

## PROSPECTING FOR GOLD.

The following statement shows the expenditure on authorities issued in subsidies to prospecting associations and parties of miners in the different counties for the year ended the 31st March, 1912 :—

Name of County, &c.	Expenditure for the Year ending 31st March, 1912.		
	£	s.	d.
Coromandel .. .. .	463	15	0
Thames .. .. .	11	0	0
Ohinemuri .. .. .	415	17	3
Whakatane .. .. .	24	0	0
Inangahua .. .. .	232	15	0
Takaka .. .. .	49	0	0
Grey .. .. .	260	2	6
Westland .. .. .	1,349	7	0
Ross Borough Council .. .. .	327	12	6
Waihemo .. .. .	18	7	6
Lake .. .. .	10	8	0
Prospecting associations, &c. .. .. .	371	10	3
	£3,533	15	0

## GOVERNMENT PROSPECTING DRILLS.

Three diamond drills of Schram-Harker type, with a boring-capacity of 2,500 ft., 1,500 ft., and 500 ft. respectively, also two Keystone traction placer drills of 350 ft. capacity, are lent out by the Government to mining companies and local bodies free of charge. The borrowers have, however, to keep the machines in good order, and pay all expenses and wages in connection therewith, including those of the Government Superintendent of the drill.

There has been a considerable demand for these machines, and their introduction has been amply justified. Another diamond drill, of Sullivan (C.N.) type, having a capacity of 800 ft., is under order from America for this Department.

The following table shows the work done by Government prospecting drills during 1911 :—

Type of Drill.	Name of Superintendent.	To whom lent.	Minerals sought for.	Number of Holes drilled.	Approximate Depth drilled.	Diameter of Hole.	Character of Country penetrated.	Average Total Cost per Foot, including Transport.
No. 3—Diamond (Schram-Harker type)	W. Warburton	Seddonville State Colliery	Coal ..	7	Ft. 978	In. 2½	Mudstone and grit .. ..	s. d. 11 0½
No. 2—Diamond (Schram-Harker type)	W. Carter ..	Romulus Syndicate, Waihi	Gold ..	3	523	4½	Crushed dacite (would not core), extremely difficult drilling	20 11
		Westport Harbour Board	Coal ..	1	334*	5½	Blue clay, containing boulders (will not core)	..
No. 1—Keystone	T. McMath ..	Various Central Otago dredging claims	Gold, alluvial	23	1,161½	6	Gravel, mostly of schist; easy to drill	2 7½
No. 2—Keystone	G. E. D. Seale		Ditto ..	14	668	6		3 9
	G. E. D. Seale		North Westland alluvial-mining claims	44	1,964	6	Gravel, consisting of grauwacke and large granite boulders; very difficult to penetrate with drive-pipe	4 5

\* Still in progress.

## VIII. SCHOOLS OF MINES.

The decline in the number of students attending the schools of mines still continues. This is especially noticeable in the colliery districts, where but few young men attempt to better their position by a course of lectures and study. The advantages to be gained by attending the excellent schools of mines in New Zealand are clearly shown in the report of Professor James Park, Director of the Otago School (see Section VIII, Annexure C, accompanying this report). Professor Park states that at the present time thirty-seven of his old students are profitably employed in mining and engineering in New Zealand. Of these, no less than fourteen hold official appointments in connection with the Mines and Geological Department of the State. Professor Park also gives a list of nineteen old Otago graduates who are at present holding high positions in the mining industry in foreign parts. For two years in succession the forty-guinea premium presented by the Institution of Mining and Metallurgy, of London (the most exclusive mining institute in the world), has been won by his ex-students—namely, Dr. A. Moncrief Finlayson, in 1911, and Mr. Alexander McLeod, in 1910. This is one of the principal awards given by this institution, and is open to its members and associate members. To those at all sceptical as to the benefits of the training to be obtained from our schools of mines I strongly recommend perusal of the report by Professor Park.