*Plunket Society.*—Plunket nurses forwarded 250 samples of human milk and humanized milk for analysis during the year.

### Post and Telegraph.

Samples examined for the Engineering Branch of the Post and Telegraph Department comprised beeswax, bronze wire, distilled water, iron bolts, jointer's metal, lead sheathing for cables, petroleum jelly, shellac, solder, damaged submarine cable, sulphuric acid, zinc rods.

### Public Works.

The principal work undertaken for the Public Works Department was the testing of road-tar, bitumen, and bituminous concrete for the Main Highways Board. Owing to restricted accommodation and shortage of staff, the work fell considerably into arrears as the season advanced. Provision now being made should enable tests to be expedited in future. Other samples analyzed for the Department were coal, boiler-water, paint, roofing-materials, wire.

### Railways.

The samples examined for the Railways Department were fuel briquettes, ink, paints and pigments, oleine oil, water.

### Stores Control.

The Stores Control Board required careful examination of the following materials: Cleaning preparation, fuel oil, galvanized iron, ink, kerosene, lubricating-oils, metal-polish, motor and aviation spirit. Some assistance was also given in framing certain specifications.

### Other Departments.

Samples analyzed for other Departments included creosote and other wood-preservatives, fire-resisting paint, and kauri-gum, for the State Forest Service; copra, for the Department of External Affairs; and soap, for the Navy Office. In addition there have been frequent requests for information or advice on chemical matters by many Government Departments.

### Gas Control.

Regular tests of town gas for pressure, purity, and calorific value have been carried out in Auckland, Christchurch, and Wellington. Towards the end of the year two meter-inspectors were appointed in Auckland and Wellington respectively.

## AUCKLAND BRANCH.

The number of samples analyzed during the year was as follows: Health Department, 2,243; Justice Department (Police), 49; Public Works Department, 8: total, 2,300.

## CHRISTCHURCH BRANCH.

The number of samples received during the year ended 31st December, 1926, was as under: Health Department, 1,192; Justice (Police) Department, 37; other Government Departments, 16; local bodies, 6; general, 1: total, 1,252.

J. S. Maclaurin,
Dominion Analyst.

---

# GEOLOGICAL SURVEY BRANCH.

## DIRECTOR'S REPORT.

### Control and History of Survey.

On the 1st September, 1926, the Geological Survey, which from the 1st January, 1886, had been attached to the Mines Department, was transferred to the newly organized Department of Scientific and Industrial Research. This change in organization marks a turning-point in the career of the Geological Survey, and therefore a brief account of its history up to the present time is here given.

The Geological Survey of New Zealand was first organized in 1865, when Dr. James Hector, at that time Otago Provincial Geologist, was appointed Director. In 1867 the New Zealand Government passed an Act "to establish an Institute for the Advancement of Science and Art in New Zealand, and to make Provision for the Carrying-out of the Geological Survey of the Colony." The short title of this Act was "The New Zealand Institute Act, 1867."

For many years Dr. (later Sir James) Hector directed not only the Geological Survey, but the Colonial Museum, and there was therefore an intimate bond between these two institutions. Sir James Hector was also Manager of the New Zealand Institute, and ably filled many other