

Electrical Work on Residential Property

What you should know before work begins.



Residential property owners

▶ Before you do electrical work or hire a contractor, please consider these points.

- Protect your investment by making sure you have all electrical permits, inspections, and approvals as required by law. In 2011, according to the National Fire Protection Association, an estimated 47,700 home structure fires reported to U.S. fire departments involved some type of electrical failure or malfunction as a factor contributing to ignition. These fires resulted in 418 civilian deaths, 1,570 civilian injuries, and \$1.4 billion in direct property damage.
- An electrical permit must be purchased by the person, company or organization doing the work. Only property owners or electrical contractors can purchase an electrical permit.
- The lack of a permit, inspection and approval could affect the safety of your home or business, your ability to obtain financing, and your ability to sell your property, obtain insurance or collect on insurance claims.
- A permit, inspection and approval will ensure that the work done on your property conforms to current safety codes.

Electrical contractors and property owners

▶ An electrical permit is required for most new, remodel, and maintenance electrical work.

- Your best protection is purchasing electrical permits and having your electrical work inspected, as required by law.
- You must request an inspection prior to covering any electrical work, no later than three business days after completing the work or one business day after any part of the installation has been energized, whichever occurs first. See the Electrical Inspection Basics page on the L&I website for more information. Go to www.Lni.wa.gov and enter “Electrical Inspection Basics” in the search box.
- You could be subject to civil penalties if you don’t obtain the required permits and inspections.
- You could face a fine of up to \$2,000 for failing to obtain a permit before beginning electrical work. Each day and each location on which a violation occurs constitutes a separate violation.
- There could be additional penalties for failing to correct violations found during an inspection.
- Your electrical power might be disconnected if you fail to comply with the law.



Washington State Department of
Labor & Industries

Upon request, foreign language support and formats for persons with disabilities are available. Call 1-800-547-8367. TDD users, call 711. L&I is an equal opportunity employer.

Work that does not require a permit

- Travel trailers.
- Plug-in household appliances.
- Like-in-kind replacement of lamps, single-family residential luminaires, branch circuit breakers, contactors, relays, timers, starters, circuit boards, or similar control components.
- Like-in-kind replacement of a single set of fuses; a single battery smaller than 150 amp hour; one hardwired household appliance; one 10 horsepower, or smaller, motor.
- Like-in-kind replacement of a maximum of five: snap switches, dimmers, receptacle outlets, thermostats, heating elements, or luminaire ballasts with an exact same ballast.
- Heat cable repair.

Work that requires a permit

▶ **If it is not included in the exemption above, the work requires a permit and inspection.**

This includes:

- All circuit wiring
- Motors larger than 10 horsepower
- Panelboards
- Meterbases or masts
- Thermostats
- Thermostat wiring
- Intercoms
- Burglar alarms



- Fire alarms
- Generators
- Telecommunications systems
- Permanent home stereo systems
- HVAC/R equipment
- Outbuildings
- Swimming pools, spas, hot tubs
- Septic pumping systems
- Other electrical equipment

What about appliances?

▶ **Cord-and-plug appliances:**

If your household appliance is cord-and-plug connected, then anyone, regardless of their qualifications, can install, repair, or replace the appliance.

Cord-and-plug appliances have a cord with a molded plug that was either factory or field installed on the appliance. The appliance is then ready to be plugged into an existing receptacle in the location where the existing appliance was installed. You cannot use any type of plug-to-receptacle adapter to make the plug work.

▶ **Hard-wired appliances:**

If your household appliance is hard wired, then either you or a licensed electrical contractor using properly certified electricians must install, repair or replace the appliance. A hard-wired appliance is one where the building wiring method attaches to the appliance in a more permanent fashion. The connection will involve splicing of wires inside a junction box in or on the wall or the appliance.

How to protect yourself and your home from fire danger

- Do electrical work only if you are qualified. If you do not have a good understanding of electrical wiring and are not qualified, hire a licensed electrical contractor.
- Never overload outlets, extension cords, or electrical circuits. If your circuit breaker trips, either your circuit breaker is overloaded or your circuit has malfunctioned and should be inspected by a qualified person.
- Get the required permits, inspections and approvals.



How to protect your property so that you can refinance, sell, buy insurance, etc.

- Get the required electrical permit if you are doing the electrical work or be sure the electrical contractor you hire obtains it.
- Locate electrical work you or an electrical contractor did in the past and determine if you have corresponding permits. If not, you can obtain permit and inspection information on our website.
- If you are unsure whether existing electrical work was inspected, consult a licensed electrical contractor. Have the contractor obtain a permit and make any necessary corrections to the existing work before requesting an inspection.
- Safeguard your permits and approvals. Lack of proper documentation for electrical modifications may cause you problems when trying to sell your property.
- If you hire an electrical contractor, be sure he or she is properly licensed. Check their contractor's license and whether that contractor has past violations: www.Lni.wa.gov/ElectricalBasics.

Electrical permits and inspections

▶ If you do the work yourself:

- You must buy a permit.
- You may buy your permit online using a credit card at: www.Lni.wa.gov/ElectricalPermitsInspections or in person at any L&I office.

▶ If you hire an electrical contractor:

- Get a written quote for all the work to be done.
- The contractor must buy the permit.
- Check the electrician certificate for each electrician on your job. Electricians and trainees are required to visibly display their certificate when doing electrical work.
- If trainees are on your job, they must have a current training certificate and be supervised by an electrician. Supervising electricians must be on the same job site as their trainees.

Installation description and fees

- Include a complete description of all the work that is being performed under the permit.
- For new residential dwelling construction or remodels/additions with increased square footage, enter square footage of the project.
- All residential septic/sewage pump systems, outbuildings (including pump houses), hot tubs, thermostats, security systems and other such items, must be listed in the description.
- The initial inspection fee will be based on your installation description. The electrical inspector will adjust the fee if the information you provide is incomplete or inaccurate.

Driving directions

To ensure a prompt inspection and to avoid additional trip fees, you must provide good driving directions from the nearest major intersection. The address of the inspection site must be clearly identifiable from the street, road or highway that serves the premises.

Making your inspection request

- You must request the inspection prior to covering any electrical work, no later than three business days after completing the work or one business day after any part of the installation has been energized, whichever occurs first. Failure to request an inspection may result in civil penalties. See the Electrical Inspection Basics page on the L&I website for more information. Go to www.Lni.wa.gov and enter "Electrical Inspection Basics" in the search box.

- Request an electrical inspection online at www.Lni.wa.gov/ElectricalPermitsInspections. Requests made online before midnight will be available to the inspector the next morning. Because of varying workloads, the response time for an inspection may vary. Most inspections are performed within 48 hours after the request is received.
- You may also call an inspection request line near you to request an inspection, but this may delay your inspection request.
- If any special arrangements are needed, you must provide instructions as part of your inspection request. If we need to go inside a locked building or gate, tell us how to get in. Requests for specific inspection days or times, or other unique arrangements must be made by speaking directly with your inspector in advance of the inspection.
- Inspectors will not enter any work site when minors are present unless the owner or the owner's adult representative is present.

Canceling an inspection

Contact us before 8:30 a.m. the day of the inspection to cancel an inspection request. Cancellations made after 8:30 a.m. may not reach the inspector in time and may result in additional fees.

Your responsibilities

- You must **restrain all domestic and farm animals** to provide clear and safe access to the inspection site or the inspection will not be made. If necessary, provide safe access by way of steps, stairs or ladder into the inspection site. Additional fees may be charged for additional trips.
- **The site must be free from any hazards** to the electrical inspector. Inspectors will not enter an unsafe work site. Additional fees may be charged for additional trips.
- **For manufactured home inspections**, you must display the city or county manufactured home placement permit in a conspicuous place at the work site.

Principles that guide state electrical inspections

- **Public safety:** To protect the general public from unsafe living and working conditions.
- **Fire safety:** Improperly installed components, including electrical, are a leading cause of fires in the state.
- **Consumer protection:** Improperly installed electrical work can be costly to a property owner.

State authority regarding electrical inspection

The Department of Labor & Industries' Electrical Program has statewide responsibility for inspecting both new and altered electrical systems in all types of installations. With this responsibility, L&I's goal is to provide consistency and uniformity in application of laws and rules concerning electrical installations.

Note: Some cities do electrical inspections. Their standards of inspection must meet or exceed those required by L&I. If you have city inspections, contact your city for answers to your electrical questions.

For more information

L&I's Electrical Program

www.Lni.wa.gov/ElectricalBasics

L&I Electrical Inspection Request Line

www.Lni.wa.gov/ElectricalInspectionRequest

Look up an Electrical Permit or Inspection

www.Lni.wa.gov/ElectricalPermitsInspections

City Electrical Inspection Jurisdictions

www.Lni.wa.gov/CityInspectors

L&I Offices

www.Lni.wa.gov/Offices

No electrical work may be covered before it is inspected and approved.