



# Water Wells and Drought

During drought, increased groundwater pumping coupled with reduced recharge can result in low water yields from wells. This handout provides information for well owners to prevent impacts to wells due to drought and options if a well's output is reduced. More information on some of these items is included in the Water Well Owner's Handbook.

## Maintenance and Problem Prevention

**Maintain Your Well.** In some cases, reduced well outputs can be linked to maintenance, well construction, or pump issues. Wells and well components require periodic maintenance. Contact a licensed well driller or pump installer to ensure your well is maintained for proper functioning.

**Protect Your Pump.** Installing an automatic low-flow shutoff switch, or a pump saver, will protect your pump in the event that your well begins to fail to produce water during drought.

**Monitor Your Well's Water Levels and Conserve Water.** Watch for long-term changes in water depth and reduced water pressure, which can be a warning that your water supply may be in jeopardy. Aquifers are like storage reservoirs, and the amount of water in storage can decline over multiple years of drought or increased pumping. If you use a well, it is important to conserve water and use it as efficiently as possible.

## What to do if your well stops working – Dry wells

**Contact a licensed well driller or pump installer to assess the well.** Depending on the aquifer, in many cases, the well has not permanently gone dry. Issues often referred to as "dry wells" are often a reduction in the amount of water produced. In some cases, the well isn't dry, but rather due to construction deficiencies or lack of maintenance, a well no longer produces because it has collapsed or is clogged.

**Contact a licensed well driller or pump installer to lower the well pump.** Sometimes the well is not dry, but the water level has declined below the pump and the pump just needs to be lowered. A pump installer can help determine if the well is deeper than where the pump is set and if lowering the pump will address the issue. Note that pumps should not be set at the bottom of the well.

**Report a Dry Well** – Report your dry well or significant reductions in well output to [owrd.info/reportdrywell](http://owrd.info/reportdrywell). Reporting your dry well also helps scientists and water managers better understand changes in groundwater supplies and how those changes may be impacting people who rely on those supplies. If you report your dry well, the Department may notify you of funding and other assistance, if the Department is made aware of any available for your area.

**Temporary Emergency Measure – Obtain water from a nearby well.** It may be possible to obtain water from a neighbor's well. To do this, you will need to confirm that the combined new and existing uses will not result in an exceedance of the water rights or water right exemptions under ORS 537.545. Consult the Water Well Handbook or your watermaster for more information on exemptions. This method *should not be used to provide drinking water unless caution is taken to test water quality and disinfect all connections. Do not pour water from any source into your well as this can result in contamination.*

**Temporary Emergency Measure - Portable water tank and trucked water delivery.** Water tanks can be purchased from local ranch and farm stores for installation adjacent to a residence. Local well and pump supply companies can be an additional resource for water tanks and can assist with questions around installation. Water can be delivered by the landowner or by water trucking companies to fill a tank as needed, provided the water is obtained from a municipal supplier at an authorized fill station.

**Deepen the existing well.** In some cases, deepening your well may be an option, particularly if the well is shallow. Wells that are damaged or do not have a straight casing may not be able to be deepened. Contact a licensed well constructor to see if the well can be properly deepened.

**Drill a new well.** New wells must meet the Department's well construction standards. Consult a licensed well constructor to determine the location of the well to ensure it meets Department setback requirements from septic and other potential contaminants. Hire a licensed well constructor to perform the work. If your use of groundwater is pursuant to a water right and not an exemption under ORS 537.545, you may need to apply and obtain authorization from the Department for a water right transfer (a change in the point of appropriation) before using groundwater from the new well may begin under your water right.

**Protect Groundwater – Abandon unused wells.** If a well is no longer in use, it is important to have it properly abandoned by a licensed well constructor. Properly abandoning unused wells protects the groundwater from contamination for future uses.

## Additional Information and Resources

- **Find a Licensed Well Constructor:** [owrd.info/wellconstructor](http://owrd.info/wellconstructor)
  - **Use licensed contractors** to work on water pumps or electrical. The Construction Contractors Board licenses pump contractors, and the Building Codes Division licenses electricians
- **Oregon Water Resources Department** – *Well construction standards, well logs, well inspections, and well constructor licensing. Processes water right transactions.*
  - Well Construction and Compliance: [owrd.info/wellconstructioncompliance](http://owrd.info/wellconstructioncompliance)
  - Well Inspector Contact Information: [owrd.info/wellinspector](http://owrd.info/wellinspector)
  - Water Resources Department Well Owners Handbook
    - English [owrd.info/wellhandbookeng](http://owrd.info/wellhandbookeng)
    - Spanish: [owrd.info/wellhandbookesp](http://owrd.info/wellhandbookesp)
  - Water Right Information: [owrd.info/wris](http://owrd.info/wris)
- **Oregon Health Authority** - *Information on water well testing and potential water contaminants.*
  - Domestic Well Safety, Testing Tips and Accredited Labs: [owrd.info/ohawellsafety](http://owrd.info/ohawellsafety)

## Financial Assistance – Potential Funding Assistance

Resource availability under these programs may vary over time. Check in periodically for updates.

- **OWRD Well Abandonment, Repair and Replacement Fund:** [owrd.info/warrf](http://owrd.info/warrf)
- **USDA Rural Development Single Family Housing Repair Loans & Grants:** [owrd.info/usdarepairloansgrants](http://owrd.info/usdarepairloansgrants)
- **Farm Service Agency Emergency Conservation Program:** [owrd.info/usdaecp](http://owrd.info/usdaecp)
- **Rural Community Assistance Corporation:** [owrd.info/rcacwellloans](http://owrd.info/rcacwellloans)