

Drainage.—Drainage throughout the city and suburbs has been pushed ahead during the year. Of special importance has been the provision of the combined drainage scheme in Mount Eden and Mount Albert. For years portions of Mount Eden and Mount Albert and Mount Roskill districts have been seriously flooded during times of heavy rain. Although the scheme is not entirely completed, it was effective in preventing a recurrence of very serious effects during last winter, and Cabbage-tree Swamp, which has always been a mosquito-breeding area, is now a thing of the past.

The question of drainage for Ellerslie is one of the most urgent problems in the suburbs. This district has no outlet for drainage except through other local bodies' districts. The natural outlet is to the Manukau Harbour, but the finances of the district do not permit of the local body undertaking a scheme involving, as it does, such a large expenditure. The Engineer to the Auckland and Suburban Drainage Board has assisted the Department by investigating the various alternatives for draining this area. The urgency for drainage is accentuated by the fact that storm-water from the city, One Tree Hill, and Ellerslie districts all gravitates to the depression in which the septic tank is situated, causing flooding of the tank and surrounding area whenever excessive rainfall occurs. This polluted surface water at times surrounds houses in the adjacent low-lying area. It is agreed that the drainage scheme for this district should be continued through One Tree Hill and Onehunga and Mount Roskill districts to the Manukau, and should include also drainage from the offensive trades in Mount Wellington district.

Conferences have been held during the year with the above local bodies, and also with the Harbour Board, with a view to providing a combined drainage scheme for those local bodies on the Manukau watershed, such watershed to be included in the present Auckland and Suburban Drainage Board's area.

Storm-water Overflows.—In the city many of these discharge into creeks or gullies, and at times create nuisance. It is time that a proper supervision for these should be provided, and I have strongly recommended that the Auckland Drainage Board should be vested with special legal powers and have full control of such streams, &c. Arch Hill Gully, for example, requires urgent attention, and should be concreted, if not piped.

Complaints concerning disposal of refuse at the two City Council's refuse-dumps were received from time to time. The city destructor is not of sufficient capacity for dealing with the whole of the refuse of the City Council's areas. Great improvements have been made in the control of these, and general improvements were carried out. Still, the smoke nuisance at the Grey Lynn tip was considerable on occasions during the year. Inspections were made with City Council officials of sites proposed for additional destructors, the final decision being held over pending the appointment of a successor to the City Engineer. The Remuera tip is being closed, and the Freeman's Bay destructor is to be used in the meantime for garbage from that portion of the city. During the year the Mount Roskill tip was closed by the Department, and arrangements were made for refuse from Mount Roskill district to be disposed of at the new destructor at Onehunga, which destructor has proved very economical and satisfactory. The care and supervision of tips at Mount Albert and Mount Eden are such that no complaints have been received by the Department during the year.

Smoke Nuisance.—It has been necessary to deal with nuisances created by smoke at two factories. In one case heating by oil fuel was substituted, while in the second it was decided to instal the "Iron Fireman," and this installation is being carried out at the present time. From reports obtained it appears that this installation is giving very satisfactory results in other parts of New Zealand and in other countries.

Mosquito-control.—All local bodies were circularized by the Department as regards the steps required in dealing with this nuisance. During the year research work has been carried out by the Mosquito-control Committee, and a survey made of the city for breeding-places. A report of the latter was forwarded to the local bodies concerned. For a period the Committee's officer acted as an inspector for the City Council on this particular work, and householders were personally given information concerning the necessary precautions to be taken. Most local bodies show apathy in regard to this work, and much remains to be done. Nevertheless, the surface drainage undertaken by local bodies, especially Mount Eden and Mount Albert Borough Councils, has assisted in removing a number of mosquito-breeding areas.

WATER-SUPPLIES.

A great deal of work has been done in the supervision of the purity of the various water-supplies throughout the district, and many tests as to the effective carrying-out of chlorination of the supplies have been made, and, in addition, samples of water have been obtained for bacteriological and chemical examination from all the supplies.

Auckland City.—Most of the water-supplies of the metropolitan area are drawn from the city supply, which has proved satisfactory throughout the year. Additional storage capacity has been provided, and the Candy filtering plants at Nihotapu and Waitakere have effectively dealt with the suspended impurities which have been experienced after heavy rain in previous years.

Papatoetoe.—A poll on a loan proposal to provide a suitable water-supply was carried by a large majority in November last, and contracts have been let for the building of a reservoir and service reticulation-pipes to the town.

Papakura.—Samples taken during the year indicate that this supply is being efficiently chlorinated and filtered, Candy Chlor filter being used, although on one occasion it was necessary to take up the matter of ineffective chlorination with the Town Board, which has been urged to obtain control over the catchment area, but has not yet done so.