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MADRAS RECORD OFFICE

GOVERNMENT OF MADRAS

Revenue DEPARTMENT

G.O. No.
B.P. No.

1380

Press
Mis.

Dated

30. 10. 1874 196 ..

Not to be folded or roughly handled

Read the following papers :—

No. 323. From Captain C. WALKER, Officiating Inspector of Forests, to C. G. MASTER, Esq., Acting Secretary to Government, Revenue Department, dated Ootacamund, 24th September 1874, No. 324.

I HAVE the honor to report that I have recently visited the Tinnevely forests and fuel-reserves. I entered the district at the extreme north, crossing the hills from the Cumbum Valley in Madura *via* Vursenad, and proceeded along the foot of the line of ghauts to the Calcad forests in the south, returning by the line of road and railway from Palamecottah to Madura. I was accompanied by Mr. Hayne, the forest officer, throughout my tour, and spent some days with the Collector, who was unfortunately unable to meet me in the forests, conferring on future operations and arrangements.

2. The inhabitants of the large and important village of Wartrap complain bitterly of the recent settlement of the Shaptur Zemindar's claim by the Collector of Madura, and state that the Zemindar is now excluding them from all rights or privileges of pasturage, fire-wood, *etc.*, which they have formerly enjoyed free. It appears that they were never called upon to give evidence in the case referred to in G. O., No. 810, dated 21st May 1872, although they maintain that a portion of the forest at least is within their village boundaries, and that they can adduce proof as to its never having formed part of the Zemindari.

Mr. Hayne, to whom I referred them, informs me that, although he was 2nd defendant in the suit, no notice was ever served upon him, and he was in ignorance of the inquiry until he was informed that it was settled in the Zemindar's favor, and that the claim now reaches far beyond the limit of six miles mentioned in the original plaint. The Government have doubtless rightly censured the action of the Forest Department in trespassing in this forest in which the rights of

Government were doubtful;* but it is, I think,

* *Vide* G. O., No. 467, dated 16th March 1872.

matter for regret that the department was not

represented when the case was inquired into by the Collector of Madura. At present the settlement exists only on paper as the boundaries have never been marked out. I think it very necessary that they should be, and if they encroach on the Tinnevely District a further inquiry would appear necessary, as the Madura Collector had no jurisdiction. The Wartrap villagers would then have a chance of being heard, meanwhile their communal rights should not, I think, be interfered with by the Zemindar or his Agents.

3. Mr. Puckle is of opinion that our special establishments may be withdrawn from the Streevilaputoor Taluq for the present, as the revenue is small, and the timber-yielding tracts at present almost inaccessible. He proposes that the Tahsildar and Deputy-Tahsildar should issue the necessary permits on receipt of seigniorage, aided by two or three forest peons to check the quantities brought out, and that the Deputy-Conservator and forester should occasionally visit the taluq. This might be tried; but I am not sanguine of the plan succeeding as the Tahsildars have already more than enough work of their own to attend to. Extensive tracts of cardamoms are stated to exist in some of the ravines, which are eagerly sought after on lease, and above Rajahpolliem there is a considerable extent of forest though rather inaccessible. I should much prefer endeavoring to lease the valuable forests of the Shitur and Sivagherry Zemindars which adjoin the taluq to the south, and carefully conserve and work the whole, as I cannot agree with Mr. Puckle in his view that the northern part of the district forests may be neglected whilst the south is rigidly conserved. The fact of there being much less forest in the north seems to me the very reason why we should endeavor to keep and increase it, and there are other rivers besides the Tambrapurney to be thought of, besides the large local demand for fire-wood and building timber throughout the north of the district. I believe the Sivagherry Zemindar is anxious to lease out his forests for Coffee planting and he would doubtless be equally glad to lease them for conservancy; and I imagine Shitur consent, though Mr. Puckle informs me he has hitherto refused any terms. A description of these forests and their approximate annual value is in my report recorded with G. O., No. 981, dated 3rd June 1871.

4. The timber-yard at Vasadavenellur (Sunkernainacovil Taluq), the present headquarters of the forester, contains a quantity of timber which does not command a ready sale owing to the scantlings not being suited to the demand and the deterioration of the loss from exposure to the sun. They should, I think, be sold off by auction, and if the timber-yard is kept up pandals and a yard-keeper's office will be required. It is, however, proposed to try periodical auction sales, as the natives are said to prefer green timber. Even then the pandals will probably be found necessary, and an office for the forester, with a room available for the Deputy-Conservator on inspection, should be built as soon as possible.

5. Mr. Puckle has recently been busy in the neighborhood of Courtalum and at Paupanassum in running a boundary and inspection-path and raising a fence of thorns to divide off the village jungles or tracts for free felling from the forest above. The theory on which this is undertaken must recommend itself to all, viz., to give to each village or group of villages adjoining the hills a sufficient area for grazing, fire-wood supply, etc., free of all charge, and reserve the forests above for climatic considerations and the supply of timber to the district generally both now and in the future. Apart, however, from the unfortunate illegality of the measure in the absence of any law prescribing the course to be adopted for regulating and settling forest rights and constituting State and communal reserves, there are several points connected with Mr. Puckle's arrangements which, I think, deserving of remark.

6. I should have preferred if the extent to be allotted to each village or group had been regulated by some written rules based upon the number of acres cultivated, number of inhabitants, or some such data to be carefully compiled beforehand, instead of which the allotment has been, I fear, more or less at haphazard; and whilst, in my opinion, some of the Tencassy villages have got a very scant allowance, those of Vickrasingapuram (Paupanassum) appear likely, by dint of much importunity, to get more than their share. It is true that they have a large number of cattle; but I have long held the opinion, which is shared by others, and is, I think, gaining ground each day, that it is not expedient to encourage the upkeep of a number of worthless cattle by granting facilities for free grazing. A great proportion are utterly worthless, except for their manure which is lost by their being driven into the hill-forests where they and their drivers do much damage. I think no effort should be spared to induce the Indian cultivator to keep only as many cattle as he really requires for ploughing, manure, etc., to improve their quality, and secure the full benefit of their work and manure by keeping them at home whenever practicable, or penning them within comparatively restricted areas in the communal forests. Again, I am not sure that the grant of a lower or outer belt along the whole line of forest will answer; it is certainly most convenient, and the hedge and path serves at once for inspection purposes as a barrier against entry into the reserved forests and as a fire-trace; but what I fear is that this belt may be gradually cleared and then another demanded and granted, and so on gradually baring the slopes and encroaching on the total forest area; to guard against this I would recommend that the whole belt, which it is intended eventually should stretch from north to south of the district, should be divided into blocks, two or more being assigned to each village or group of villages, half of which only should be open at one time. I would also reserve a certain number of trees in each as standards which should be marked and numbered, and would strictly limit felling to the inhabitants of the respective villages for their own use and not for sale, breaches of which regulations should render the village liable to certain penalties, such as forfeiture of their rights for a time, payment of a fine to the jungle conservancy, etc.

7. To carry out this, however, we must have an Act and Rules framed in accordance with its provisions, and also provide for the supply of fire-wood, jungle-wood, etc., to the larger villages and towns to which those necessities are removed in sale. At present, fire-wood, notwithstanding the recent reduction in seigniorage, is much dearer in Umbasamudrum, Shermadavi and Palamangudi than it was three years ago, the price being from 3 to 6 Rupees per cart-load, and mainly be procured from the communal jungles of Paupanassum and Aladyoor which will sooner or later disappear. Of course, what we would like to see would be the villagers themselves conserving their jungle and preventing any

one else cutting in it; but we are a long way from that in India, especially so long as they think they can get a new piece by asking for it; but the paid kavalgars and village-officers should be held strictly responsible that no unauthorised parties fell or remove wood: otherwise we shall have to revive the issue of free passes, the necessity of which it was hoped the laying off of the free jungles would obviate.

8. I would at once select tracts for the supply of fire-wood, charcoal, etc., for sale, either through the direct agency of the department, leasing out a tract or tracts by the year, or on payment of seigniorage, the receipts being credited either to Imperial or Local Forest Revenue as deemed advisable, and expended, to a great extent, in the upkeep and reproduction of the supply. I do not like the license and ticket system any more than Mr. Puckle, and hope it may be possible to do without it, at least as a direct Government collection, by selling the right to supply from such and such tracts year by year; but it must not be forgotten that to do any good in the way of planting or reproduction requires funds, and that fire-wood, etc., taken for sale to the large towns is a legitimate source of revenue.

These remarks apply equally to all the taluqs (five) which adjoin the ghaut forests; a similar system and method of management should, I think, be maintained in each.

9. I was sorry to find a distinction still made with regard to some of the forests and jungles being under the Forest Department or under the Tahsildar. Mr. Puckle explained to me partially the reason for this which was of a temporary nature, and I hope it may be possible ere long to place all under the control of the forest officer as the Collector's Assistant, whether the immediate charge is in the hands of the Tahsildars, or necessitates the employment of a forester or sub-forester who may in like manner, whenever thought advisable, work under the control of the Taluq Tahsildars.

The mere crediting of revenue to Imperial or Local presents no difficulties; in fact, there has hitherto been little or no local revenue in these taluqs since the department took charge of the forests.

10. With regard to the fine forests above ghaut, especially those above Paupanassum, Alwar-koochery, etc., I think valuable time is being lost by the present arrangements under which there is not only no felling, even of back going trees, but no attempt at improving the forest, filling up blank spaces, or even arriving at conclusions as to what we have got and how much we can fairly cut each year. This may be conservancy, but it is certainly not forestry. I had understood that Mr. Puckle was strongly opposed to all felling as likely to affect the water-supply of the Tambrapourney and its affluents; but on speaking to him on the subject I ascertained that he had no objections to, and, in fact, favored, any well-matured scheme for working the forests on a rational system, whilst he strongly objected to throwing them open to license-holders or contractors to fell at will. On these points we all quite agreed, and I fully concur in his anxiety with regard to forest denudation affecting the constant and steady supply of water and resulting in disastrous floods at one season and cessation of water-supply at another. This is the more to be guarded against as the enormous annual sales and clearing of lands on the Travancore side for Coffee planting may sooner or later affect the climate and rain-fall on our side of the mountains. But so long as we fell well within our yield and remove mature timber-trees only, and those of the inferior descriptions which choke the growth of the more valuable sorts, there can be no danger, especially if we encourage natural reproduction and the "reboisement" of denuded areas by simple and inexpensive, but at the same time effective, measures. Some of the tracts in the Surveyar Valley and in the rich forests known as the upper and lower Oolaroo and Putunkadu offer peculiar facilities for the commencement of regular forest operations on a small scale to be increased gradually in accordance with a regular pre-determined plan of operations. It is unnecessary to enter into details here; I thoroughly explained the matter to Mr. Hayne and talked it over with Mr. Puckle, and trust a commencement may be made next year if the proposal meets with the approval of Government and the Board. The steps are doubtless to secure a settlement of the Kutlay Mulla claim which has extended its claims since I was in charge of the range, and to mature an effective and economical system of planting and removing our timber from the

forest by means of roads, steps, etc. There would be ample employment for an experienced European forester, and adequate establishments above ghaut for the working, conservation, and improvement of these fine forests, and the project will not be lost sight of in revising the forest establishments of the district.

11. In the southern taluq of Nangunary periodical auction sales are to be tried in lieu of daily sales at fixed rates from the timber-yard. This may prove more satisfactory and remunerative; but what is most required is improvement in the converting the timber and facilitating its removal to the plains without the enormous waste and expense now incurred.

I do not think that the Teak belt at foot of the hills here will ever come to anything, and Mr. Hayne proposes to treat several portions on different systems to ascertain the results and favor the growth of Vengay (*Pterocarpus marsupium*), seedlings of which are frequent. This should be done if it meets the Collector's approval, and the results carefully recorded and compared. There is a boundary dispute with the representatives of a temple or religious endowment which causes great inconvenience and constant disputes betwixt the Government villagers and the representatives of the temple. Mr. Puckle informs me that the matter will be decided on the settlement of the land-revenue, but unless that is likely to take place at once I think some order as to possession or enjoyment should issue, or Mr. Hayne might be empowered to inquire into and settle the matter under the Act, which leaves either party the right of appeal to the Court.

12. From Palamcottah I inspected the railway fuel-reserves consisting chiefly of tank-beds more or less covered with Babul which have been taken up and conserved. On the whole, the experiment has succeeded well; but I think that increased endeavors are necessary to supplement the growth by dibbling in seed, excluding goats, etc.

In some tanks the new growth is very good, but in others there is little to show, and the old trees are, in many cases, growing beyond the age when they will grow freely from the stool when cut. I discussed the condition and future management of these fuel-reserves very fully with Mr. Puckle whilst riding out with him to inspect the channel and tank-banks about to be transferred to Mr. Hayne for conservancy. Complaints had been made that the growth of trees in the waterspread of the tanks tended to silt them up and deteriorate the quality of the water; but Mr. Puckle agrees with me that neither of those assertions are proved; in fact, the balance tends in the opposite direction as I found in 1870, when I inquired into the matter very carefully on the spot. The real objection on the part of villagers to any attempts to increase the yield of fire-wood from these tanks or any waste lands is doubtless that it curtails their grazing grounds, and that waste land or trees which were considered as of little value if enjoyed by the community at large or alienated to an individual, acquire a greatly enhanced and even fictitious value in the eyes of the people when it is seen that Government are desirous of reserving and improving them. This is but natural and is found to be the case in all countries. Mr. Puckle considers that the comparatively small areas we have reserved do not trench injuriously on the ryots' pasture grounds; but we concur that, in order to carry out operations to the best advantage, it is imperative to exclude direct foreign agency in the shape of a European Overseer and establishments, and Mr. Taylor, who has recently taken charge under Mr. Hayne, has therefore been instructed to work entirely through the Tahsildar and village-officers who will be placed in charge of the reserves with an adequate allowance for Kavalgars, etc. By this means, which I advocated from the outset when proposing and inaugurating the faguation of these tank-bed plantations, any pressure on the people will, it is confidently believed, be reduced to a minimum, and any slight curtailment of pasture, etc., be more than compensated by an increased field for labor at remunerative rates and grant of the thinnings, loppings, etc., not requiring fencing or the railway supply, free to the inhabitants of adjoining villages.

The Overseer and forest maistries will be concentrating their attention as much as possible the felling and supply of the wood to the railway question of railway fuel-supply will shortly, meanwhile, I am glad to be able to state

ple work in supervising technical operations, certain areas or circles, and superintending its reproduction block by block. The whole is being considered by the Board and laid before Government; and we are in a position to supply them with

wood without denuding the country and at rates which compare favorably with those of coal, but the demand must be fixed and permanent to enable us to carry out the necessary measures for reproduction on a sufficiently extensive scale.

13. General Remarks.—The Tinnevely forest establishments require a thorough revision, and Mr. Puckle agrees that when the railway is opened it will be better to have the officers' headquarters at Tinnevely itself where he can transact office-work in the Collector's catcherry, and be in constant communication with him. I would then divide the district into three forest ranges, viz., the north and south ghaut forests, and the centre or railway fuel-reserve charge, each under an Overseer with the necessary establishments.

The timber requirements of a rich and prosperous district like Tinnevely must be very great, and I was somewhat surprised to see it stated in a recent report, on the authority of the Collector that the scantlings of the Umbasamudrum bridge, a few second-hand logs, had "glutted the market." The district requirements are met largely from Travancore, which State has a depot at Shencotta to the north of Tencassy Taluq, and a certain amount is also procured from the Zemin-daris. The Department of Public Works is, I believe, mainly supplied by sea-borne Teak from Burmah; but there no doubt remains a large and increasing demand which was formerly met from the State forests before they were placed under conservancy and subsequently under the license and voucher system. I believe that timber must even now be removed from the southern forests clandestinely, and certainly fire-wood is in considerable quantities.

I have no wish to force a forest revenue, but I am convinced that that of Tinnevely from timber, fire-wood, and minor forest-products should not fall short of Rs. 50,000 without including the profit on railway fuel-supply. This would leave us enough funds to maintain adequate establishments and really conserve and improve the forests, whilst working out the ripe timber to advantage; merely to close them rigidly, even if we could maintain such a blockade, is to fold up one's talent in a napkin.

The first step here as elsewhere is to define and settle the rights and privileges of the villagers under the authority of an Act construing their claims most liberally and arranging that all those entitled to timber, fire-wood, grazing, etc., free of charge, should have it with the least possible restrictions compatible with its preservation for future generations, and then let us work the State forests systematically and to the best advantage. We should then be making real progress, whereas at present, I must say, I think, we are not only acting illegally, but doing little or no real good to the forests, whilst we have recently sacrificed much legitimate revenue from them. I have communicated my suggestions in a memorandum to the Collector for such notice as he may think fit.

No. 324. From Captain C. WALKER, Offg. Inspector of Forests, to C. G. MASTER, Esq., Acting Secretary to Government, Revenue Department, dated Ootacamund, 24th September 1874, No. 325.

In continuation of my Inspection Report on the Tinnevely forests, I have the honor to forward copy of a report just received from the Collector showing the beneficial influence of excluding fire from the scrub and open grasslands of the ghats.

2. I consider the results ascertained by Mr. Puckle's experiment most interesting and instructive, and fully concur in his views regarding the great importance of protecting the hill-sides from fire and damage by cattle, goats, etc.

3. The data given prove conclusively the benefit which has resulted by the exclusion of fire, even for a comparatively short period; and I am convinced that we need only persevere and carry out the system under the authority of a future enactment to reclothe the hill-sides with the better descriptions of timber-trees now found in comparatively inaccessible localities.

4. The extension of the system to the paths acting, at the same time, as fire-traces recommends itself on every ground; but I do not see any further action in the shape of restric-

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tions, however advisable, until we can act legally, and the action of one Collector in constituting so-called reserves may not be liable to be upset by the next or by the Civil Courts.

ENCLOSURE No. 1.

From R. K. PUOKLE, Esq., Collector of Tinnevely, to the Inspector of Forests, Ootacamund, dated Courtalum, 11th September 1874, No. 792.

I HAVE the honor to forward, for your information, the results of two experiments made to ascertain what we have growing in the scrub-jungle and grass-lands on the hillside near Courtalum.

2. The localities selected have been protected from fire and the ravages of wood-cutters and cattle for two and five years, respectively; both lie low down on the slope immediately above the fence that bounds the village grazing grounds, and both are fair average specimens of the scrub and grass-lands of the lower slopes. I measured off an acre or a square of seventy yards each way in either case, and found that in the scrub-jungle we have 260 and in the grass-land 548 seedlings of timber-trees per acre as under:—

Scrub.		Grass.	
Ponpadirei	11	Tekku (Teak)	1
Todakalti (Blackwood)	9	Vengai	49
Kurukuvagei	23	Todakatti (Blackwood)	31
Vakkali	41	Black marudu	105
Karumarudi	21	Ponpadirei	133
Pana	25	Vakkali	125
Tandappalie	9	Ayama	57
Kulakotta tekku	5	Vaimarai	17
Helli	17	Madama	12
Vagei	36	Pullavarei	15
Manjanatti	5	Tandappalei	2
Manjakadamba	3	Veppalay	1
Irumbudi	23		
Vakkanatti	11	Total ..	548
Tettamaram	3		
Ayama	4		
Mudama	1		
Sarakkonrei	2		
Vidattalei	5		
Tanjikkoimaram	1		
Vusuvusukkoimaram	2		
Kanjuruimaram	3		
Total ..	260		

3. The whole of these will be destroyed sh two years, and as we have 10,000 or 15,000 appreciate the extent of the damage that mar For, independently of the great advant our streams and averting disastrous flood forest, as it will be no doubt if protected for will be worth at least one Rupee in a few y acre, we have in a very small compass a pr wantonly damaged and effectually kept bac outlay of a few hundred Rupees on conser

fire pass over the hillside during the next similarly circumstanced you will be able to by the hill fires of a single season. district generally of protecting the heads ting the hillside once more clothed with en years more, each seedling now growing taking the low average of 250 trees to the h twenty-five lakhs of Rupees, till lately ling any return for want of the annual

Proceedings of the Madras Government, Revenue Department,
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4. In the budget for 1875-76 a small establishment is provided for protecting the hills from fire, and, as a valuable property may be saved to the State and the people by prompt measures being taken to at once extinguish any fire that may occur, it seems to me very advantageous to extend the system of forest-paths dividing the reserved forest from the village grazing grounds, not only to allow watchmen patrolling the skirt of the property to be preserved but to afford ready access to points where a fire can be cut off or extinguished.

No. 324A.

Minute by the Hon. W. ROBINSON, C.S.I.

I AM not altogether satisfied with this draft. The Inspector's Report discloses much action of an arbitrary character by the Collector, mixed up with doubtful theories about conservancy of water, and prevention of floods. These measures have been taken without even the orders or sanction of Government, and have no justification in law.

2. Again all tank-beds—the most valued grazing grounds of the villagers—are being foreclosed for State railway purposes, and of this naturally and widely unpopular measure the Government has only become aware by the Inspector's Report. The Collector has been silent.

3. I cannot help looking with much apprehension on the Inspector's sentiments as laid before us in paragraph 6. He would starve out a number of village-cattle on some theory of his own—unmindful that dairy produce is an important branch of agricultural industry in this country—and force new agricultural operations by confiscation. I think that these views should call forth the marked disapprobation of Government. I have no sympathy with this quasi-energy at the cost of real injustice, and prefer the contentment and good will of our people.

22nd October 1874.

(Signed) W. ROBINSON.

No. 325.

ORDER THEREON, 30th October 1874, No. 1,380.

Forests, No. 23.

COMMUNICATED to the Board of Revenue.

2. From the tenor of his remarks regarding the Saptur Zemindar's claims, it would appear that the Acting Inspector of Forests has overlooked the papers noted in the margin, copies of which were communicated to his Office.

G. O., 21st May 1872, No. 810.
" 10th June 1873, " 614.
" 27th Oct. 1873, " 1,157.

3. From the inquiry held by Mr. Symonds and the late Deputy-Collector Devasikamoney Pillai, it was clearly established that different Zemindars had been in undisputed possession of these forests for more than sixty years, and the admission, therefore, by the Government that such was the case can in no way have altered the position of the villagers of Wattrap, on which, however, the Board should instruct the Collector to report. The determination of the boundaries is a matter that should engage the early attention of the Board.

4. From his remarks in paragraph it would appear that the Acting Inspector was unaware that the Government have already* decided in the negative the

question raised as to the necessity of their acquiring the northern forests.

5. The Collector of Tinnevely should be called upon to explain his system of forest management and arrangements for fencing off village jungles.

6. The progress of the railway is satisfactory, but care must be taken to deal as tenderly as possible with the rights and privileges of the people which the formation of these reserves seem to curtail.

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30th October 1874.

7. The redistribution of the forest ranges is a subject that should be again brought forward on the completion of the line of rail.

(Signed) C. G. MASTER,
Acting Secretary to Government.

Encl. F. R. Bantleman.

14. 11. 14.

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Original
Sob. of 1874 Madras.
REVENUE.

THE BOARD OF REVENUE.

So, So, So.

Date October 30th.

G. O. 30th October 1874 No.

Forest and Railways, Thiruvallur District.
—Communicating to Revenue Board Captain
Walker's Memoirs on the subject of the
instruct the Collector to report on the position of
the villages of Welling with regard to the forests;
directing the early determination of the bound-
aries; requesting that the Collector be called on
to explain his system of forest management and
arrangements for apportioning of village jungles;
and directing that the question of redistributing
the ranges be again brought forward on the com-
pletion of the line of rail.

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2. The inhabitants of the large and important village of Wartrap complain bitterly of the recent settlement of the Shaptur Zemindar's claim by the Collector of Madura, and state that the Zemindar is now excluding them from all rights or privileges of pasturage, fire-wood, *etc.*, which they have formerly enjoyed free. It appears that they were never called upon to give evidence in the case referred to in G. O., No. 810, dated 21st May 1872, although they maintain that a portion of the forest at least is within their village boundaries, and that they can adduce proof as to its never having formed part of the Zemindari.

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Government were doubtful;* but it is, I think, matter for regret that the department was not represented when the case was inquired into by the Collector of Madura. At present the settlement exists only on paper as the boundaries have never been marked out. I think it very necessary that they should be, and if they encroach on the Tinnevely District a further inquiry would appear necessary, as the Madura Collector had no jurisdiction. The Wartrap villagers would then have a chance of being heard, meanwhile their communal rights should not, I think, be interfered with by the Zemindar or his Agents.

3. Mr. Puckle is of opinion that our special establishments may be withdrawn from the Streevilaputoor Taluq for the present, as the revenue is small, and the timber-yielding tracts at present almost inaccessible. He proposes that the Tahsildar and Deputy-Tahsildar should issue the necessary permits on receipt of seigniorage, aided by two or three forest peons to check the quantities brought out, and that the Deputy-Conservator and forester should occasionally visit the taluq. This might be tried; but I am not sanguine of the plan succeeding as the Tahsildars have already more than enough work of their own to attend to. Extensive tracts of cardamoms are stated to exist in some of the ravines, which are eagerly sought after on lease, and above Rajahpolliem there is a considerable extent of forest though rather inaccessible. I should much prefer endeavoring to lease the valuable forests of the Shitur and Sivagherry Zemindars which adjoin the taluq to the south, and carefully conserve and work the whole, as I cannot agree with Mr. Puckle in his view that the northern part of the district forests may be neglected whilst the south is rigidly conserved. The fact of there being much less forest in the north seems to me the very reason why we should endeavor to keep and increase it, and there are other rivers besides the Tambrapurney to be thought of, besides the large local demand for fire-wood and building timber throughout the north of the district. I believe the Sivagherry Zemindar is anxious to lease out his forests for Coffee planting, and he would doubtless be equally glad to lease them for conservancy; and I imagine Shitur could also be brought under Government management, though Mr. Puckle informs me he has hitherto refused any terms. A description of these forests and their approximate annual value is given in my report recorded with G. O., No. 981, dated 3rd June 1871.

This report was fully considered & finally settled in G.O. 454/73 No 825.

4. The timber-yard at Vasadavenellur (Sunkernainacovil Taluq), the present headquarters of the forester, contains a quantity of timber which does not command a ready sale owing to the scantlings not being suited to the demand and the deterioration of the loss from exposure to the sun. They should, I think, be sold off by auction, and if the timber-yard is kept up pandals and a yard-keeper's office will be required. It is, however, proposed to try periodical auction sales, as the natives are said to prefer green timber. Even then the pandals will probably be found necessary, and an office for the forester, with a room available for the Deputy-Conservator on inspection, should be built as soon as possible.

5. Mr. Puckle has recently been busy in the neighborhood of Courtalum and at Paupanassum in running a boundary and inspection-path and raising a fence of thorns to divide off the village jungles or tracts for free felling from the forest above. The theory on which this is undertaken must recommend itself to all, viz., to give to each village or group of villages adjoining the hills a sufficient area for grazing, fire-wood supply, etc., free of all charge, and reserve the forests above for climatic considerations and the supply of timber to the district generally both now and in the future. Apart, however, from the unfortunate illegality of the measure in the absence of any law prescribing the course to be adopted for regulating and settling forest rights and constituting State and communal reserves, there are several points connected with Mr. Puckle's arrangements which, I think, deserving of remark.

6. I should have preferred if the extent to be allotted to each village or group had been regulated by some written rules based upon the number of acres cultivated, number of inhabitants, or some such data to be carefully compiled beforehand, instead of which the allotment has been, I fear, more or less at haphazard; and whilst, in my opinion, some of the Tencassy villages have got a very scant allowance, those of Vickrasingapuram (Paupanassum) appear likely, by dint of much importunity, to get more than their share. It is true that they have a large number of cattle; but I have long held the opinion, which is shared by others, and is, I think, gaining ground each day, that it is not expedient to encourage the upkeep of a number of worthless cattle by granting facilities for free grazing. A great proportion are utterly worthless, except for their manure which is lost by their being driven into the hill-forests where they and their drivers do much damage. I think no effort should be spared to induce the Indian cultivator to keep only as many cattle as he really requires for ploughing, manure, etc., to improve their quality, and secure the full benefit of their work and manure by keeping them at home whenever practicable, or penning them within comparatively restricted areas in the communal forests. Again, I am not sure that the grant of a lower or outer belt along the whole line of forest will answer; it is certainly most convenient, and the hedge and path serves at once for inspection purposes as a barrier against entry into the reserved forests and as a fire-trace; but what I fear is that this belt may be gradually cleared and then another demanded and granted, and so on gradually baring the slopes and encroaching on the total forest area; to guard against this I would recommend that the whole belt, which it is intended eventually should stretch from north to south of the district, should be divided into blocks, two or more being assigned to each village or group of villages, half of which only should be open at one time. I would also reserve a certain number of trees in each as standards which should be marked and numbered, and would strictly limit felling to the inhabitants of the respective villages for their own use and not for sale, breaches of which regulations should render the village liable to certain penalties, such as forfeiture of their rights for a time, payment of a fine to the jungle conservancy, etc.

7. To carry out this, however, we must have an Act and Rules framed in accordance with its provisions, and also provide for the supply of fire-wood, jungle-wood, etc., to the larger villages and towns to which those necessities are removed on sale. At present, fire-wood, notwithstanding the recent reduction in seigniorage, is much dearer in Umbasamudrum, Shernadavi and Palamcottah than it was three years ago, the prices ranging from 3 to 6 Rupees per cart-load; and at the former place, at any rate, the supply must mainly be procured from the communal jungles of Paupanassum and Aladyoor which will thus sooner or later disappear. Of course, what we would like to see would be the villagers themselves conserving their jungle and preventing any

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8. I would at once select tracts for the supply of fire-wood, charcoal, etc., for sale, either through the direct agency of the department, leasing out a tract or tracts by the year, or on payment of seigniorage, the receipts being credited either to Imperial or Local Forest Revenue as deemed advisable, and expended, to a great extent, in the upkeep and reproduction of the supply. I do not like the license and ticket system any more than Mr. Puckle, and hope it may be possible to do without it, at least as a direct Government collection, by selling the right to supply from such and such tracts year by year; but it must not be forgotten that to do any good in the way of planting or reproduction requires funds, and that fire-wood, etc., taken for sale to the large towns is a legitimate source of revenue.

These remarks apply equally to all the taluqs (five) which adjoin the ghaut forests; a similar system and method of management should, I think, be maintained in each.

9. I was sorry to find a distinction still made with regard to some of the forests and jungles being under the Forest Department or under the Tahsildar. Mr. Puckle explained to me partially the reason for this which was of a temporary nature, and I hope it may be possible ere long to place all under the control of the forest officer as the Collector's Assistant, whether the immediate charge is in the hands of the Tahsildars, or necessitates the employment of a forester or sub-forester who may in like manner, whenever thought advisable, work under the control of the Taluq Tahsildars.

The mere crediting of revenue to Imperial or Local presents no difficulties; in fact, there has hitherto been little or no local revenue in these taluqs since the department took charge of the forests.

10. With regard to the fine forests above ghaut, especially those above Paupanassum, Alwar-koorchy, etc., I think valuable time is being lost by the present arrangements under which there is not only no felling, even of back going trees, but no attempt at improving the forest, filling up blank spaces, or even arriving at conclusions as to what we have got and how much we can fairly cut each year. This may be conservancy, but it is certainly not forestry. I had understood that Mr. Puckle was strongly opposed to all felling as likely to affect the water-supply of the Tambrapourney and its affluents; but on speaking to him on the subject I ascertained that he had no objections to, and, in fact, favored, any well-matured scheme for working the forests on a rational system, whilst he strongly objected to throwing them open to license-holders or contractors to fell at will. On these points we all quite agreed, and I fully concurred in his anxiety with regard to forest denudation affecting the constant and steady supply of water and resulting in disastrous floods at one season and cessation of water-supply at another. This is the more to be guarded against as the enormous annual sales and clearing of lands on the Travancore side for Coffee planting may sooner or later affect the climate and rain-fall on our side of the mountains. But so long as we fell well within our yield and remove mature timber-trees only and those of the inferior descriptions which choke the growth of the more valuable sorts, there can be no danger, especially if we encourage natural reproduction and the "reboisement" of denuded areas by simple and inexpensive, but at the same time effective, measures. Some of the tracts in the Surveyar Valley and in the rich forests known as the upper and lower Oolaroo and Putunkadu offer peculiar facilities for the commencement of regular forest operations on a small scale to be increased gradually in accordance with a regular pre-determined plan of operations. It is unnecessary to enter into details here; I thoroughly explained the matter to Mr. Hayne and talked it over with Mr. Puckle, and trust a commencement may be made next year if the proposal meets with the approval of Government and the Board. The first steps are doubtless to secure a settlement of the Kutlay Mullay claim which has extended its limits since I was in charge of the range, and to mature an effective and economical system of converting and removing our timber from the

forest by means of roads, steps, etc. There would be ample employment for an experienced European forester, and adequate establishments above ghaut for the working, conservation, and improvement of these fine forests, and the project will not be lost sight of in revising the forest establishments of the district.

11. In the southern taluq of Nangunary periodical auction sales are to be tried in lieu of daily sales at fixed rates from the timber-yard. This may prove more satisfactory and remunerative; but what is most required is improvement in the converting the timber and facilitating its removal to the plains without the enormous waste and expense now incurred.

I do not think that the Teak belt at foot of the hills here will ever come to anything, and Mr. Hayne proposes to treat several portions on different systems to ascertain the results and favor the growth of Vengay (*Pterocarpus marsupium*), seedlings of which are frequent. This should be done if it meets the Collector's approval, and the results carefully recorded and compared. There is a boundary dispute with the representatives of a temple or religious endowment which causes great inconvenience and constant disputes betwixt the Government villagers and the representatives of the temple. Mr. Puckle informs me that the matter will be decided on the settlement of the land-revenue, but unless that is likely to take place at once I think some order as to possession or enjoyment should issue, or Mr. Hayne might be empowered to inquire into and settle the matter under the Act, which leaves either party the right of appeal to the Court.

12. From Palamecottah I inspected the railway fuel-reserves consisting chiefly of tank-beds more or less covered with Babul which have been taken up and conserved. On the whole, the experiment has succeeded well; but I think that increased endeavors are necessary to supplement the growth by dibbling in seed, excluding goats, etc.

In some tanks the new growth is very good, but in others there is little to show, and the old trees are, in many cases, growing beyond the age when they will grow freely from the stool when cut. I discussed the condition and future management of these fuel-reserves very fully with Mr. Puckle whilst riding out with him to inspect the channel and tank-banks about to be transferred to Mr. Hayne for conservancy. Complaints had been made that the growth of trees in the waterspread of the tanks tended to silt them up and deteriorate the quality of the water; but Mr. Puckle agrees with me that neither of those assertions are proved; in fact, the balance tends in the opposite direction as I found in 1870, when I inquired into the matter very carefully on the spot. The real objection on the part of villagers to any attempts to increase the yield of fire-wood from these tanks or any waste lands is doubtless that it curtails their grazing grounds, and that waste land or trees which were considered as of little value if enjoyed by the community at large or alienated to an individual, acquire a greatly enhanced and even fictitious value in the eyes of the people when it is seen that Government are desirous of reserving and improving them. This is but natural and is found to be the case in all countries. Mr. Puckle considers that the comparatively small areas we have reserved do not trench injuriously on the ryots' pasture grounds; but we concur that, in order to carry out operations to the best advantage, it is imperative to exclude direct foreign agency in the shape of a European Overseer and establishments, and Mr. Taylor, who has recently taken charge under Mr. Hayne, has therefore been instructed to work entirely through the Tahsildar and village-officers who will be placed in charge of the reserves with an adequate allowance for Kavalgars, etc. By this means, which I advocated from the outset when proposing and inaugurating the formation of these tank-bed plantations, any pressure on the people will, it is confidently believed, be reduced to a minimum, and any slight curtailment of pasture, etc., be more than compensated by an increased field for labor at remunerative rates and grant of the thinnings, loppings, etc., not required for fencing or the railway supply, free to the inhabitants of adjoining villages.

The Overseer and forest maistries will have ample work in supervising technical operations, concentrating their attention as much as possible on certain areas or circles, and superintending the felling and supply of the wood to the railway and its reproduction block by block. The whole question of railway fuel-supply will shortly be discussed by the Board and laid before Government; meanwhile, I am glad to be able to state that I think we are in a position to supply them with

wood without denuding the country and at rates which compare favorably with those of coal, but the demand must be fixed and permanent to enable us to carry out the necessary measures for reproduction on a sufficiently extensive scale.

13. General Remarks.—The Tinnevely forest establishments require a thorough revision, and Mr. Puckle agrees that when the railway is opened it will be better to have the officers' headquarters at Tinnevely itself where he can transact office-work in the Collector's cutcherry, and be in constant communication with him. I would then divide the district into three forest ranges, viz., the north and south ghaut forests, and the centre or railway fuel-reserve charge, each under an Overseer with the necessary establishments.

The timber requirements of a rich and prosperous district like Tinnevely must be very great, and I was somewhat surprised to see it stated in a recent report, on the authority of the Collector, that the scantlings of the Umbasamudrum bridge, a few second-hand logs, had "glutted the market." The district requirements are met largely from Travancore, which State has a depôt at Shencotta to the north of Tencassy Taluq, and a certain amount is also procured from the Zemin-daris. The Department of Public Works is, I believe, mainly supplied by sea-borne Teak from Burmah; but there no doubt remains a large and increasing demand which was formerly met from the State forests before they were placed under conservancy and subsequently under the license and voucher system. I believe that timber must even now be removed from the southern forests clandestinely, and certainly fire-wood is in considerable quantities.

I have no wish to force a forest revenue, but I am convinced that that of Tinnevely from timber, fire-wood, and minor forest-products should not fall short of Rs. 50,000 without including the profit on railway fuel-supply. This would leave us enough funds to maintain adequate establishments and really conserve and improve the forests, whilst working out the ripe timber to advantage; merely to close them rigidly, even if we could maintain such a blockade, is to fold up one's talent in a napkin.

The first step here as elsewhere is to define and settle the rights and privileges of the villagers under the authority of an Act construing their claims most liberally and arranging that all those entitled to timber, fire-wood, grazing, etc., free of charge, should have it with the least possible restrictions compatible with its preservation for future generations, and then let us work the State forests systematically and to the best advantage. We should then be making real progress, whereas at present, I must say, I think, we are not only acting illegally, but doing little or no real good to the forests, whilst we have recently sacrificed much legitimate revenue from them. I have communicated my suggestions in a memorandum to the Collector for such notice as he may think fit.

From Captain C. WALKER, Officiating Inspector of Forests, to C. G. MASTER, Esq.,
Acting Secretary to Government, Revenue Department, dated Cotacamund,
24th September 1874, No. 325.

In continuation of my Inspection Report on the Tinnevely forests, I have the honor to forward copy of a report just received from the Collector showing the beneficial influence of excluding fire from the scrub and open grass-lands of the ghauts.

2. I consider the results ascertained by Mr. Puckle's experiment most interesting and instructive, and fully concur in his views regarding the great importance of protecting the hillsides from fire and damage by cattle, goats, etc.

3. The data given prove conclusively the benefit which has resulted by the exclusion of fire, even for a comparatively short period; and I feel convinced that we need only persevere and carry out the system under the authority of a legislative enactment to reclothe the hillsides with the better descriptions of timber-trees now found only in comparatively inaccessible localities.

4. The extension of the system of forest-paths acting, at the same time, as fire-traces recommends itself on every ground; but I deprecate any further action in the shape of restrictions, however advisable, until we can act legally, and the action of one Collector in constituting so-called reserves may not be liable to be upset by the next or by the Civil Courts.

ENCLOSURE No. 1.

From R. K. PUCKLE, Esq., Collector of Tinnevely, to the Inspector of Forests, Ootacamund, dated Courtalum, 11th September 1874, No. 792.

I HAVE the honor to forward, for your information, the results of two experiments made to ascertain what we have growing in the scrub-jungle and grass-lands on the hillside near Courtalum.

The localities selected have been protected from fire and the ravages of wood cutters and cattle for two and five years, respectively; both lie low down on the slope immediately above the fence that bounds the village grazing grounds, and both are fair average specimens of the scrub and grass-lands of the lower slopes. I measured off an acre or a square of seventy yards each way in either case, and found that in the scrub-jungle we have 260 and in the grass-land 548 seedlings of timber-trees per acre as under:—

Scrub.		Grass.	
Ponpadirei	11	Tekku (Teak)	1
Todakalti (Blackwood)	9	Vengai	49
Kurukuvagei	23	Todakatti (Blackwood)	31
Vakkali	41	Black marudu	105
Karumarudri	21	Ponpadirei	133
Puna	25	Vekkali	125
Tandappalie	9	Ayama	57
Kulakotta tekku	5	Vaimarai	17
Helli	17	Madama	12
Vagei	36	Pullavarei	15
Manjanatti	5	Tandappalei	2
Manjakadamba	3	Veppalay	1
Irumbudi	23		
Vakkanatti	11		
Tettamaram	3		
Ayama	4		
Mudama	1		
Sarakkonrei	2		
Vidattalei	5		
Tanikkoimaram	1		
Vusuvusukkoimaram	2		
Kanjuruimaram	3		
Total ..	260	Total ..	548

3. The whole of these will be destroyed should fire pass over the hillside during the next two years, and as we have 10,000 or 15,000 acres similarly circumstanced you will be able to appreciate the extent of the damage that may be done by the hill fires of a single season.

For, independently of the great advantage to the district generally of protecting the heads of our streams and averting disastrous floods by getting the hillside once more clothed with forest, as it will be no doubt if protected for ten or fifteen years more, each seedling now growing will be worth at least one Rupee in a few years, and, taking the low average of 250 trees to the acre, we have in a very small compass a property worth twenty-five lakhs of Rupees, till lately wantonly damaged and effectually kept back from yielding any return for want of the annual outlay of a few hundred Rupees on conservancy.

4. In the budget for 1875-76 a small establishment is provided for protecting the hills from fire, and, as a valuable property may be saved to the State and the people by prompt measures being taken to at once extinguish any fire that may occur, it seems to me very advantageous to extend the system of forest-paths dividing the reserved forest from the village grazing grounds, not only to allow watchmen patrolling the skirt of the property to be preserved but to afford ready access to points where a fire can be cut off or extinguished.

No. 324A.

MINUTE BY THE HON. W. ROBINSON, C.S.I.

I AM not altogether satisfied with this draft. The Inspector's Report discloses much action of an arbitrary character by the Collector, mixed up with ~~un~~ful theories of conservancy of water, and prevention of floods. These measures ~~are~~ taken without even the orders or sanction of Government, and have no justification in law. *have been*

2. ~~Then~~ all tank-beds—the most valued grazing grounds of the villagers—are being foreclosed for State railway purposes, and of this naturally and widely unpopular measure the Government only became aware by the Inspector's Report. *The Collector has been silent*

3. I cannot help looking with much apprehension on the Inspector's sentiment as laid before us in paragraph 6. He would starve out the village-cattle on some theory of his own—unmindful that dairy produce is an important branch of agricultural industry in this country—and force new agricultural operations by confiscation. I think that these views should call forth the marked disapprobation of Government. I have no sympathy with this quasi-energy at real injustice, and prefer the contentment and good will of our people. *the cost of*

22nd October 1874.

(Signed) W. ROBINSON.

Proof 19
not doubt/ about

*Again
has
a number
of*

*The original of this Minute is written in the
L.D. 111340 D. 20 Oct 1874*

N^o 324.

From

Captain Campbell Walker
Officiating Inspector of Forests

To
C. G. Master Esquire
Acting Secretary to Government
Revenue Department

Sir,

I have the honor to report that I have recently visited ^{the} Timorelly forests and fuel reserves. I entered the district at the extreme north, crossing the hills from the Cumlum valley in Madara via Varsenad, and proceeded along the foot of the line of ghats to the Calcad forests in the south, returning by the line of road and railway from Palamcottah to Madura. I was accompanied by Mr. Hayne the forest officer throughout my tour, and spent some days with the collector, who was unfortunately unable to meet me in the forests, conferring on future operations and

arrangements.

2. The inhabitants of the large and important village of Wartrap complain bitterly of the recent settlement of the Shapstur zemindar's claim by the Collector of Madura, and state that the zemindar is now excluding them from all rights or privileges of pasturage firewood which they have formerly enjoyed free. It appears that they were never called upon to give evidence in the case referred to in G. O. N^o 810 dated 21st May 1872 although they maintain that a portion of the forest at least is within their village boundaries, and that they can adduce proof as to its never having formed part of the zemindary.

Mr. Hayne, to whom I referred them, informs me that although he was 2nd defendant in the suit no notice was ever served upon him, and he was in ignorance of the enquiry until he was informed that it was settled in the zemindar's favor, and that

* Vide G. O. N^o 467
dated 16th March
1872

the claim now reaches far beyond the limit of six miles mentioned in the original plaint. The Government have, doubtless rightly, censured the action of the Forest Department in trespassing in this forest in which the rights of Government were doubtful but it is, I think, matter for regret that the Department was not represented when the case was enquired into by the Collector of Madura. At present the settlement exists only on paper as the boundaries have never been marked out. I think it very necessary that they should be, and if they encroach on the Tinnevely District a further enquiry would appear necessary as the Madura Collector had no jurisdiction. The Wartrap villagers would then have a chance of being heard, meanwhile their communal rights should not, I think, be interfered with by the zemindar or his agents.

3. Mr. Puckle is of opinion that our

Special Establishments may be withdrawn from the Kreevilaputtoo Talug for the present as the revenue is small, and the timber yielding tracts at present almost inaccessible. he proposes that the Tahsildar and deputy Tahsildar should issue the necessary permits on receipt of signiorage aided by 2 or 3 forest peons to check the quantities brought out, and that the Deputy Conservator and Forester should occasionally visit the Talug. This might be tried, but I am not sanguine of the plan succeeding as the Tahsildars have already more than enough work of their own to attend to. Extensive tracts of Cardamoms are stated to exist in some of the ravines which are eagerly sought after on lease, and above Rajahpollheim there is a considerable extent of forest though rather inaccessible. I should much prefer endeavouring to lease the valuable forests

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forests of the Shetur and Sivagherry Zemindars which adjoin the Talug to the south, and carefully conserve and work the whole as I cannot agree with Mr Puckle in his view that the northern part of the district forests may be neglected whilst the south is rigidly conserved. The fact of their being much left forest in the north seems to me the very reason why we should endeavour to keep and increase it, and there are other rivers besides the Tambrapurney to be thought of, besides the large local demand for firewood and building timber throughout the north of the district. I believe the Sivagherry Zemindar is anxious to lease out his forests for coffee planting, and he would doubtless be equally glad to lease them for Conservancy and I imagine Shetur could also be brought under Government.

management. though Mr. Puckle informs me he has hitherto refused any terms. A description of these forests and their approximate annual value is given in my report recorded with G. O. N^o 981. dated 3rd June 1871. -

4 The timber yard at Vasadavenillur (Lunkernamacoil Taluk) the present head quarters of the forester, contains a quantity of timber which does not command a ready sale owing to the scantlings not being suited to the demand, and the deterioration of the logs from exposure to the sun. They should, I think, be sold off by auction, and if the timber yard is kept up pandals and a yard keepers office will be required. It is, however, proposed to try periodical auction sales as the natives are said to prefer green timber. Even then the pandals will ^{probably} be found necessary, and an office for the forester with a room available for the Deputy Conservator on inspection should be built as soon as possible.

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all the Taluqs (5) which adjoin the
ghat Forests, a similar system and
method of management should,
I think, be maintained in each.

9. I was sorry to find a distinction
still made with regard to some of
the forests and jungles being under the
Forest Department or under the Tahildar
Mr. Puckle explained to me partially
the reason for this which was of a
temporary

37/
temporary nature, and I hope it may be
possible ere long to place all under the control
of the Forest Officers as the Collectors advise
but whether the immediate change is in
the hands of the Tahildars, or necessitates
the employment of a Forester or Sub Forester
who may in like manner whenever thought
advisable work under the control of the
Taluq Tahildars.

The mere crediting of revenue to Im-
perial or Local presents no difficulties, in
fact there has hitherto been little or no
Local revenue in these Taluqs since the
Department took charge of the Forests.
10. With regard to the fine forests
above ghat especially those above Pampa-
napur, Alwar Koorchy &c. I think
valuable time is being lost by the
present arrangements under which
there is not only no felling, even of
back growing trees, but no attempt at
improving the Forests, filling up
blank spaces, or even arriving at con-
clusions as to what we have got, and
how much we can fairly cut each
year. This may be conservancy but it

it is certainly not forestry. I had under-
stood that Mr. Puckle was strongly
opposed to all felling as likely to affect
the water supply of the Tambapoorney
and its affluents, but on speaking
to him on the subject I ascertained
that he had no objections to, and
in fact favored, any well matured
Scheme for working the forests on a
rational system, whilst he strongly
objected to throwing them open to license
holders or contractors to fell at will. on
these points we all quite agreed, and
I fully concur in his anxiety with
regard to Forest denudation affecting
the constant and steady supply of
water, and resulting in disastrous
floods at one season and cessation
of water supply at another. This is
the more to be guarded against as
the enormous annual sales and clear-
ing of lands on the Travancore
side for coffee plantling may

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sooner or later affect the climate and
rainfall on our side of the mountains.
But so long as we fell well within our
yield, and remove mature timber trees
only, and those of the inferior description
which choke the growth of the more
valuable sorts there can be no danger,
especially if we encourage natural
reproduction and the "reboisement" of
denuded areas by simple and inexpensive
but at the same time effective means.
Some of the tracts in the Surveyor's
valley, and in the rich Forests known
as the upper and lower Oslaros and
Puttur Roads offer peculiar facilities
for the commencement of regular
forest operations on a small scale
to be increased gradually in accordance
with a regular pre-determined plan
of operations. It is unnecessary to
enter into details here; I thoroughly
explained the matter to Mr. Hayne,
and talked it over with Mr. Puckle
and trust a commencement may be
made next year if the proposal

meets with the approval of Government and the Board. The first steps are doubtless to secure a settlement of the Kuttay-Mullay Claim which has extended its limits since I was in charge of the range, and to mature an effective and economical system of converting and removing our timber from the Forest by means of roads steps &c. There would be ample employment for an experienced European forester and adequate establishments above the grant for the working, conservation, and improvement of these fine forests and the project will not be lost sight of in revising the Forest establishments of the District.

11. In the southern taluq of Nangunah periodical auction sales are to be tried in lieu of daily sales at fixed rates from the timber yard. This may prove more satisfactory and remunerative; but what is most required is improvement in the converting the timber and facilitating its removal to the plains without the enormous waste and expense now incurred.

I do not think that the Teak belt at foot of the hills here will ever come to any thing, and Mr.

Hayne

37
Hayne proposes to treat several portions on different systems to ascertain the results and favor the growth of Vengay, (*Pterocarpus Marsupium*), seedlings of which are frequent. This should be done if it meets the Collect approval, and the results carefully recorded and compared. There is a boundary dispute with the representatives of a temple or religious endowment, which causes great inconvenience and constant disputes between the Government villagers, and the representatives of the temple. Mr. Puckle informs me that the matter will be decided on the settlement of the land revenue, but, until that is likely to take place alone I think some order as to possession or enjoyment should issue, or Mr. Hayne might be empowered to enquire into and settle.

matter under the Act which leaves either party the right of appeal to the Court.

12. From Palamcottah I inspected the Railway fuel Reserves consisting chiefly of tank beds more or less covered with Bahul which have been taken up and conserved. on the whole the experiment has succeeded well, but I think that increased endeavours are necessary to supplement the growth by dibbling in seed, excluding goats &c.

In some tanks the new growth is very good, but in others there is little to show, and the old trees are in many cases growing beyond the age when they will grow freely from the stool when cut. I discussed the condition and future management of these fuel reserves very fully with Mr. Puckle, whilst riding out with him to inspect the channel and tank banks about to be transferred to Mr. Bayne for Conservancy. Complaints

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had been made that the growth of trees in the water spread of the tanks tended to silt them up and deteriorate the quality of the water, but Mr. Puckle agrees with me that neither of those assertions are proved in fact, the balance tends in the opposite direction as I found in 1870 when I enquired into the matter very carefully on the spot. The real objection on the part of villagers to any attempts to increase the yield of firewood from these tanks or any waste lands is doubtless that it curtails their grazing grounds, and that waste land or trees which were considered as of little value if enjoyed by the community at large or alienated to an individual, acquire a greatly enhanced and even fictitious value in the eyes of the people when it is seen that Government are desirous of reserving and improving them. This is but natural, and is found to be the case in all countries. Mr. Puckle considers that the comparatively small areas we have reserved

do not trench injuriously on the ryots
pasture grounds, but we concur
that, in order to carry out operations
to the best advantage, it is imperative
to exclude direct foreign agency in
the shape of a European overseer
and establishments, and Mr Taylor,
who has recently taken charge under
Mr Hayne, has therefore been instructed
to work entirely through the Tahildar
and village officers who will be placed
in charge of the reserves with an adequate
allowance for Ravulgaris &c. By this
means, which I advocated from the
outset when proposing and inaugurat-
ing the formation of these tank bed
plantations, any pressure on the
people will, it is confidently believed,
be reduced to a minimum, and any
slight curtailment of pasture &c.
be more than compensated by an in-
creased field for labor at remun-
erative rates, and grant of the thinnings
loppings &c., not required for fencing
or the railway supply, free to the in-
habitants of adjoining villages.

The

12/
The overseer and Forest maistries will
have ample work in supervising techni-
cal operations, concentrating their
attention as much as possible on
certain areas or circles and superintending
the felling and supply of the wood
to the railway and its reproduction
block by block. The whole question
of railway fuel supply will shortly
be discussed by the Board and laid
before Government, meanwhile I am
glad to be able to state that I think
we are in a position to supply them
with wood without denuding the
Country, and at rates which compare
favorably with those of coal, but the
demand must be fixed and perma-
nent to enable us to carry out the
necessary measures for re-production
on a sufficiently extensive scale.

13. General Remarks. The Immensely
Forest establishments require a thorough
revision, and Mr Puckle agrees that
when the railway is opened it will
be better to have the officers

head quarters at Tinnevely itself
where he can transact office work
the Collector's cutcherry, and be in
constant communication with him.
I would then divide the District
into three forest ranges viz: the north
and South Ghat Forests, and the Centre
or railway fuel reserve charge, each
under an overseer with the necessary
establishments.

The timber requirements of a
rich and prosperous District like
Tinnevely must be very great and I
was somewhat surprised to see it
stated in a recent report on the
authority of the Collector that the
scantlings of the Umbasamundrum bridge,
a few second hand logs, had "glutted
the market". The district requirements
are met largely from Travancore
which State has a depot at Shen-
cotta to the north of Tencaary Taluk
and a certain amount is also procured
from the Zemindaries. The Department
of Public Works is, I believe, mainly
supplied by sea borne teak from

12
Burmah. but there no doubt
remains a large and increasing
demand which was formerly met
from the State Forests before they
were placed under conservancy,
and subsequently under the license
and Voucher System. I believe
that timber must even now be
removed from the Southern forests
clandestinely, and certainly firewood
is in considerable quantities.

13
I have no wish to force a Forest
revenue, but I am convinced that
that of Tinnevely from timber, fire-
wood and minor forest products
should not fall short of Rupees
50,000 - without including the
profit on railway fuel supply. This
would leave us enough funds
to maintain adequate establish-
ments, and really conserve and
improve the Forests, whilst working
out the ripe timber to advantage,

merely to close them rigidly even if we could maintain such a blockade is to fold up ones talent in a napkin.

The first step here as elsewhere is to define and settle the rights and privileges of the villagers under the authority of an Act Constraining their claims most liberally and arranging that all those entitled to timber, firewood, grazing & free of charge should have it with the least possible restrictions - compatible with its preservation for future generations, and then let us work the State Forests systematically and to the best advantage. We should then be making real progress whereas at present I must say I think we are not only acting illegally, but doing little or no real good to the Forests, whilst we have recently sacrificed much legitimate revenue from them.

15/
I have communicated my suggestion in a memorandum to the Collector for such notice as he may think fit.

I have the honor to be,
Sir,
Your most Obedient Servant
Campbell ~~in the~~ Captain
Officiating Secretary of Forests.

N^o 792 ⁴⁹ Sinnerelly Collectors Circuit
Cutcherry Courtalam 11th September 1874

From A. H. Puckle Esq^{re}
Collector

To The Inspector of Forests
Cotacurund

Sir,

I have the honor to forward
for your information the results of two
experiments made to ascertain what
we have growing in the scrub jungle
and grass lands on the hill side
near Courtalam.

2. The localities selected have been
protected from fire and the ravages of
wood cutters and cattle for 2 and 5 years
respectively; both lie low down on the
slope immediately above the fence that
bounds the Village grazing grounds,
and both are fair average specimens
of the scrub and grass lands of the
lower slopes. I measured off an
acre or a square of 70 yards each
way in either case and found that
in the scrub jungle, we have 20

Received 8/11 - 75 Sinnerelly Sub

Forest Department,

No. 3310.

The 11/9 Inspector of
Forests

To

The Secretary to Govt.
Revenue Dept^{re}

Dated 24th
Cutcherry Courtalam
Received 25

N^o 324

Enclosure, 9 one

S.D. 1380-30 October 1874

Sinnerelly District on

Sinnerelly Forests and

State Revenue.

323

and in the grass land 548 seedlings of
timber trees per acre as under.

Scrub		Grass	
Ponpadiroo	11	Tekku Teak	1
Todakalli Blackwood	9	Vengai	119
Kurukuvagai	23	Todakalli Blackwood	31
Vakkali	44	Blackmarudu	105
Kanumaradu	21	Ponpadiroo	133
Puna	25	Vakkali	125
Tandappali	9	Ayama	37
Kulakattakku	5	Vuniarai	17
Helli	17	Mudama	12
Vagai	26	Pullavari	15
Manginatti	5	Tandappali	2
Mangakudamba	3	Veppalay	1
Irumbudi	23		
Vakkamatti	11		
Tekhamanam	3		
Ayama	4		
Mudama	1		
Sarakkuvil	2		
Vedattalai	5		548
Tanjikhoi manam	1		
Vaduvusukhoi manam	2		
Kanjurci manam	3		
	260		

3. The whole of these will be des-
troyed should fire pass over the hill
side during the next two years, and
as we have 10,000 or 15,000 acres
similarly circumstanced, you will
be able to appreciate the extent of

the damage that may be done by
the hill fires of a single season.

For, independantly of the great advan-
tage to the district generally of pro-
tecting the heads of our streams,
and averting disastrous floods by
getting the hill side once more
clothed with forest, as it will be no
doubt if protected for 10 or 15 years more,
each seedling now growing will
be worth at least one Rupee in a
few years, and taking the low average
of 250 trees to the acre we have in a
very small compass a property worth
25 lacs of Rupees, till lately wantonly
damaged and effectually kept back
from yielding any return for want
of the annual outlay of a few hundred
Rupees on conservancy.

4. In the Budget for 1875-76, a
small establishment is provided for
protecting the hills from fire and as
a valuable property may be saved
to the state and the people by
prompt measures being taken,

to at once extinguish any fire that may occur, it seems to me very advantageous to extend the system of forest paths dividing the reserved forest from the village grazing grounds, not only to allow watchmen patrolling the skirt of the property to be preserved but to afford ready access to points where a fire can be cut off or extinguished

I have &c.

Signed, R. R. Puckle

Collector

(True Copy)

Campbellweather Captain

Officiating Inspector of Forests

N^o 325.

Office of Inspector of Forests
Ootacamund 24th September 1874

From
Captain Campbell Walker
Officiating Inspector of Forests

To
C. G. Master Esquire
Acting Secretary to Government
Revenue Department.

Sir,
In continuation of my Inspection Report on the Tinnerelly Forests I have the honor to forward copy of a report just received from the Collector, showing the beneficial influence of excluding fire from the scrub and open grass lands of the ghats.

2. I consider the results ^{ascertained} by Mr. Puckles experiment most interesting and instructive, and fully concur in his views regarding the great importance of protecting the hill sides from fire and damage by cattle, goats &c.

3. The data given prove conclusively the benefit which has resulted by the exclusion of fire, even for a comparatively short period, and I feel convinced that we need only persevere and carry out the system under the authority of a legislative enactment to re-clothe the hill sides with the better descriptions of timber trees now found only

1874.

Sept

Rev. 331/74.

From
The Collector

Tinnerelly

To
The Inspector of Forests
Ootacamund

Dated 11th 3
Sept 12th } September 1874
Received 17th }

Enc. 1
11th 792
Enc. 1
11th 792

Forwarding the results of
two experiments made in
the dense jungle and grass
lands on the hill sides near
Ootacamund

Per 730 Oct 7/74
L. H. N. 324

in comparatively inaccessible localities.

4. The extension of the system of forest paths acting at the same time as fire traces recommends itself on every ground, but I deprecate any further action in the shape of restrictions however advisable until we can act legally, and the action of one collector in constituting so called Reserves may not be liable to be upset by the next, or by the Civil Courts.

I have the honor to be,
Sir

Your most Obedt Servant,
Campbell Captain.

Officiating Inspector of Forests

Revenue Department.

No. 1380

Proceedings of the Madras Government.

Under date the 3^d October 1874.

Read the following
inspection reports of the
Inspector of Forest

On the Trimmelly } H.C. 24th Sept^r 1874 No.
Forest and Fuel Reserved } 324 & 325.

Minute by the Honble Mr Robinson (the ...)

Communicated
to the Board of Revenue
~~through whom these~~
~~reports should~~
~~be submitted.~~
2. From the tenor
of his remarks regard-
ing the Saptar Zemindars
claims it would
appear that the Acting
Inspector of Forests has
overlooked
~~not made himself ac-~~
~~quainted with the paper~~

noted

Received 18/11 75 Department

Forest Department

From No. 3311.

The Offg. Inspector of
Forests

to

The Secretary to Govt.

Revenue Dept.

Dated 24th

October 1874.

No. 325

Enclosure One

No. 1380 30 October 1874

Subject

The continuation of the

Revenue Report on the Trimmelly

Forest towards copy of

a Report from the District

showing the temporary

influence of excluding

fire from the scrub

and open grass lands

324

noted in the margin
copies of which were
communicated to his
Office

* G.O. 21st May 1872 N^o 810
" 10th June 1873 " 614
" 27th Oct^r 1873 " 1157

3. From the inquiry
held by Mr. Symonds
and the late Deputy
Collector Dewasikamoney
Pallai it was clearly
established that different
Zemindars had been in
undisputed possession
of these Forests for more
than ~~50~~ ¹⁰⁰ years and
the admission therefore
by the Govt. that such
was the case can in no
way have altered the
position of the villagers
of Wattrap. The deter-
mination of the boundaries
is ~~however~~ a matter that
should engage the early
attention of the Board.

4. From his remarks
in para 3 it would appear
that the Acting Inspector
was

* G.O. 1st Nov 1873 N^o 1157
G.O. 1st Dec 1873 N^o 1157
G.O. 4th Dec 1873 N^o 1157

* as which however
the Govt. is to be
the C. M. to be sent.

R. M.

* G.O. 4th July 1873 N^o 685

was unaware that the
Govt. have already decided
in the negative the question
raised as to the necessity
of their acquiring the
Northern forests.

5. The Collector of
Tinnevely should be
called upon to explain
his system of Forest
management and
arrangements for ap-
portioning off village
jungles.

6. The progress of
the railway fuel reserves
is satisfactory but care
must be taken to deal as
tenderly as possible with
those privileges of the
people which the for-
mation of these reserves
seems likely to curtail.

7. The redistribution
of the Forest ranges is
a subject that should

Refd in the measure is not in-
popular & will so. It is a fresh ap-
propriation of village rights. The Govt.
lands are the village grounds & are the
property of the village & the Govt.

Refd in the measure is not in-

be

be again brought for-
ward on the completion
of the line of rail.

J. W.

C. M.

14 To the Board of Geo. on 19 Nov
3. The Inspector of Forests

223-225

10
4

324-18

Minute

I am not satisfied with this
of the ~~land~~ ^{land} ~~commission~~ ^{commission} inspectors &
don't disclose much action of
an arbitrary character. The ~~Commission~~
comes up with fanciful theories of
extension of water & prevention of floods.
- These measures are taken without
the orders of Govt. or sanction of Govt.
I am not satisfied with this.

Then all land held - the ~~land~~
reduced grassy grounds of the villages
are being purchased for State Raising
purposes and of this naturally
& land of unproductive measure
the Govt. influence away
the inspectors report.

I cannot help looking with
much apprehension at the
policy contained in the
report as to the Govt. of the
land the village. Cattle on some
theory of his own - unimproved
but dairy produce is an important
branch of agricultural industry in
the country - and force new
agricultural operation of inspectors.

I think that these news of the
22/10/74. just the matter
disappointing

for the Govt. of the

+ Have no sympathy with the
less energy and less importance
of the Govt. of the

2/11/2001 SY OBR