

PowerCheck's quick guide to old home electrical systems



If your home was built:	Likely has	Fire concern	Solution	Comments
Pre 1950	Knob & tube	Knob and tube circuits are not grounded. Modern equipment, such as TVs, stereos & kitchen appliances require ground protection for safety.	The wiring must be checked. If the wiring is in good condition ground protection can be provided by changing the outlets to GFCIs.	GFCIs are an excellent method of ground protection for modern equipment. GFCIs are a fraction of the cost to that of rewiring.
1950 to 1962	Ungrounded wiring	These early circuits are not grounded. Modern equipment, such as TVs, stereos & kitchen appliances require ground protection for safety.	The wiring needs to be checked. If the wiring is in good condition ground protection can be provided by changing the outlets to GFCIs.	GFCIs are an excellent method of ground protection for modern equipment. GFCIs are a fraction of the cost to that of rewiring.
1965 to 1975	Aluminum wiring	Aluminum wiring was intended for outlets and switches rated for aluminum. If the outlets and switches have been changed to modern outlets and switches that are not rated for aluminum the electrical connections get loose, which can result in fire.	An option rather than rewiring is to provide "Correct pigtailig with correct and tight wire connectors". Correct pigtailig is done at the receptacle and switch boxes. It is a fast, easy and excellent solution to make your house safe.	A house with aluminum wiring that has been correctly pigtailed should be equally as safe to that of a house wired with copper
Other facts:	Likely has	Fire concern	Solution	Comments
Pre 1972	60 amp service	The original service conductors outside may have deteriorated, the panels may be overloaded, and the circuit breakers may have exceeded their service life.	The electrical service and panel needs to be checked. In many older houses with original 60 amp service, the service and panel are fine. However if circuit breakers are original, they will need to be replaced.	In 1972 a minimum service size of 100 amp was required for houses over 80 m ² . This was to provide additional power, should additional circuits be required in the future (e.g., basement suite, electric baseboard heaters).
Pre 1975	Outdoor receptacles not GFCI protected	GFCI outlets were invented for life safety, to help prevent electrocution.	GFCI outlets are inexpensive and easy to install by a licensed electrical contractor.	In 1975, GFCIs were first required for outdoor outlets.
Pre 1975	Gas pipe not "bonded"	Gas-line bonding protects the gas line from becoming electrically energized, in the event of a live wire contacting the gas pipe.	Gas line bonding consists of installing an electrical conductor from the gas pipe to the panel. It's an easy and fast installation in most houses	Gas-line bonding became code 1975; protecting against shock and gas line damage.
Pre 1980	No smoke alarms	Smoke alarms are likely the most important feature of any house. Smoke alarms save lives.	Hard-wired smoke alarms with wireless interconnection are now available in Canada, making smoke alarm installation easy.	Smoke alarms were first required in the National Building Code, for a single family residence, in 1980.
Pre 1980	Build up of cobwebs and debris in electrical boxes	Cobwebs are organic material. If a spark occurs the cobwebs can easily ignite, resulting in fire	Older electrical boxes should be checked and cleaned periodically by a licensed electrician	The older the house, the higher the likelihood of debris in the electrical boxes

POWERCHECK — Providing a simple and inexpensive solution for older homes to get safe!