The following shows result of sodium iodide in weekly doses amounting to 40 gr. to 120 gr. per annum for a period of six years in a group of Christchurch schools.—

|  |                                    | Normal Thyroids.                            |               |              |            |           |            | Total of all Types of Goitrous Thyroids. |   |              |              |            |            |              |  |  |
|--|------------------------------------|---|---------------|--------------|------------|-----------|------------|--|---|--------------|--------------|------------|------------|--------------|--|--|
| na dina bisa sama                      | andre November                     |   | Actual Totals |              | Unchanged. |           | Increased. |  | Actual<br>Number.                         |              | Unchanged.   |            | Increased. |              | Decreased.                                   |  |
|  |                                    | В.  | G.            | В.           | G.         | В.        | G.         | В.                                       | G.  | В.           | G.           | В.         | G.         | В.           | G.   |  |
| Treated—                               |                                    |   |               | %            | %          | %<br>17·8 | %<br>20·8  | - 1                                      | 110                                       | %            | %            | %          | %          | %            | <b>%</b>                                     |  |
| Sydenham<br>Christchurch<br>and Waltha | West<br>m                          | $\begin{bmatrix} 92 \\ 50 \end{bmatrix}$    | 98<br>35      | 82·2<br>94·0 |            |           | 20.8       | 54<br>54                                 | $\begin{vmatrix} 113 \\ 62 \end{vmatrix}$ | 51·8<br>25·7 | 43·3<br>30·6 | 9·2<br>5·5 |            | 38·4<br>68·5 | $\begin{vmatrix} 45.2 \\ 61.3 \end{vmatrix}$ |  |
| Not treated—                           |                                    | $\begin{vmatrix} & & \\ & 92 \end{vmatrix}$ | 68            | 77.1         | 67.7       | 22.8      | 32.3       | 42                                       | 42  | 54.7         | 57.1         | 09.0       | 99.5       | 21.4         | 14.2   |  |
| Sydenham<br>Christchurch<br>and Waltha | $\operatorname{West}_{\mathbf{m}}$ | 61  | 41            | 73.7         | 73.1       | 26.2      | 26.8       | 51                                       | 45  | 41.2         | 53.3         |            | -          | 21.5         |  |  |

B = Boys; G = Girls.

Dr. Gunn, in the Wanganui District, began the school treatment of goitre in 1921 by giving sodium iodide in 2 gr. doses five days in the week for thirty weeks in the year, so that each child was getting 300 gr. of sodium iodide per annum. She saw no evidence of hyperthyroidism, nor were any children reported as having any symptoms with this dosage: Decrease, 50 per cent.; stationary, 42 per cent.; increase, 7 per cent. Controls—that is, goitrous children not taking treatment—showed decrease, 6 per cent.; stationary, 14 per cent.; increase, 80 per cent.

Dr. Gunn has now under observation two large infant schools, of which the majority of the pupils are taking the routine school treatment with potassium iodide. The object of this measure is, in the main, prophylactic, and it is intended to carry it on for some years in order to observe its influence in goitre-prevention.

The amount of work involved in keeping records, in the re-examination of children, and in the distribution of tablets at the schools is very great. For exact information of all cases under treatment much more time should be devoted to it than we have at our disposal. We consider that treatment has, as a rule, been carried out regularly in those schools in which it was instituted, though in a minority the distribution of tablets appears to have been somewhat casual. Two children only among ten thousand taking tablets were reported as suffering from hyperthyroidism, so that this risk is apparently negligible. In reviewing the position, it is evident that the result of treatment has been, generally speaking, beneficial. Nevertheless, the fact that 20 per cent. of the goitrous children showed increase under treatment and a definite percentage of non-goitrous developed goitre under treatment indicates that the goitre problem would not be solved, though its magnitude would be diminished, by continuing treatment as before. There is without doubt a considerable percentage of children (20 per cent. of goitrous) who require other measures than can be provided for them at school. They require also more frequent supervision than it is practicable to give them. Under present arrangements parents are led to believe that no further steps are necessary in order to secure improvement. Our facilities for extending treatment are inadequate; the attention which we are able to give certain We therefore consider it impracticable to extend the scheme on its present individuals is inadequate.

We note the findings of the recent International Conference held at Berne, Switzerland (Lancet, 18th February, 1928). These are as follows: "It was agreed in general at the Berne Conference that in districts where goitre is endemic three measures are desirable: (1) The general use of a slightly iodized salt by the whole population in order to supply the physiological dose of iodine lacking in the food and drink; (2) goitres, when detected in the course of school inspections, require treatment with iodine under medical supervision; (3) care should be exercised to prevent the use of excessive doses of iodine in the treatment of adults."

Iodized salt is now on the market for use in the endemic areas. School Medical Officers in future will take every opportunity of recommending its use in those areas. Children suffering from goitre will be recommended to obtain treatment from the family physician. It may, however, be found practicable in the larger centres to establish treatment clinics of a size not so large as to prevent adequate supervision by the School Medical Officers.

## SPECIAL INQUIRIES.

Reports on two investigations by School Medical Officers—(1) An inquiry into the condition of rural school-children, by Dr. Albert Henderson; (2) a short inquiry into rheumatic conditions in Auckland school-children, by Dr. Harriet Wilkie—will be found published in the Appendix.

Ada G. Paterson, Director, Division of School Hygiene.