News Letter from the Office of the Chief Electrical Inspector

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• This Month’s Question of the Month
What is the best way to communicate inspection request details to the inspector? A) Call the inspector, B) E-mail, C) Send a 255 character comment in an online inspection request, D) Leave a phone message – See the correct answer on page 2.

• Note From The Chief
It is time for an update after the spring layoff of inspectors. We are doing our best to respond quickly to inspection requests and maintain a high level of compliance enforcement with the underground economy and contractors getting a competitive advantage by not following the law.

Even with the larger areas that each of our inspectors is required to cover, we are getting to 89% of all inspections within 48 hours of the inspection request. Over 85% of all our compliance activity is related to unlicensed electrical contracting, uncertified electricians, and failure to buy a permit and get inspection.

We have been and will continue using a “plan, do, check, and adjust” philosophy to find the most efficient and effective ways to provide the quality of service our customers expect and need.

• Air Compressor Marking Requirements
This is a follow-up to an article published in May 2009 and will further clarify the options available when an inspector encounters an unlisted air compressor. But, because compressors are often manufactured in multiple configurations (e.g. tank mounted, skid mounted, and with multiple accessories, etc.) only a very few manufacturers use UL 1450 and list their equipment as a unit.

Listing is always the preferred method of documentation that the equipment is appropriate. If the compressor is not listed to UL 1450 by an approved electrical testing laboratory, the inspector has three options available:

1. The equipment may be approved by field evaluation;
2. If all components are listed, the inspector can inspect according to the NEC; or
3. The installer/owner may request a site specific variance request. The request must prove that all of the electrical components have been manufactured and installed in accordance with applicable standards.

• New Fees Effective October 1, 2010
Do not forget to update your WAC book with the new permit/license fees. New WACs will not be printed. Fourteen insert pages (seven when printed double-sided) with all the new fees are available as direct replacements for the fee pages in the last (October 31, 2009-yellow cover) printing at:


• Class A Permit Exempt List – Can You Replace More Than One Of Those Contactors?
The RCW definition of Class A, permit exempt, work has been in place since the 2003 legislative session. Many installers seem unaware that the items that are exempt are limited to only one of each item. The singular language was put into place to limit an installer who might attempt to do a large scale replacement without an inspection (e.g. re-fixture a complete house, replace all the controls on a motor control system, etc.). The definition says that replacement is limited to “a” contactor, relay, etc. This means a single contactor, relay, etc. on a single jobsite each day. If you are replacing multiples of a component or equipment on the Class A basic electrical work list, an electrical permit is required. However, because of the lack of understanding of this requirement, inspectors will use discretion when enforcing the permitting requirement at this time.

During the current rule making process, the program is reviewing the Class B rule to allow an electrical contractor to replace multiple Class A items by using a Class B label. All proposals will be reviewed by the Technical Advisory Committee (TAC) and the Electrical Board.

Safety Tip of the Month!
Maintain & update your electrical systems.

Most electrical fires result from problems with “fixed wiring” such as faulty electrical outlets and old wiring (U.S. Fire Administration).

Get a permit and electrical inspection for all new and changed wiring.
Fee Training Series – Miscellaneous

This is the fifth in a series of articles on selecting the appropriate permit fees for your work. This article will cover WAC 296-46B-906(5), Miscellaneous – commercial/industrial and residential. Most of the items in “Miscellaneous” are very straight forward; but, others require some explanation.

You will see “inspected at the same time” in several parts of the “Miscellaneous” section. It means all work must be ready so the inspector can complete the inspection in one single ½ hour visit. For example, if two thermostats are to be installed and an inspection request is made when only one is ready for inspection, the installer does not get to use the reduced fee of $13.40 for the second thermostat. Each one will cost $43.10. This logic can be applied to the other items where a reduced fee is allowed for inspection of multiple items made at the same time.

Class 2 or 3 low voltage or telecommunications systems’ fees are calculated on a square foot basis similar to a new residence (see Electrical Currents, May 2010 edition). The first 2,500 square feet is $50.00 and each additional or part of 2,500 square feet is $13.40. For example, if the low voltage system is in a 7,600 square foot building, the total fee is $90.20 ($50.00 for the 1st 2,500 square feet plus 3 x $13.40 for the remaining 5,100 square feet).

The fees line for yard pole, pedestal, or other meter loops is only for meter installations remote from the service location. If the meter installation is inspected at the same time as the permanent service or with another part of the electrical installation, the fee for the meter is $36.10. If it is inspected by itself, the fee is $57.10.

When you are calculating the fees for a permanently installed generator, you must use the fees in the appropriate residential (section (1)(b)) or the commercial new/ altered service or feeder (section (2)(a) section. See the July 2010, Electrical Currents for calculation fees for how to make those calculations.

The fee for inspecting permanently installed transfer equipment for a single portable generator connection is $79.40 is in addition to any other required fees. This fee applies to both residential and commercial installations. For portable generators and equipment, the fees for temporary services/ feeders in section (3) should be used.

Annual permits are allowed for commercial and industrial facilities. Annual permits can only be used by the facility owner who has qualified maintenance electricians or an electrical or telecommunication contractor that has an annual maintenance contract for the facility.

- See WAC 296-46B-901(14) for a description of the work covered by an annual electrical permit. For electrical work, the fee is based upon the number of electricians available to do electrical work. Supervisors are counted as an electrician if they participate in doing the work.
- See WAC 296-46B-901(13) for more information about annual telecommunication permits. Annual telecommunication permits can only be used for telecommunication circuits. For telecommunication work, the fee is based upon the portal-to-portal hours necessary to complete the inspections.

The fee for “ditch cover inspections only” is required whenever the inspection is only for ditch cover. This fee is in addition to other required fees. For example, if you are installing a new 200 ampere underground feeder to a second building at a residence and need a twenty minute ditch cover inspection, between the two buildings, before the feeder work is complete the total fee, for the job, is $136.50 ($93.40 for the 200 ampere feeder plus $43.10 for the separate ditch inspection). If the underground portion of the feeder is inspected with the rest of the feeder, the underground only portion of the fee is not required and the total fee for the feeder would be $93.40. The fee, per half-hour, for ditch cover inspections can also be used when an underground conduit or wiring is installed for future use and is not being connected to an active electrical system.

With all fees, it is important to remember that if the allowed number of progress inspections is exceeded, additional progress inspection fees will be assessed. Remember, inspections are counted in ½ hour increments (e.g. 70 minutes equal 3 inspections for fee purposes). See the May 2010, Electrical Currents.

Answer to This Month’s Question of the Month:

C) Send a 255 character comment in an online inspection request. (Many inspectors work directly from the field and inspections are often shifted from one inspector to another. The online comment is the preferred method of communication).