M.R..O. 1—32,000—16-10-29.

MADRAS RECORD OFFICE.

Government of Madras.

Revenue DEPARTMENT.

G.O. No. 2098 Press Mis.

428-429

Dated 19 & July 19 1869

Not to be folded or roughly handled

No. 429. ORDER THEREON, 19th July 1869, No. 2,098.

Miscellaneous.

THE Government regret that they are unable to assign any further funds for the prosecution of these works, originally undertaken for the purpose of providing labour for the distressed poor.

2. The Board are, however, at liberty to provide for such expenditure as may be immediately needed by transfers from any local works "Original" or "Repairs," which are of a less emergent character.

(True Extract.)

(Signed) **R. A. DALYELL,**
Acting Secretary to Government.

To the Board of Revenue.
„ the Accountant-General.

Exd. F. B. Bantleman.

Govt. of Madras, July 1869.

REVENUE.

To

THE BOARD OF REVENUE,

&c., &c., &c.

Dated July 19th.

Recd.

Encl.

G. O., 19th July 1869, No. 2,008.

JULY.

Nos. 428-429.

Grain-roads in North Arcot.—Board to provide for such expenditure as may be immediately needed by transfer from other local works of a less emergent character.

Proceedings of the Madras Government, Revenue Department, 19th July 1869.

No. 428. Read the following Proceedings of the Board of Revenue, dated 8th July 1869 :—

Read the following letter from J. D. ROBINSON, Esq., Collector of North Arcot, to the Sub-Secretary to the Board of Revenue, dated Palmanair, 10th June 1869, No. 174:—

ADVERTING to the Proceedings of the Board, dated 12th April last, No. 2,495, communicating Order of Government, dated 9th idem, No. 977, Revenue Department, I have the honour to submit Mr. E. Gibson's special report on roads therein called for.

2. I beg at the same time to submit, as a continuation of Mr. Gibson's report, and with reference to Government Order, dated 19th May 1869, No. 1,399, my remarks on those roads which have been excluded from Mr. Gibson's list.

I.—*Road No. 17 from Penmari to Nendragunta, on Road No. 7.*

Remarks of Range Officer.

Road recently completed is in very fair order, and does not call for any further allotment; the portions of roadway sandy and clayey may be gravelled year after year from the maintenance grant.

Collector's remarks.

The estimate for this work amounts to Rupees 5,360. Of this, the expenditure up to the end of last official year from all sources was Rupees 4,519-12-7. It requires no more money except the ordinary maintenance allowance in the Budgets.

II.—*Section between Kotarlapalli and Pallipatt of road No. 20 from Chittoor to Poothoor Railway Station, North-West Railway.*

The total length is fourteen-and-a-half miles; of this, six were gravelled from Special Fund grant of Rupees 1,400 last year. The remainder eight-and-a-half miles are in bad order, having received on maintenance grant for the past year. Rs. 1,780 are required to bring this portion of the road into order. This road from Pallipatt to its junction with Road No. 13, at Kucklian Chuttrum, is in very fair order, but wants gravelling on portions, which would cost about Rs. 1,000. Numerous jungle-streams are unbridged. It is, therefore, recommended that sanction may be given for their construction, and for a causeway being built across the Naranavanum river to facilitate traffic. Estimates are under preparation.

Recommends that sanction may be given for Rupees 1,780 for the completion of section between Kotarlapalli and Pallipatt, and a further grant of Rupees 1,000 for the improvement of the section between Pallipatt and point of junction with No. 13 Road. This Section is much intersected by ravines and streams. To complete it, masonry works (for which estimates are now said to be under preparation) will have to be built, and funds provided in the ordinary Budgets.

III.—*Road No. 9, from Sautghur to Amboor.*

The road is completed with the exception of some turfing from Sautghur to the north bank of the Bathnapalli river, a distance of about three-and-a-half miles, but the last half a mile from the 9th mile-stone to the river is very much cut up, and will require more gravel from the south bank of the river to the 4th mile-stone; the formation of the road is completed and the tunnels built except two, the estimated cost of which is Rupees 400. This portion of the road, however, has not been gravelled, and this will

The remarks of the Range Officer correspond in all respects with the Collector's own observations. This road has a maintenance allowance of Rupees 900 in the current year's Budget. If Rupees 1,500, or half of the unexpended balance of the estimate is granted, the road can be finished off in first-rate style.

have to be done before the ensuing wet season; from the 4th mile-stone to within half a mile of the Palar river, the road is completed, and for the last half a mile up to the north bank of the river, the only thing necessary to complete the road is to spread the gravel which is already collected.

The requirements of the road now are, therefore, about Rupees 200 for turfing slopes, Rupees 400 for two tunnels, and Rupees 900 for gravelling a little over seven miles of the road, or a total of Rupees 1,500; this sum will put the road into excellent order. The road is even now in very fair condition, and the work is executed throughout in the most satisfactory manner.

If the conservation of the work already executed only be considered, the Rupees 400 for tunnels will not be absolutely necessary.

The estimate amounts to Rupees 13,000, and the expenditure up to date is Rupees 9,606-2-5.

IV.—*Road from Madandacoopam to Melpadi* (*Extension of No.* 13.)

Earth-work completed throughout, and a few small tunnels constructed. The estimate amounts to Rupees 5,300, and the expenditure on the work already executed is Rupees 1,627.

For the proper conservation of the work already executed, an expenditure of Rupees 825 will be necessary in turfing and gravelling, and Rupees 1,275 for tunnels. There are two large tunnels especially which it would be advisable to construct at once. The estimates for this amount to Rupees 720, or considerably mor than half the sum required for tunnels. There is not much to report on this work. The execution is good as far as it has gone, and the expenditure of Rupees 2,100 as detailed above will render the road passable throughout and put most of it into fair condition. There is one other tunnel which though not necessary for the conservation of the work done would be a great improvement to the road if built. The estimate for it is Rupees 150 only, so that for Rupees 2,250 the road could be put into fair working order.

This is a short but important link of road opening up the country on the west bank of the Poiney river, and giving access from the main roads north and south to Vallimalai, one of the principal places of pilgrimage in the district.

The estimate for this work amounts to Rupees 5,300, and was submitted to the Board for their sanction. Of this, Rupees 1,627 have been spent during the past official year from special funds. If the Rupees 2,100 asked for by the Range Officer be given, the road may be completed and put into good working order.

V.—Road No. 15 *from Chittoor to Arugonda with branch to Iral.*

I inspected this work on the 17th and 18th April 1869, and found the formation of the main road completed to within about quarter of a mile of the Arugonda river, when I ordered the trace to be slightly altered to get a better approach to the river; from the opposite branch of the river to Arugonda the road was only partly marked out, but this has since been completed, the Overseer stating that he had orders from the late Range Officer to finish first the branch road as an excuse for the backward condition of this portion of the main road. The formation of the branch road is complete throughout with the exception of an embankment 150 yards long in the bed of the Arapookundah tank where an eight yards road dam has also to be constructed.

The masonry work on the main road is in many instances very badly executed, and the road altogether is in a most unsatisfactory condition; the total number of tunnels built is nine, and there are also twenty-three road dams constructed.

The branch road is in better condition than the main line, and there are ten tunnels and two road-dams constructed up to this date, leaving three tunnels and two road-dams yet to be built.

The estimate for the main line from Chittoor to Arugonda is Rupees 6,000, and that for the branch line Rupees 2,000; but strange to say, this latter estimate was never sent forward for sanction, and the whole of the work done up to this date, at a cost of Rupees 4,791-12-2, has been done out of the estimate for the main line only. The balance of this estimate, amounting to Rupees 1,200, will be sufficient to complete the formation and tunnelling of both roads in the same manner as the work already executed, and I applied early in the present year to the Superintending Engineer for this sum. I would strongly recommend now that this sum be granted and the formation of the whole road completed, and then that a supplemental estimate should be framed for the gravelling, etc., of both roads in order to put them into proper condition. No gravelling was provided for in the original estimates for either road. In fact the original estimate was quite inadequate for the proper execution of the work. As regards the conservation of the work already executed, the maintenance grant of Rupees 800, which appears in the current year's Budget, would be sufficient; but unless a sufficient sum is granted to extend the road such

The branch he was not able to see, but has learned that the formation has been completed throughout with the exception of 150 yards of embankment in the bed of a tank. The formation of the main road is completed up to within two miles of Arugonda, and work was going forward on this part when Collector passed along. This road, as it stands, is the least satisfactory piece of work in the Range, and should not under any circumstances be left in its present incomplete state. The estimate for the main line is Rupees 6,000 and for the branch road Rupees 2,000; but by some strange oversight the latter estimate has never been sent in for sanction, and the whole expenditure on both, amounting to Rupees 4,791, has been made from the estimate of the main line only.

Thus, considering that the formation of fourteen miles of road has been completed with nearly the complement of road dams and small tunnels provided for in the estimate at some Rupees 300 a mile, or a moiety of the amount required according to estimate, the Collector is unwilling to be too critical respecting the present state of the work. It is expected that for the Rupees 1,200 remaining or the estimate for the main road, formation may be completed through to Arugonda, and if the estimate of Rupees 2,000 for the branch road were now sanctioned, both could be put into fair working order. These roads tap a very fertile valley in which are situated some of the largest villages in the talook, and on that account, as well as for the conservation of work thus far executed, it becomes most desirable that the balance of the estimate, Rupees 1,200, for the main line, (which the Range Officer tells the Collector he has applied for,) and the whole estimate for the branch road, Rupees 2,000, should be made available for expenditure during the current year.

as it is to Arugonda, as I have suggested above, I think the objects of its construction will be almost completely frustrated, and its usefulness to a very great extent destroyed; the Rs. 1,200 required to open the road to traffic throughout its whole length would, therefore, I think, be well spent.

VI.—*Road No. 55 from Veringipuram to the Railway Station.*

The earthwork is completed throughout, and as the road consists of an embankment for the greater part of its length, it is absolutely necessary that turfing and gravelling to the amount of Rupees 1,100 should be executed before the wet season. There are three tunnels provided for in the estimate, and as they are all across river and Irrigation channels which have a constant supply of water, it is very necessary that they should be executed, as without them this important road is almost impassable. The estimated amount for tunnelling is Rupees 1,300. The total amount required for this road is, therefore, about Rupees 2,500. The amount of estimate is Rupees 7,700, and the expenditure up to date amounts to Rupees 1,101-8-7.

This is a short Railway feeder. In the remarks of the Range Officer the Collector fully concurs. If Rupees 2,500 be granted, this useful little Railway feeder may be opened for general traffic.

VII.—*Road No. 4 from Pallicondah to Kaniembady on road from Vellore to Arni.*

VIII.—*Road No. 64 from Pallicondah to Vepancoopam.*

3. The Range Officer has not yet furnished a report on these two works; but as neither of them will require special provision, I have thought it better not to detain Mr. Gibson's report longer on this account.

P. S.—I have just learned from the Range Officer that the report on the last two roads which I had called for, has been sent to the Superintending Engineer.

ENCLOSURE No. 1.

From E. GIBSON, Esq., Assistant-Collector, to the Collector of North Arcot, dated Palmanair, 3rd June 1869, No. 162.

I HAVE the honour to report that in accordance with the instructions contained in the Order of Government, Revenue Department, dated 9th April 1869, No. 977, I have inspected the roads enumerated below upon which outlay has been made from Special Funds. The road from Punganoor to Kulloor is not one of those mentioned in the Government Order, but, at your suggestion, I have included it in the list. I preserve the order in which I visited the works.

Southern Division.—1. No. 1 Road from Conjeveram through Wandewash and Thellar to South Arcot frontier.

2. Road from Wandewash through Chetput to Poloor.
3. Road from Yetwedu Junction of Poloor road to Arnee.
4. Road from Arnee to Wandewash.
5. Road from Chetput to Arnee.
6. Road from Arnee to Santavassal.
7. Road from Kannamangalam through Poloor to South Arcot frontier.

Northern Division.—8. Road from Tripathi Railway Station through Kalastri to Nellore frontier towards Naidupet.

Proceedings of the Madras Government, Revenue Department,
19*th July* 1869.

9. Branch Road from No. 8 at Yerpet to Nellore frontier.

10. Road from Chendragherry to Rangampet.

Western Division.—11. Road from Cuppum through Venkatagherricottah and Palmanair to Cuddapah frontier.

12. Road from Punganoor through Suddum, to Trunk Road No. XI. at Kulloor.

II. Of the sixteen minor roads mentioned in the Government Order I report upon six. Eight others have recently been removed from the list by the Government Order, Revenue Department, dated 19th May 1869, No. 1,399, while, as regards the remaining two, I offer the following explanation. They are the roads from Vussoor to Natchatracovil and from Trivattur to Wandewash. The former is an insignificant village road upon which only Rupees 1,570 have been spent, and for which the Range Officer requires no further grant; to have visited it would have detained me another day in the Sub-Division, and would, in no way, have furthered the object which Government appear to have had in view in ordering my inspection. My omission to inspect the latter was the result of an oversight which I regret. The Range Officer, however, states that only Rupees 500 are now needed to complete the work; it is therefore probable that Government will be able to dispense with my report upon it.

With these preliminary remarks I proceed to give the results of my inspection:—

III. Road from *Conjeveram through Wandewash and Thallar to the frontier of South Arcot.* (1) The expenditure upon "new work" since 1864 has been Rupees 7,719, of which Rupees 5,532 were allotted from local and Rupees 2,187 from Special Funds.

The entire length of this road is thirty-seven miles, which may be conveniently divided into four sections; (1) from Conjeveram to the south bank of the Palar, four miles; (2) from the Palar to the Cheyar, eight miles; (3) from the Cheyar to Wandewash, twelve miles; and (4) from Wandewash to South Arcot frontier thirteen miles.

(2.) The first section from Conjeveram to the Poloor is situated in the Madras District; there is no formed road, but here and there a tunnel has been built to facilitate the passage of wheeled traffic over deep streams and channels. Being unacquainted with the rates current in this part of the country, I am not prepared to state the probable cost of the construction of this piece of road, as leading to the Terminus of the Tramway; it is, however, very desirable that it should be made, and I would suggest that the Range Officer be directed to prepare an estimate. The expense of the first mile, which passes through the town, ought naturally to fall upon the Conjeveram Municipal Commission, but although they collect tolls upon vehicles entering their limits, I am told that it is contrary to their traditions to construct roads.

(3.) The second section from the Poloor to the Cheyar is included in the Vellore Range. Upon a reference made subsequent to my inspection, regarding the amount requisite to put this portion into good order, the Assistant-Engineer reports that the work is complete, and that nothing is required beyond "maintenance allowance." I cannot agree with Mr. Brockman in this opinion. At the date of my inspection, the first three miles were in a very bad state, the sub-soil appeared to be far from firm, while the so-called gravel used for the surface of the road was of such inferior quality, containing so much clay, that in dry weather it must pulverise, and in wet weather become mud. The last five miles were in slightly better condition, and, in consequence of a light shower of rain sufficient to lay without saturating the dust, showed to the best advantage. The material used is, however, of the same character, the best of the kind to be had in the neighbourhood it is true, but of which a road more useful than a bandy-track can never be made. As regards this section therefore, I beg to recommend that it be metalled with broken stone, which, at a cost of Rupees 660 a-mile, will amount to Rupees 5,280.*

* I reckon the rate at 12 Annas per cubic yard, inclusive of spreading and rolling the breadth of metalling 4½ yards and 4 inches in depth.

(4.) The third section from the Cheyar to Wandewash lies in the Poloor Range. Of this four miles (17th, 20th, 23rd, and 24th) are in very good order; of the remaining eight, some have

the appearance of having never been formed, and some of having been abandoned for years. The maintenance allowance has apparently been wisely spent in making a few miles thoroughly good, rather than on a vain endeavour to patch up the whole length of the line. On these two last sections, many tunnels have been built, most of which were constructed more than twenty years ago; they are, however, in good order, and I am of opinion that no more are emergently required. The sum necessary for earthwork, etc., upon this portion of the road is included in the amount specified in the next paragraph.

(5.) The fourth section from Wandewash to the South Arcot frontier is also in the Poloor Range. Of this section, about a mile altogether (made up of portions of the 25th, 31st, 33rd, and 34th miles) is in good order; two miles (32nd and 33rd) are formed and bridged, but for the most part not gravelled, two-and-a-half miles (29th, 30th, and 31st) are unformed, the remaining miles are formed, but not gravelled or bridged. In its present unfinished state the road is useless. The Range Officer has prepared an estimate for this and the third section of the road; it amounts to Rupees 40,000. Of this sum, Rupees 16,100 is for masonry, and the remainder for earthwork and gravelling with superintendence. I have observed above that I do not consider that any more tunnels are immediately needed for the third section. As regards the fourth, the country is so flat and the streams so shallow, that the construction of bridges may very well be postponed until they can be erected in the ordinary course from annual grants. Deducting, therefore, from Rs. 16,100, allotted in the estimate to masonry, the sum of Rupees 350, the estimated cost of five tunnels of one vent of two feet space which are clearly intended to cover irrigation channels, and are consequently necessary, and allowing further the sum of Rupees 50 a-mile, or Rupees 650 for the construction of road-dams in the place of tunnels on the fourth section, I would recommend that the sum of Rupees 15,100 be struck off from the amount of Mr. Bevan's estimate, and that the balance, namely, Rupees 24,900, be sanctioned for expenditure upon earthwork and gravelling, which are, in my opinion, absolutely necessary to put the road into a state in which it will be at all useful as a means of communication.

(6.) The total of the sums thus recommended for expenditure in this district upon the road between Conjeveram and the South Arcot frontier, amounts to Rupees 29,380, and unless this outlay be made, the work must deteriorate from day to day.

IV. Road from Wandewash to Poloor vix Chetput.—The expenditure upon this road, which is thirty-four miles long, has been up to 30th April Rupees 32,037, of which Rupees 3,000 were drawn from Local and Rupees 29,037 from Special Funds. The original estimate was set aside as inadequate, and the revised estimate is not yet prepared; the sum still required by the Range Officer is said to be Rupees 3,400. The road has been formed, and the tunnels have been built throughout; about three-and-a-half miles (20th, 21st, 22nd, 28th, and 29th) are still ungravelled, and I presume the balance mentioned by the Executive Engineer is required for completing these portions, with the exception of which, due allowance being made for the work most recently completed which is absolutely new, the line is throughout in excellent order. It appears to me that this is a larger sum than is necessary, and I would propose that Rupees 1,155 only be granted.

V. Road from Arni to junction with Poloor road at Yettivedu.—The length of this road is twelve miles; the expenditure upon it (entirely from Special Funds) up to the 30th April has been Rupees 22,401; it is gravelled and tunnelled throughout, and is in perfect order; no further allotment is needed.

VI. Road from Arni to Wandewash.—(1.) The entire length is twenty-four miles, which I divide into two sections: I.—From Arni to the Cheyar Anicut, ten miles. II.—From the Cheyar Anicut to the end, fourteen miles. The expenditure which has been altogether from Special Funds, amounted on the 30th April to Rupees 56,542, and a further allotment of Rupees 2,312 is said to be still required.

(2.) The first section is completed, the tunnels having been built and the road gravelled; it is in good order, and no further outlay is necessary.

Proceedings of the Madras Government, Revenue Department,
19*th July* 1869.

(3.) The second section is less complete; a large bridge over the Cheyar Anicut is unfinished. Immediately beyond this bridge, at a much lower level, the road passes over a small tunnel which crosses the main channel of the Anicut, and which was apparently built many years ago. This tunnel is only about six feet wide, and the parapets are exceedingly low. Consequently the passage of carts over it must be attended by much danger. I was informed that it was not intended to improve this state of things; but although it be a work which it is not perhaps necessary to execute from Special Funds, I would strongly urge its being entered for sanction in next year's Budget. East of the Cheyar, the first (3) three miles of road are completed and in good order. Of the remaining eleven miles, two-and-a-half (portions of 37th, 40th, 41st, and 42nd) are not formed, and two-and-a-half (portions of 35th, 45th, and 46th) are formed but not gravelled. The other six miles are finished, but the work being new is rough. On the 37th mile two tunnels are incomplete. I was prevented by unforeseen circumstances from inspecting the last two miles of this road, and was forced to be content with information furnished by the Overseer. In its present unfinished state the road east of the Anicut is of little use. In the absence of any detailed estimate, I cannot say for what particular purpose the balance of Rupees 2,312 is required, but there certainly remains to be done as much work as could possibly be obtained for that sum; I beg, therefore, to recommend that this expenditure be sanctioned.

VII. *Road from Chetput to Arni.*—(1.) Length seventeen miles. Expenditure to 30th April, Rupees 29,944, of which Rupees 27,444 were drawn from Special and 2,500 from Local Funds. Amount still required by the Range Officer, Rupees 786.

(2.) With the exception of half a mile (parts of 29th and 28th miles) this road is formed throughout, and the tunnels are all built. About a mile (portions of 36th and 35th miles) which is otherwise complete requires to be gravelled. The whole line, with the exception of this short piece, is in excellent order throughout. I beg to recommend that the expenditure of the small sum required, namely, Rupees 786, be sanctioned.

VIII. *Road from Kannamangalam through Poloor to South Arcot frontier.*—The whole length of this line is twenty-six miles. The expenditure is stated to have been Rupees 32,037* up to the end of April; the road, however, has been in use for several years, and this is merely the amount spent recently upon its improvement. The sum of Rupees 3,845 is said to be required to complete the work. In the absence of any detailed estimate, I cannot tell for what particular kind of work this outlay is needed; but as a considerable number of tunnels remain unbuilt, I suppose that it is intended for their construction. In my opinion this work is not emergent, and I beg, therefore, to recommend, inasmuch as the state of the road is in other respects exceedingly good, that this money be not granted from Special Funds.

	Rs.
* Special Funds	29,037
Local Funds	3,000
	32,037

IX. *Road from Arni to Santavasal and Padavedu.*—The length of this road is about nine miles. The mile-stones not being put up, I was unable to tell the exact distance over which I passed upon it. The expenditure has been Rupees 4,055, (exclusively from Special Funds,) and the sum still required, Rupees 9,337. Very little work has been executed up to the present time. A line has been merely marked out by throwing up the earth excavated from the side channels, and a few petty tunnels for irrigation purposes have been built. This road is one of comparatively small importance, and the little work already done is not likely to be very injuriously affected by delaying its completion. I beg, there fore, to advise that the execution of the work be postponed to be carried out in the ordinary course by annual grants.

X.—*Road from Tripatti Railway Station through Kalastri to the Nellore frontier towards Naidupet.*—(1.) The expenditure up to the end of April upon this road, which is thirty-five miles in length, has been Rs. 59,156,* of which Rs. 10,600 were spent on the branch from the Railway Station to Tripathi town, and Rupees 300 and odd remain unpaid. The Range

	Rs.
* Imperial Fund...	15,756
Local...	32,493
Special	9,000
Contribution by Zemindar	1,300

Officer states that he still requires Rupees 9,884, that is to say, the balance of the estimate of Rupees 69,040 alluded to by the Board.

(2.) I divide the whole line into four Sections. (I.)—From Tripathi Railway Station to Yerped, eight miles. (II.)—From Yerped to Kalastri, nine miles. (III.)—From Kalastri to Nellore frontier, ten miles. (VI.)—From the frontier to Naidupet, eight miles.

(3.) The first section from the Railway Station to Yerped is completed; the first three miles are very good, and the remaining five are in fair order. No further outlay is necessary beyond the annual allowance for maintenance.

(4.) The second section from Yerped to Kalastri has been formed, metalled, gravelled, and bridged; nevertheless it is in exceedingly bad condition, and resembles rather a ploughed stony field than a made road. I know that it will be said that the work is new, and has not had time to settle; but in my opinion, this does not account for its present state. The cause is far more serious. The metal, which has become mixed with the gravel spread on it, forming with it a loose mass some four or five inches in depth, is exposed throughout the section; it is of a shingly character, and the pebbles, many of which are three or five inches in diameter, are smooth and rounded, so that, unless, in course of time, they become broken by the constant passage of heavy traffic, it seems to me they can never "bind" so as to form a united stratum. If I am right in this opinion, which I give with some diffidence, subject to correction by those of larger experience, the only remedy will be to remove the present material and re-place it after breaking it into small angular fragments. As this, however, would be a task attended by considerable expense costing probably some six or seven hundered Rupees a-mile, I am not prepared to recommend that it be undertaken until the existing work has had a fair trial, or until it has been condemned by some better authority.

(5.) The third section from Kalastri to the Nellore frontier is formed, gravelled, and bridged throughout, and is in as good order as could be expected seeing that the work is new. After a few showers of rain it will no doubt settle down, and the surface become hard. A few only road-dams are still necessary; a special grant for these is, however, not desirable, as the construction of them is not emergently necessary.

(6.) The fourth section from the frontier to Naidupet. At the time of my visit to this part of the district, I was not aware that the Chendragherry Range Officer had charge of the road beyond the boundary of North Arcot; consequently I did not inspect and am unable to speak from personal knowledge of the requirements of this section. I learn, however, that the road is formed, and Mr. Hayes states that materials have been collected, and that the balance of the amount of the estimate, Rupees 9,884, is needed to complete the work. By reference to the detailed estimate, I find that, of this sum, only two-thousand Rupees are allotted to masonry; one-half of this amount is needed for building small culverts over irrigation channels, Rupees eight-hundred more are required for road-dams, and the balance for two small tunnels; the two former items should, in my opinion, be allowed to stand, and it is hardly worthwhile to strike off the small sum which remains. I beg, therefore, to recommend that the balance of the estimate, namely, Rupees 9,884, be sanctioned in order that the line of communication with the adjoining district of Nellore may be uninterrupted.

XI. *Road from Yerped to Nellore frontier.*—(1.) The whole length of this road is nineteen miles, of which I inspected sixteen miles, the remaining three are in the Venkatagherry Zemindary, and, although constructed by the Chendragherry Range Officer, have, since completion, been handed over to the Nellore District.

(2.) The aggregate amount of the original and supplemental estimates is Rupees 26,080. The expenditure has been Rupees 18,858, of which Rupees 6,806 have been drawn from Imperial and Rupees 1,500 from Special Funds, the remainder having fallen upon Local Funds. The road has been formed and gravelled and some of the tunnels have been built. The approaches to the beds of many of the streams which remain unbridged are dangerously steep, and ought not to

Proceedings of the Madras Government, Revenue Department,
19th July 1869.

remain in their present state. The majority of the inclines may be reduced to "cuttings," but it is necessary that some few of the water-courses should be bridged over and the road through others supported by dams. I enumerate in the margin the several items of masonry which I deem immediately necessary. The entire cost of construction will be Rupees 3,500. In addition to these, there is a supply channel to a large tank at the village of Pallom on the 18th mile, which, when in fresh, cannot be forded by carts. The bridging of this is not provided for in the estimate, but as in its present state the traffic must frequently be interrupted, I would propose that the Range Officer be required to prepare an estimate, and that it be sanctioned as an emergent work.

		Rs.
24th mile.	One drain for irrigation at Thiagaia-palli, 1 vent, 1½ feet	35
	One Road dam	240
23rd ,,	One Road dam	18
Do.	do	58
22nd ,,	One Road dam	24
20th ,,	One Bridge, 1 arch 20 feet span	*1,550
19th ,,	Do. do.	*1,550
16th mile.	One drain for irrigation 1 vent 1½× 1½ feet	35
	One Road dam	44
14th ,,	One Tunnel 1 vent 3'×3'	65
12th ,,	One Road dam	24
11th ,,	One drain for irrigation as above	35
9th ,,	One drain for irrigation as above	35
		3,498

* These are not included in the estimate. I have entered an approximate amount according to the size of the bridges which, in my judgment, are necessary.

XII. *Road from Chendragherry to Rangampet.*—(1.) The length of this road is five-and-a-half miles. The expenditure has been Rupees 3,288.* The road is formed throughout, but only a portion of it has been gravelled. Some tunnels have been built, others are still required. I observe that the sum of Rupees 1,280 is allotted in Part I. of the Local Fund Budget for expenditure during the current year. This will probably be sufficient to finish, or at any rate to put the work into such order that it will not suffer by a little delay in its completion. Moreover, it is as yet only a village road, and, although it may eventually be extended to the Nagapatla Pass, the proposal to carry it on has, for the present, been abandoned.

* Rupees 1,175 from Local, and Rupees 2,113 from Special Funds.

(2.) I should mention that I have not visited this road since the receipt of the Government Order, because having ridden over it twice a few weeks before, I was well acquainted with its condition, and to have diverted my route so far to the west, would have caused a delay of two days.

XIII. *Road from Cooppum through Venkatagherrycottah, Palmanair, and Punganoor, to Cuddapah frontier.*—(1.) The expenditure upon this road, which is seventy-two miles in length, has been, during the last three years, Rupees 29,599.* The amount of the original estimates was Rupees 1,00,450. A supplemental estimate for the latter portion of the road is however in course of preparation.

* Local Funds Rupees 8,483.
Special Funds Rupees 21,116.

(2.) I divide the whole line into five Sections: (I) From Cooppum to Venkatagherrycottah, twenty-one miles, (II) From Venkatagherrycottah to Bireddipalli, twelve miles. (III) From Bireddipalli to Palmanair, (*i. e.*, to junction with Bangalore road,) ten miles. (IV) From Palmanair to Punganoor, nineteen miles. (V) From Punganoor to the frontier, ten miles.

(3.) The amount of the estimate for the first section from Cuppum to Venkatagherrycottah is Rupees 65,000, of which Rupees 21,645 provide for earth-work and gravelling, the remainder for masonry and sundries. The expenditure up to the 30th April has been Rupees 16,464. The road is formed throughout with the exception of about half a mile, but only three miles are gravelled Many of the bridges and tunnels throughout the Section have been commenced but remain unfinished, and in order to avoid loss, should be completed. One item of masonry (not yet commenced,) requires special notice, namely, the bridge of five arches which is to span the Palar near

Kristnapooram, the estimate for which amounts to Rupees 14,000. I was anxious, if possible, to deduct this large sum from the amount immediately required, by recommending that the construction of the work be postponed. Judging, however, from my own experience of the locality last year, which has been corroborated by inquiry this year, it appears that the stream which, at this part of its course, is perennial, is at all times, except in one or two of the dryest months, exceedingly difficult to ford, and that it is liable to freshes not only after heavy rain, but upon the occurrence of light showers, while, during the north-east monsoon, travellers are compelled to halt upon the bank for days together waiting for the waters to subside. Unless, therefore, this bridge be built, the traffic will be liable to constant interruption, and the utility of the road will be greatly lessened; only those bridges noted in the margin, the total cost of which is Rupees 3,800, can in my opinion be allowed to remain unbuilt until provided for by annual allotment. From the amount of the estimate may also be withdrawn the sum of Rupees 2,100 for planting avenues, making the total of deduction Rupees 5,910. Outlay necessary from Special Funds will, therefore, be Rupees 59,090, of which the sum of Rupees 16,464 has already been spent, leaving a balance of Rupees 42,626 for future expenditure.

2nd Mile,	1	Bridge	Rupees 2,200
8th ,,	1	Tunnel ,,	480
9th ,,	1	do. ,,	130
,,	1	Bridge ,,	1,000
		Rupees...	3,810

(4.) The estimate for the second section from Venkatagherrycottah to Bireddipalli amounts to Rupees 24,050; of this Rupees 6,600 from Special Funds have been expended during the last three years, that is to say, since the estimate was prepared; the road, however, was formed many years ago, and has ever since been open to traffic. At present it is in fair order, but, in some places, especially where the line has been recently diverted or prolonged, tunnels (as noted in the margin) are immediately necessary, the approaches to the water-courses being dangerously precipitous. The total amount needed is Rupees 4,090. As yet only one tunnel has been built upon the entire section.

		Rs.
146th Mile (8th furlong).—	1 Tunnel	300
144th	,, ,, ...	300
,,	,, ,, ...	55
143rd	,, ,, ...	55
,,	,, ,, ...	130
,,	,, ,, ...	130
142nd	,, ,, ...	300
141st	,, ,, ...	300
140th	,, ,, ...	1,100
,,	,, ,, ...	130
,,	,, ,, ...	130
139th	,, ,, ...	55
,,	,, ,, ...	55
,,	,, ,, ...	55
,,	,, ,, ...	55

		Rs.
138th Mile.—	1 Tunnel	610
137th	,, ,, ...	139
136th	,, ,, ...	200
	Total...	4,090

(5.) The third section from Bireddipalli to Palmanair is in excellent order, and requires no expenditure from Special Funds.

(6.) Fourth section from Palmanair to Punganoor. The first six miles of this Section cannot be improved. The remaining thirteen are, with one exception, (134th mile,) in fair order, and do not require any immediate outlay. The Range Officer informs me that an estimate is in course of preparation for widening and metalling the road in order to make it correspond in width and construction with the other Trunk Roads of the district. It appears to me that the best plan of carrying out so important a work, is to do so leisurely by means of annual grants.

(7.) The fifth section from Punganoor to Cuddapah requires immediate attention. Even in the present dry season, wheeled traffic is greatly retarded owing to its bad condition, while in wet weather it must, in many places, be impassable. In the absence of any detailed estimate, I cannot state exactly what amount it is necessary to spend in order to render the work useful. I would recommend, however, that the sum of Rupees 500 a-mile be at once allotted for the construction of the tunnels most needed, and for raising the road in certain places, particularly on those portions of the 142nd and 143rd miles where every shower brings a flood of water over the road. The entire grant will come to Rupees 5,000.

Proceedings of the Madras Government, Revenue Department,
19th July 1869.

(8.) The total sum necessary for immediate expenditure between Cooppum and Cuddapah frontier in order to render the road practically useful, avoiding loss by leaving unfinished bridges which have been partially constructed, amounts therefore, in my opinion, to Rupees 51,719.

XIV. *Road from Punganoor through Suddum to Trunk Road No. XI.* The entire length is thirty-five miles. The expenditure (which has been exclusively from Special Funds) up to the end of April amounts to Rupees 18,000. An estimate is in course of preparation, but is not yet ready. With the exception of a mile-and-a-half, the road is formed throughout, but it is necessary that it should be gravelled at once, or the formation will be greatly damaged by the traffic passing over it. The cost of gravelling will be about 275 Rupees a-mile, to which must be added Rupees 50 a-mile for road dams, to be put down temporarily until the bridges are built; this gives a total of Rupees 10,050, which together with the cost of superintendence at five per cent. will be the amount still necessary, namely, Rupees 10,552.

XV. The sum still necessary, in my opinion, for immediate expenditure upon all the above roads amounts then to Rupees 1,09,288, of which Rupees 33,633 are needed for the Southern Division, Rupees 13,384 for the Northern Division, and Rupees 62,271 for the Western Division. Unless this expenditure be sanctioned there can be no doubt that the work already done will be of little use while it lasts, and that in most cases it will not last very long.

XVI. I regret that I was unable to submit this report by the 15th ultimo, as directed in the Government Order. My inspection was complete by the 19th idem, but I had occasion to make further references to the Range Officers, and consequently further delay ensued.

SUBMITTED to Government, with reference to paragraph 3 of their Order of the 9th April 1869, No. 977.

2. Annexed is a Tabular Statement showing the roads inspected by Mr. Gibson with his recommendation thereon and the Board's opinion, also the Statement furnished by the Collector, of roads which were excluded from Mr. Gibson's inspection, under Government Order, dated 19th May 1869, No. 1,399.

3. The Board have in their recommendation been anxious to limit as much as possible the sums asked for, but the estimates have already been so much cut down, that they are unable to effect much further reduction without trenching on the sums stated to be positively necessary to conserve existing work, or to render passable lines of communication in which links are wanting.

4. The Collector has not given any opinion on Mr. Gibson's report, confining himself to its transmission.

5. The Board suggest that the attention of the Superintending Engineer should be called to the state of the road between the Palar and Cheyar, as described in paragraph 4 of Mr. Gibson's report, in order that he may judge whether the value of the money spent has been realised.

6. The aggregate sum now applied for by the Collector and his Assistant is Rupees 1,22,174, namely, for grain roads Rs. 96,033, for other roads inspected by Mr. Gibson Rs. 14,052, and for roads excluded from Mr. Gibson's inspection and reported on by Mr. Robinson Rupees 12,090.

7. This sum has been reduced by the Board to Rupees 1,05,274, and they trust that Government will be disposed to make a grant to that extent. The Road Fund of the district is already so completely absorbed by maintenance allowances, that little or nothing in the way of assistance can be hoped from it, and unless, therefore, a special grant is made, the Board fear the expenditure hitherto incurred on relief-works will not have been a means of permanent improvement to the communications of the district.

STATEMENT of expenditure on Roads in North Arcot from Special, etc., Funds, reported on by Mr. Gibson.

Work.	Length.	Amount of Estimate.	Expenditure from Special Funds.	Balance.	Required for future expenditure.	Remarks of Mr. Gibson.	Amount recommended by the Board.	Remarks.
SOUTHERN DIVISION.	Miles.	RS.	RS.	RS.	RS.		RS.	
Grain Road No. 3.								
No. 1.—Road from Conjeveram through Wandewash and Thellar to South Arcot frontier.	37	...	2,187	...	...	Rupees 5,532 were expended from Local Funds since 1864. Rupees 3,500 in Part II. of the Road Fund Budget of 1869-70 for the maintenance of the Road in North Arcot.		
Section 1.—Conjeveram to Palar.	4	...	...	...	...	No formed road. A few tunnels. Cannot estimate. Should be made as being important. Range Officer to prepare an estimate.		
Section 2.—From Palar to Cheyar.	8	...	...	...	5,280	Assistant Engineer states it is finished. First 3 miles very bad. Gravel such as to become mud or dust. Recommends to be metalled with broken stone.	5,280	
Section 3.—From Cheyar to Wandewash.	12	40,000	...	...	24,900	Four miles in good order. The remainder much neglected. Maintenance allowance wisely spent. Many tunnels built, and they are in good order. More not needed.	24,900	
Section 4.—Wandewash to South Arcot frontier.	13					One mile in good order; two miles are formed and bridged; most part not gravelled; 2½ miles unformed; the remainder formed but not gravelled or bridged. Road as at present useless. Range Officer's estimate for this and 3rd Section is Rupees 40,000, of this Rs. 16,100 is for masonry and the remainder for earth work and gravelling. Bridges may be postponed. Deducting		
	37							

Proceedings of the Madras Government, Revenue Department, 19th July 1869.

STATEMENT of expenditure on Roads in North Arcot, etc.—(*Continued.*)

Work.	Length.	Amount of Estimate.	Expenditure from Special Funds.	Balance.	Required for future expenditure.	Remarks of Mr. Gibson.	Amount recommended by the Board.	Remarks.
SOUTHERN DIVISION.—(Continued.)	Miles.	RS.	RS.	RS.	RS.		RS.	
Grain Road No. 4.								
						from Rs. 16,100 Rupees 1,000, required for tunnels and road dams, the remainder of the estimate for masonry may be struck off, and Rupees 24,900 sanctioned which will be sufficient to make the road useful.		
No. 2.—Road from Wandewash to Polur, *via* Chetput.	34	...	29,037	...	1,155	Rupees 3,000 were drawn from Local Funds. Original estimate set aside as inadequate. Revised estimate not yet prepared. Sum still required as stated by Range Officer Rupees 3,400. Road formed, tunnels built. Line in excellent order with the exception of 3½ miles still ungravelled. Recommends a grant of Rupees 1,155 only.	1,155	
						Rupees 2,630 in Part II. of the Road Fund Budget of 1869-70 for the maintenance of the road.		
No. 3.—Road from Arni to junction with Polur road at Yettivedu.	12	...	22,401	...	...	Gravelled and tunnelled and in perfect order. No funds necessary.	...	
						Rupees 750 in Part II. of the Road Fund Budget of 1869-70 for the maintenance of the road.		
No. 4.—Road from Arni to Wandewash.	24	...	56,542	...	...	Rupees 1,730 in do. do. do. do.	...	
Section 1.—Arni to Cheyar Anicut.	10	...	...	...	...	Completed. Tunnels built. Road gravelled and in good order. No further grant needed.	...	
Section 2.—From Cheyar Anicut to the end.	14	...	...	...	2,312	Less complete. Bridge across Cheyar Anicut unfinished. A tunnel which crosses the main channel of the Anicut requires improvement. It may be included in next year's Budget. First 3 miles each of the Cheyar the road is complete and in good order. 2½ miles not formed. 2½ miles formed but not gravelled. Six miles finished but rough. On the 37th mile two tunnels are incomplete, last two miles not inspected. Cannot say for what particulars purposes Rupees 2,312 is required, but there certainly remains as much work as could possibly be obtained for that sum.	2,312	
	24							
No. 5.—Road from Chetput to Arni.	17	...	27,444	...	786	Rupees 2,500 were spent from Local Funds. With the exception of half mile road formed throughout and the tunnels are all built. About a mile requires to be gravelled. Road excellent.	786	
						Rupees 1,800, in Part II. of the Road Fund Budget of 1869-70 for the maintenance of the road.		
No. 6.—Road from Arni to Santavassal and Padavedu.	9	...	4,055	...	...	Mile-stones not put up. Exact distance inspected not known. Very little work done. A line marked out by throwing up earth. Channels and few tunnels built. Rupees 9,387 required. Road not very important. The work may be postponed to be carried out by annual grants.	...	
						Rupees 300 in Part II. of the Road Fund Budget of 1869-70 for the maintenance of the road.		
No. 7.—Road from Kunumungalum through Polur to South Arcot frontier.	26		29,037	...	...	Rupees 3,000 drawn from Local Funds. Road has been in use several years, and this is the only recent expenditure on it. Rupees 3,845 are said to be required. The work is not emergent and may be postponed.	...	
Total Southern Division...	...	...	...	...	34,433	Rupees 2,800 in the Road Fund Budget of 1869-70 for the maintenance of the road.		

Proceedings of the Madras Government, Revenue Department, 19th July 1869.

STATEMENT of expenditure on Roads in North Arcot, etc.,—(*Continued.*)

Work.	Length.	Amount of Estimate.	Expenditure from Special Funds.	Balance.	Required for future expenditure.	Remarks of Mr. Gibson.	Amount recommended by the Board.	Remarks.
	Miles.	RS.	RS.	RS.	RS.		RS.	
NORTHERN DIVISION.								
Grain Road No. 1.								
No. 8.—Road from Tripathy Railway station through Kalastry to the Nellore frontier towards Naidupet.	35	69,040	9,000	60,040	...	Rupees 15,756 were drawn from Imperial Funds, Rupees 32,493 from Local Funds, and Rupees 1,600 from the Zemindar. Rupees 10,600 were spent on the branch from the Railway to Tripathy town. Rupees 5,250 in the Road Fund Budget of 1869-70 for the maintenance of the road.	...	
Section 1.—From Tripathy Railway station to Yerped.	8	...	...	...	...	Completed. First three miles very good, and the remainder in fair order. No further sums are required beyond the annual allowance.	...	
Section 2.—From Yerped to Kalastry.	9	...	...	...	...	Formed, metalled, gravelled, and bridged. Condition exceedingly bad. The metal which has become mixed with the gravel is exposed throughout the Section. To put it in good order, the present materials should be removed and replaced after breaking it into small fragments. This would cost a good deal, and the work may be postponed till the existing works have had a fair trial.	...	
Section 3.—From Kalastry to Nellore frontier.	10	...	...	...	...	Formed, gravelled, and bridged throughout and is in good order. A few road dams are still necessary. A special grant is not desirable as the work is not emergently required.	...	
Section 4.—From the frontier to Naidupet.	8	...	...	...	9,884	Not inspected. Road reported to be formed and materials collected. Rupees 9,884 are needed to complete the work, in order that the line of communication with the District of Nellore may be uninterrupted.	9,884	
	35							
No. 9.—Road from Yerped to Nellore frontier.	19	26,080	1,500	...	3,500	Rupees 6,806 were drawn from Imperial Funds and Rupees 10,552 from Local Fund. Road formed and gravelled and some tunnels built. The approaches to the beds of many streams which are unbridged are dangerously steep.- Masonry works at a cost of Rupees 3,500 immediately necessary. The Range Officer should be required to prepare an estimate to be sanctioned on emergency. Rupees 1,700 in the Road Fund Budget of 1869-70 for the maintenance of the road.	3,500	
No. 10.—Road from Chendragherry to Rangampet.	5½	...	2,113	...	...	Rupees 1,175 were drawn from Local Funds. Formed throughout. Portion gravelled. Some tunnels built. Rupees 1,280 in Local Fund Budget for current year sufficient to finish or to put the work into such order that it will not suffer by a little delay in its completion. Item No. 97 of the Road Fund Budget of 1869-70. Allotment Rupees 1,280. Rupees 300 in Part II. of the Road Fund Budget of do., for the maintenance of the road.	...	
Total Northern Division...	...	...	...	...	13,384			
WESTERN DIVISION.								
Grain Road No. 2.								
No. 11.—Road from Cooppum through Vencatagherry-cottah, Palmanair, and Punganur to Cuddapah frontier.	72	...	21,116	...	...	Rupees 8,483 were drawn from Local Fund. Original estimates Rupees 1,00,450. A supplemental estimate for the latter portion of the road is under preparation. Rupees 3,400 in the Road Fund Budget of 1869-70 for the maintenance of this road.	...	

STATEMENT of expenditure on Roads in North Arcot, etc.—(*Concluded.*)

Work.	Length.	Amount of Estimate.	Expenditure from Special Funds.	Balance.	Required for future expenditure.	Remarks of Mr. Gibson.	Amount recommended by the Board.	Remarks.
WESTERN DIVISION.—(*Concluded.*) *Grain Road No.* 2.-(Concld.)	Miles.	RS.	RS.	RS.	RS.		RS.	
Section 1.—From Cooppum to Vencatagherricottah.	21	65,000	16,464	48,536	42,626	Road has been formed throughout with the exception of about half a mile, but only three miles gravelled. Many of the bridges and tunnels have been commenced but remain unfinished but should be completed to avoid loss. A bridge of five arches should be built across the Palar at a cost of Rupees 14,000.	28,626	The estimate includes a sum of Rupees 14,000 for a bridge. The utility of this work is admitted, but the Board do not feel justified in recommending the allotment of special funds for its construction.
Section 2.—From Vencatagherrycottah to Byreddipalli.	12	24,050	6,600	17,450	4,090	In fair order. Tunnels immediately necessary in some places. Only one tunnel has been built upon the entire section.	4,090	
Section 3.—From Byreddipalli to Palmanair.	10	...	...	...	...	In excellent condition, and requires no expenditure from Special Funds.	...	
Section 4.—From Palmanair to Punganoor.	19	...	...	...	...	First six miles cannot be improved. The remainder with the exception of the 134th mile is in fair order and do not require any outlay immediately.	...	
Section 5.—From Punganoor to Frontier.	10	...	...	...	5,000	Requires immediate attention. In wet weather the road is impassable. Amount required to improve it cannot be stated. Rupees 5,000 should at once be allotted for the construction of tunnels most needed and for raising the road in some places.	5,000	
	72							
No. 12.—Road from Punganoor through Suddum to Trunk Road No. XI.	35	...	18,000	...	10,552	Estimate in course of preparation but not yet ready. Road formed throughout. It should be gravelled at once.	10,552	
						Rupees 1,000 in the Road Fund Budget of 1869-70 for the maintenance of the road.		
Total Western Division...	...	...	...	...	62,268			
Grand Total.....	...	...	...	...	1,10,085		96,085	

STATEMENT showing the particulars of roads in North Arcot, reported on by Mr. Robinson.

Works.	Amount of Estimate.	Expenditure up to 31st March 1869.	Balance.	Amount required to complete the work.	Remarks of the Collector.	Amount recommended by the Board.	Remarks.
	RS.	RS.	RS.	RS.		RS.	
I. Road No. 17 from Penmari to Nendragunta on Road No. 7.	5,360	4,520	840	.....	No more money required, except the ordinary maintenance allowance in the Budget.	.....	
					A new grant of Rupees 300 is provided for the work in Part II. of the Road Fund Budget of 1869-70.		
II. Section between Kotarlapally and Palliput of Road No. 20 from Chittoor to Puthoor Railway Station, North-West Railway.	.....	.....	.....	2,780	Recommends Rupees 2,780 to be laid out on this Section. Estimates for masonry works under preparation, and funds will have to be provided for them in the ordinary Budgets.	2,780	
					A new grant of Rupees 2,250 is provided for the work in Part II. of the Road Fund Budget of 1869-70.		
III. Road No. 9 from Satghur to Amboor.	13,000	9,606	3,394	1,500	If Rupees 1,500 or half the unexpended balance of the Estimate is granted, the road can be finished in a first-rate style.	.....	
					A new grant of Rupees 900 is provided for the work in Part II. of the Road Fund Budget.		
IV. Do. from Madandacoopum to Melpadi, extension of Road No. 13.	5,300	1,627	3,673	2,100	An important line of road giving access from the main roads north and south to Vallimalay, one of the principal places of pilgrimage in the district. If Rupees 2,100 be given, the road may be completed and put into good working order.	2,100	

Proceedings of the Madras Government, Revenue Department, 19th July 1869.

Statement showing the particulars of roads in North Arcot reported on by Mr. Robinson.—(*Concluded.*)

Works.	Amount of Estimate.	Expenditure up to 31st March 1869.	Balance.	Amount required to complete the work.	Remarks of the Collector.	Amount recommended by the Board.	Remarks.
	RS.	RS.	RS.	RS.		RS.	
V. Road No. 15 from Chittoor to Arugonda with branch to Iral.	8,000	4,791	3,209	3,209	These roads tap a very fertile valley in which are situated some of the largest villages in the talook, and on that account, as well as for the conservation of the work already executed, it is most desirable that the balance of the estimate, Rupees 3,209, should be made available for expenditure during the current year. A new grant of Rupees 800 is provided for the work in Part II. of the Road Fund Budget of 1869-70.	3,209	
VI. Do. 55 from Virinjipuram to the Railway station.	7,700	1,102	6,598	2,500	This is a short Railway feeder. Turfing and gravelling to the extent of Rupees 1,100 should be executed before the wet season. Three tunnels, at a cost of Rupees 1,300, should also be executed to prevent the road from being almost impassable.	1,100	The turfing and gravelling should be provided. The construction of tunnels may be postponed till funds can be provided from District Road Fund.
VII. Do. No. 4 from Palliconda to Kaniembady on road from Vellore to Arni.	.....	.....	.....	.....	No report has as yet been furnished on these two works by the Range Officer. Neither of them require special provision.	.....	
VIII. Do. No. 64 from do. to Vepancooppum.	.....	.....	.....	.....	A new grant of Rupees 750 is provided in Part II. of the Road Fund Budget of 1869-70 for Road No. 4. A new grant of Rupees 300 is provided in Part II. of the Road Fund Budget of 1869-70 for Road No. 64.		
				12,089		9,189	

Superintending Engineer should be called to the state of the road between the Palar and Cheyar as described in para 4 of Mr Gibson's report, in order that he may judge whether the value of the money spent has been realized -

The aggregate sum now applied for by the Collector and his Assistant is Rupees 1,22,174 Viz for grain roads 96,033 for other roads inspected by Mr Gibson Rs 14,052 and for roads excluded from Mr Gibson's inspection and reported on by Mr Robinson Rs 12,080 -

This sum has been reduced by the Board to Rupees 1,05,274 and they trust that Government will be disposed to make a grant to that extent -

The road Fund of the District is already so completely absorbed by maintenance allowance that little or nothing in the way of assistance can be hoped from it and unless therefore a special grant is made the Board fear the expenditure hitherto incurred on relief works will not have been a means of permanent improvement to the communications of the District -

(True Extract)

A Swanston

Ag Secretary

To The Ag Secretary to Government
Revenue Department

with Copies of Collectors letter & Enclosure and 2 Statements -

2

I cannot agree with Mr Brockman in the opinion at the date of my inspection, the first three Miles were in a very bad state the sub soil appeared to be far from firm under the so called ground used for the surface of the road was of such inferior quality containing so much clay that in dry weather it must [illegible] and in wet weather became mud. The last four Miles were in slightly better condition, and, in consequence of a light shower of rain sufficient to lay without saturating the dust, showed to the best advantage. The material in each of the same character, the best of the kind to be had in the neighbourhood it is true that of which a road more useful than a handy track can never be made. As regards this section therefore I beg to recommend that it be metalled with broken stone which at a cost of Rs 600 a Mile will amount to Rupees 5280 a

a Reckoning the rate at 12 annas per C Yards inclusive of spreading & rolling the breadth of metalling 4 1/2 Yards and 4 inches in depth.

5. The third section from the Cheyar to Wandewash lies in the Palar Range. Of the four Miles (17-20: 23. & 24) are in very good order. Of the remaining eight some have the appearance of having never been formed and some of having

been abandoned for years. The maintenance allowance has apparently been wisely spent in making a few miles thoroughly good rather than on a vain endeavour to patch up the whole length of the line. On these two last sections no any tunnels have been built most of which were constructed more than twenty years ago they are however in good order and none of them are urgently required. The sum necessary for earth work for upon this portion of the road is included in the amount specified in the next paragraph.

The fourth section from Maulemain to the South West frontier is also in the Palon Range. Of this section about a mile altogether (made up of portions of the 25: 31st 33: & 34th Miles) is in good order two Miles (32 and 33) are formed and bridged but for the most part not gravelled. two and a half Miles (29 30 & 31) are unformed the remaining Miles are formed but not gravelled or bridged. Quite recent unfinished state the road is useless. The Range Officer has prepared an Estimate for this and the third section of the road at

amounts to Rs 40000 of this sum Rs 16,700 is for masonry and the remainder for earth work and gravelling with superintendence I have observed above that I do not consider that any more tunnels are immediately needed for the third section. As regards the fourth the Country is so flat and the streams so shallow that the construction of bridges on any will be postponed until they can be erected in the ordinary course from annual grants. Deducting therefore from Rs 16,700 allotted in the Estimate to Masonry the sum of Rupees 350 the estimated cost of five tunnels of one cent of two feet Span which are clearly intended to cover irrigation channels and are consequently necessary and allowing further the sum of Rs 50 a Mile or Rs 650 for the construction of road dams in the place of tunnels on the fourth section, I would recommend that the sum of Rs 15,700 be struck off from the amount of Mr Bevans Estimate and that the balance viz Rs 24,900 be sanctioned for expenditure upon earth work and gravelling which are in my opinion absolutely necessary

to put the road into a state in which it will be at all useful as a means of communication

The total of the sums thus recommended for expenditure in this District upon the road between Cuyeeram and the South Arcot frontier amounts to Rs 29380 and unless this outlay be made the work must deteriorate from day to day.

IV. Road from Mandavasi to Polore via Chettput.

The expenditure upon this road which is 34 Miles long has been upto 30 April Rs 32037 of which Rupees 3000 were drawn from Local and Rupees 29037 from Special Funds

The original estimate was set aside as inadequate and the revised estimate is not yet prepared the sum still required by the Range Officer is said to be Rs 3400. The road has been formed and the tunnels have been built through - out about 3½ Miles (24 21 22 28 29) are still ungravelled and I presume the balance

15

No 22 G/ Jn orders.

The Board ask for opinions of a line of repeats to prevent waste of funds on the Jamma roads in N. A. It seems useless to ask the Govt of India for such a grant now as it would certainly be refused. The only course open seems to be to direct all special expenditure to be at once discontinued and to direct the Bd to arrange for the most emergent expenditure by transfer from any less emergent local works.

JWD.

The money expended has answered the purpose of providing labor & food for the suffering population. We must be content with this & order as herein proposed, that all further special expenditure be stopped. WR

AJA

This may be done WR

AJA

No: 2098.

19th July/69

The Board request that they are unable to appropriate any further funds for the prosecution of these works, now undertaken for the purpose of providing labour for the destitute poor.

The Board are however at liberty to provide for such expenditure as ~~is absolutely~~ may be immediately needed

by transfer from any
local marks "original"
or "spain" which are
of a less ancient
character

[illegible]

[illegible]

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