

origin. There is little doubt that the more stringent system of inspection of risks adopted of recent years by many of the companies has had an important effect both in bringing home to the public the necessity for greater care in respect to fire, and also in reducing the tendency to incendiaristic fires. Unfortunately this inspection system is by no means general, and in at least one or two cases there appears to be a tendency to accept owners' valuations without question. This is, of course, done with the knowledge that under the insurance contract the actual value and not the insurance cover is the determining factor in the pay-out after a fire.

2. *Fire-prevention Propaganda.*—Experience in other countries has shown that regular fire-prevention propaganda has considerable value in reducing the fire wastage. This is confirmed by the effect of the Fire-prevention Weeks held in New Zealand during the past few years. It is therefore most desirable that these should be continued.

3. *Improvement of the Organization, Plant, Equipment, and General Efficiency of the Fire Brigades.*—The results obtained by the brigades in many of the fire districts show that a considerable reduction in damage caused by fire can be obtained by improvement in brigade efficiency. This will of course result in additional expenditure, and reference to this matter is made elsewhere in this report.

4. *Improvement in Building Construction and Fire Protection.*—A great deal can be done to limit fire loss by the adoption of fire-resisting construction in the building itself, the protection of exposures, the fitting of automatic fire-alarms, sprinklers, first-aid equipment, and also of rising mains for fire brigade use. This is not only a matter for local authority building by-laws, referred to elsewhere, but for an insurance tariff giving adequate differential rates in favour of buildings which are efficiently protected against fire.

5. *Prevention and Detection of Incendiarism.*—Valuable results have been achieved in the last few years in connection with this class of fire, both by the fire brigades and the police. Searching inquiries are made by the police into the cause of all fires, and those of doubtful origin are given special investigation. If considered necessary a coronial inquiry is held. Publicity has been given these facts in all fire-prevention propaganda. A continuance of this system is regarded as essential.

#### FIRE LOSS IN FIRE DISTRICTS.

It will be seen from Tables II and IV attached that the loss in fire districts (during the year ended 31st March, 1936) was £181,296, and in areas protected by Fire Boards, £2,940, or a total loss of £184,236, as compared with £177,734 for the previous year. Six fires occurred in fire districts during the year in which the loss exceeded £5,000. Details of these are as follow: Cabaret, Auckland (3.30 a.m.), £5,360; picture theatre, Otaki (4.15 a.m.), £6,495; box-factory, Taumarunui (5.5 a.m.), £5,187; auction-room and shops, Westport (2.30 a.m.), £9,223; hotel and shops, Tauranga (Saturday, 2.30 p.m.), £11,338; bargain store, Wanganui (Sunday, 1.17 p.m.), £5,718. These six fires account for about 22 per cent. of the total fire loss. It is interesting to note that although the number of outbreaks of fire has increased considerably, the number of fires at which the brigade's attendance was necessary has remained practically stationary for the past four years, the number of property fires attended being—1932–33, 737; 1933–34, 732; 1934–35, 775; 1935–36, 783. The fire loss per head in fire districts for the year 1935 was 5s. 10d., as compared with 9s. 5d. in the remainder of the Dominion.

#### FIRE-PROTECTION SERVICE.

Inquiries made during inspection visits into the working of brigades at fires tend to confirm the opinion expressed in this report last year, that the advance made in general organization and equipment during recent years has been a very important factor in reducing the fire losses. The keenness and enthusiasm of the firemen themselves is in most cases worthy of high praise, but the improvement referred to is not general, and in too many towns the firemen are still handicapped in their work by defective turnout arrangements or obsolete appliances and equipment.

It cannot be too strongly stressed that the basic costs of the fire service—station overhead, vehicle running and maintenance, uniforms, payments to or in respect of brigade personnel, travelling-expenses, and Board administrative charges—which constitute the major part of the Boards' annual expenditure, are the same whether or not the brigade is properly equipped and organized for its work of fire fighting. In most cases the additional expenditure necessary to bring the brigade up to the required standard of efficiency represents only a small percentage increase on the present charges, and would be quickly recouped by the contributing bodies—directly by the insurance companies in the form of reduced fire loss pay-out, and indirectly by the municipality in the saving of the citizens' property and the lesser disturbance of normal business conditions. It is desired to direct particular attention to the following deficiencies:—

*Fire Alarm System.*—Despite recommendations made both in these reports and in reports on annual inspections, there are still a number of the smaller Fire Board towns which rely on the manual ringing of a firebell to call the brigade in the event of fire. It is axiomatic that only in the early stages can a fire be effectively stopped, and experience shows that the electrically-controlled alarm system operated from the telephone exchange, which costs from £50 to £100 to install, will result in a saving of several minutes in the time of response by the brigade. It must also be noted that in many of the larger towns where street fire-alarm systems have been installed the extension of these systems has not kept pace with the growth of the town.

*Fire Engines.*—It has been stressed in these reports for several years past that owing to the water-supply conditions existing in most towns, the brigade cannot be regarded as efficient unless it is equipped with a fire-pump for boosting purposes. The technical reasons for this requirement have been explained