate should be identified in gallons per minute.

The table below provides conversion information between the rates.

1 cfs	448.83 gpm

Annual Volume

This is the volume of water requested that will be used for each purpose of use over the course of a calendar year. The volume must be in units of acre-feet per year for both surface and ground water uses.

The table below provides conversion information between common volumes.

1 acre-foot	43,560 cubic feet
1 acre-foot	325,851 gallons

Period of Use

If your water use could occur at any time, enter “continuously” in this column. If your water use will be seasonal in nature, such as irrigation, enter the date range during which this water use could occur.

If you plan to irrigate, and plan to typically irrigate from June 1 through September 30, but on some warmer and drier years you might irrigate from May 1 through October 31, identify the May 1 through October 31 dates in this column. If a water right permit is issued with a specified period of use (i.e., seasonal), water use outside of that period of the year is not allowed.

At the bottom of the table, total the requested instantaneous rate, annual volume, and number of irrigated acres for all purposes of use requested.

Section 3.1

For domestic water supply system proposals with fewer than 15 residential connections, provide:

- **Projected number of connections to be served**
- **Type of connections (e.g., home, recreational cabin)**

A water right issued to this type of water system will likely qualify as being for multiple domestic water supply purposes.

If information is provided from a current water system plan or small water system management program, provide a copy of the cover and title page, including the date and a copy of the approval letter from the Washington State Department of Health.

Existing water system information can be obtained by accessing the Washington State Department of Health's Sentry Database:
https://fortress.wa.gov/doh/odwsentry/portal/odw/si/Intro.aspx

Section 3.2

For domestic water supply system proposals with 15 or more residential connections, provide:

- **Present population to be served water**
- **Estimated future population to be served (20-year projection)**
- **Whether you have a Water System Plan approved by the Washington State Department of Health, Drinking Water Division, and the date of plan approval**
- **Water System Identification Number**
- **Name of water system**

A water right issued to this type of water system will likely qualify as being for municipal water supply purposes. Many of the questions asked above can be answered by information contained within a water system plan. If the water system plan is available online, provide a URL for the investigator to access it.

If information is provided from a current water system plan or small water system management program, provide a copy of the cover and title page, including the date and a copy of the approval letter from the Washington State Department of Health.

Water system information can also be obtained by accessing the Washington State Department of Health's Sentry Database (https://fortress.wa.gov/doh/odwsentry/portal/odw/si/Intro.aspx).

Section 3.3

For stockwater purposes, provide the number of animals and type of stock, and daily watering requirements per animal.

If you have not identified stockwatering as one of the requested purposes of use, enter "NA." Otherwise, estimates of daily water requirements per animal can be obtained from sources such as metering data from existing operations, literature provided by industry groups, or from the Washington State Department of Health Water System Design Manual, Table 3-2

(https://www.doh.wa.gov/Portals/1/Documents/Pubs/331-123.pdf). Identify the source of the data on which your stockwatering use calculations are based and include your calculations as part of this section.

Section 3.4

For other farm uses, describe all proposed uses.

If you have not identified other farm uses as one of the requested purposes of use, enter "NA." Otherwise, all of the uses on the farm that do not fall within one of the other purpose of use categories should be described in this section. Also, estimates of daily or annual water requirements should be provided while indicating where the estimate was obtained, such as from metering data from existing operations, literature provided by industry groups, or from the Washington State Department of Health Water System Design Manual, Table 3-2 (https://www.doh.wa.gov/Portals/1/Documents/Pubs/331-123.pdf).

Section 3.5

For agricultural irrigation, calculate the acreage in which you have a controlling interest, including only:

- **Acreage irrigated under water rights acquired after December 8, 1977.**
- **Acreage proposed to be irrigated under this application, and**
- **Acreage proposed to be irrigated under other pending application(s).**
- **If the combined acreage under existing rights is greater than 6,000 acres.**
- **If you have a controlling interest in a Family Farm Development Permit.**
    - If so, provide the permit/water right number.

If you have not identified agricultural irrigation as one of the requested purposes of use, enter "NA." Otherwise, this information is needed to make sure that issuance of this water right will not cause you to be in violation of the Family Farm Water Act, chapter 90.66 RCW (https://app.leg.wa.gov/rcw/default.aspx?cite=90.66&full=true). Definitions for terms used under this section are contained in the RCW.

This section is related to all Family Farm Permit water rights and applications held by the applicant for agricultural irrigation in Washington State, not just water rights and applications associated with the same farm as this application.

The table below is provided as an example of how the requested information can be displayed:

Water Right Number	Original Permit Issuance Date	Irrigated Acres	Current Document Type	Notes
G2-22222C	12/9/1977	1,000	Certificate	Family Farm Permit
G3-22223P	2/27/2015	3,000	Permit	Family Farm Permit
Subtotal		***4,000***	***Existing Family Farm Permits***	
G3-33333A	**NA**	**500**	**Application**	**This Application**

Water Right Number	Original Permit Issuance Date	Irrigated Acres	Current Document Type	Notes
Subtotal		***4,500***	***Existing plus this Application***	
G4-32222A	NA	500	Application	Pending Application
G1-31111A	NA	50	Application	Pending Application
Total		**5,050**	**Existing plus all Pending Applications**	

If the subtotal of your existing Family Farm Permits and this application exceed 6,000 acres, the number of irrigated acres under this application will need to be reduced to keep the combined total to 6,000 acres or less, unless the water right qualifies as one of the other types of permits listed in RCW 90.66.050 (https://app.leg.wa.gov/RCW/default.aspx?cite=90.66.050).

Section 3.6

For hydropower uses, indicate:

- **Total feet of head.** The total feet of head is the difference between the elevation of the top of the water surface at the diversion point and the elevation of the hydropower turbine.
- **Proposed capacity in kilowatts.** The proposed capacity in kilowatts can be calculated using the equation below for Theoretical Kilowatts:

  Theoretical Kilowatts = Total feet of head x Flow in cubic feet per second

  11.81

- **A description of the works.** Provide a description of the system, including items such as the diversion location, fish screening, penstock route, penstock length, penstock diameter, turbine location, turbine type, and discharge from the hydropower plant back into the surface water.
- **All uses to which power will be applied.** For the power produced from the facility, identify who the end user of that power will be. Possible answers include the power being provided to the power grid for use by customers, or if it will be used by a single nearby industry.
- **FERC License Number.** If the hydropower project is in the process of being permitted by the Federal Energy Regulatory Commission (FERC), provide the license number.

If you have not identified hydropower as one of the requested purposes of use, enter "NA."

Section 3.7

For industrial/mining uses, describe the type of industrial/mining operations, and the method of supplying and utilizing water.

If you have not identified industrial/mining as one of the requested purposes of use, enter "NA." Otherwise, describe how water will be used in more detail including rate of diversion or withdrawal, annual quantity of water used, period of use, etc.

Section 3.8

For other uses, describe your use in detail.

If you have not identified other as one of the requested purposes of use, enter "NA." Otherwise, describe how water will be used in more detail.

Section 4: Point(s) of Diversion/Withdrawal

Section 4 is broken out into two different tables depending on whether the application is for use of surface water (A) or ground water (B). Since a water right application must either be for a surface water or ground water source, complete either (A) or (B), but not both. If your project will use both (e.g., a surface water diversion and a well), you need to submit two separate applications.

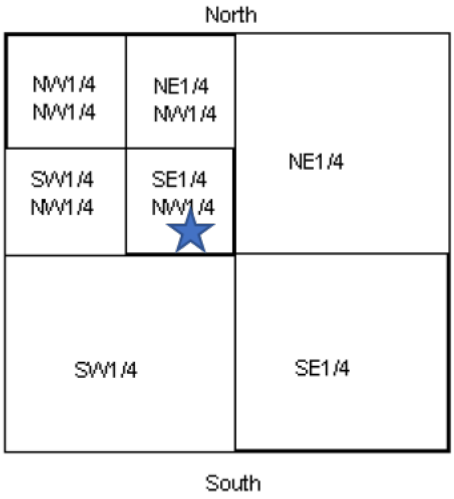
A. Points of Diversion (Surface Water Only—Legal Descriptions)

Check the box next to the generic description of the surface water source(s) that you propose to divert from (Spring, Creek, River, Lake, Other). Examples of sources that could qualify as "other" include a pond or ditch.

There are five important components of your proposed point of diversion covered in this section. They are the source, identification of which surface water body the source is tributary to, legal description of the point of diversion (quarter quarter, quarter, section, township, and range), parcel number, and the latitude/longitude of the point of diversion. Each point of diversion should be identified separately, in its own row in the table.

- **SOURCE** – This is the name of the surface water body that water will be diverted from. Examples include Lake Whatcom, Spokane River, First Creek, unnamed stream, unnamed stream tributary to Anderson Creek, unnamed pond, and spring.
- **TRIBUTARY TO:** – This is the next largest stream or water body that water from the source will flow into. As an example, if the source of water was the Cedar River, Lake Washington would be entered in this cell, since the Cedar River flows into Lake Washington.
- **QTR QTR, QTR, SEC, TWP, RGE –** These columns provide the legal description of the proposed point of diversion.

To assist with identification of the legal description of the point(s) of diversion, the following illustration shows how a Section of land is divided into smaller subsections. The entire square in this example is a Section which typically measures one mile on each side. Within each Section, the land is referred to as half and quarter sections. A one-sixteenth division is called a quarter quarter section, as in the SE1/4 of the NW1/4. The descriptions are read from the smallest division to the largest.



The Section above is divided into four sections. Starting in the upper left corner and moving clockwise, the quarter sections are NW 1/4, NE 1/4, SE 1/4, and the SW 1/4. In this example, the NW1/4 is further divided into four quarter quarter sections. These are labeled, in the same order, as the ¼ sections. The star is located in the SE1/4 (QTR QTR), NW1/4 (QTR) of the Section, Township X North, Range Y (either West or East) of the Willamette Meridian.

If you do not understand the Public Land Survey System, contact the appropriate Ecology regional office or seek professional assistance in completing your application.

1. **PARCEL NO.** – This is the county parcel number on which the point of diversion is located. If there is no parcel number associated with the location of the point of diversion due to it being considered water, identify the parcel adjacent to the water. Many counties have online parcel maps available for determining this information.

2. **GPS/LAT-LONG** – This is a reference to the geographic positioning system (GPS) latitude and longitude of the point of diversion. This can be obtained through use of a GPS unit, a cell phone with GPS capabilities, or through a mapping program like Google Maps/Earth™ if the location can be identified on an aerial photo. Latitude and longitude reported in decimal degrees (such as 47.0476 and -122.8087) is preferable to those reported in degrees, hours, and minutes (such as 47°02’51” North and 122°48’31” West).

Do you own the proposed point(s) of diversion?

Check the appropriate box in response to the question. Note that ownership information of the point of diversion or withdrawal is not required. However, we advise applicants to arrange with the owner to ensure future access to the source location. Approval of the application does not provide you or the water right holder with assurance of future access.

B. Points of Withdrawal (Ground Water—Legal Descriptions)

Check the box next to the generic description of the ground water source (Well, Other). An example of a source that could qualify as “other” is an infiltration trench.

There are six important components of your proposed point of withdrawal covered in this section. They are the source, well number, well tag number, legal description of the point of withdrawal (quarter quarter, quarter, section, township, and range), parcel number, and the latitude/longitude of the point of withdrawal. Each point of withdrawal should be identified separately, on its own row in the table.

1. **SOURCE** – This is the name of the ground water that will be withdrawn from. Examples include well, Wanapum Basalt Aquifer, Sumas Aquifer, and alluvial aquifer.
2. **WELL NO.** – This is a number assigned by the applicant. Examples could be Well No. 1, Well No. 2, and so on. This could also be a source number assigned by the Washington State Department of Health, such as S01 or S02. If there is no number, leave blank.
3. **WELL TAG NO.** - This refers to a tag issued by Ecology that contains a three-letter sequence followed by a three-number sequence. The tag is permanently attached to the outer well casing or other prominent well feature and must be visible above the land surface. A photo of Well Tag No. AFJ959 properly affixed to a well casing is shown below:

Wells drilled prior to 1971 usually do not have Well Tags attached. These tags can be obtained from Ecology by the well owner and attached to the well to clarify which well is associated with which water well report. For additional information on well tagging requirements, see Focus on Well Tagging (https://fortress.wa.gov/ecy/publications/SummaryPages/981805WR.html).

4. **QTR QTR, QTR, SEC, TWP, RGE –** See explanation of legal description provided above under A. Points of Diversion.
5. **PARCEL NO. –** See explanation of parcel number provided above under A. Points of Diversion.
6. **GPS/LAT-LONG –** See explanation of GPS location provided above under A. Points of Diversion.

Do you own the proposed point(s) of withdrawal?

Check the appropriate box in response to the question. Note that ownership information of the point of diversion or withdrawal is not required. However, we advise applicants to arrange with the owner to ensure future access to the source location. Approval of the application does not provide you or the water right holder with assurance of future access.

Section 5: Water Storage

Section 5.1

If you will be storing 10 acre-feet or more of water and/or if the water depth will be 10 feet or more at the deepest point and some portion of the storage will be above grade, you must also complete an "Application for a Reservoir Permit," and a "Dam Construction or Decommissioning Permit Application."

If your project does not include storage of water in an existing or new reservoir, enter "NA."

Typically, when a water right that includes the beneficial use of water from a reservoir is in the planning stages, the *Application for a Reservoir Permit* must be filed and processed at the same time as the *Application for a New Water Right Permit*. Exceptions to this are:

- When a reservoir permit is being applied for to store water, but there is no additional water right needed to beneficially use the water, or
- When a reservoir already exists, but an *Application for a New Water Right Permit* must be submitted and approved to use the water in that reservoir.

Example #1
An irrigator holds a water right for irrigation from a stream. Historically, the water was pumped directly from the stream to the fields. Now, the irrigator would like to construct a reservoir to allow them to pump from the stream into the reservoir and then pump from the reservoir for irrigation of the fields. Water will still be pumped from the stream and used for irrigation, but it will be routed through a reservoir under the new scenario.

Example #2
An entity obtained a reservoir permit for storage of water and now they are requesting to pump from the reservoir and put that stored water to a beneficial use, such as irrigation.

- Application for a Reservoir Permit, Form ECY 070-38
  (https://fortress.wa.gov/ecy/publications/summarypages/ecy040160.html)

If a reservoir permit is obtained, the applicant will be required to complete the Dam Construction or Decommissioning Permit Application before the reservoir can be constructed.

- Dam Construction or Decommissioning Permit Application
  (https://fortress.wa.gov/ecy/publications/summarypages/ecy07038.html)

Section 5.2

If applicable, describe your proposed impoundment, including the volume and maximum depth.

If you entered "NA" in Section 5.1, enter it again here. If not, describe your proposed impoundment. Items to include in the description are:

- elevation of the top of the dam
- elevation range of active storage
- elevation below which is dead storage
- reservoir liner material
- location of inflow and outflow pipes
- spillway and emergency spillway locations and capacities
- surface area of water
- total volume held at full pool
- maximum depth at full pool

Section 5.3

If you are proposing in Aquifer Storage and Recovery project, complete Attachment B.

Aquifer storage and recovery (ASR) involves the artificial storage of water in the subsurface. Attachment B contains requirements specific to that type of new water right application. If you are not applying for an ASR project, enter "NA."

Section 6: Place of Use

The place of use is where the water is proposed to be used. The proposed place of use includes all parcels on which water will be used. In order to identify where water use is proposed, fill out the table. If more than one parcel will be involved, create additional rows with one for each parcel. The legal description and parcel number column descriptions have been covered in Section 4 above. The columns that are not covered in Section 4, include:

County

Identify which county the parcel is located within. This is especially important when the place of use crosses a county boundary.

No. of irrigated acres

If you are requesting water for irrigation, identify how many acres are proposed to be irrigated on each parcel. Also, see Section 11 for a description of the map that will need to be included showing the acres proposed to be irrigated.

Legal landowner of proposed place of use.

If you are not the legal landowner of the proposed place of use, the name and contact information for that landowner must be included here and the signature of the legal landowner of the proposed place of use must be included in Section 12. There can be multiple landowners within the proposed place of use and the signature of each legal landowner is required. Duplicate the contact information box and fill in for all landowners.

However, if you are requesting a water right, and under that water right you will distribute water to other entities (for instance you are a municipality, public water system, or irrigation district), enter "NA" in this box.

Section 7: Related Water Rights

Section 7.1

List any other water rights (applications, permits, certificates, or claims) related to this application. Include any rights that overlap the place of use.

Ecology needs to know if there are other water rights or claims that are attached to the proposed place of use requested in your application. Provide a list of water rights and identify which attribute (such as place of use or points of withdrawal) overlaps with the requested water right. If there are no such rights, enter "NA."

The table below is provided as an example of how the requested water right information can be displayed to accompany the narrative:

Water Right Number	Instantaneous Rate (gpm)		Annual Volume (afy)		Irrigated Acres (acres)	
	Additive	Non-Additive	Additive	Non-Additive	Additive	Non-Additive
G2-22222C	1,500	0	500	0	250	0
G2-22223P	500	2,000	500	0	250	0
Subtotal	***2,000***	**-**	***1,000***	**-**	***500***	**-**
G2-33333A	1,000	0	0	1,000	0	500
Proposed Total	**3,000**	**-**	**1,000**	**-**	**500**	**-**

Section 7.2

Explain how the water rights listed above have been used and how that use relates to the use proposed.

- If no water rights were identified under Section 7.1, enter "NA."
- If one or more water rights were identified, provide a narrative of how water use will be divided between different water rights within the overlapping places of use, if applicable.

Provide a narrative of how water use from sources authorized under multiple water rights will be metered and differentiated, if applicable.

For information on our use of terms, refer to Policy POL-1040 Use of Terms that Clarify Relationships Between Water Rights (https://fortress.wa.gov/ecy/wrdocs/WaterRights/wrwebpdf/pol1040.pdf).

If you still have questions about your water rights, contact the appropriate Ecology regional office Water Resources Program staff.

If there are related water rights, you must show these on a map. See Section 11 for items to include in your map.

Section 8: System Design and Operation

Section 8.1

Provide a description of the proposed water supply system from the point of diversion or withdrawal to the proposed place of use.

Describe your proposed water system qualitatively. Identify the sources of water and how the water will be moved from the source to the point of use. This description of the system will provide the reviewer with a general understanding of how water will flow through your system. Refer to maps you have provided as needed.

See Section 11 for the required map details.

Section 8.2

Provide preliminary design plans and specifications for the proposed use, including diversion or withdrawal and conveyance facilities, if applicable, and the proposed flow rate and volume design capacity.

Describe the proposed water system quantitatively. This should include details such as pipe diameters, the size and types of pumps, pump curves, rating curves, sprinkler types and efficiency, meters, and flow controls. This description should provide enough detail that the person reviewing the application will have an accurate understanding of how water will move through your system. Refer to maps you have provided as needed.

See Section 11 for required map details.

Section 8.3

Provide the projected system efficiency.

System efficiency is a percentage represented by the difference between the amount of water withdrawn or diverted and the amount applied to beneficial use, divided by the amount of water withdrawn or diverted. Water use is rarely 100 percent efficient, but the amount withdrawn or diverted should be no more than reasonably necessary to accomplish the project purpose. Calculation examples and sources of data for irrigation and municipal water systems are provided below.

If you will use water for irrigation, provide information on the efficiency of the irrigation method to be employed. You may use Water Resources Program's Guidance 1210: Determining Irrigation Efficiency and Consumptive Use (https://fortress.wa.gov/ecy/wrdocs/WaterRights/wrwebpdf/guid1210.pdf) as a source of information. If other sources are used, document the work and provide references to that information.

If you have a municipal purpose water right, identify your most recent distribution system leakage as reported on your most recent Water Use Efficiency Annual Performance Report submitted to the Washington State Department of Health. Existing water system information can be obtained by accessing the Washington State Department of Health's Sentry Database (https://fortress.wa.gov/doh/odwsentry/portal/odw/si/Intro.aspx).

Section 8.4

For surface water diversions, describe how your plans comply with Washington Department of Fish and Wildlife (WDFW) fish screening requirements.

For surface water diversions, provide confirmation that your fish screening does or will comply with requirements of the WDFW as stated in Chapter 77.57 RCW, Fishways, Flow, and Screening (https://app.leg.wa.gov/RCW/default.aspx?cite=77.57&full=true).

Development Schedule

Section 8.5

Provide a general timeline that includes the steps needed to begin the project, complete the project, and put the water to full beneficial use.

If your application for a new water right permit is approved, describe how long it will take for you to:

- Start the project
- Construct all infrastructure to allow for full use of the water right
- Fully use the rate and volume of water authorized under the water right

Do not include specific dates in this response, but instead identify how many months/years it will take to achieve each development step from the date you are notified you can proceed. For instance, you might enter one year, two years, and five years, if it will take one year to begin the project, another year to construct the project, and three more years to put the water to full use,

which equals five years total). Your schedule should present the amount of time necessary to fully complete your project, including time to address unforeseen circumstances. If you are issued a permit, but cannot meet these deadlines, you can request an extension, but will need to demonstrate good cause and due diligence in moving forward with the project or else the permit may be cancelled.

Section 8.6

Identify and discuss other land-use or environmental permits required and the timeline to obtain those permits.

Indicate whether your project requires any other land use or environmental permits. Identify the status of those applications or permits. Indicate when all needed permits should be obtained. If this includes SEPA determinations, make sure your comments here are consistent with those in Section 2.3. Examples of other permits include Hydraulic Project Approval (HPA) for in-water construction, clearing and grading permit for preparation of land for agricultural use, and building permits for facility construction.

Section 9: Hydrogeologic Analysis

This analysis is required only if applying for a new ground water right. **We recommend that this section be prepared by a hydrogeologist licensed in Washington State.** As previously mentioned, we strongly recommend that you engage in a pre-application consultation with Ecology prior to conducting a hydrogeologic analysis.

Section 9.1

Describe the hydrogeologic setting. Identify all ground water bodies and surface water bodies involved.

Describe the hydrogeologic setting. Provide a narrative discussion of the geology of the area including identification of all ground water bodies and any connected surface water bodies involved. Assistance in identifying a body of public ground water or source of water is defined in Water Resources Program's Policy 2010: Defining and Delineation of Water Resources (https://fortress.wa.gov/ecy/wrdocs/WaterRights/wrwebpdf/pol_2010.pdf).

Section 9.2

Describe geographic recharge and discharge areas, seasonal variations, and interrelationships between surface and ground water, and between aquifers. Identify barriers to flow and hydrologic boundaries, if known.

- Identify and describe geographic recharge and discharge areas, seasonal variations in ground water levels and surface water flow and identify barriers to flow and hydrologic boundaries if known for the aquifer proposed to be tapped.
- Describe the aquifer properties measured or estimated for the aquifer tapped by the proposed point(s) of withdrawal.

- Identify the ground water flow directions in the aquifer to be tapped by the proposed point(s) of withdrawal.
- Identify the body of public ground water in which the existing and proposed points of withdrawal are completed.
- Calculate the possible pumping impacts on neighboring points of withdrawal, surface water diversions, and minimum instream flows.

Section 9.3

If available, attach Water Well Report, well diameter and depth, and any pump test data.

If the proposed well already exists (such as if it was drilled as a point of withdrawal under another water right), provide any construction and testing reports that exist along with the water well report that was filed with Ecology.

Note: a new water supply well for anything other than a permit-exempt ground water use can NOT be drilled prior to receiving a water right permit or a preliminary permit issued by Ecology.

Section 9.4

Describe, if available, the following characteristics of the source aquifer and cite the source of that information:

- **Aquifer transmissivity**
- **Aquifer storage coefficient and specific yield**
- **Saturated thickness**
- **Aquitard leakage**
- **A detailed description of ground water-flow boundaries**
- **Water-level hydrographs for points of withdrawal, both static background and during aquifer testing**
- **Associated water-quality information**

The methods used to estimate the effects of pumping will vary, but in all instances this work should include development of a conceptual model and an appropriate level of analytical modeling or 2D or 3D numerical modeling. Time lags of effects to streams should be evaluated and multiple results should be reported. A description of the analyses and all results should be included in your application or an attached hydrogeologic report.

Describe any known or potential issues on the quality of the water, either natural or human-caused, such as seawater intrusion, nitrate, contaminated sites, high iron, and manganese.

Additional hydrogeologic work may be required to process your application, and this can best be determined with a pre-application consultation with Ecology staff at the appropriate regional office. Work may be required to be performed prior to Ecology making a decision on the water right application. This is done through issuance of a preliminary permit to collect additional data for decision-making.

If your proposed water use impairs existing water rights, including minimum instream flows, or would take water that is legally not available, you will need to develop a mitigation plan as described in Attachment C.

Section 10: Driving Directions

Section 10.1

Site address, and detailed driving directions to the project site.

Provide a site address that can be entered into navigation software to obtain driving directions to the site. In addition, provide driving directions from an interstate to the project site. Identify necessary turns and distances between turns.

Section 11: Maps and Other Documentation

Section 11.1

Attach detailed map(s) clearly indicating the following:

- The proposed places of use for all rights related to this application. If any overlapping water rights for the place of use, or multiple rights that share the same point(s) of diversion/withdrawal exist, provide one map depicting all of the historic points of diversion, means of conveyance, and places of use. Identify related rights as such by water right number.
- The county parcel numbers for the proposed place of use, unless the place of use is for a large service area such as that served by an irrigation district or municipal water system. Identify the name of the irrigation district or the water system, if applicable.
- The proposed locations of the point(s) of diversion/withdrawal.
- The names, informal or formal, used to identify each point of diversion/withdrawal (e.g., Well No. 1, River Well, S01, Smith Dam, etc.).
- A grid layer referencing Section, Township, and Range of the area.
- The location of the water delivery system and other such features relevant to your proposed application (e.g., mainlines, reservoirs, booster pumps, etc.)

Maps that must accompany your completed water right application, if applicable:

Map(s) showing:	**Is required for:**
Proposed Water Right Attributes	All applications
Infrastructure associated with the proposed water use	All applications
Irrigated acres within the proposed place of use	Only for applications with irrigation as a proposed purpose of use
Related water rights used within the proposed place of use, or that are sharing proposed points of diversion/withdrawal with the proposed water right	Only for overlapping or associated water rights identified in Section 7

1. Map of Proposed Water Right Attributes (*all*)

Showing:

- Township, Range, and Sections
- Scale Bar
- Legend
- North Arrow
- Date map prepared
- Proposed Points of Diversion or Withdrawal (labeled with diversion name or number or well name or well number)
- Proposed Place of Use
- Parcels (labeled with parcel numbers inside proposed place of use)
- Recent aerial photo in the background (i.e. overlay the information above onto a recent aerial photo

2. Map showing infrastructure associated with the proposed water use (*all*)

Showing:

- Proposed Point of withdrawal/diversion locations
- Proposed Mainlines
- Proposed Booster pumps
- Proposed Irrigation zones
- Proposed Reservoirs
- Date map prepared
- Recent aerial photo in the background (i.e. overlay the information above onto a recent aerial photo

3. Map showing irrigated acres within the proposed place of use (*applications with irrigation as a proposed purpose of use only*)

Showing:

1. Township, Range, and Sections
2. Scale Bar
3. Legend
4. North Arrow
5. Date map prepared
6. Proposed Place of Use
7. Proposed irrigated acres (with acres by parcel or field/orchard block noted)
8. Recent aerial photo in the background (i.e. overlay the information above onto a recent aerial photo

4. Map showing related water rights used within the proposed place of use, or that are sharing proposed points of diversion/withdrawal with the proposed water right (*only for overlapping or associated water rights identified in Section 7*)

Showing:

1. Township, Range, and Sections
2. Date map prepared
3. Currently used points of diversion or withdrawal (labeled with diversion name or number or well name or well number)
4. State or Federal water project turnouts
5. Currently used place of use for other water rights
6. Currently used place of use for state or federal water project water use
7. Recent aerial photo in the background (i.e. overlay the information above onto a recent aerial photo

Section 12: Signatures

The following parties must sign a new water right application:

- Applicant (or authorized representative)
- Legal Owner or Part Owner Place of Use

All owners of property within the proposed place of use must sign the application for it to be accepted for processing. If you do not have the signatures of all landowners, do not submit the application. This is **not applicable** to water rights proposed to serve water to customers, such as public water systems, municipal water suppliers, and irrigation districts.

If there are multiple owners, such as LLCs, that are owned by the applicant, include text and supporting documents (such as corporation ownership information from the Washington Secretary of State's Corporations and Charities Filing System (https://ccfs.sos.wa.gov/#/). to explain the relationship between the legal land owners and applicant, if any.

The table below is provided as an example of how the requested parcel ownership within the proposed place of use information can be displayed to accompany the narrative:

Parcel Number	Parcel Owner	Relationship to Applicant
12345678	John Doe	Applicant
23456789	John Doe LLC	Applicant is Governor of LLC
34567890	Doe LLC	Applicant is Governor of LLC
98765432	Jane Smith	None – Signature on Application

Attachment A: Drought Authorizations

You must have completed Sections 1 through 4, Section 6 and 7, and Sections 10 through 12 of the water right application (Ecology Form No. ECY 040-1-14 (Rev 01-2020). In addition, you must complete all sections in this Attachment.

The eligibility criteria for the use of a new temporary drought permit is:

1. The geographic area has been declared to be suffering from drought conditions by the Governor.
2. The water right holder must receive or be projected to receive 75 percent or less of normal year water supply.
3. The reduced water supply is expected to cause undue hardship.

An applicant can apply for a new temporary drought permit at any time. However, this water right will not be able to be used until the criteria above are met. New temporary drought permit applications will only be expedited if the application is for a point of diversion or withdrawal located within the area experiencing a declared drought.

A new temporary drought permit is different than a drought change authorization in that the source of water for the temporary drought permit can be different than the current source of water, such as the Yakima River and deep basalt ground water. A drought change authorization is for changes and transfers involving a **single source** of water (such as including a different well tapping the same body of public ground water).

Section A.1

Describe the specific circumstances pertaining to your water shortage. Describe how existing water rights are insufficient to address these impacts due to the drought.

Describe the water use authorization for your current water use, which may be under a water right permit, certificate, claim, or water service contract. Information about the status of droughts in Washington State is available by calling your local Ecology regional office. Identify and describe your source of water and the availability typically encountered in normal years. Compare and contrast the normal availability with what you are experiencing or expect during a drought and describe how that will impact your ability to use your water during the drought.

Section A.2

Describe how the water right proposed will address these impacts.

Describe how the requested new temporary drought permit will address the impacts you described in Section A.1. Identify if the requested new temporary drought permit will fully or partially offset the drought impacts. Identify how long the requested solution will take to implement once approval is received.

Section A.3

Have you had any previous drought-specific authorizations for the subject parcels?

If yes:

- **What are the Drought Authorization numbers?**
- **Did those former authorizations cause impairment to other water users?**

Indicate whether you have had previous drought-specific authorizations or temporary drought permits for water use on the parcels for which you are currently seeking a temporary drought permit. If yes, provide the year and water right number that accompanied the previous authorizations. Identify if past authorizations solved or alleviated the water supply problems you

experienced at those times. Identify whether any third parties made claims of impairment against you when you exercised your water right under the prior authorizations.

Attachment B: Aquifer Storage and Recovery

This Attachment is required if you are applying to use aquifer storage and recovery. You must have completed Sections 1 through 12 of the water right application and all sections in this attachment. Permitting an aquifer storage and recovery project is a substantial undertaking. We highly recommend that you request and attend a pre-application consultation with Ecology before taking on this endeavor.

Section B.1

Application Requirements:

1. A description (conceptual model) of the hydrogeologic system prepared by a hydrogeologist licensed in the state of Washington. See WAC 173-157-120 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-120).
2. A project operation plan with a description of the pilot and operational phases of the ASR project prepared by an engineer or geologist licensed in the state of Washington. See WAC 173-157-130 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-130).
3. A description of the legal framework for the proposed project. See WAC 173-157-140 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-140).
4. An environmental assessment and analysis of any potential adverse conditions or potential impacts to the surrounding ecosystem(s) that might result from the project, along with a plan to mitigate such conditions or impacts. See WAC 173-157-150 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-150). The environmental assessment will establish whether a determination of non-significance or an environmental impact statement is required per SEPA regulations.
5. A project mitigation plan, if required. See WAC 173-157-160 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-160).
6. A project monitoring plan. See WAC 173-157-170 (https://app.leg.wa.gov/WAC/default.aspx?cite=173-157&full=true#173-157-170).

Each of the required analyses and plans described above must be provided with the application packet. Chapter 173-157 WAC provides more information on the level of detail required for each document.

Attachment C: Mitigation Plan

If the proposed water right, without a mitigation plan, would impair an existing water right, you must complete at least Sections 1 through 4 and Sections 6 through 12 of the water right application and all sections in this Attachment. For the purposes of this analysis, an existing water right is a water use being carried out under authority of a water right permit, certificate, a water

right claim, a permit-exempt well, or a minimum instream flow or base flow established by rule. The specific water right or water rights that would be impaired, absent a mitigation plan, must be identified at the beginning of the mitigation plan. It is highly recommended that the applicant request and attend a pre-application consultation with Ecology before taking on the preparation of a mitigation plan.

Section C.1

Identify the source of supply for the proposed mitigation water.

Identify the source of supply for your mitigation water that will be used to offset the impairment of the water right(s). Also, identify the authority to use the water, such as an existing water right, water service contract, or trust water right agreement.

Section C.2

Estimate the consumptive quantity of water for the proposed use. Describe the methodology used to support your estimate.

The rate and volume of water diverted or withdrawn might not accurately reflect the impact to the water source if water is allowed to flow back to that source. As an example, if a city diverts water from a river, but then discharges treated effluent from its wastewater treatment facility into the same river, the impact from the diversion point to the discharge location is equal to the rate and volume of water pumped, but the impact below the discharge location will only be the difference between what is diverted and what is discharged, which is the consumptive use.

These calculations can also be made absent direct measurements using data from similar uses, industry standards, or calculations, such as for the consumptive use under irrigation water rights, as described in Water Resource Program's Guidance 1210: Determining Irrigation Efficiency and Consumptive (https://fortress.wa.gov/ecy/wrdocs/WaterRights/wrwebpdf/guid1210.pdf). If calculations are made, identify the source of your information and include your calculations as well as the results of your analysis.

Section C.3

Describe how the proposed mitigation would offset the impacts of the proposed withdrawal or diversion.

Describe how the mitigation water source will offset the impacts of the proposed new water right. This should specifically address how the change in the amount of water in Section C.2 will be offset by the source identified in Section C.1.

Section C.4

Describe the measures that will be taken to ensure mitigation will be maintained for the duration of the water right authorization.

Provide assurances that the mitigation measures will remain in effect as long as water is being used under the terms and conditions of the water right, which is assumed to be in perpetuity, unless specified. These assurances could be in the form of legal contracts between the parties, property easements, or other binding conditions.

Section C.5

Provide copies of any agreements between you and other parties regarding mitigation for impacts, if applicable.

Provide copies of any agreements described in Section C.4.

Section C.6

Describe the benefits and costs, including environmental effects, of any water impoundment or other resource management technique that is included as component of the application.

Identify if there will be a water impoundment or other management technique that is part of the mitigation package. Discuss the benefits and costs and environmental impacts of those structures or techniques. See RCW 90.03.255 (for surface water) and RCW 90.44.055 (for ground water).

Section C.7 or C.8

Analyze whether there will be any increased water supply from the impoundment or technique, including recharge of ground water, as a means of making water available or otherwise offsetting diversion/withdrawal impacts.

Because the information in this section will be reviewed and evaluated by licensed hydrogeologists at Ecology, the services of a professional hydrogeologist are highly recommended for this section.

Section C.9

If you intend to offset your new use, describe how and when non-consumptive water returns to ground water or surface water, and explain how this volume was estimated. Specifically describe how the quantity, timing and location of return flow would change if the proposed permit is approved.

Because the information in this section will be reviewed and evaluated by licensed hydrogeologists at Ecology, the services of a professional hydrogeologist are highly recommended for this section.