Water & Rural Living
What Idaho Homeowners Need to Know

University of Idaho Extension

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Water & Rural Living: What Idaho Homeowners Need to Know

Introduction
This guide to government agencies and permitting processes related to water and rural residences in Idaho is intended for homeowners, home buyers, and Realtors. It explains which agencies administer which water-related programs and which ones to contact with your water-related questions. The guide also is intended to help you understand the terminology and the science behind the permitting processes.

Contents
Individual Septic Systems ............................................................. 3
Drinking Water .................................................................................. 6
Building, Land-Use Permits, and Site Design ..................................... 9
Wetlands ......................................................................................... 11
Lake Shorelines, Streams, and Rivers ............................................... 12
Floodplains .................................................................................... 14
Directory ....................................................................................... 15
WHAT IS A SEPTIC SYSTEM?
Many rural properties do not have access to a municipal sewage collection and treatment system. These properties are usually served by septic tanks and drainfields. For a standard home, the septic tank is 1,000 gallons in size. The tank separates out solids and greases before the sewage effluent (wastewater) is distributed to a drainfield. The drainfield’s purpose is to treat the sewage effluent further, before it reaches groundwater and/or surface water.

Individual septic systems are typically located on the property adjacent to the house, depending on the site conditions. Sometimes the system is located some distance from the house. Wastewater can even be pumped uphill to the closest available suitable land. If necessary, septic systems may be on a neighboring parcel, via a recorded easement.

Septic systems include a tank to separate solids and grease from liquids and a drainfield for percolating wastewater slowly into the soil. The soil has physical, chemical, and biological properties that treat the wastewater before it gets to the clean groundwater.
**Individual Septic Systems, cont.**

**DO SEPTIC SYSTEMS NEED PERMITS?**

If a parcel is served by an individual septic system installed after 1973, it is required to have a septic permit. All Idaho health districts can look up individual septic permits, and some have an online self-search feature. A septic permit will have information on installation date, size of the system, and location of the system. If you still need assistance, call your local health district’s environmental services division office.

**WHERE CAN I FIND A COPY OF THE STATE OF IDAHO’S SUBSURFACE SEWAGE RULES?**

Idaho Regulation 58.01.03—Individual/Subsurface Sewage Disposal Rules:  

**HOW DO I MAINTAIN A SEPTIC SYSTEM?**

The Idaho Department of Environmental Quality has published a guide, *A Homeowner’s Guide to Septic Systems*, found at the following web address:  

This guide includes information on how often to pump a septic tank, along with additional information about septic systems.


**HOW DO I FIND LICENSED SEPTIC INSTALLERS AND LICENSED SEPTAGE PUMPERS IN MY AREA?**

Consult these lists:

Idaho-permitted subsurface sewage disposal system installers—  

Idaho-permitted septic tank pumpers—  

**HOW DO I KNOW IF A SEPTIC SYSTEM ISN’T WORKING PROPERLY?**

From the surface, it might not be possible for the untrained eye to notice a failing or failed septic system. However, some obvious symptoms may include (but are not limited to) slow-running drains or toilets; wet, mushy, spongy soil in one area; lush green grass in one area; or backed-up water in the home. If the system is failing, contact your local health district. Depending upon the issue, the health district may provide a list of licensed septic pumpers for the septic tank or require an application to repair the failing septic system.
Individual Septic Systems, cont.

WHY DID THE BANK ASK ME TO CHECK MY SEPTIC SYSTEM?
Lenders may want assurance that properties are served by wastewater and drinking water systems that meet current standards. Some health districts can conduct a mortgage survey to make that assessment. There is a fee for this service; ask your local public health district’s environmental services department if this service is provided in your area.

HOW BIG DOES MY SEPTIC SYSTEM NEED TO BE?
In Idaho, sizing is based on two factors: the number of bedrooms, which determines flow, and the soil type. Finer-grained soils such as clay or silt require a much larger system than soils with coarser grains, such as sands. A suitable area must be identified for a primary drainfield and its replacement. These may take up a large portion of the property—anywhere from 600 to 3000 square feet.

DO I NEED TO LOCATE A SUITABLE SITE FOR THE SEPTIC SYSTEM BEFORE I BUILD OR ADD ON?
Placement of the house, decks, and outbuildings (such as a shop, garage, barn, greenhouse), along with locations of driveways, wells, sidewalks, patios, parking areas, gardens, etc., must not compromise the suitable areas identified for septic. Identify those suitable areas before you build or add on. The septic system is a critical component of your home’s infrastructure and must be protected!

The drainfield and replacement area must both be located at least 100 feet from a drinking water well and between 100 and 300 feet from surface water. The surface water setback depends upon the soil type. There is a design life for septic drainfields, so a replacement area must be determined and protected. Additional information can be found at your local Idaho public health district (see page 16 for Idaho public health district contact information.)
Drinking Water

Drinking Water for Existing Homes

WHERE DOES DRINKING WATER COME FROM?

In Idaho, water for domestic use can be from a stream or river, a lake, or from an underground aquifer. Individual homes will either be on a private well or other private water system or on a community water system that services many homes. A public water system is a regulated system serving water to at least 15 service connections or regularly serving an average of at least 25 persons daily at least 60 days out of the year. Typically those systems with over nine connections are considered public drinking water systems because they likely will serve at least 25 people.

To understand which system the home of interest is on, ask the current homeowner (not the renter) if they get a water bill. If they do get a water bill, they may be on a regulated public water system. Ask for the contact information of the utility that sends the bill. If there is no water bill, the home is most likely on a private system.

Drinking water can come from the surface or underground. Wells have a local effect, lowering groundwater and aquifer levels. Surface water flows into groundwater and aquifers.
Drinking Water, cont.

HOW DO I KNOW IF THE WATER IS SAFE TO DRINK?

Public water systems—Public water systems that are regulated by a health district or the Idaho Department of Environmental Quality must follow a rigorous water testing schedule, and they must prepare annual consumer confidence reports (CCR) for their customers telling them important information about the water and any contaminants found in it. To know if a water system must abide by such regulations, and/or to get a copy of the CCR, contact the public water system (using the contact information from the water bill). If after talking with the public water system you still have questions, contact the Idaho Department of Environmental Quality or a health district office. When you call, be sure to have the contact information for the public water system.

The Idaho Department of Environmental Quality posts water quality data for most public water systems in a searchable database (http://www.deq.idaho.gov/water-quality/drinking-water/). Call the department at (208) 373-0471 if you need assistance using the online database.

Unregulated community systems and private systems—Unregulated community water systems and single-family homes on a private system are not required to test their water. Therefore, the owner of the home is solely responsible for making sure that the water is safe to drink. This is done by having their water tested by a certified lab. Domestic water should be tested annually for nitrate and coliform bacteria. Health districts can provide a well water test as part of a mortgage survey for a fee.

WHERE CAN I GET MY DRINKING WATER TESTED?

The Idaho Department of Health and Welfare maintains a list of certified water quality labs in Idaho that can test household water for nitrate and coliform bacteria. Be sure to get instructions from the lab on how to take the water sample.

Find the list at http://www.healthandwelfare.idaho.gov/Health/Labs/CertificationDrinkingWaterLabs/tabid/1833/Default.aspx

WHAT CAN I DO TO MAINTAIN SAFE DRINKING WATER FROM MY PRIVATE WELL?

The Idaho Department of Health and Welfare maintains a website dedicated to keeping a private well healthy: http://www.healthandwelfare.idaho.gov/Health/EnvironmentalHealth/WellWater/tabid/1128/ItemId/8584/Default.aspx

The Idaho Department of Environmental Quality maintains a website dedicated to information about wells: http://www.deq.idaho.gov/water-quality/ground-water/private-wells.aspx
Drinking Water, cont.

Drinking Water for Proposed Subdivisions

When your health district receives a land development application for a new subdivision (with a proposed shared well), it will require proof from a licensed engineer that the well has the capacity to provide adequate flow for all the proposed homes and the plat must state that they are served by a shared well.

A water system that is intended to ultimately serve a subdivision and be classified as a public water system must be designed to meet public water system rules and undergo initial source monitoring. The system will be unregulated until enough connections are made or a high-enough population is served to put it into a regulated capacity.
WHAT ARE SHORELINE STANDARDS AND HOW COULD THEY AFFECT MY PLANS TO DEVELOP THE WATERFRONT?

Some places enact shoreline standards for buildings or structures. Shoreline standards are designed to preserve both the quality and quantity of water resources and to reduce erosion and sedimentation. They can include shoreline setbacks and exceptions, fencing near the water, impervious surface standards, and shoreline vegetative buffers. You can call or stop by your county planning department to inquire about whether shoreline standards apply in your area.

The USDA Natural Resources Conservation Service (NRCS) can provide technical assistance about vegetation in shoreline areas (see page 17 for NRCS contact information). These plants protect the bank or shore from erosion, provide food for fish, and take up excess nutrients before they reach the water body. They also enhance the natural feel of a property and can help block the view of other structures or houses. Riparian vegetation exists near streams and lakes, where groundwater is close to the surface. Riparian vegetation grows in wetter places where the roots can easily grow to year-round groundwater and can consist of a mix of native grasses, shrubs, and trees.

Robust streamside and lakeside vegetation, called a vegetated buffer, is essential to protecting water quality, stream habitat, and property. A variety of plants, such as sedges, shrubs, trees, and rushes absorb nutrients, stop sediment erosion, provide shade and habitat, and hold the bank in place.

Used with permission: © Minnesota Department of Natural Resources.
**Building, Land-Use Permits, and Site Design, cont.**

**WHERE CAN I BUILD A NEW OUTBUILDING, FENCE, OR STRUCTURE?**
Setbacks from water (as with roads, sidewalks, property lines, and other boundaries) vary, depending on the proposed use of the structure and the zoning district. Some counties or municipalities have very few setbacks, while others have more. Your county planning department can advise you regarding setbacks and building permits.

**WHEN DO I NEED A STORMWATER PERMIT?**
Stormwater is water from rain or melting snow that runs off of land and hard surfaces such as streets, parking lots, and rooftops and picks up pollutants such as fertilizers, dirt, pesticides, and oil and grease. Eventually, stormwater soaks into the ground or discharges to surface water (usually through storm drains), bringing the pollutants with it.

The US Army Corps of Engineers (corps), Idaho Department of Water Resources (IDWR), and Idaho Department of Lands (IDL) have a joint permitting process for activities impacting jurisdictional waterways that require review and/or approval of both the corps and State of Idaho. This Nonpoint Sources Discharge Elimination Program (NPDES) permit may be required for the following:

- Construction activities that disturb 1 acre or more of land, including clearing, grading, and excavation activities
- Industrial activities specifically listed by EPA
- Commercial, industrial, and subdivision projects
- Excavation of 50 cubic yards or more of rock, soil, fill, etc.


Local standards and permitting for grading, stormwater management, and erosion control, as applicable, can be found at your county planning department.

**I WANT TO BUILD ON A VACANT LOT. WHERE DO I GET STARTED?**
Call or stop by any county planning department office to discuss your building plans. Planning staff will set up a permit application for you and explain development standards and required sign-offs. It is good to get an early start, since the planning process can take time.
Wetlands

WHAT IS A WETLAND?

There is no single definition of "wetland" that all agencies, scientists, policymakers, or landowners use for all purposes. The following definition is from the USDA Economic Research Service publication AER 765, Wetlands and Agriculture: Private Interests and Public Benefits:

Land that (1) has a predominance of hydric soils; (2) is inundated or saturated by surface or groundwater at a frequency and duration sufficient to support a prevalence of hydrophytic vegetation typically adapted for life in saturated soil conditions..."

Wetlands provide a multitude of ecological, economic and social benefits. They provide habitat for fish, wildlife, and a variety of plants. Wetlands are nurseries for many freshwater fishes and are also important landscape features because they hold and slowly release floodwater and snowmelt, recharge groundwater, recycle nutrients, and provide recreation and wildlife-viewing opportunities.

HOW DO I FIND OUT IF MY PROPERTY IS IN A WETLAND?

NRCS can provide technical guidance regarding wetland delineation. Web resources to help determine whether land is a wetland include:

- The US Fish and Wildlife Service National Wetlands Inventory: [https://www.fws.gov/wetlands/data/mapper.HTML](https://www.fws.gov/wetlands/data/mapper.HTML)

MAIN CONTACTS

**USDA Natural Resources Conservation Service (NRCS)**
The NRCS can assist rural homeowners with questions about wetlands and with finding someone to complete a wetland delineation.
http://www.nrcs.usda.gov/wps/portal/nrcs/site/id/home/
(208) 378-5729

**County Planning Departments**
They can provide information about whether a property contains wetlands.
http://www.idaho.gov/aboutidaho/county/

**U.S. Army Corps of Engineers**
The corps is the regulatory authority regarding any proposed development near or in wetlands.
http://www.nww.usace.army.mil/Business-With-Us/Regulatory-Division/Contact-Us/
(509) 527-7150
Lake Shorelines, Streams, and Rivers

WHAT WORK IN SHORELINES OR WETLANDS REQUIRES A PERMIT?
Any work below the normal high water mark in a lake, creek, wetland, or river requires a permit. The exact permitting process depends on the location and situation. A “Joint 404” permit application should be submitted to all three agencies listed under contacts in this section. A representative from the most pertinent agency will call you back to discuss the project and next steps.

CAN I USE A STREAM OR LAKE FOR WATER SUPPLY?
Two permits are required to use a stream or lake as a water supply. The Idaho Department of Water Resources requires an application for the right to appropriate the water, or the “water right.” The Idaho Department of Lands requires a separate permit for the placement of the apparatus that will withdraw the water from the stream or lake (the intake pipe). (Contact the local tribe if you are on a reservation.)

WHAT IS THIS PIPE RUNNING TO THE LAKE OR STREAM FROM THE YARD?
It may be a water intake pipe for irrigation or drinking water. Check with the Idaho Department of Water Resources to determine water rights on your property. Call the Idaho Department of Lands to see if there is a permit for water intake equipment.
Lake Shorelines, Streams, and Rivers, cont.

**HOW DO I STABILIZE MY SHORELINE? IT IS ERODING.**
The best thing to stabilize shorelines and stream banks is to protect the existing native vegetation, sometimes referred to as a “riparian vegetated buffer.” NRCS (208 378-5729) can provide technical assistance and information about riparian vegetation and shoreline stabilization. Alteration of the shoreline of the stream or river may need a permit from the Idaho Department of Water Resources and US Army Corps of Engineers. A floodplain permit may also be required from your county planning department.

**WHAT IS INVOLVED IN BUILDING, ADDING TO, OR REPLACING A DOCK, INCLUDING PROPER PERMITTING?**
The Idaho Department of Lands can answer these questions and can also provide guidance on the regulations related to docks, sometimes referred to as "encroachments." It is up to the seller to prove that the dock is permitted or in non-compliance (e.g., that a previously permitted dock was remodeled or enlarged without a new permit). The seller must transfer the permit to purchaser. (Contact the local tribe if you are on a reservation.)

**WHAT IS A BIOLOGICAL ASSESSMENT OR “BA”? WHY WOULD I NEED THAT?**
A biological assessment is an impact assessment for threatened and endangered species. As an example, when it comes to lakeshores and many rivers and creeks in northern Idaho, critical bull trout habitat designation is the trigger for a BA. Critical habitat areas are protected and get extra attention from agencies. As part of the US Army Corps of Engineers permit process for lake and stream work in bull trout habitat, a BA will need to be conducted. The US Fish and Wildlife Service is the authority regarding biological assessments ([https://www.fws.gov/midwest/Endangered/section7/ba_guide.html](https://www.fws.gov/midwest/Endangered/section7/ba_guide.html)).

**I AM INTERESTED IN A PROPERTY THAT IS ADJACENT TO A CREEK. WHAT SHOULD I DO TO INFORM MYSELF ABOUT THE PROPERTY?**
Stream processes are extremely complex and dynamic; however, here are a few questions to ask the current homeowner or Realtor to be better informed when considering a home for purchase:

- What is the flood history of this property?
- Where does the water go in the spring during high water flow?
- Where does the water go during rain-on-snow events in the winter?
- Are any buildings or other structures at risk of being flooded during high water, flooding, or rain-on-snow events?
- Is there a loss of streamside (riparian) vegetation or streambank(s) on an annual basis due to erosion by the stream?

If the above questions raise concerns, contact the USDA Natural Resources Conservation Service (NRCS) or the local soil and water conservation district (SWCD) with any questions you might have (see page 17 for NRCS contact information and page 16 for SWCD contact information).
Floodplains

WHAT IS A FLOODPLAIN? WHAT IS A FLOODWAY?

A floodplain is an area with a chance of flooding in any given year. The “100-year” floodplain has a 1% chance of flooding in any given year. The “500-year” floodplain has a 0.2% chance of flooding in any given year.

The floodway lies within the floodplain. It is an extremely hazardous portion of the floodplain due to high floodwater velocity, often carrying debris and causing erosion. The Federal Emergency Management Agency (FEMA) further defines the floodplain and floodway as follows:

The channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than a designated height. Communities must regulate development in these floodways to ensure that there are no increases in upstream flood elevations.

WHO CAN TELL ME IF MY LOT IS IN A FLOODPLAIN?

The Idaho Flood Hazard Mapping Tool (maps.idwr.idaho.gov/FloodHazard/Map) can help determine if your property is in a floodplain. County planning departments can sometimes provide floodplain and floodway determinations for properties. These departments are often repositories for US Fish and Wildlife Service (USFWS) provisional wetland maps and FEMA flood-insurance rate maps.

The local Natural Resources Conservation Service office can provide technical and financial assistance for landowners concerned about preserving natural features such as wetlands and floodplains.

MAIN CONTACTS

County Planning Departments
Most floodplain questions can be answered by your county planning department. http://www.idaho.gov/aboutidaho/county/

Idaho Department of Water Resources
The IDWR floodplain manager coordinates the National Flood Insurance Program (NFIP) in Idaho. http://idwr.idaho.gov/floods/

Be sure to check local floodplain maps and/or inquire about flood areas with the local county planning department or Natural Resources Conservation Service office. These areas can be difficult to identify during summer dry months.
Directory

City Planning and Zoning Offices
Many Idaho cities have a planning and zoning office. Find Idaho city contact information here:
http://www.idaho.gov/aboutidaho/cities.html

County Planning Departments
Each county in Idaho independently administers planning and zoning permits, regulations, and other services. While services vary from county to county, they typically include the following: processing applications for building location permits, subdivision and land-use applications, lot line adjustments, conditional use permits, zone changes, variances, and road and plat vacations.

County planning departments often provide floodplain determinations, county zoning and comprehensive plan maps, and stormwater/erosion/shoreland standards. Some county planning departments have mapping or GIS functions and can help landowners view aerial photographs and maps of their property. Choose your county office from a list of Idaho county contact information at the following website:
http://www.idaho.gov/aboutidaho/county/

Idaho Association of REALTORS®
http://www.idahorealtors.com/
(208) 342-3585 | 800-621-7553
10116 W. Overland Road
Boise ID 83709

Idaho Department of Environmental Quality (IDC)
Assessment of environmental problems; oversight of facilities that generate air, water, and hazardous waste pollution; monitoring of air and water quality; cleanup of contaminated sites; and education, outreach, and technical assistance to businesses, local government agencies, and interested citizens.
(208) 373-0502
1410 N. Hilton
Boise, ID 83706

Idaho Department of Fish and Game (IDFG)
Fish and wildlife management, hunting and fishing licenses and tags.
http://fishandgame.idaho.gov/
(208) 334-3700

Idaho Department of Lands (IDL)
Water supply lines in lakes, bank stabilization, boat facilities, mining, bottom barriers for aquatic weed control.
http://www.idl.idaho.gov/lakes-rivers/
(208) 334-0200
300 N. 6th Street, Suite 103
Boise, ID 83702
Directory, cont.

**Idaho Department of Parks and Recreation (IDPR)**
Registration of boats, snowmobiles, ORVs, ATVs, UTVs, motorbikes.
http://www.parksandrecreation.idaho.gov/
(208) 334-4199

**Idaho Department of Water Resources (IDWR)**
Water rights, waterbody/watercourse alterations.
http://www.idwr.idaho.gov/
(208) 287-4800
322 East Front Street
PO Box 83720
Boise, Idaho 83720-0098

**Idaho Public Health Districts**
Septic tanks/drainfields, subdivision sanitary restrictions, non-public drinking water systems. Seven regional districts serve Idaho. Independent agencies, the health districts are primary outlets for public health services in Idaho. They work closely with the Idaho Department of Health and Welfare and other state and local agencies.
Panhandle (Hayden): (208) 415-5000
North-Central (Lewiston): (208) 799-3100
Southwest (Caldwell): (208) 455-5300
Central (Boise): (208) 375-5211
South-Central (Twin Falls): (208) 734-5900
Southeastern (Pocatello): (208) 233-9080
Eastern (Idaho Falls): (208) 522-0310

**Idaho Soil and Water Conservation Districts**
Conservation projects, assistance, and resources in partnership with NRCS. Administration of numerous conservation grants and projects benefiting landowners.
http://swc.idaho.gov/
(208) 332-1790
650 West State Street, Rm. 145
Boise, ID 83702

**Lake Assist (Lake Pend Oreille and vicinity)**
Consultation on shoreline landscaping, land-use regulations, and pollution prevention techniques in the northern Idaho lake district.
http://www.lakeassist.org/
(208) 263-5310 ext 103
(208) 666-4623

**Lake*A*Syst (Coeur d’Alene Lake and vicinity)**
Consultation on shoreline landscaping, land-use regulations, and pollution prevention techniques in the northern Idaho lake district.
http://ourgem.org/outreach.php
(208) 667-5772

**Tribal Reservations**
If you live on an Indian tribe’s reservation, contact the tribe to find out about specific water-resource and land-use regulations.
US Army Corps of Engineers (Walla Walla District)
Wetlands, pilings, work in lakes and rivers.
http://www.nww.usace.army.mil/Business-With-Us/Regulatory-Division/Contact-Us/
(509) 527-7150

Idaho Field Offices
Boise: (208) 345-2155
Coeur d'Alene: (208) 433-4475 or –4474
Idaho Falls: (208) 522-1645

USDA Natural Resources Conservation Service (NRCS)
Cost-free assistance for managing natural resources on private lands. The agency works with landowners and operators on a voluntary, nonregulatory basis to find solutions to resource concerns and management challenges. The agency has expertise in agronomy, livestock management, forestry, civil engineering, wildlife biology, and water quality.
http://www.nrcs.usda.gov/wps/portal/nrcs/site/id/home/
(208) 378-5729
9173 W. Barnes Dr., Suite C
Boise, ID 83709-1574

US Environmental Protection Agency (EPA)
Stormwater permits for construction on 1 or more acres.
https://www.epa.gov/npdes
(800) 424-4372 ext 2752

University of Idaho Extension
Water-related education programs and presentations for all audiences, volunteer water quality data collection program, IDAH²O Master Water Stewards volunteer water quality monitoring program.
http://www.uidaho.edu/extension/idah2o
(208) 292-1287
1031 N. Academic Way, Suite 242
Coeur d'Alene, ID 83814

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