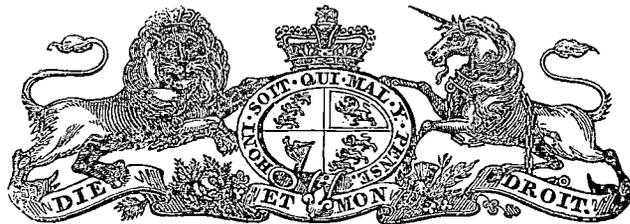


(No. 72.)



1891.

PARLIAMENT OF TASMANIA.

SURVEY DEPARTMENT:
ANNUAL REPORT OF THE DEPUTY SURVEYOR-GENERAL.

Presented to both Houses of Parliament by His Excellency's Command.



SURVEY DEPARTMENT.

REPORT FOR YEAR ENDING JUNE 30, 1891.

Hobart, 6th July, 1891.

SIR,

I HAVE the honor to submit to you a Report on the working of the Survey Department for the year ending June the 30th, 1891.

Consequent on the general development of the country, the current work of the office has steadily increased during the year, and the powers of the small staff have been severely strained to satisfy the demands made upon it. This Report will indicate how difficult it is to maintain an efficient staff under existing circumstances; that we have not yet recovered from the reductions previously made; and that additional assistance is required to prevent the work from falling into serious arrears.

CROWN LANDS ACT, 1890.

The consolidated Crown Lands Act passed last Session is a measure of the very greatest importance to the country, and one that has received considerable attention in one form or another ever since the Land Bill of 1883 was introduced to Parliament. A short Land Act was passed each year since 1885, with the result that there were no fewer than twelve Acts to be studied before a stranger could acquire a competent knowledge of our Land Laws. If, therefore, for no other reason than that of consolidation, the Bill would have been hailed with satisfaction. It, however, aims at the important principle of encouraging agricultural settlement in Mining Districts. This provision is of especial importance when applied to such a field as the West Coast, where the agricultural and mineral lands are to be found side by side in large areas. When experience has shown the necessity for any alterations in its provisions, an amending Act can be added, without danger of seriously complicating matters. Had this measure become law some years since, similar provisions to those contained in the Land Bill of 1883, which purposed to deal with "Agricultural Areas," might have been embodied in it with great advantage to the country. The commendable feature in this proposal was the system of survey and the laying out of roads, and constructing them in advance of selection.

CROWN LANDS GUIDE.

The Crown Lands Guide has been revised and published for the year 1891, under your authority. Much of the information was prepared for issue last year; but it was then thought that the valuable Official Record compiled by the Government Statistician would meet all requirements; but it has since been shown that a means of supplying information relating to lands separately from other subjects, and in compact form, would best satisfy the numerous enquiries that are constantly being made to the Department by persons wishing to settle in the Colony. The present number contains the latest official information respecting the lands which, with the subjoined Returns, afford the means for gauging the general progress made during the last nine years, and the immediate prospects of extension of settlement throughout the various districts of the Colony. The epitome of "The Crown Lands Act," which appears on the opening pages, will be found very beneficial to those desirous of becoming acquainted with the system under which Crown lands are sold, leased, and otherwise occupied.

ROADS.

I am always desirous of seeing roads laid out in advance of selection surveys where practicable, and I have been very glad to have your approval to this being done in several instances. The great advantage which this system possesses over that of selection before survey is that the roads are permanently located at the outset, and all subsequent deviations in them dispensed with. The question of providing roads after selection is a very serious one, and it is now quite evident that some means should be devised to simplify matters in respect to it. The onus of reserving roads of access devolves upon this Department under what may be termed a "piecemeal" system. For instance, when a selection is surveyed a road is reserved through it to give access to Crown land. As each subsequent lot is marked off the operation is repeated. After a number of lots are taken up in the same locality application is made to the Public Works Department for a road to be opened. If funds are available for the work the District Inspector of Works is instructed to proceed to the spot and lay out such road for construction. It then frequently transpires (through no fault of the surveyor) that the roads reserved do not form the most suitable outlet; and, although a road may be perfectly graded through the block being surveyed, it may be quite impossible to extend it to suit the next applicant: such roads are, so to speak, reserved very much in the dark in rough country. It will be understood from these remarks that the trouble is due to the impracticable system rather than to those entrusted to carry out its details. All deviations in roads are set out by the Works Department,—our surveyors (strange to say) have no authority to mark a road through private property: the bulk of them are afterwards surveyed by the several district surveyors for conveyance to the Crown. Thus, such a road is really surveyed three times, after which the matter has to be dealt with by seven departments before it can be finally disposed of—provided the land has been purchased—and therefore under the most favourable circumstances a serious loss of time is incurred before one of these transactions is completed. At the present time the surveys of roads for conveyance are very much in arrears, and I understand that it is your intention to engage additional surveyors to clear them off. The Public Works Department has only one officer appointed for the work, and he is only able to make a slight impression upon it, whilst the district surveyors complain that these small scattered surveys cannot be made remunerative at contract rates; they therefore endeavour to make them fit in with the ordinary surveys for alienation. In this way many months may elapse from the time the instructions are issued till the plan is received. Altogether, it is quite evident that our Road system is not a success.

SURVEYS.

The surveys for this Department are in as satisfactory a condition as could be expected under our contract system, so far as the supervision I have been enabled to bestow upon them enables me to form an opinion. I have now paid a brief visit to all the Survey Districts, principally to ascertain how the important consideration of establishing permanent boundary marks is being observed by surveyors. In most cases the work has been fairly well performed; and I am glad to record a very noticeable improvement in the information supplied on their plans since the Department was placed under my control.

A competent officer, to be constantly employed in the field checking the work of surveyors and making re-surveys, is required in order to keep the surveys up to the standard of our Regulations, which is no higher than necessary.

The matter of re-surveys is a constant trouble, and is very expensive under the existing arrangements, and when performed is not always satisfactory.

There are no arrears of special concern, and, with few exceptions, the Office has been free from complaints of delay in getting the sections surveyed. The demand for surveyors on the West Coast has to some extent reduced the return of surveys effected in Mr. Sorell's district, he having been despatched thither early in February last. Work is, however, far from brisk in the district over which he presides, or he would have been recalled before now.

In Wellington, Mr. District-Surveyor Windsor has been unable to cope with the pressure of survey work, and accordingly Mr. Frodsham proceeded to take up a batch of surveys in the locality of Duck River on the 6th of January. He was engaged in the district for some three months, with his qualified assistant, Mr. W. R. Pitfield, and surveyed 13 lots, comprising 2160 acres, together with 4 miles of road. Mr. Surveyor Dove has been sent to render further assistance in reducing the number of instructions for that district; in West Devon, Mr. Richard Hall and his assistant (Mr. Arthur Hall) have found it difficult to keep the work from accumulating; in East Devon selection has been almost stationary, and except for mining surveys Mr. Chalmers would have been almost idle since last year. In Dorset and Cornwall, Mr. Lord was fully employed; he resigned from the District in May last, and has been succeeded by Mr. G. T. Eddie. Mr. Walpole has been employed almost exclusively on surveys for the Mines Department. Dorset, Cornwall, and Glamorgan have afforded Mr. G. C. Smith and his assistant (Mr. Clark) constant employment between the Survey and Mines Departments; Mr. Hardy's work has accumulated in Pembroke and Monmouth,—two assistants have been employed

(Messrs. H. F. Miles and J. Hinsby) to bring up arrears; Mr. Combes is fully employed in Buckingham, and Mr. Innes finds it all he can do to keep the work under his control in Kent; Mr. Frodsham has been only moderately well employed in Cumberland; Mr. Jones has been unable to get through the agricultural and town surveys as rapidly as could be desired on the West Coast. He has been assisted by Mr. E. Lodder, and Mr. J. A. Sorell has been employed there since 5th February.

The selections (11) made on King's Island, containing a total area of 1890 acres, are now being surveyed for settlement by Mr. Surveyor W. R. Pitfield. The following Returns indicate the counties and localities in which the most land has been taken up, also the unusually large number of new Towns that have been subdivided for sale, with area and number of allotments. The Town surveys being much more extensive than usual, have affected the agricultural lots to a certain extent; the number for last year being 615, comprising a total area of 44,845 acres, and for the year just closed, 581 lots, containing 38,574 acres.

Return of Selection and Auction Surveys received during 12 Months ending 30th June, 1891.

SURVEY DISTRICT.	SELECTION SURVEYS.		AUCTION SURVEYS.		TOTAL.	
	Area in Acres.	No. of Lots.	Area in Acres.	No. of Lots.	Area in Acres.	No. of Lots.
Wellington	11,489	121	116	100	11,555	221
Devon, West.....	3255	51	109	11	3364	62
Devon, East.....	1457	26	20	2	1477	28
Westmorland and part Devon.....	418	10	100	59	518	69
Dorset, West.....	2687	38	171	8	2858	46
Dorset, East.....	1509	28	—	—	1509	28
Cornwall and part Dorset.....	4430	45	114	49	4544	94
Buckingham, South.....	1815	32	314	145	2129	177
Cumberland and part Buckingham.....	4270	63	—	—	4270	63
Monmouth, Somerset, and part Pembroke	924	10	10	1	934	11
Pembroke, part, Tasman's and Forester's Peninsulas.....	1196	27	1	1	1197	28
Kent.....	2565	47	133	19	2698	66
Montagu and Russell.....	2609	83	190	417	2799	500
TOTAL.....	38,574	581	1278	812	39,852	1393

New Towns subdivided for Sale during the Twelve Months ending 30th June, 1891.

Name of Town.	Situation.	Area in Acres.	Number of Lots.
Hazlewood	Road, Waratah to Corinna	100	70
Stafford	Godkin's Mine, Whyte River	10	33
Strahan, East.....	Macquarie Harbour	80	314
Medwin	South Road, Circular Head	42	30
Pyengana	George's River	7	14
Lorinna	Middlesex Crossing	30	50
Town Reserve.....	Near Ringarooma	12	21
Dundas.....	Near Mount Dundas		
Zeehan, North.....	North of Zeehan		
Mallanua.....	Henty River		
Lisle Road, Lietinna.....	Railway Line, Launceston to Scottsdale		

} In course of subdivision.

SURVEY FEES.

The subject of increased remuneration to Surveyors has been once more brought under notice in the form of a Petition to the Government setting forth their claims to consideration. It is quite evident that, as the surveyor has to penetrate further into the interior year by year with the extension of selection, that his duties become more arduous and costly. I have already placed my views before you, and, as I understand no decision has yet been given on the Petition, I shall withhold from making further reference to the question in this Report.

EXPLORATION TRACKS.

Nothing in the way of exploration tracks has been undertaken during the year by this Department, there being no funds available for such work. It was considered, at the time the Estimates were being prepared last year, that the information to be derived from the Parliamentary Railway Surveys to the West Coast would remove the necessity for making special provision for cutting tracks. There are some localities in which expenditure of this kind would prove very beneficial in opening up the country for selectors, and I have therefore asked your favourable consideration for including an item for such work in this year's proposals for expenditure. In a recent letter from the Hon. Wm. Moore he draws attention to the discovery of an area, roughly estimated at some 50,000 acres of good land, bordering on the Flowerdale settlement, and to the necessity for obtaining an official report on the quality and extent of the good land, with suggestions as to the best means to be adopted in disposing of it. Mr. Windsor's Report (attached) refers to much good land being yet available in various parts of the County of Wellington. It has also been recommended that further track-cutting should be carried out in Duck River District in the direction of the Arthur River; and in the County of Kent Mr. Surveyor Innes draws attention in his Report (attached) to similar requirements. There is little known of the greater portion of this County, and I hope to see some explorations carried on there next summer. I would also strongly urge upon the Government the desirability of having some explorations made of the large tract of country lying south-westerly from Mt. Arrowsmith, extending down to the Gordon River, by way of the Frenchman's Cap, where gold was discovered by some of our earliest explorers. I have simply given an outline here of what I would propose should be done, leaving the details to be submitted later on. Mr. Engineer Stuart has reported having met with some good land to the south of Lienna along the Mersey River, on the Mole Creek-Dundas Line. This is the only important information respecting the discovery of lands from the Engineer-in-Chief's Department.

SURVEYS FOR THE MINES DEPARTMENT.

The unprecedented number of applications for mineral leases which followed the extensive discoveries of silver-bearing country on the West Coast necessarily overtaxed the machinery available for disposing of them, particularly in respect to the survey portion. Consequently, on my return from an official visit to Zeehan in February last, I found it necessary to recommend some changes for your approval. Seven extra surveyors were appointed, with an inspecting field officer to supervise their work. This, I am convinced, cannot fail to improve matters; but further changes may yet be necessary before everything in connection with these surveys is brought into satisfactory working order. In the meantime, the Inspector of Surveys, Mr. Fredk. Smith, who possesses a high professional standing, and who was strongly recommended for the position by Alex. Black, Esq., Surveyor-General of Victoria, will prevent any cause for a renewal of the complaints frequently brought against the surveyors employed in these localities. Already, I understand, there is a very marked improvement in the plans furnished to the Mines Department. The survey scale of fees for mineral lands on the West Coast has been raised slightly more than 25 per cent. It may be necessary to still further increase these fees, as already the list of surveyors is very much reduced.

DRAFTING ROOM.

Perhaps the remarks I have to offer under this heading form the most unsatisfactory portion of this Report, as they show the difficulty of providing and maintaining a good and efficient staff of draftsmen. The anticipations I ventured to foreshadow in my Report last year in referring to the younger members of the staff would have proved fairly correct but for the unforeseen changes that have occurred. As it is, we are in a worse position than we were at that time. Two draftsmen have left this office during the last month, and their positions have not been filled up; one has gone to the Lands Titles' Office, and one into the field to study surveying. Their salaries were £70 and £60 respectively, which were altogether inadequate for the duties they performed. The reason why their positions have not been filled is that it is impossible to obtain any draftsmen who would be of the least use to the Department under £150 per annum. The Chief Draftsman has brought under my notice the fact that the number of juniors in the office capable of doing such work as tracings, &c. is quite sufficient to cope with that class of work. What is required are officers with a thorough knowledge of Trigonometry, computing, compiling plans, lettering, &c.; such a knowledge cannot be obtained under at least three or four years' experience, and unless the services of at least one officer so qualified is obtained the work of the Department will be sadly in arrear. A second good draftsman is required if fair progress is to be made in the compilation of county sheets.

Volunteers or draftsmen entering this Branch are now required to pass an examination before being admitted, in view of classifying and grading the officers, so that there will be a better chance of promotion for those deserving it.

CUSTODY OF PLANS.

Some improvements have been effected in the Strong-room to insure better protection for the plans and records stored there, and five new plan-presses have been requisitioned for. One has been made and is almost ready for use. The other four are very much needed for the proper preservation of very valuable plans. The provision hitherto made for storing plans has resulted in their being needlessly knocked about and destroyed, and is totally inadequate to the requirements of this Department.

LITHOGRAPHIC ROOM.

The very necessary repairs and alterations referred to in my last Report have been completed, and have much improved matters. A paper-cutter has been provided to supply a long-felt want. The whole of the machinery has been thoroughly overhauled and cleaned, and the plant is now in good working order.

During the 12 months ending June 30, 1891, 19,064 copies of maps and plans have been printed by the Lithographic and Photo-lithographic Branches of this Department for its own use, and 169,900 copies of maps, plans, promissory notes, &c. for other departments, firms, &c. The estimated value for labour and material (not including paper, which is generally supplied) is £435 9s. 6d., and for which this Department receives no pecuniary credit.

EXAMINATION OF SURVEYORS.

Two candidates presented themselves to the Board of Examiners for examination in October last, Messrs. Ernest Lodder and J. H. Hinsby. Both passed. The former had acquired his professional experience on Railway Surveys in India. Mr. Hinsby obtained his knowledge of field-work in New South Wales and in Tasmania.

In order to satisfy the requirements of the Mines Department, the provision in the Regulations requiring six months' residence in the Colony before certificates should be issued to surveyors without examination, was suspended for the period named. Nine surveyors have been authorised under this altered Regulation.

SPECIAL WORK.

Feeling that some assistance might be rendered by the Railway Engineers in establishing some of the trigonometrical stations in conjunction with their railway surveys, the matter was represented to you in November last, and, by arrangement with the Engineer-in-Chief, this is, I believe, being done along portions of the North-West Coast, but only to a limited extent, under the superintendence of Mr. C. K. Sheard, the Resident Engineer. I should like to see this principle extended if practicable, and shall take an early opportunity to confer with the Engineer-in-Chief with that object. I hope also to obtain some valuable information from the Railway Department of their detailed surveys, which, I believe, are being accurately performed, with a view to bringing their measurements and observations to bear on our surveys. The railway surveys when completed should form important traverses for the information of this Branch.

A number of trigonometrical stations were cleared on Tasman's Peninsula and the country adjoining, to assist Commander Frederick, of H.M.S. *Dart*, in his survey of that portion of the coast of Tasmania.

I have endeavoured to have the magnetic variation of the needle determined by the surveyors in order to ascertain the true azimuth of fixed boundaries in various localities; but, with few exceptions, the results have not been encouraging.

Mr. Hall has determined a meridian near the commencement and termination of the survey of the road from Wilmot to the Five-mile Rise, to which the permanent traverse lines have been referred.

The plan of Mr. Sokell's re-survey of portion of Formby (now Devonport) has been received, the additional cost of which will be about £100.

More special duties might have been undertaken but for the extra demands on the Survey Branch in connection with the Mines Department. While this continues there will be very little time to devote to such work.

The roads that have been surveyed in advance of sectional surveys have been carefully located, graded, permanently marked, and pegged on the ground, under special instructions. The roads so surveyed are as follows :—

County.	Situation.	Miles.	Surveyor.
Wellington	Irish Town to Selections on the south.	4	T. Frodsham.
Devon	Wilmot to Five-Mile Rise	12	R. Hall.
Cornwall.....	Ratray's to Cotton's Selections, Upper George's River	3	G. C. Smith.

SPECIAL SURVEY SERVICE.

I anticipate that the necessity for field inspection, which you have recognised in appointing an Inspector of Surveys to supervise the work of Surveyors on the West Coast, will lead to an item being placed on the Estimates of Expenditure to be submitted to Parliament for the year 1892 for the Special Survey Service. Being aware of the difficulties that surround the subject, and of the results that followed the introduction of this service in 1883, it is with some diffidence that I approach the question.

In the first place, our Land Laws are based on principles opposed to the performance of high-class surveys. The evils arising from settlement by selection before survey have formed a barrier in the way of securing accurate results wherever that principle has been introduced. In support of this statement I will quote the following extract from Mr. Black's able and exhaustive Report on the survey system of this Colony. He says, "the difficulties of reconciling surveys initiated all over the country by independent magnetic bearings, coupled with differences in the standard of measurement, became so formidable as to cause serious public inconvenience, and it became apparent in both Colonies" (Victoria and New Zealand) "that a radical change of system which should supersede the use of the magnetic needle was imperative." This is precisely the system under which surveys have been made in Tasmania (at contract rates and almost without supervision) from the commencement, where, moreover, the rough and broken character of the country has much exaggerated errors.

Although the change in the system in Victoria resulted, no doubt, in greater accuracy being attained, still the sins of past years only became more apparent when exposed by the improved standard of the subsequent surveys. Legislation then became absolutely necessary to provide a means for dealing with unpreventable errors in measurements, in order to overcome serious complications with the Titles Department. Accordingly, in 1885 an Act was passed by the Parliament for the adjustment of discrepancies between Surveys and Titles, called the "Survey Boundaries Act." The effect of this Act was to relieve the Titles Department of difficulties that had hitherto proved so perplexing. Following the example of Victoria, a similar measure was made the law of the land in this Colony. This is a most important enactment, as it removes any insecurity in respect to boundaries defined by dimensions only; and further, it establishes the important fact that the title to a piece of land is in no way invalidated by an error in the survey. It is, however, of great consequence, for obvious reasons, that due regard to accuracy be exercised in the survey of all lands for alienation. Apart from the provision made for unavoidable errors in surveys for placing the selector in possession of his land, it is essential that any primary systematic method of survey for mapping out the country and subdividing it into large portions of territory be conducted on geodetic or scientific principles to be of any value. That the Trigonometrical survey, on which so much labour and money were expended, should have been so far lost to the Colony is a circumstance very much to be deplored—the more so inasmuch as such a survey is most valuable in the early development of a country. Notwithstanding, however, that the undertaking would necessarily involve considerable outlay and steady perseverance, every available means should be employed to re-establish the original triangulation and to carry it on to completion. Not only would it be beneficial in the construction of an accurate map of the Colony as a whole, but it would be of considerable advantage in rectifying past errors in sectional surveys, and confining those of the future to a *uniform meridian*.

The first thing to be done in connection with this survey would be to have the original computations thoroughly checked by a competent geodetic computer, a fresh plan prepared as far as the work had been proceeded with, to have the angles verified by actual observations at the most suitable stations for testing their value, and thus set at rest any manner of doubt that may exist as to the accuracy of the former operations. The re-building of the old and erecting new trigonometrical stations where required should be carried on simultaneously, and the work made as permanent as possible to avoid a repetition of what has occurred in the past.

It has been estimated by Mr. Black that this work would cost about £2000 per annum.

Perhaps, as suggested, the erection of trigonometrical stations along the various projected railway lines might be performed through the Engineer-in-Chief's Department. The work, if carried on conjointly with the railway surveys, could, I believe, be executed for a much less sum than separately by this Department. Whilst referring to the Special service, I desire to direct your attention to the necessity for retaking up the standard survey of Launceston (commenced some few years since by Mr. Assistant-Surveyor R. W. Stokell), Hobart, and other towns, in which complications are sure to occur from the old and defective surveys. A case may arise at any time that would involve heavy compensation from the Insurance Fund under the Real Property Act, by which the State guarantees an indefeasible title.

The plan of the re-survey of portion of the Town of West Devonport has shown what glaring errors existed in the original laying out and subdivision of that town, and there is very little doubt but that similar inaccuracies would be found in many other towns if they were subjected to the same crucial test. Such re-surveys might be carried on during the winter months when slow progress in surveying can be made in our dense scrubs. This was, I believe, the original intention when the work was undertaken.

A complete plan of Launceston is very much required, as hundreds of the original lots have been subdivided into allotments, and numbers of streets made within the City, of which there is no record in this office, not to mention the important suburbs of Invermay, Newstead, Trevallyn, &c. that have grown up under similar conditions.

In this Report I desire to indicate the principles upon which any plan of operations for carrying out the higher system of surveying should be based.

I have the honor to be,

Sir,

Your very obedient Servant,

E. A. COUNSEL,
Deputy Surveyor-General.

The Honorable the Minister of Lands and Works, Hobart.



REPORT OF THE INSPECTOR OF SURVEYS.

Zeehan, 18th June, 1891.

SIR,

WITH reference to marking surveys of mineral leases on the West Coast, I think that the regulations now in force, if carried out strictly, would be fairly complete. I would however suggest, instead of notches, that triangles or flat irons should be adopted, as they are better distinguished in the bush, are quite different to any other mark made by bushmen, and consequently could be recognised for a longer time; also, any tree near a corner should (as required by the present regulations) be marked with a large triangle, with the addition of the number of the lease graven on it with a chisel; and would also suggest that off-setting should be permitted only where a tree is over two feet in diameter or where impassable rocks are on the line, so that the clearing will be on the boundary as much as possible, making it easier for applicants or others to find the lines.

From observations I have taken, I believe the needle has been used very freely in making surveys of mineral leases, causing serious errors in the contained angles of blocks. I attempted to reduce the bearings of leased blocks about the Ring River to one meridian, but failed; almost the first angle I dealt with was the south-east angle of W. Kregor's lease, 2292-87M, which, according to the bearings given, should be $92^{\circ} 10'$, whereas bearings given on O'Boyle's and Belty's 113-91M adjoining lease gives the same angle as $90^{\circ} 0'$. It seems to have been the practice when starting the survey of a lease adjoining another, to set up over the corner peg and go away with the needle. I would recommend that this method of starting surveys should be stopped, and that the adjoining boundary of the existing survey should be traversed first and used as a datum for the new survey—that is to say, clauses 16 and 28 of the Regulations should be enforced.

I am informed that a trigonometrical survey has been made to the principal mountains; I would suggest that it be extended, so that a point would be available every square mile or thereabouts. By this means past errors might be rectified and future surveys kept to one meridian. The country is favourable for a trigonometrical survey, having so many conical hills.

I have the honor to be,

Sir,

Your most obedient Servant,

FREDERICK SMITH, *Inspector of Surveys.*E. A. COUNSEL, *Esq., Deputy Surveyor-General.*

DISTRICT SURVEYORS' REPORTS.

Longley, April 27th, 1891.

SIR,

IN accordance with your instruction, I have the honor to submit my annual Report for the year 1890, and for the sake of uniformity shall take the various items of information asked for in circular dated April 11th, 1890, and treat each one separately and in order stated therein.

Lands suitable for Selection.

Under this heading I have to report that in the Parishes of Throckmorton and Ranelagh, situated in the Upper Huon and Mountain River, there is still a considerable extent of good land available for selection in small lots varying from 20 to 100 acres. The land may be described as being generally first-class soil heavily timbered with swamp gum and dogwood scrub, well watered, and, being situated on the hill-sides with an easterly aspect, may be considered eminently suited for orchards or agricultural purposes; still further to the west of Throckmorton, on the Huon, Russell, and Denison Rivers, there is also a large extent of good land of a similar description which yet awaits exploration and future settlement. I have been into this country, and from what I have seen can strongly recommend this district to selectors. In the Parish of Kingborough, at the head of the Snug River I estimate about 1000 acres of excellent land available for selection. I had an opportunity a short time back of visiting this locality and was surprised to find such an extent of good country as yet unsettled, especially as access to the land is easy, being within four miles of water carriage, and should command attention in the near future. Still further south, in the Parishes of Bagot and Pedder, more good land is met with, situated principally on Nicholls' Rivulet and Garden Island Creek. The selections made in the past in this portion of my district have been chiefly for timber purposes, but little disposition being shown by the settlers to cultivate the soil; the remaining portion of this survey district does not call for any remarks, being principally poor land, very little of which is suitable for agricultural or pastoral pursuits.

Roads and Tracks.

In order to facilitate settlement of the Upper Huon District I would strongly recommend that a track suitable for horse traffic be cut from Mr. W. Wallis's "Hermitage" estate, out to the Denison River, a distance of about six miles. The quality of this land is excellent, and has been fully described under another heading.

Names of Persons possessing local knowledge.

To intending selectors in the Upper Huon District I would suggest an interview with Messrs. Edward or Daniel Rimon, of Huonville, both of whom are possessed of extensive local knowledge and bush experience,

and would, I have no doubt, for a small consideration in payment for loss of time, point out the parts most suitable for selection. Mr. W. Wallis, of Upper Huon, and Mr. Charles Fletcher, of Huonville, are also thoroughly intimate with the district under notice. In order to give persons desirous of taking up land at the Snug some idea of the country, they could not do better than apply to Mr. Alfred Miller of that place, who is well acquainted with the district at Garden Island Creek and Nicholls' Rivulet; perhaps the best authority as to the position of land available for selection would be Mr. James Sculthorpe, whose address is Nicholls' Rivulet, Port Cygnet. Longley and Kingborough.—For information respecting this district Mr. James Combes of the former place, late District Surveyor, would be happy to give persons desirous of obtaining local knowledge the benefit of his thirty years' experience.

Progress of settlement.

Generally speaking, settlement has not progressed very rapidly throughout my district. The extending of former holdings and the provision of homes for the children of original settlers seem to mark the only progress made in this direction, scarcely any new settlers having come into the district during the past year.

I have, &c.

HERBERT COMBES, *District Surveyor.*

The Surveyor-General, Survey Office, Hobart.

Latrobe, 21st April, 1891.

SIR,

I HAVE the honor to transmit to you my Annual Report for the year 1890.

In reviewing the progress that has taken place throughout the District under my charge during the past twelve months, I regret that the results do not bear a favourable comparison with previous years; this I attribute to the general depression that has existed, and also to the limited area suitable for agricultural purposes available.

In past years settlement has been so steady that nearly all the land at and around the base of the large mountains has been selected, and is being steadily improved each year. There are a great number of "cut out" pieces or areas adjoining many of the purchased lots fit only for leasehold purposes, which, if let on long leases with improvement clauses at nominal rents, would not only improve in value, but also in quality.

In agricultural areas still available I would draw the attention of intending investors to the country along the west bank of the Mersey River, south of Liens Township Reserve, County Westmorland; here the land is good in quality and extensive in area, is under twenty miles from Mole Creek Railway Station, and to the River Mersey there is a first class road and bridge across river; there is also, within a short distance, a large area of pastoral land that might be useful as summer runs. There are cleared farms adjoining Liens Reserve. A fairly good mountain track westerly leads to the Middlesex mining country. Again, at the Forth Crossing, Middlesex, and along the western slope of Gadd's Hill there is a large area of scrub land suitable for farms. A good mountain road from Sheffield, which is distant about twenty-three miles; this country is adjacent to Middlesex Mines.

Pastoral Areas.

The large areas of pastoral land from the summit of the Western Tiers, County Westmorland, to the Marlborough Road and Lake St. Clair do not command much attention, from the fact that it is inaccessible for want of roads, which, in any case, would be most difficult to procure. I favour this tract of land being connected with the farms along the Western Tiers and Chudleigh by good and well-made mountain roads ten or twelve feet wide; and I recommend the locality of Dalebrook, County Westmorland, as one most suitable and fairly practicable, the distance being about three and a half miles; this route would facilitate tourists and others visiting the Lakes and Nineteen Lagoons.

Roads.

In addition to roads already mentioned, I am of opinion that a road southerly from Liens Township Reserve to Crown land for a distance of two or three miles would open up a desirable locality. There is a track frequently used in passing between Sheffield and Mole Creek, Chudleigh, requiring cutting and making passable for a distance of about six miles.

Mining.

During the last two years mining in my District has made steady progress; thirty-seven sections have been surveyed for lease purposes during the year, and a very large amount of work has been judiciously done. The prospects are, in many cases, of a most satisfactory character. There are five companies working reefs for gold, and two companies working for silver at Mount Claude; the bulk tests by all these companies have been eminently satisfactory. During the coming year I anticipate that the mining industry in this District will occupy a prominent place in public opinion.

I have, &c.

HENRY A. CHALMERS, *District Surveyor.*

The Surveyor-General, Survey Office, Hobart.

Stone Buildings, 10th June, 1891.

SIR,

I HAVE the honor to forward you my Annual Report upon the Survey District under my charge.

A very small area of land has been taken up during the past year, the lots being as a rule heavily timbered and covered with a dense scrub, varying in size from 15 to 100 acres, in scattered localities; the cost of travelling from one place to another to do this work and other expenses amounting almost to the fees paid.

Land suitable for selection, Florentine Valley.—In this valley I have been over an estimated area of 12,000 acres of first-class land and about 6000 acres of medium quality. For a detailed account I would refer you to my Report of March, 1890. This land is not likely to be taken up at present; but if the Derwent Valley Railway is extended *viâ* Ellendale, and a good road or tramway constructed either from Russell's Falls or Ellendale, I believe the land would soon be applied for.

Traces of silver have been found on the dividing range between Russell's and the Florentine, and about seven sections applied for lease.

Uxbridge.—Some first-class land is to be found in this locality to the south and south-west of J. Riley's 25 acres. The land is heavily timbered with swamp gum and covered with a thick pear-tree, musk, and fern scrub.

Nive.—To the west and adjoining the River Nive I believe a large area of good land will be found, but at present this locality is too far away from market to be taken up; but when the Derwent Valley Railway is extended this will bring the land to within an easy distance of market, and it will, I have no doubt, be soon applied for.

A large area of good pastoral land is to be found west of the Derwent, taking in the Navarre Plains and extending south.

Roads and Tracks.

I would suggest that a track be cut from Ellendale or Sassafra Creek to the bridge over the Florentine. This, I believe, would open up a large area of good land. I furnished you a report upon this matter in April last.

Uxbridge.—I would recommend that a track be cut south and south-west from J. Riley's 25 acres. A road is being constructed to the selection, and if a track is cut for about five miles beyond, it will enable intending selectors to go over the land. I would point out that this track would also be of advantage in extending the road beyond the present selections, as it would form a basis of operations in laying out a line of road.

A track would also be of advantage in opening up Crown lands, starting from near Mount Lloyd and extending southerly.

Names of persons possessing local knowledge.—Mr. Robert Marriott, of Russell's Falls; Mr. James Clarke, of Ellendale; and Mr. John M'Gurk, of Uxbridge, have a local knowledge of the country where they reside, and, I believe, would be prepared to assist intending selectors.

Progress of Settlement.

The land taken up at Russell's Falls, with the exception of a few small lots, has been all surveyed, and a large amount of work done by the selectors in the shape of clearing, scrubbing, and burning off. I look upon this part of my district as likely to be in a few years a thriving settlement, the great drawback at present being the want of good roads.

In the other portions of the district the usual amount of clearing has been done on lots recently taken up.

I have, &c.

THOMAS FRODSHAM.

The Surveyor-General, Survey Office.

Leith, 6th January, 1891.

SIR,

I have the honor to report on the progress made in my district for the year 1890.

The principal work has been confined to agricultural land, but a few town lots have been surveyed and sold, and a small number of lots under the Mineral Lands Act have been marked off as well. The survey of over 7000 acres has been effected during the past year. This area comprises 102 lots, of which 85 were agricultural lands, containing 5725 acres, or an average of 67 acres each; 11 lots were town lands, 109 acres, of about 10 acres each; six lots for mining, amounting to 230 acres.

The total area is not large for two surveyors to perform in twelve months, but the surveys have been greatly scattered, and a good deal of time has been lost in travelling from one to another. The lots are disconnected owing, principally, to selections being made by former purchasers merely to enlarge their

holdings, or to take up a small lot adjoining to enclose water or other purposes. As the agricultural land has been very largely selected in this district, and all that is well situated has been taken up, I am not very sanguine that any very great quantity will be selected during this year. The West Coast mines are attracting a good many of the people from this district, and this will militate against the purchase of land and its improvement also. Both coal mining and silver mining show symptoms of reviving. It has always been a mystery to me that more attention should not have been given to the mineral indications shown from the Penguin, along the Dial Range, to some 20 miles southerly. Indications of copper, silver, and lead have been found in numerous places throughout this distance, but nothing to any extent has been done to develop the minerals, and yet, if the same indications existed on the West Coast, thousands of acres would be taken up, and companies formed to work them.

I have, &c.

RICHARD HALL, *District Surveyor.*

The Surveyor-General, Survey Office, Hobart.

Hobart, May, 1891.

SIR,

I have the honor to submit my Annual Report for the current year.

Selection.

There has been a considerable amount of selection all over the district, consisting generally of small lots to be worked in conjunction with land already held.

Land available.

Most of the Crown land still unselected consists, when it is good, of small scattered patches, to obtain which it is generally necessary to take in stony ground. There is not much scope for an intending selector, unless he is already possessed of property adjacent. No doubt the following residents would be glad to assist any person desirous of making a selection.

References.

Messrs Montgomery and J. Cornish, at Runnymede; G. Nettlefold, Rumney's Huts; J. Zantuck, Rhyndaston; M. Bresnehan, at Orford; and Mr. Robinson, Spring Bay.

Public Works Roads.

A new feature this year has been the receipt of instructions for the survey of new roads for the above department. Where they are of any extent, and adjacent to selection work, they will assist the District Surveyor, but when instructions refer to deviations of three or four chains only, and happen to be miles apart, it is needless to say that 75 farthings a chain will not indemnify the surveyor.

Increase of Fees.

In my district the work is so scattered and mixed up with old work that, in spite of the fact that the country is generally fairly open, I cannot make the work pay as a professional man should be paid, and it is within my recollection that you had the same experience when in charge of this district. I may be permitted to state that had it not been that I was engaged by the Government on other surveys, notably a standard survey of portion of the City of Hobart for the Central Board of Health, and some private surveys, I should have been put to considerable loss. My brother district surveyors lately forwarded a petition through you to the Surveyor-General, and I venture to express the hope that you will contrive to put matters on a more satisfactory basis, inasmuch as you have experienced the same difficulty in the past.

I have, &c.

WENTWORTH M. HARDY, *District Surveyor.*

The Deputy Surveyor-General, Hobart.

Port Esperance, 17th April, 1891.

SIR,

SINCE the date of my last Annual Report (10th May, 1890) I have surveyed some sixty-two or three lots, varying in size from five to 320 acres, with a total acreage of about 3000, the generality of which have been heavily timbered lands, selected under the 24th Section of the Waste Lands Act, 1870, and I think I am right in saying that by far the greater portion of the lots thus selected are for *bonâ fide* settlement.

Lands suitable for Selection.

County of Kent—Parish of Leithbridge.—In the valley of the Huon and its tributaries there are still considerable areas of land suitable for agricultural pursuits unselected, and in many instances, as in the valley of the Arve, especially adapted for fruit-growing (at present the staple industry of the Huon), being well sheltered, good land; but I regret to say that, for want of proper means of communication, the greater portion of these lands are at present inaccessible to the selector.

Parish of Honeywood.—Here, as in Leithbridge, there is still a large area of unselected Crown land, which is principally heavily timbered land, and of fair quality, well suited for small holdings; but here, as in the last-mentioned parish, the want of roads into the back country is a serious drawback to settlement.

Parish of Price.—In this, as in the last-named parish, there is a large area of unalienated land, in many places of very good quality, but very heavily timbered and at present inaccessible.

Parish of Thanet.—In this parish the same may be said as in the preceding ones, the same difficulty standing in the way of settlement. It contains a very large area of unalienated good land, very heavily timbered and well watered.

The timber is principally blue gum and stringy bark, with a dense undergrowth of musk, dogwood, and other scrub. This land is well adapted for agricultural pursuits, but until roads are made to connect it with our splendid waterway, there is little or no chance of much of it being brought under cultivation.

In one portion of this parish a road is at present being constructed by the Public Works Department, which will give some one or two miles of frontage, and within the next twelve months I expect to see the whole of the available land along the line of route selected.

Parishes of Garrett and Purves.—In both of these parishes there is plenty of good land suitable for settlement, but the same difficulty stands in the way—want of roads; for beyond the main road to the southern portion of the district I am not aware of any in the course of construction to facilitate settlement.

Parish of Blaheny.—In this parish there is very little land suitable for selection for agricultural purposes, and at present that little is locked up, there being no roads whatever to the back land, and the only selection that takes place is in the interests of the sawmills for timber purposes, and a little upon the sea coast for homesteads for the various fishermen and mill hands at Recherche Bay.

By far the greater portion of this parish and also the adjoining Parish of Purves is composed of rugged mountains and swampy flats, nearly all of which are covered with a dense growth of timber and scrub.

County of Buckingham—Parishes of Bedford and Pedder.—Nearly the whole of the available land in these parishes suitable for agriculture has been selected, and what little remains is inferior in quality, and only suitable for selection by those who own the adjoining land.

Parish of Bagot.—Here, as in the last named parishes, the best of the land has been alienated, and that which remains (with the exception of a few lots in the town of Welsh) is rugged and broken, and generally of very inferior quality.

Parish of South Bruni.—This contains a considerable area of first-class land, not so heavily timbered as the main land, well watered, and a beautiful climate, being much milder than that of the western shore of D'Entrecasteaux Channel, and is within easy distance of Hobart. Considerable improvements in the way of roads have been recently made, and for *bona fide* settlers with small capital this is one of the best portions of the district.

Roads.

I would suggest that the road to the Upper Huon be pushed ahead as fast as circumstances will permit, until the junction of the Rivers Huon and Arve is reached; thence it should be continued up the valley of the Arve. This would open up both land and timber of considerable value.

The extension of the new road at Franklin should also be pushed on, there being a valuable bed of swamp-gum timber, with good land, at no great distance from the present terminus.

Parish of Honeywood.—In the vicinity of Geeveston Settlement there are two roads leading towards the unselected Crown land upon the northern side of the settlement, and I would strongly urge the necessity of at least one of them being carried into the Arve Valley at an early date. I would recommend the one leading through the properties of Messrs. Watchorn, Diers, Burrell, and others, for I have every reason to believe this to be the best line, and it will tap the Arve Valley well towards the head waters of that stream, and open to selectors a considerable area of good land, with valuable timber.

I think this road is wanted more urgently than any other that could be constructed to open Crown lands in any portion of the district, and, if it were opened for traffic from the present terminus to the bank of the Arve, I have very little doubt but that the amount of land that would be selected along the route would soon repay the cost of construction.

The road towards the Crown lands in the vicinity of Scott's Rivulet also requires extending.

Parish of Price.—The road known as Tongataboo Road requires extending into Crown lands. At present the whole of the land along the line of route is in private hands.

The same may be said of the Kermandie Valley Road.

Parish of Thanet.—Here I would suggest a further extension of the new line of road known as Pulfer's Road, leading from Hopetoun Jetty to Crown lands. I have recently been along the line as at present marked out, and I find it is leading to first-class land and splendid blue-gum timber, and am also aware there is a very large area of Crown land in the direction in which an extension of this road would run.

A road is also urgently required to lead from the main road from Dover to Hastings in a north-westerly direction up the valley of the Esperance River, and I would suggest that it should commence in the Parish of Garrett, on the southern bank of the Esperance, and near the new bridge now in course of construction over that stream, going thence through some private property which fronts upon the southern side of the river, and into a block of Crown land in the vicinity of lands selected by H. Chesterman, M. Chesterman, and others. It should be continued some distance along the southern bank of the Esperance, and then cross into the Parish of Thanet at a point which would be indicated by local men, and go thence

into the Crown land upon the northern side of the river. A glance at the chart will show hereabouts a very large area of land at present unalienated, drained by the Esperance and its tributaries, a great deal of it being suitable for agricultural purposes. I have no doubt that if it were opened by means of a road in the position indicated, most of it would soon be taken up and settled upon. The route I have pointed out would open both sides of the river, and also avoid some very expensive bridges, which would have to be constructed if the northern bank of the stream were taken.

Parish of Garrett.—A road leading from Hastings in a westerly direction up the valley of the Lune would open up some splendid bottom land, very suitable for fruit-growing and general homestead purposes.

Parishes of Purves and Blakeney.—Beyond some tracks, which I will suggest further on, I cannot see that anything in the way of road-making to open Crown lands is required for the present.

On the main road from Dover to Recherche there are some works which require attending to ; but, as our Public Works officials have them in hand, no doubt they will be pushed on with as little delay as possible.

While upon the subject of roads generally, there is one item which I would draw special attention to, viz., the encroachments upon the Crown reservation or esplanade upon our coast line by the holders of property adjoining and fronting thereon. Upon several occasions lately I have had it brought under my notice where these encroachments are causing serious inconvenience to our Public Works officials, notably in one case, where the reservation upon the River Huon is required for road purposes, and I would respectfully suggest that the Honorable the Minister of Lands should at once resume possession of any portion of our reservation upon which encroachments have been made ; and that, in any future case in which a portion of the reservation is leased to private persons, a clause should be inserted in such lease compelling them to leave open to the public sufficient space to give access to the adjacent waterway if the same is required.

Tracks for Exploration Purposes.

I would suggest that a track should be cut from Recherche Bay to South Cape Bay, a distance of some six or seven miles. A considerable area of land has recently been taken up in this vicinity for the purpose of opening up a coal field known to exist thereabouts. Some 1600 acres have been pegged off, and I understand steps are about to be taken to test its value, when a track will be required as a means of getting to and fro, the country between South Cape and Recherche Bay being covered with a dense scrub.

I would suggest another track, to be cut from what is locally known as the Pigsties, Recherche Bay, near the mouth of the D'Entrecasteaux River, running in a westerly direction up the valley of that stream towards the La Perouse Range for a distance of six or seven miles. This would greatly facilitate prospecting operations both for land and minerals, as it would be a means of access to the D'Entrecasteaux Valley, and also to the rugged country forming the La Perouse Range. These two tracks would do more towards opening the rugged parishes of Purves and Blakeney than anything else in the shape of roads that I could suggest.

A track cut from the Kermantie Valley, in the vicinity of what is known as the South Creek, and running in a southerly direction across the low dividing range between the head waters of the Kermantie and Esperance rivers, until it reached the end of a tramway owned by the proprietors of the Ramea Saw-mills, at Esperance, would give access to a large area of hitherto unexplored country in the parishes of Price and Thanet, and which, it is believed, contains both good land and valuable timber, and would, in all probability, be the forerunner of a road through this way to the south-western portion of the district. The distance, roughly speaking, would be about ten miles.

Names of persons possessing local knowledge—

At Franklin—Mr. G. Innes (late District Surveyor) ; Mr. W. Cuthbert, J.P. ; Mr. J. T. Stanfield, Authorised Surveyor.

At Geeveston—Mr. O. Geeves, J.P. ; Mr. J. Evans.

At Esperance—Mr. A. E. Davis ; Mr. J. Pulfer ; Mr. H. Chesterman, Ramea and Hobart.

Hastings—Mr. J. Hay, Tertius.

Southport—Mr. J. Graves, Tarrabah.

Lady Bay—Mr. R. Hay, Seaton.

Ida Bay—Mr. H. W. Tyler.

Recherche Bay—Mr. R. D. Cuthbert, Lepreena ; Mr. J. M'Dougall, Catamarau.

Adventure Bay—Mr. H. Gray, } South Bruni Island.

Taylor's Bay—Mr. T. Davis, }

General Progress.

During the past twelve months the rate of progress in the Huon, when compared with some preceding years, has been slow. There are several reasons which will account for this. For instance, the low prices ranging for fruit last year were very damaging to the best interests of a great proportion of our population, especially to the "small growers," who, as a rule, do the greater portion of the selecting, and who, in a great many instances, were losers over their fruit transactions.

Again, the timber interest has suffered in a like manner, owing to the dull state of the markets in the adjoining colonies, the prices being such that in a great many cases those realized would not cover the cost of cutting, freight, &c., and as a natural consequence, the owners of the various mills have had to lower the rate of wage, and in some instances close their establishments ; and sawn timber being the chief product of the southern portion of the district, when there is no payable outlet for it, everything else suffers accordingly.

But, looking at the brighter side of the question, a commencement has been made in an industry which is almost new to my district. I refer to mining.

Mr. J. Hay, of Hastings, has during the past 12 months opened up a fine seam of coal, some four feet in thickness, and I have heard from a reliable source that it has stood a very satisfactory test as regards being suitable for steam purposes in the furnaces of one of the large ocean-going steamships which visit the port of Hobart.

The mine is situated about $2\frac{1}{2}$ miles from Hastings wharf, has been opened up under the superintendence of an experienced miner, and a tramway has been constructed connecting it with the shipping place, the present output being, I believe, about some 10 tons per day, which finds a ready sale in Hobart, whither it is conveyed in a steam vessel that was built at Hastings for that purpose.

A little further south, on the southern side of the River Lune, a discovery has been made of limestone, and a large area has been pegged off for mining purposes.

Again, in the vicinity of South Cape Bay, in the parish of Blakeney, some 1600 acres have been pegged off for the purpose of coal mining, as, from surface indications, a large body of that mineral appears to exist there; and, I believe, steps are about to be taken to test its value. These lots not having been surveyed at the present date, beyond what I have learned from the prospectors I am unable to speak with any degree of certainty of their probable value.

Upon the whole, though our rate of progress has been slow, it has been of a healthy description. Our roads, under an efficient staff of public work officials, are making good progress, and are in a much better state than I have ever before seen them; this is a general thing throughout the district. Jetties have been constructed at a number of the more important places on the coast to facilitate the shipment of fruit, timber, and other produce, and are a decided improvement upon the old system of boating it off to the various vessels employed in our coasting trade. These improvements, together with the prospect of a good season for our fruit-growers, and a revival to a certain extent in our timber trade, lead to the hope that in my next annual report I shall be able to refer to a more rapid rate of progress.

I have, &c.

E. G. INNES, *District Surveyor.*

The Surveyor-General.

Strahan, 28th May, 1891.

SIR,

I HAVE the honor to submit for your consideration my Annual Report on the West Coast for the last year.

Lands suitable for Selection.

Really good land is quite a desideratum on the West Coast, but small areas of fairly good land can be found that could be made fit for cultivation with the expenditure of a large amount of labour. Outside the township boundary of Waratah some tolerably good land exists, composed chiefly of basaltic soil, heavily timbered with myrtles and sassafras, and an undergrowth of small ferns and tree ferns. This land has not been thrown open for selection as yet. Its extent is about $1\frac{1}{2}$ miles south of Waratah, and about two to three miles in width.

The examination of the route for the proposed railway line between Waratah and Zeehan—now being surveyed—has disclosed the existence of some good land in the valley of the Huskisson River, formed, no doubt, from the diluvium carried down by the different streams. This land is not available for selection.

Granville Harbour is another place where agricultural land of good quality can be found, say about 500 acres, and about 1500 acres of an inferior kind. The 500 acres alluded to is part of the Township Reserve there, and is available for selection in 10-acre lots only. A mile from the Town Reserve in any direction the land is available, under the 49th section of "The Crown Lands Act," in areas not exceeding 100 acres. Some patches of good land can be obtained at the Pieman Heads, about three or four 50-acre lots. Granville Harbour is situated about 12 miles south of the Pieman Heads, or nearly half way between the Pieman Heads and Trial Harbour.

At Zeehan and Dundas some land suitable for cultivation can be found. That near Zeehan is on the banks of the North Henty River, about two miles east from Zeehan along the Zeehan and Dundas Road, and near Dundas, on Stony Creek, about five miles from Zeehan; but as this land is not at present open for selection it need not be referred to further, especially as it was dealt with in my last Report.

At the little Henty River some good land exists between the Strahan-Zeehan Railway line, now in course of construction and the sea coast. It is some distance west of the line, the extent of the land being about 500 acres, all heavily timbered.

Most of the land fit for farming purposes at the Big Henty River has been selected. Small isolated areas of fair land may be found along the Strahan-Zeehan line as the country becomes better known. It is a moot point as to whether the indifferent land here will grow marketable produce and grass, owing to the naturally moist humid climate that prevails.

Some 300 acres of good land exists on the King River, near Mount Lyell, on the track from Mount Lyell to Marlborough, *via* Mount Arrowsmith. The only objection to it is that it is occasionally subjected to floods.

Roads and Tracks.

No part of Tasmania offers more inducement to the Government of the Colony than the West Coast for reasonable expenditure on roads and tracks to open it up. The extensive mineral deposits already discovered would largely recoup the Government for such outlay.

Some three years back a line was laid out and "blazed," under the direction of Mr. T. B. Moore, from the Town of Lynchford, on the Queen River, past Mt. Jukes and not far from Flannigan's Flat, on to Mt. Sorell, and terminating at Kelly's Basin, Macquarie Harbour. If this line was converted into a road, or even a pack-track, it would give access to a country known to be mineral bearing. At Mt. Jukes gold and silver have been got; at Flannigan's Flat, also, gold has been and is being obtained; and at Mt. Sorell, or its vicinity, limestone of good quality is known to exist. Vessels of ordinary draught of water can readily be moored in almost any part of Kelly's Basin, thus making it a suitable place for the terminus of a road.

The present way of approaching Flannigan's Flat is to go up the King River for seven or eight miles in a boat,—having to drag the same over fifteen or sixteen rapids: then, leaving the boat and climbing over a hill some fifteen hundred feet, rising it in a little over a mile, then dropping almost the same distance on the other side into the Garfield River, which is followed up to its junction with the Flannigan's Creek, and this, in its turn, is followed up to the "Flat." The "Track" is not more than seven miles long, but it is a very bad seven miles, and to get provisions and material on to the ground is certainly a herculean task.

To the new discoveries in the vicinity of Mt. Read and Mt. Tyndal a track is being selected by Mr. G. Meredith, and no doubt he will get the best that can be got.

A much-needed work, too, is a road from the Pieman, Waratah Road, near the Heazlewood, fourteen and a-half miles from Waratah, to the Castray River. It is an awkward place to get to; and all provisions, tools, &c. have to be carried to the New Castray G. M. Co's. ground on men's backs. This Company is going in for *bonâ fide* mining, and deserves some better means of communication. Silver-lead has been found in this locality, and some of the surface shows are very promising indeed. If a road were made to the Castray, a track could be continued from the end of the road to the north end of the Meredith Range. A tract of country, of which very little is at present known, would then become a good field for prospectors.

Names of persons possessing local knowledge.

The persons at Strahan who would no doubt give information respecting this part of the district, exclusive of the Government officials, are—Messrs. T. B. Moore, James Moore, F. O. Henry, and Gaffney and Harvey; at Zeehan, Messrs. James Adams and John Power, mining surveyor; at Heazlewood, Messrs. A. R. Browne, S. Hilder, E. P. Dwyer, and Jupp; at Waratah, Messrs. Goldsmith, A. W. Johnston, and T. W. Jones.

Progress of Settlement.

A great number of agricultural lots—over 30—have been applied for, and nearly all surveyed, in the vicinity of the Big Henty River, known as the Parish of Matong. At Strahan over 50 lots, chiefly 10 acres each, have been surveyed. Some of the applicants have begun scrubbing and clearing their ground, and in one instance a cottage has been built, and produce obtained from the ground of good quality, proving, at any rate, that some of the West Coast land is capable of bearing profitable crops.

The progress of mining has also been very great. The Heazlewood S.L.M. Company made a great discovery on their ground, which led to sections adjoining the property being taken up. The same thing occurred at the Washington S.M. Company's sections, and on the line of this lode a great number of sections were applied for, and some surveyed.

The Zeehan field has extended very much, and new finds made almost daily. The Big Henty has a discovery of a formation belonging to the coal measures; this has led to several sections being taken up over some of the lots taken up for agricultural purposes. On these sections work has been commenced in the way of prospecting and road making.

The Dundas field has extended to Mount Read, and a considerable area of country has been taken up in the neighbourhood of Mount Tyndal. The branch line from Zeehan Station site to Dundas is being pushed on with vigour. The line from Strahan to Zeehan is now available for traffic 21 miles from Strahan. The wet weather, which has been so continuous for a long period, has interfered very much with the progress of this very necessary work.

In conclusion, it may be stated that no district in Tasmania has progressed more than the West Coast during the last two years. The many discoveries that have been made on the Coast assures its success, and places it beyond question or doubt. Experts from all the enlightened parts of the world have visited the chief mining centres, and are all in accord as to the extent and richness of the mineral deposits they have seen here; all that is required to make it remunerative to capitalists, investors, and mine-owners is the completion of the Strahan-Zeehan Railway line and the re-opening of the entrance to Macquarie Harbour.

I have, &c.

DAVID JONES, *District Surveyor.*

The Surveyor-General.

Invermay, 1st January, 1891.

SIR,

I HAVE the honor to report as follows concerning the district under my charge for the past year.

Selection.—At the commencement of last year I had in hand 22 orders, and only 21 were added during the first four months, which made me think selection had ceased, or nearly so. When the withdrawn land in Parish of Shaw was thrown open, however, matters improved, as I have, since 1st May, received 76 instructions. It is a great pity this land was not thrown open or subdivided previously, as there would have been good competition for lots, though I expect now to find many of the orders there withdrawn after the first few surveys are effected, there not being sufficient land for all. Most of the selections during the year have been in small lots, two only being 320 acres; and still the number of orders received have not been up to the average. To improve selection I can only suggest a continuance of the plan tried during the year of sending a competent bushman to cut tracks into the forests to allow intending selectors to look about them. Mr. Wilson was sent by the Department track-cutting north of Mount Barrow, and he tells me the land is, as I predicted, from medium to good. On the south side of Mount Barrow I know land to be fair, but, like its northern slope, there are no roads. On the south slope, land would be selected for the timber alone if access were provided. This matter has been mentioned several times previously, and I would like to see something done towards opening it up. There has been very little selection in open parishes, for which the dulness at Lefroy, &c. is partially responsible.

Surveys.—Private troubles have caused me to lose a considerable amount of this year, and, besides that, I was unable to obtain assistance when required; also was employed on Beaconsfield railway. These matters combined have prevented a large area being surveyed, and leave me at the close of the year with 58 incomplete orders; but, with Mr. Miles' assistance, I hope soon to lessen these, especially as the rush is over, and only 14 of these have come in since 30th September, which shows it would indeed have been a dull year had I been steadily at work, and had land along Scottsdale Railway not been thrown open. Surveys effected are as follows:—

	Lots.	Acres.
Agricultural	35	1956
Gold	9	80
Mineral.....	4	560
Schools	1	1
Town.....	8	15

Mines.—The falling-off in selection is followed under this heading so far as gold is concerned, the chief work done being caused by a new discovery at Lefroy, which, it is to be hoped, will keep up present good accounts. In mineral lands the figures are, for 1890, 560 acres, and in 1889, 320 acres, showing the only increase (of 240 acres). So many prospectors are now away at the West Coast that this heading can hardly be expected to increase during 1891.

Roads.—This is an item that causes trouble both to surveyors and the office, owing to the officers of the Public Works Department making alterations. In one instance, on the St. Patrick's River, the inspector took one of my side corner pins on a boundary for the centre of road (though centre-line was run and both pegs were in) and scrubbed his road accordingly. In another, at Scottsdale, there were several alterations in lots fronting on a road, such deviations only being about half a chain. I am certain that in neither case was there the slightest cause to deviate. It might also occur that an inspector has decided to deviate, and tenders are called—a surveyor, not knowing his intention, proceeds with the survey of an adjoining lot, using his previous road-line—thus making a continuation of alterations necessary. It is to be regretted that this system prevails, as it is no encouragement to a surveyor to try his best, so far as laying out roads is concerned, for where there are old tracks he will follow them blindly without trying to improve. A surveyor may not be always on the best line, but his theodolite will give him more reliable information than the other's guesswork. There is no doubt that the system of laying out roads in pieces is a bad one, and that of laying out ahead of selection without previous inspection is worse. I should like to see land sold subject to a right of road through if required. This would be met by a great amount of opposition, like a railway, but I believe it would insure the best roads.

I have, &c.

The Surveyor-General, Survey Office, Hobart.

C. W. LORD, District Surveyor.

REPORT Survey District including parts of Glamorgan, Cornwall, and Dorset.

GEORGE C. SMITH, Surveyor.

In this district selection went on in 1890 at about the same rate as in the previous year. Surveys were ordered of about 70 lots, comprising an area of 5800 acres; of these lots, sixteen, containing about 1100 acres, were taken up under the 5th Sect. Waste Lands Act, 1889. Eleven of the latter are on the land lately thrown open between Fingal and Mathinna, and five in or near the Parish of Kay. It is too early yet to judge whether the object for which the Act of 1889 was passed will be attained.

Of the selections under the 24th Sect. Waste Lands Act, 1870, 20 lots, comprising an area of about 1200 acres, were applied for in the locality of which St. Mary's is the centre. On some of these homesteads will be established, but the larger number of selections are made by relatives of those who already own land, and these selections will be worked with the adjoining holdings. The selection in this vicinity exceeds that of 1889. Much of the land is of but poor quality, and would be of use only to those who have an interest in adjoining land, or who look for a living otherwise than from farming.

On the Upper George River the number of applications and area applied for are not so large as in 1889. Surveys were ordered of 12 lots, containing about 2400 acres, while six lots, 460 acres, were applied for nearer George's Bay. In all, eighteen lots, with an area of about 2800 acres, for which St. Helen's will be the outlet, have been taken up.

Early in 1890 four lots were applied for near Fingal, on the table land to the east, where a few selections had been previously made. There seems, however, no prospect of an extension of settlement in that direction. There is much land of the same quality as that taken up, but the climate, I fear, is unsuitable for almost any kind of crop. On the Evercreech Rivulet five small lots have been applied for. Here, with the exception of narrow strips along the Rivulet and in some of the neighbouring gullies, the land is very poor. Two or three small lots have been selected in Glamorgan, and the remaining few are wide apart and adjoining land already occupied by the selectors.

Crown Land suitable for Selection.

The only locality in this District where there is any considerable tract of land suitable and open for selection is that of the Upper George River, and until the roads now in course of construction are completed the country is very difficult of access. The soil is good, very heavily timbered, and covered with dense scrub,—is, in fact, of the usual character of good agricultural land in this Colony.

Between Mr. G. D. Brown's farm on the North George and Thomas' Plain there is a large area of good land on which tin does not exist in such quantity or under such conditions as to offer any probability of its being profitably worked; there is therefore no reason why it should be reserved from settlement.

There are other less extensive tracts of good land in the District, as, for instance, on the heads of the Scamander River (of which St. Helen's would be the outlet), and on Dan's Rivulet; it is, however, unnecessary to refer to these here. They are not likely to be thrown open for selection for a time at least, as the mining interest might be interfered with by settlement.

About St. Mary's there is very little good land unalienated; and in the locality of the Upper George alone, in this District, can intending settlers be advised to look for farms.

Roads required.

A road which is now being made to the Falls on the South George ought to be continued to Robertson's selections; and that in course of construction on the south side of the North George ought to be extended to Inglis's selection.

A road from Brown's farm, on the North George to Thomas' Plain, would open up the tract of good land to which I have referred above; this road, in conjunction with that which has been proposed, and which will no doubt at some time be made, namely, from Goshen to the junction of the North and South George, would afford a shorter, and probably better route, between St. Helen's and Weldborough than that now in use. In the rest of the District there is no special need of road extension beyond what is being carried on.

Tracks.

A track should be cut from Robertson's selections to Clayton's, on the Evercreech Rivulet. A track is also required from Meaburn's selection to join Cotton's Track (from George River to Alberton) on the large plain, a distance estimated to be about six and a half miles in a north-westerly direction. These tracks would be of great use to intending settlers, by enabling them to inspect the land available for settlement. At present it is a work of no light labour to get beyond the limits of the country already selected.

Names of Persons possessing local knowledge.

I would suggest the names of Mr. B. H. Wright, Commercial Bank, St. Helens; Mr. A. Johnston, Gould's Country; Messrs. Jas. Irwin, G. D. Brown, and R. Terry, George's River, as those of persons willing and able to give information and advice to intending settlers who may wish to inspect the Crown lands in the neighbourhood of George's River. At St. Mary's, Mr. J. Morey would, I am sure, afford information as to land in that locality.

Progress of Settlement.

There has been little progress in the past year. About St. Mary's the land is being gradually improved, and a few new homesteads established; but, as I have explained, no great increase of settlement can be expected there. A large proportion of the land—even of that selected many years ago—is scarcely worth improving, or even capable of improvement.

On the Upper George, where alone in this district considerable extension of agricultural settlement may be looked for in the future, there was little progress in 1890. All the lots surveyed last year, with only two exceptions, are still unoccupied. The two homesteads established, and about 100 acres cleared on a lot south of North George, comprise all the progress made towards settlement on the lots selected recently. South of the Falls there is only one lot occupied. When the roads now being made are finished, especially if they are extended as I recommend, settlement and improvement will doubtless go on more quickly. The lots on the table land east of Fingal are still unoccupied, although some small improvements have been made. In other parts of the district there has been practically no increase of agricultural settlement for years past.

GEORGE C. SMITH.

30th April, 1891.

The Surveyor-General, Survey Office.

ANNUAL Report for the Year ending 31st December, 1890.

SIR,

I HAVE the honor to forward herewith my progress Report for the year ending 31st December, 1890.

During the year 96 agricultural selections have been surveyed, comprising an area of 10,000 acres; 29½ miles of roads and connection lines through the same; together with 57 lots for auction sale, containing an area of 119 acres, and 4 mineral sections.

Parishes of Mowbray and Gibson.—Considerable selection has taken place in these Parishes, and the land is now under survey by Mr. Surveyor Frodsham. Until the completion of these surveys it is impossible to estimate the extent of land which is still available for selection. Generally the land in this part is very hilly, with large swamps between the high land.

About 3½ miles of the road from Smithton to Christmas Hills has been grubbed and cleared, which, together with the steel rail tramway line running to the foot of the hills, gives facility for transport of produce, &c. from that part.

From Scotch Town a track has been opened in a southerly direction for about 8 miles. From Irish Town towards the Arthur River for 12 miles another track has been cleared, and from the same point, in a south-easterly direction towards the south road for 8 miles, a third track has been opened. These three tracks lead through the recently applied for sections in the neighbourhood, and afford every facility for intending selectors to see the land in that district. Messrs. J. S. Lee, H. M. R. Carnac, and Wm. Poke would be able to give all information to strangers, the last-named gentleman being intimately acquainted with the Crown lands at the back.

Parishes of Ford and Medwin.—Probably from 1000 to 1500 acres of good land is still available for selection in these Parishes. Several sections have been recently surveyed in the neighbourhood of the South Road, and a considerable area of the best of the land applied for by the Irish Town selectors is in this neighbourhood, and will find its outlet by this road, being nearer to it than to any available road.

About 8½ miles of the South Road is metalled, and the road running west from it at the junction near J. L. Waters' section is grubbed and cleared three miles further to Breheney's section, and might well be opened still further to join the proposed deviation through Withnall's. The road leading east is grubbed and cleared for about two miles. The road from the South Road westward through Haywood's and Easton's sections might also be opened with advantage to the selectors, more land being available in that part. The Main South Road should be opened for another three or four miles.

About 60 chains of the road from Stanley to Smithton are metalled, and considerable improvement might advantageously be made on this road. The Smithton and Irish Town Road is metalled about 4¾ miles, but further improvement is required; and on the Smithton Township about 10 chains of metalling has been done. Messrs. J. L. Waters, Jonathan House, and Henry Boys could supply information to intending selectors.

Parishes of Emmett and Anderson.—Selection in these Parishes has been very slow, although a considerable quantity of good land is still available south of Black River, on the Brickmakers' Bay track. The road to the land runs for about 3½ miles across and is unformed. About three miles are grubbed and cleared through the forest, but the road is impassable in winter and unsafe even in summer for horse traffic. From the end of the cleared road there is an old track leading southward, but it is now useless, being covered with fallen timber. Until the road is attended to and the track cleared, it is hopeless to expect any further selection or settlement in this part. About 12 miles of the main road from Stanley to Detention is metalled, and five miles is unformed. The Sandy Banks portion requires attention. Messrs. A. Ainslie, of Black River, I. A. Peers, and H. W. Wells are intimately acquainted with the country.

Parishes of Flowerdale and Dallas.—Selections have been taken up in these parishes, but the available good land is now so far from the main road that it is difficult of access. Probably 1500 or 2000 acres exist south of the Detention River and between Sisters Creek and Flowerdale. At Rocky Cape the road leading south from E. Boys' selection is grubbed and cleared for three or four miles, and that through E. D. Atkinson's for about 1½ miles. The road from Sisters Hills to Flowerdale has been opened for some distance at each end, but might be further extended, and the road south through Park and Shevenan might be opened further with advantage through Kinch and King to join the road from Sisters Hills to Flowerdale. Messrs. Josh. Harman and R. Dallas are well acquainted with the Crown lands in the vicinity.

Parish of Calder.—Several selections have been taken up in this district, and there is still some good land unselected near the Calder River, but generally the land is broken by deep gullies. Some metalling and forming might with advantage be done on the Calder road, and the road opened to the junction of the Calder and Inglis Rivers. Messrs T. Harris and John Howes are intimately acquainted with the Crown lands in that locality.

Parish of Yolla.—There is still a considerable area of moderately good land for selection in this parish on the slope of the Campbell Range, and at the foot of the hills. The Moore's Plains road has been grubbed and cleared for twelve or fourteen miles, and when some forming and metalling has been done the selectors will be able to reach their land, and further improvements and more selections may be expected. It will be desirable before long to open up the Moore's Plain road as far as its junction with the Waratah road.

Parish of Lewis.—Several selections have been lately taken up in this parish, and most of the land has been applied for. The Cam road has been opened about eight miles, and requires extending another mile or two, and some side cuttings and forming done on the already cleared part. Some of the by-roads also

require opening to enable the selectors to do anything with their land. A road should be opened through A. C. Hall's 53 acre selection to connect the Cam and Bischoff roads. Messrs A. C. Hall and Gale could give information to intending selectors.

Parishes of Oonah and Takoné.—A small area of land has been selected in these parishes, but the distance from the coast, and difficulty of access, has retarded the progress of selection. The Bischoff road passes through these parishes, and considerable improvements are now being made on it, so there is a prospect of development in that part before long. Messrs Duniam and A. Muir are well acquainted with the Crown lands.

Parishes of Stowport and Natone.—Roads require opening to the already selected land, and there is a small area of moderately good land still available. Settlement continues to progress favorably, although rather slowly, owing to the heavy nature of the timber, which takes years to clear. Much improvement has been made on the selected land by scrubbing and clearing, and the area under cultivation steadily increases, and every part of the district exhibits encouraging signs of development. The principal products of the district at the present time are potatoes, grain, grass seed, timber; and cattle are bred and supplied to the neighbouring mining districts.

This district is well provided with schools, there being ten between Burnie and the West Coast.

When better means of transport and export are afforded, the district will undoubtedly be one of the most populous and thriving in the Colony; and the western line of railway from Ulverstone to Wynyard, of which the survey is completed, will give an immense impetus to the improvement of the locality.

I have, &c.

FREDK. E. WINDSOR.

April 30th, 1891.

Surveyor-General, Survey Office, Hobart.

Moorina, July 11th, 1891.

SIR,

IN furnishing you with my Annual Report, I would wish to draw your attention to the fact that this district, being essentially a mining one, progress of settlement is very slow, and the distance from any market, and costly carriage of produce, cause those inclined to settle upon the lands to turn their attention to more favoured districts.

During the past year only three lots of 100 acres each have been applied for under the Waste Lands Act, they being in the Parish of Branhholm, where the best land in the district exists, and have been applied for by persons whose calling compels them to reside here.

In mining there has been a steady progress, and the land taken up for tin-mining purposes, though small in comparison with former years when high prices were obtained for the metal, still shows that the mineral is being sought for. Some prospecting is being done, and land taken up that will be commanded by water from the Mount Cameron Water-race. As this race does not appear to be the unqualified success that was predicted for it, I think attention should be drawn to the fact that there are some thousands of acres on the north and east of its course that are at present totally unfit for any purposes except pastoral, and even then will not carry more than one sheep to ten acres. This land is all very lightly timbered, and could be brought under plough for a merely nominal sum per acre, much of it being totally devoid of timber.

The land referred to is below the level of the Government race, the water from which could be utilised for irrigation purposes, and, I believe, would meet with ready sale provided it could be demonstrated that, by means of irrigation, drainage, and manure, it would become eventually profitable. Examples can be seen of the productiveness of this kind of soil if properly treated in the gardens and small paddocks in and around Gladstone, where the soil is of precisely the same description, and where they (the owners) cannot avail themselves of the benefits arising from irrigation.

If settlement could be induced on this land, and water supplied from the Government race for the purposes of irrigation, a national undertaking, that now appears to be anything but a pronounced success, would then have an assured future.

If within my province, I would here suggest that to demonstrate to the public the value of this land if properly treated, that experiments be instituted on a small scale either under direct Government supervision or by a system of bonuses, as obtains elsewhere. This suggestion is merely striking a key-note, and if the subject were taken up and thoroughly threshed out by others more competent than myself, good would accrue from it.

Between the Race and the Mussel Roe River there are many spots with an eastern aspect, sheltered and warm, that would be admirably adapted for orchard sites, and the climate of this district appears to be eminently suitable for apple-growing.

The requirements of this district in the matter of roads is, as occurs in most newly settled districts, manifold. A road leading from Gladstone to selections in the Parish of Truganini and on to the new bridge over the Ringarooma River near Boobyalla has lately been marked out and partly cleared. Were the clearing of this road completed, and a few chains here and there formed where it is on a sideling country, it would be a great boon to settlers in that neighbourhood.

It would be also advantageous to have a road cleared, for the passage of stock, &c., from a point at about the 15-mile mark on the road leading from Scottsdale to Gladstone to the direct road from Branxholm to Moorina, at about Hardman's selections. This would also give immediate access to prospectors, explorers, and others to the land around and about Mount Horror.

I would also suggest that the road from and through Hardman's selections to the junction with the Boobyalla road at David's Creek be cleared and formed. This road leads through several selections taken up last year, and something like £500 or £600 will be available under the Waste Lands Act; but I would like to suggest that before any money be expended on the present route that it be thoroughly examined, as a much better route can be obtained with easy gradients, whereas the present route is exceedingly steep in places.

There appears, I am happy to say, to be a revival of the gold mining industry in this district, and lately applications have been made for leases in four localities—namely, Lyndhurst, Gladstone, Mussel Roe, and north of Branxholm, on what is known as Pearce's Reef; and as it is the intention of the various parties to have these reefs tested, it may possibly lead to some valuable finds.

I have no doubt that Messrs. George Green, on the Mussel Roe River, and George Groves, at Truganini, would give intending selectors any information in their power.

I have, &c.

E. GLOUCESTER WALPOLE, *District Surveyor.*

The Surveyor-General, Survey Office, Hobart.