

TABLE NO. 7—continued.  
IRRIGATION AND WATER-SUPPLY—continued.  
SCHEDULE OF SCHEMES UNDER INVESTIGATION.

| Scheme.                                  | Source of Supply.                                                             | River Discharge (Minimum). | Main Canals Discharge (Maximum), as per Design. | Average Rainfall from Records available.  | Rainfall, 1928. | Area commanded (Gross). | Length of Main Canal. | Length of Distributaries. | Expenditure to 31st March, 1929. | Remarks.                                                                                                                                                                                                                                                                                                          |
|------------------------------------------|-------------------------------------------------------------------------------|----------------------------|-------------------------------------------------|-------------------------------------------|-----------------|-------------------------|-----------------------|---------------------------|----------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Maniototo (Upper Taieri)                 | Taieri River and storage dam                                                  | Cusecs. 25                 | Cusecs. 500                                     | Inches. 17.54 (Waipia)                    | Inches. 17.32   | Acres. 100,000          | Miles. 60             | Miles. ..                 | £ 257                            | Modified scheme for complete irrigation of 5,000 acres is possible without storage, or for reasonable partial irrigation of 15,000 acres. Development would be costly.                                                                                                                                            |
| Gromwell Flat and Low burn (Roaring Meg) | Roaring Meg Stream (gravity), Kawarau River (pumping)                         | 29<br>3,000                | 40                                              | 21.16 (Luggate)                           | 21.88           | 15,000                  | 10                    | 30                        | 3,367                            |                                                                                                                                                                                                                                                                                                                   |
| Upper Manuherikia ..                     | Manuherikia and Dunstan Rivers, and storage dam in Manuherikia River at Falls | 77                         | 500                                             | 20.70 (Clyde, Ophir, and Blackstone Hill) | 23.10           | 96,000                  | 130                   | ..                        | 5,334                            | Further investigations into water requirements and areas available, and revised estimates have been made.                                                                                                                                                                                                         |
| Hawea Flats (first alteration native)    | Timaru Creek (gravity)                                                        | 20                         | 30                                              | 26.01 (Hawea Flat)                        | 20.58           | 4,000                   | 11                    | 20                        | 49                               | To irrigate lower flat only.                                                                                                                                                                                                                                                                                      |
| Hawea Flats (later alteration native)    | Hawea River (pumping)                                                         | ..                         | ..                                              | 26.01 (Hawea Flat)                        | 20.58           | 17,600                  | ..                    | ..                        | ..                               | Latest tentative proposal. Electric power not necessary, but water to be pumped by direct application of power generated by low-pressure turbines at outlet of Lake Hawea. This appears preferable to alternative No. 1, and appears to be a promising scheme. Further closer survey and estimates are necessary. |
| Chapman's Gully ..                       | Butcher's Creek, Conroy's Creek, and storage dam                              | ..                         | ..                                              | 14.57 (Alexandra)                         | 13.45           | 100                     | ..                    | ..                        | 16                               | ..                                                                                                                                                                                                                                                                                                                |
| Bendigo Flat ..                          | Lindis River and storage dam                                                  | 35                         | 30                                              | 19.46 (Tarras)                            | 21.83           | 3,000                   | 7                     | ..                        | ..                               | The greater portion of this area is now served.                                                                                                                                                                                                                                                                   |
| * Teviot River Extension                 | Teviot River and Lake Onslow dam                                              | 40                         | 80                                              | 14.90 (Roxburgh East)                     | 17.15           | 2,300                   | ..                    | ..                        | 207                              | To irrigate a limited area in the vicinity of Ettrick, on west side of Clutha River. To be commenced in July.                                                                                                                                                                                                     |
| Miller's Flat ..                         | Minzionburn ..                                                                | 6                          | ..                                              | ..                                        | ..              | 2,000                   | ..                    | ..                        | 192                              | Survey and proposals completed.                                                                                                                                                                                                                                                                                   |
| Luggate Burn ..                          | Luggate Burn ..                                                               | ..                         | 12                                              | 21.16 (Luggate)                           | 21.88           | 1,200                   | ..                    | ..                        | 273                              | To supply water to part of Mount Pisa settlement lands.                                                                                                                                                                                                                                                           |
| Scandinavian ..                          | Tributaries of Manuherikia River                                              | ..                         | 20                                              | 30.94 (St. Bathans)                       | 34.99           | 4,000                   | ..                    | ..                        | ..                               | For lands about St. Bathans. Includes £12,000 towards cost of Falls dam. Upper Manuherikia scheme.                                                                                                                                                                                                                |
| Soil Survey (Central Otago)              | ..                                                                            | ..                         | ..                                              | ..                                        | ..              | ..                      | ..                    | ..                        | 3,065                            | This soil survey in the irrigation districts is now complete, and plans are being prepared. 250,000 acres were surveyed this year.                                                                                                                                                                                |
| Investigation of proposed schemes        | ..                                                                            | ..                         | ..                                              | ..                                        | ..              | ..                      | ..                    | ..                        | 247                              | Includes the reading of river and rain gauges.                                                                                                                                                                                                                                                                    |

\* Put under Teviot River scheme with which it will be ultimately amalgamated.