

through; but when permitted to be taken through, the crossing shall be made at a pole in a manner to be approved by the Minister of Telegraphs.

Where the electric lines intersect telegraph lines, the latter shall be suitably insulated if deemed necessary; and when the crossing is above and near a pole, the spans on each side of the pole may be insulated. This insulation shall be effected at the expense of the licensee in cases where the telegraph lines existed previously to the erection of the electric lines.

Where high-pressure electric lines intersect telegraph lines the former shall be insulated with not less than 300-megohms grade of vulcanized rubber, and the low-pressure wires with weather-proofed insulation as prescribed in section 29.

Where deemed necessary efficient guard-wires shall be erected in a manner to meet with the approval of the Minister of Telegraphs at all crossings or places where electric lines intersect telegraph lines, or at any place where such protection may be considered necessary.

The licensee shall bear the expense of such guard-wires in all cases where an electric line intersects any telegraph line previously existing.

Where electric lines are on one side of the road and electric telegraph lines on the other, and service is required to be given from either to the other side of the road, the licensee and the Minister of Telegraphs shall give to each other reasonable facilities as far as possible to effect supply.

In running the lines authorized by this license through or along any road where no telegraph line exists the licensee shall keep to one side of the road, and in running wires to the opposite side of the road the licensee shall arrange so as to interfere as little as possible with the route of any future telegraph lines.

32. Where electric lines are permitted to be supported on telegraph poles all details of the supports and of the insulation of the adjacent spans shall be approved by the Minister of Telegraphs, who may, on giving to the licensee reasonable notice in that behalf, require the licensee to remove such electric lines at any time from such telegraph poles, and without payment of any compensation to the licensee.

Where overhead electric lines at extra high pressure cross telegraph lines, the electric lines shall be subject to such special conditions as may be required by the Minister of Telegraphs in each case of such crossing.

The cost of all necessary guard-wires and special provisions required to comply with this clause shall be borne by the licensee.

33. Service lines shall be taken direct from line-insulators to insulators supported and firmly attached to some portion of the consumer's premises which is not accessible to any person without the use of a ladder or other special appliance. Every portion of any service line other than a neutral wire which is outside a building and accessible therefrom shall be rubber insulated.

34. Every aerial line, including its supports, its conductors, and their insulating covering, and all structural parts and electric appliances and devices belonging to or connected with the line, shall be duly and efficiently maintained as regards both electrical and mechanical conditions.

35. Where high-pressure transformers are attached to poles they shall be placed so as to be inaccessible except by the use of a ladder or other special appliance. Where high-pressure transformers are placed in sub-stations, all high-tension conductors shall be thoroughly insulated or protected from accidental contact; and the sub-station shall be entirely inaccessible to unauthorized persons. Where high-tension transformers are placed on consumers' premises, the whole of the apparatus shall be enclosed or rendered inaccessible except to authorized persons. The cases of all transformers shall be earthed by means of a copper conductor at least 0.022 square inch in section.

36. Where any portion of any electric line or support for an electric line is exposed to such a position as to be liable to injury from lightning, it shall be efficiently protected against such liability.

37. Underground conductors shall be thoroughly insulated, and shall be protected from mechanical damage by steel armouring or by wooden boxing or earthenware, stoneware, concrete, iron, or fibre conduits or pipes. They shall be laid wherever possible under the footpaths and with a cover of at least 12 in. from the surface of the pavement. Where laid under any other part of the road such cover shall be increased to 2 ft.

All conduits, pipes, casings, and street boxes used as receptacles for electric lines shall be constructed of durable material, and they shall be of ample strength to prevent damage from heavy traffic, and reasonable means shall be taken to prevent the accumulation of gas in such receptacles.

Where any underground line crosses or is in proximity to any metallic substance, special precaution shall be taken against the possibility of any electrical charging of the metallic

substance from the line or from any metallic conduit pipe or casing enclosing the line.

38. All underground metallic conduits, pipes, or casings containing an electric line shall be efficiently earthed, and shall be so jointed and connected across all street boxes and other openings as to make good electrical contact throughout their whole length.

The covers of street cable-boxes shall be so secured that they cannot be opened except by means of a special appliance. Street boxes shall be either filled solid with cable compound or oil, or if not so filled shall be inspected from time to time for the presence of gas, and suitable action shall be taken to check its influx and accumulation.

39. Every main, either overhead or underground, shall be tested for insulation after having been placed in position and before it is used for the purposes of supply, the testing pressures being at least 500 volts, and the licensee shall duly record the results of the tests of each main or section of a main, and forthwith forward a report thereon to the Resident Engineer of the Public Works Department at Whangarei.

The insulation of every complete circuit used for the supply of energy, including all machinery, apparatus, and devices forming part of or in connection with such circuit, shall be so maintained that the leakage current shall not under any conditions exceed one-thousandth part of the maximum supply current. Every leakage shall be remedied without delay. Every such circuit shall be tested for insulation at least once in every month, and the licensee shall duly record the results of the tests.

40. The licensee shall be responsible for all electric lines or wires, fittings, and apparatus belonging to it or under its control, which may be upon a consumer's premises, being maintained in a safe condition and in all respects fit for supplying energy.

In delivering the energy to a consumer's terminals the licensee shall exercise all due precautions so as to avoid risk of causing fire on the premises.

A suitable safety-fuse or other automatic circuit-breaker shall be inserted in each service line within a consumer's premises as close as possible to the point of entry, and contained within a suitable locked or sealed receptacle or fireproof construction.

All electric wires and apparatus on a consumer's premises, except such parts as require to be earthed, shall be highly insulated and suitable for the voltage at which the supply is given. They shall be thoroughly protected against injury to the insulation or access of moisture. All electric wires shall be so fixed and protected as to prevent the possibility of electrical discharge to any adjacent metallic substance.

41. The licensee shall not connect the wires and fittings on a consumer's premises with its mains, or in the case of premises already connected continue the supply from its mains, unless it is reasonably satisfied that the requirements of this license are complied with, that the wiring and fittings are suitable for the voltage at which supply is given, that the installation is generally in accordance with the requirements of good practice, and that the connection or continuance of supply would not cause a leakage from those wires dangerous to life or property or deleterious to the rendering of good service.

For the purposes of satisfying itself that the requirements of this license are being observed, in so far as they apply to wires on a consumer's premises, the licensee may require that notice must be served upon it of the intention to instal wires, fittings, lamps, motors, or other apparatus on any such premises, and may inspect and test the same during any reasonable hours while the installation of such is in progress.

42. If the licensee is reasonably satisfied, after making all proper examination on the completion of the installation, by testing or otherwise, that the wiring and fittings are not suitable for the voltage being employed, or that a leakage exists at some part of a circuit of such extent as to be a source of danger, and that such leakage does not exist at any part of the circuit belonging to the licensee, or that any other requirements of this license are not being complied with, then and in such case any officer of the licensee, duly authorized by it in writing, may, for the purpose of discovering whether the leakage exists at any part of a circuit within or upon any consumer's premises, or whether the wiring is suitable and the general requirements of the license are complied with, by notice require the consumer, at some reasonable time after the service of a notice, to permit him to inspect and to test the wires and fittings belonging to the consumer forming part of the circuit.

If on such testing and inspection the officer discovers a leakage from the consumer's wires exceeding one-thousandth part of the maximum supply current to the premises, or that the requirements of this license are not properly conformed to, or if the consumer does not give all due facilities for