M.R.O. 1—77,006—8-6-31.

(1) Number of pages 12

(2) Date of repair 15-3-43

(3) Initials of the Referencer

MADRAS RECORD OFFICE.

Government of Madras.

Public works **DEPARTMENT.**

G.O. No. 237 Press ~~Mis.~~

483-84

Dated 24 1 1867.

Not to be folded or roughly handled

Q 45-47

1

Proceedings of the Madras Government, Public Works Department.
24th January 1867.

No. 483. Read the following Proceedings of the Madras Government in the Revenue Department :—

Passing orders on certain correspondence from the Board of Revenue and the Forest Department, relative to the measures to be adopted for meeting the growing requirements for fuel for Railway purposes, &c. } (Here enter 15th January 1867, No. 159.)

No. 484. ORDER THEREON, 24th January 1867, No. 237.

RAILWAY, No. 29.

Communicated to the Consulting Engineer for Railways and to the Superintending Engineers.

(True Extract.)

(Signed) CHARLES A. ORR, Colonel, R. E.,
Secretary to Government.

To the Consulting Engineer for Railways.
,, Superintending Engineers.

Exd. S. T. Augustin.

Read the following papers :—

No. 337. From the Officiating Conservator of Forests, to the Acting Secretary to Government, Revenue Department, Fort Saint George, dated Camp, Ootacamund, 27th July 1866, No. 1,894.

1. Alluding to the Government Order No. 1,709, of the 10th of July 1866, and to the correspondence as per margin* herewith returned, I have the honor to inform you that I am in communication with the Collectors of North Arcot, Cuddapah, and Coimbatore, with the view to the reservation of tracts of land for plantations, in the Arcot District at Errode, and near Cuddapah.

* From the Consulting Engineer for Railways, to the Secretary to Government, Public Works Department, No. 289, dated 5th July, and copy of a letter from the Directors of the Madras Railway Company to their Agent at Madras, No. 377, dated 11th of May.

2. With regard to the 210 acres near the Soornamookey river, in the Chendragherry Talook, handed over to the Railway Company by the Collector of North Arcot, I would suggest that Government should sanction the transfer of the same to the Forest Department, and that the amount paid for the land by the Railway Company (viz., Rupees 751-3-7) be refunded to them. In addition to this tract, I would suggest that a plantation of about 300 acres should be formed beyond Cuddapah, and a third one of a similar area at Errode ; this with the plantation near Bangalore would be sufficient for the present, and the planting operations could be extended if they are found to answer.

3. There can be no doubt of the great importance of the undertaking ; the Railway Company have proved that the substitution of wood for coal saves more than one-half the cost of fuel, and it is evident that, at the present rate of consumption, there must in a few years be a great difficulty about the supply of wood without the aid of artificial planting. It is to be regretted that these plantations could not be undertaken by the Railway Company themselves, as they possess great advantages, and would take great interest in the work ; if they are to be undertaken by Government, I would suggest that application be made to the Home Government for a good Forester or a Gardener, who has had experience in planting and arboriculture ; as all the plantations would be on the line of Railway, they might be all under his general supervision, at least at first until the growth was well established ; he might receive a salary of 80 Rupees per mensem to commence with, and a gradual rise to Rupees 200, if he gave satisfaction. During the first few months after arriving in the country, he should be allowed to visit the Nellumbur Plantations, the plantations about Madras, Mr. Dykes' planting operations at Nellore, and the Bangalore Gardens. The whole success of the undertaking will depend upon having a good Forester in charge.

4. In addition to the tracts proposed for plantations, I would request the sanction of Government for the reservation of 5,000 acres of forest on the Cuddapah Line, near Balapilly, the same to be fenced in, and cattle and the annual fires carefully excluded.

No. 338. Proceedings of the Board of Revenue.

Submitting report from Collector of Coimbatore as to private enterprise being sufficient to meet requirements for fuel of Railways and the general community, and suggesting that Forest Department be directed to undertake restoration of jungles on a larger scale than hitherto. } (Here enter 15th August 1866, No. 5,709.)

No. 339. From the Officiating Conservator of Forests, to the Secretary to Government, Revenue Department, Fort Saint George, dated Camp, Ootacamund, 21st September 1866, No. 1,977.

1. Adverting to the Government Order No. 2,171, of the 22nd of August, I have the honor to inform you that I fully concur with the Collector's proposals of fencing in large tracts of jungle near the line of Railway, and thereby excluding all cattle and fire; this plan is already being carried out between Coimbatore and Palghat, and has been proposed for the Cuddapah and Salem Districts, and I feel sure will be more efficacious than any artificial planting in dry districts.

2. With regard to increasing the present seigniorage rates, from Annas 6 to Rupee 1, on firewood supplied to the Locomotive Department, Lieutenant Walker reports that at the present rates firewood costs the Railway Company (including all charges) Rupees 4-8-0 per ton, and if the rates were increased, as proposed, it would only cost Rupees 5-14-6 per ton. Coal at Jollarpet costs Rupees 25 per ton, and as three tons of wood are found to be equivalent to one ton of coal, the cost of wood would, at the advanced rates, be still only Rupees 17-11-6, *versus* Rupees 25 for coal. I would, therefore, suggest that the seigniorage rates on all wood felled for the Locomotive Department be increased, as proposed by the Collector, subject to a further report on the results at the end of six months. The increased rate should, I think, only be charged on that cut for locomotive fuel, for, as the Collector observes, they require wood of from six to twelve inches in diameter, whereas the ordinary firewood cut for sale is generally of a much smaller description, and is often cut from mere scrub.

3. With regard to the probable annual charges and receipts of carrying out the measures proposed by the Collector, I may roughly state that the expenses of fencing in two square-miles of jungle would be about 1,000 or 1,100 Rupees, and the pay of a Watcher would be Rupees 84 per annum. Six such tracts, or twelve square-miles, as proposed by the Collector would, therefore, cost about 7,000 Rupees for the first year, but the subsequent expenditure would be only trifling; the receipts would of course entirely depend upon the amount of timber that we were enabled to supply annually, but at the proposed rates of seigniorage, the expenditure of 7,000 Rupees would be covered by a supply of about 3,000 tons, and I have ascertained that if the supply was equal to the demand, the Railway Company would take about 20,000 tons.

4. If Government would sanction the expenditure of Rupees 7,000 for the first year for enclosing the twelve square-miles, any subsequent extension of operations might depend upon future reports, but I am confident that there can be no doubt about the success.

Proceedings of the Madras Government, Revenue Department, 15th January 1867.

No. 340. Proceedings of the Board of Revenue.

Submitting, for information of Government, report of Collector of North Arcot as to measures to be adopted for meeting growing requirements for fuel of Railways and general community, and drawing attention of Conservator of Forests to reserves proposed by Collector. } (Here enter 25th September 1866, No. 6,871.)

No. 341. Do. do. do.

Submitting report of Officiating Collector of Tanjore on the formation of plantations for meeting growing requirements for fuel; and recommending that he be authorized to form a small plantation near Negapatam. } (Here enter 25th September 1866, No. 6,885.)

No. 342. Do. do. do.

Submitting, with remarks, report from Acting Collector of Madras, on subject of forming plantations to meet growing demand for fuel; approving Collector's proceedings in terminating village jungle leases, and desiring that five annas per bandy load be levied on firewood or bamboos cut for sale. } (Here enter 8th November 1866, No 8,092.)

No. 343. Do. do. do.

Submitting to Government report of Collector of Cuddapah as to private enterprise being sufficient to meet growing requirements for fuel; and requesting attention of Conservator of Forests to Collector's proposal for formation of plantations by Forest Department. } (Here enter 21st December 1866, No. 9,071.)

No. 344. ORDER THEREON, 15th January 1867, No. 159.

Forests, No. 7.

1. In his Despatch dated 9th May last, No. 15, the Secretary of State, in allusion to the increased demand for fuel which would be caused by the operations of the Railway Companies, expressed his readiness, if private enterprise were not likely to meet the emergency, to sanction any expenditure necessary to enable the Forest Department to augment the general supply of fuel and timber by legitimate means, consistent with the views expressed in Sir C. Wood's Despatches, numbered 18 and 55 of 1865, and on the understanding that the general community should be equally entitled with such Companies to supplies from the Forest Department.

2. The Despatch was communicated to the Board of Revenue, who referred to the Collectors of the districts through or near which lines of Railway pass, with a view to ascertain how far private enterprise is likely to meet the increasing requirements of the Railways and the public for fuel; what aid would be required from Government to assist private speculation, and, in the event of private enterprise not sufficing to meet the exigency, what measures could advantageously be adopted by Government. The Board also called for the opinions of these Officers on the advisability of placing a higher tax on Government timber in order to check waste.

Madras.	Tanjore.
North Arcot.	Trichinopoly.
Salem.	Bellary.
Coimbatore.	Cuddapah.

3. The Collectors of the eight districts marginally noted have replied to this call.

4. *Madras.*—In this district Casuarina plantations have been extensively formed by private individuals along the seacoast, and are generally thriving. The total area thus occupied is between 6,000 and 7,000 Cawnies. Speculation in this direction has, it is stated, received a temporary check, owing to a report that one of the oldest plantations could not realize the price expected by its owners. The intervention of Government is clearly undesirable in this district, so far as operations on the coast are concerned, but the Acting Collector contemplates, nevertheless, laying out a Casuarina plantation at Sadras, on the ground that East Indian supervision of a tolerably reliable character is available there at a moderate cost. This agency, it is to be presumed, is equally at the command of private individuals, and as a plantation at Sadras would apparently serve none of the public purposes mentioned by the Board in their Proceedings on the Collector's report, the intention should be abandoned, and the field be left, without Government competition, to the private enterprise already awakened by the promise of profitable investment.

5. In the interior of the district the prospect is discouraging. It is found impossible, Mr. Cockerell reports, to induce the people even to plant topes for their own convenience, and it is not to be expected that they will turn their attention to planting for sale, when quicker and more profitable methods of laying out their capital are abundant. Mr. Cockerell is not of opinion that any further liberality on the part of Government would be effectual.

6. As regards fuel for the ordinary requirements of the population, Mr. Cockerell reports that the scrub-jungles of the district, hitherto let at nominal rents to the villagers, have been reserved, and brought under careful conservancy, and, on the understanding, as noted by the Board, that the prescriptive rights of the villagers to wood for agricultural purposes, leaves for manure and fuel (for use, *not* sale) are respected, the arrangement is a good one.

7. The reservation of patches of scrub at Chingleput and Sholaveram, to be protected from cattle, on the plan under trial in Nellore, is very desirable; but

G. O. 15th May 1866, No. 1,154.

care must be taken to record the annual receipts and charges, the growth of the wood, and other data for ultimately determining the cost of the fuel, the produce per acre, &c.

8. The levy of seigniorage on Government wood cut for sale and on charcoal, as proposed by the Board, and usual in other districts, is clearly advisable.

9. *North Arcot.*—The Collector, Mr. J. D. Robinson, considers that there is not "the remotest chance" of private enterprise providing a supply of firewood for Railway and general purposes, and that "any aid from Government, in whatever form contributed, would fail to create any source of supply from private speculation." Mr. Robinson looks to the careful and systematic conservancy of the jungle tracts by Government, as the means of supplying present and future requirements. The Forest Department has an establishment in the district, and the omission by the Collector of all mention of their operations is singular. Captain Beddome will be requested to report specifically what his department are doing in the way of such conservancy as Mr. Robinson advocates.

10. Mr. Robinson alludes to a tract of land near the Tripetty station, which he made over some time since to the Railway authorities, but which reverted to him

Proceedings of the Madras Government, Revenue Department,
15th January 1867.

in consequence of the Home Government having declined to allow of the Railway Company engaging in such enterprises as the growth of fuel. Since then, this restriction has been withdrawn in respect to this tract and another, and the land will therefore be again placed at the disposal of the Agent of the Railway Company on the usual terms. Another tract of 150 cawnies near Trivellum, similarly reserved, has been prepared at the public expense, and can be retained as an experiment. If, however, this be the other tract which the Railway Company are allowed by the Home Government to plant, it will also be offered to them, on condition of their re-paying the expense already incurred by Government.

11. Mr. Robinson deprecates any increase of the seigniorage rates of the district, but in his letter assigns no reasons for his opinion, and the Board do not notice the point, which appears, however, to have previously engaged their attention. The rates of seigniorage in all districts have hitherto been fixed in a somewhat arbitrary manner, without much reference to the cost of production. It is obvious that private enterprise will be effectually excluded if Government sell timber below its value, and the rates should now be generally regulated on this principle, as was recently done in Nellore. Any sudden material enhancement of the price should be avoided, but the proper price of wood being ascertained approximately, from the assessment of the land, the expense of guarding, &c., the charge might be gradually raised. The Board [illegible] the present rates accordingly.

G. O. 10th November 1864, No. 2,061.

12. *Salem.*—In this district also the Collector states that there is not "the slightest probability" of private enterprise meeting the requirements of the Railway. The measures proposed are the raising of the seigniorage from 6 Annas to 1 Rupee per 1,000 lbs., and the protection of the scrub-jungles in the vicinity of the Railway. Captain Beddome, to whom the Collector's suggestions were forwarded, agrees as to their expediency. As to the seigniorage, he states that at the increased rate, the cost of three tons of wood would be Rupees 17-11-6, while that of their equivalent, one ton of coal, is Rupees 25. The Railway Company would thus save thirty per cent. by using wood in lieu of coal. Both the Collector and Conservator apparently contemplate charging the Railway only with this rate, but this is clearly wrong. The Government cannot thus charge different prices to different purchasers, and whatever price may be fixed upon, must be applicable to the general public as well as the Railway Company. The seigniorage should be regulated with reference to the cost of production, and not with reference to the price of coal. As to the protection of the scrub-jungles, the Conservator estimates the cost of fencing six tracts, aggregating twelve square-miles, at about 6,500 Rupees, and the salary of a Watchman would be 84 Rupees annually for each, or altogether Rupees 7,000 in the first year, and about Rupees 500 annually thereafter. Seeing how greatly the fuel resources of the Salem District have already been trenched upon by the Railway, the Government sanction this expenditure, the Collector and Conservator being left to decide by which department the different reserves shall be looked after.

13. *Coimbatore.*—This district, owing to scanty rain-fall, the prevalence of high winds, &c., is generally unfavorable to the growth of trees, and the Collector

despairs of private enterprise effecting much in the way of growing fuel, and recommends that Government should undertake this work.

14. The Government have already directed the reservation of 6,000 acres of jungle near the Walliar tract, and the same course may be adopted elsewhere.

G. O. 8th March 1866, No. 596.

The question of Government growing timber on the Neilgherries has already been fully considered, and decided in the negative, and this decision has been approved by the Home Government.

15. *Tunjore.*—The Acting Collector, Mr. Banbury, states that the Railway in his district has hitherto drawn its supplies of fuel from Ceylon, but that this source of supply is now closed, owing to the Government of Ceylon having imposed a duty on the export of wood. He considers it hopeless to rely on private enterprise, as there is no land available for planting in the delta, while in the upland tracts the ryots are not sufficiently well off to undertake the work, and the merchants and capitalists can realize twelve per cent. on first class mortgages. He states that there are large tracts available for Casuarina along the seacoast, and recommends that Government should assume the duty of providing the Railway Company, if not the public generally, with fuel. The Board's recommendation is limited to the formation of a small experimental plantation of Casuarinas, &c., and the planting of channel and canal banks. This is as much as the Government can legitimately undertake, and it is to be hoped that with this example before them, and the prospect of a profitable and certain demand, private individuals will take up the work.

16. *Trichinopoly.*—In this district, as in the preceding districts, no expectation is entertained of planting for sale being undertaken by the people. All that can be done is to husband existing resources, and to this the Collector's attention has been directed.

G. O. 30th August 1866, No. 2,278.

17. *Bellary.*—This district is particularly unfavorable to the growth of trees, and the Collector does not consider that "plantations, either by Government agency or by private enterprise, or by a combination of both" will succeed, until the climate of the district has been improved by irrigation on an extensive scale. The Government have already had practical proof of the unfavorable results of planting by State agency, and all that can be done, at least at present, is to encourage the people to plant the Babool, which seems to suit the district best, as extensively as possible.

18. *Cuddapah.*—In this district there is the same hopelessness of private enterprise, and careful conservancy and re-planting by the Forest Department are the only measures suggested or apparently feasible. Captain Beddome's attention should be directed to these.

19. *Malabar and Kurnool.*—No reports have been received from these districts; the Board will call for them.

20. The Acting Conservator's letter, recorded at the head of these Proceedings, relates to the formation of Railway reserves. The Home Government have now permitted the Railway Company to commence two experimental plantations, and

Proceedings of the Madras Government, Revenue Department,
15th January 1867.

the results of these will afford valuable data for future guidance. The Government will, as already stated, be prepared to sanction reserves in favorable localities.

21. The Acting Conservator's proposal to look to England for Foresters is of doubtful expediency. Natives and Eurasians have great advantages in constitutional ability to stand exposure and in knowledge of the languages, over Europeans of the class likely to be secured by the salaries which Government can afford, and the Government cannot believe that such experienced Officers as Major Morgan, Mr. Ferguson, and others, could not teach forestry to intelligent Natives or Eurasians; but men of this stamp must have the prospect of promotion in the department, as vacancies occur, or they will naturally avoid it. Competent agents for far more difficult and responsible duties are found, without difficulty, in other departments, and will not be wanting in the Forest Department if proper and reasonable encouragement be held out to them.

(True Extract.)

Secretary to Government.

To the Officiating Conservator of Forests.
„ the Board of Revenue.
„ the Public Works Department.
„ the Accountant General.

Exd. S. T. Augustin.

Lid

Railways

237

No 237

Comm^d to the
Consulting Engineer
for Railways and
to the Supply Engr

10 20 Lt. Ep. Rys
60 70 SES

Gart St George
24th Jany 1867

Sd
Capt 25 Jany/67