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# MADRAS RECORD OFFICE.

Government of Madras.

*Public works* DEPARTMENT.

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Not to be folded or roughly handled

*Proceedings of the Madras Government, Public Works Department,  
23rd August 1872.*

No. 393. Read the following letter from the Consulting Engineer for Railways, to the Secretary to Government, Public Works Department, dated Madras, 3rd August 1872, No. 413 :—

I HAVE the honour to submit, for the information of Government, a report drawn up by the Officiating Deputy Consulting Engineer upon the work in progress along the Southern Extension of the Great Southern of India Railway, between Trichinopoly and Tiroomungalum. Captain Thompson did not go further south than this, as little or no work is yet in progress between Tiroomungalum and Tuticorin.

From the Officiating Deputy Consulting Engineer for Railways, to the Consulting Engineer for Railways, dated Bangalore, 1st August 1872.

I HAVE the honour to report to you that I have inspected that portion of the Great Southern of India Railway Extension which lies between Trichinopoly and Tiroomungalum, a town about thirteen miles south of Madura.

2. This portion of line is divided into eight districts; the eighth district ending a little to the south of Tiroomungalum.

3. The officers in charge of these districts are as follow :—

|          |                                               |
|----------|-----------------------------------------------|
| District | I.—Mr. Rhodes.                                |
| Do.      | II.—Mr. Hemans.                               |
| Do.      | III.—Mr. Cunningham.                          |
| Do.      | { <sup>IV</sup> <sub>V</sub> }—Mr. Spalding.  |
| Do.      | VI.—Mr. Jopp.                                 |
| Do.      | { <sup>VII</sup> <sub>VIII</sub> }—Mr. White. |

Mr. Griffiths has been sent to take charge of the district situated next Tuticorin. Work has just been commenced there, but between Tiroomungalum and Tuticorin, or Tinnevely, no work has as yet been undertaken.

Upon the dates of my inspection the state of progress in Districts I. to VIII. was as follows :—  
DISTRICT, I.—Inspected 12th July 1872. Engineer in charge, Mr. Rhodes.

*Masonry Works, Bridges, and Drains.*—A bridge of one 12 feet arch in the bed of the Coolum tank completed, with the exception of copings on parapets and wing-walls.

A 3 feet culvert for irrigation purposes below the bund of the Coolum tank completed.

A bridge of one 12 feet arch over drainage north of the Corayaur river completed, with exception of parapet and wing-wall copings.

Two 2 feet culverts south of the Corayaur river, one just covered in and the other about half finished.

Bridge over the Corayaur river, consisting of five 30 feet girder spans, commenced.

The foundations of the abutment on the north bank have been laid on rock at a depth of 14 feet below the river bed at its lowest part at point of crossing. The masonry has been carried up to about the level of river bed.

Excavations are in progress for the pier next the north abutment.

*Quality of Masonry.*—The above-mentioned masonry works have been executed by the Railway Engineer Department, and are intended as standards of excellence in masonry, up to which all Contractors on the line will be required to work. The quality of the work is excellent.

*Building Material.*—The stone used is gneiss procured from quarries situated in the 4th and 12th miles, from which two quarries all the stone required for the masonry works of this district will have to be carried. The stone is of excellent quality.

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*Mode of Quarrying.*—It is quarried or rather "burnt" out by means of fire, the action of which causes the stone to split or scale off the rock-bed in layers varying from 6 to 12 inches in thickness. It is then broken to the sizes required for working up.

*Advantages of "burnt stone."*—This method is considerably cheaper than the ordinary one of quarrying by blasting, and has the advantage of leaving the stone, so taken out, with the upper and lower surfaces almost always parallel to each other, thus saving an enormous amount of labour in dressing.

*"Burnt stone" not suitable for covering slabs.*—It is not advisable to use "burnt stone" for covering culverts or drains of greater span than 1 foot or 18 inches, from its liability to crack when not supported below. Covering slabs for such works are, therefore, being quarried in the usual way by means of wedges, etc.

*Engineer's and Inspector's Bungalows.*—A bungalow for the District Engineer has been nearly completed at the 7th mile 40th chain. The thatching of the roof and the roof of the out-houses being now in progress.

At the 4th mile an Inspector's bungalow has been completed, and is now occupied by the Masonry Inspector of District I.

At the 11th mile 40th chain an Inspector's bungalow has been completed and is now fit for occupation. These buildings are all of sun-dried bricks, the work being substantial and good of its kind.

*Earthwork.*—The earthwork of District I. is being carried out on contract by Messrs. Oliver and Co. of Negapatam, and about 70,000 cubic yards of embankment have been already thrown up. Where the line passes through tanks the embankments are being pushed on to completion, so that the action of the water upon them during the approaching monsoon may be noted and due provision made for strengthening and protecting them during ensuing seasons:—

In the Coolum tank, embankment completed.

Do. Cotamungalum, do. 5 out of 7 chains completed.

Do. Kalgoody, do. 5 out of 10 do. do.

Do. Pangoor, do. 3 out of 6 do. do.

DISTRICT II.—Inspected 13th July 1872. Engineer in charge, Mr. Hemans.

*Masonry Bridges and Drains.*—None yet commenced.

*Building Material.*—About 1,100 cubic yards of "burnt stone" (gneiss) have been delivered at the sites of bridges in this district.

*Engineer's and Inspector's Bungalows.*—The bungalow for the No. II. District Engineer at 9th mile 10th chain has been completed and is now fit for occupation. An Inspector's bungalow at 3rd mile 40th chain is completed, but not quite fit for occupation yet, the floors not being sufficiently dry.

An Inspector's bungalow at 11th mile 30th chain. The same as the above.

*Earthwork.*—Earthwork is being carried on in the 1st, 3rd, 4th, 5th, 6th, 8th, 9th, 10th, 11th, 13th and 15th miles, and about 7,500 cubic yards have been thrown up in embankment.

DISTRICT III.—Inspected 13th and 14th July 1872. Engineer in charge, Mr. Cunningham.

*Masonry Works, Bridges and Drains.*—No masonry work commenced yet.

*Building Material.*—Gneiss of good quality, similar to that found in Districts I. and II. About 650 cubic yards have been delivered at the sites of bridges.

*Engineer's and Inspector's Bungalows.*—The bungalow for the Engineer in charge of No. III. District is finished with the exception of roofing and plastering. The site it occupies is a very fine and pretty one.

One Inspector's bungalow has just been completed and another just commenced.

*Earthwork.*—About 9,000 cubic yards of earth have been thrown up in embankment in the 1st, 2nd, 5th, 6th, and 9th miles.

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23rd August 1872.*

DISTRICT IV.—Inspected 14th July 1872. Engineer in charge, Mr. Spalding.

*Masonry Works, Bridges and Drains.*—At 9th mile 21st chain there is a 2 feet culvert in progress and masonry up to ground level.

At 9th mile 34th chain a 6 feet arch is in progress. Foundations at 10 feet below ground level. Seven feet of masonry have been built up and a flooring of 1 foot 10 inches concrete and 1 foot 6 inches stone on edge laid.

At 9th mile 66th chain a 4 feet culvert is in progress. Foundations at 4 feet below channel bed. Two courses of masonry laid.

At 13th mile 15th chain a 15 feet arch in progress. Two courses of masonry laid. Flooring 9 inches concrete and 1 foot stone on edge.

*Quality of Masonry.*—The quality of the masonry is excellent throughout.

*Building Material.*—Gneiss of good quality. About 1,500 cubic yards of "burnt stone" have been delivered at bridge sites.

*Engineer's and Inspector's Bungalows.*—At 7th mile 30th chain. The District Engineer's bungalow is completed and fit for occupation. The site is a very fine, healthy, and pretty one. Well in course of excavation in the compound.

At 3rd mile. An Inspector's bungalow is completed with exception of thatching and white-washing. The site is a fine one, very open and healthy. The well is not yet commenced pending arrangement of the station ground.

At 13th mile. Inspector's bungalow at Dindigul Station-yard completed and fit for occupation. The well not yet commenced pending arrangement of station ground.

*Earthwork.*—Earthwork is in progress on the following miles, namely:—1st, 2nd, 3rd, 4th, 7th, 8th, 9th, 11th, and 13th, and about 50,000 cubic yards thrown up in embankment. Where tanks are crossed earthwork is in progress and well-advanced.

DISTRICT V.—Inspected 15th July 1872. Engineer in charge, Mr. Spalding.

*Masonry Works, Bridges and Drains.*—Excavations in progress for a 6 feet arch bridge at 16 chains.

*Building Material.*—Gneiss of good quality. About 100 cubic yards of "burnt stone" have been delivered at sites of bridges.

*Engineer's and Inspector's Bungalows.*—The bungalow for the District Engineer is completed and has been occupied. The well has been sunk 28 feet and is nearly completed. The water is excellent, and the site of the bungalow is a fine, high, open and pretty one.

The two Inspector's bungalows are also finished and fit for occupation. The sites they occupy are excellent. The well for the Inspector's bungalow at Ammanaikanoor is not yet sunk pending arrangement of station ground.

*Earthwork.*—Earthwork is in progress in the 1st, 3rd, 4th, 5th, 7th, 9th, 10th, 11th, 12th, and 14th miles. About 1,000 cubic yards of cutting and 35,000 cubic yards of embankment completed.

DISTRICT VI.—Inspected 16th July 1872. Engineer in charge, Mr. Jopp.

*Masonry Works, Bridges and Drains.*—None yet commenced.

*Building Material.*—Gneiss ("burnt stone") none yet delivered.

*Engineer's and Inspector's Bungalows.*—An Inspector's bungalow at 3rd mile 40th chain just commenced.

An Inspector's bungalow at 12th mile just completed. The bungalow for the Engineer of the VI District has been completed and occupied for about a month past.

*Earthwork.*—Earthwork is in progress in the 2nd, 3rd, 5th, 6th, 7th, 8th, 9th, 10th, 11th, 12th, 13th, 14th, and 15th miles and about 68,000 cubic yards have been thrown up in embankment.

*Proceedings of the Madras Government, Public Works Department,  
23rd August 1872.*

DISTRICT VII.—Inspected 17th July 1872. Engineer in charge, Mr. White.  
*Masonry Works, Bridges and Culverts.*—A culvert of 4 feet span has been commenced at 7th mile 77th chain. Wells for the foundations have been found necessary, and these are being successfully sunk. The work is progressing well.

A 2 feet culvert at 8th mile 21st chain is completed.

A 6 feet girder bridge at 8th mile 31st chain is completed with exception of copings.

*Quality of Masonry.*—The masonry work is excellent throughout.

*Building Materials.*—Gneiss of good quality. About 600 cubic yards of "burnt stone" have been delivered at sites of bridges. Excellent stone is being procured from a quarry at Skandamully about five miles south of Madura. It is being quarried in the usual way by blasting. The portion of line between Madura and Skandamully is being pushed on as rapidly as possible, so as to utilize it in conveying stone from the quarry to the bank of the Vygay for the Railway bridge over that river at Madura.

50,000 bricks have been collected at the site of the station-yard at Madura.

*Engineer's and Inspector's Bungalows.*—The bungalow for the Engineer of this district is situated in the station-yard at Madura and is just completed.

An Inspector's bungalow at 20th mile 60th chain is completed. A Sub-Assistant Engineer's bungalow at 5th mile 50th chain and an Inspector's bungalow at 8th mile 50th chain have been also completed and are now occupied.

*Earthwork.*—Earthwork is in progress on the 1st, 2nd, 3rd, 4th, 5th, 7th, 8th, 9th, 10th, and 12th miles. About 85,000 cubic yards have been thrown up in embankment.

DISTRICT VIII.—Inspected 19th July 1872. Engineer in charge, Mr. White.  
*Masonry Works, Bridges, and Drains.*—None yet commenced.

*Building Material.*—Gneiss, none yet delivered.

*Engineer's and Inspector's Bungalows.*—An Inspector's bungalow at 4th mile just commenced.

The District Engineer's bungalow at 7th mile 40th chain is about half finished.

An Inspector's bungalow at 11th mile 10th chain is in progress and is about half finished.

*Earthwork.*—Earthwork has lately been commenced on the 1st, 8th, 11th, 14th, and 15th miles.

(Signed) R. THOMPSON, Captain, R.E.,  
Offg. Dy. Consr. Engineer for Railways.

No. 394.

ORDER THEREON, 23rd August 1872, No. 2,011.

RAILWAY, No. 65.

ORDERED to be recorded.

(True Extract.)

(Signed) G. W. WALKER, Colonel, R.E.,  
Secretary to Government.

Exd. E. C. Shunker.

Bangalore  
August 1st 1872

From Capt. R. Thompson R.E.  
Offg. Dy. Consr. Engineer for Railways

J. H. Coll. J. H. M. Stewart R.E.  
Consulting Engineer for Railways  
Madras

Sir, I have the honor to report to you that I have inspected that portion of the G. S. L. Railway Extension which lies between Richinopoly and Tirumangalam, a town about 13 miles South of Madura.

The portion of line is divided into eight districts. The 8th District ending a little to the South of Tirumangalam. The Officers in charge of these districts are as follows.

|            |                |
|------------|----------------|
| District I | Mr. Rhodes     |
| II         | Mr. Blenkins   |
| III        | Mr. Cunningham |
| IV         | Mr. Spalding   |
| V          | Mr. Joseph     |
| VII        | Mr. White      |
| VIII       | Mr. White      |

*Proceedings of the Madras Government, Public Works Department,  
23rd August 1872.*

DISTRICT VII.—Inspected 17th July 1872. Engineer in charge, Mr. White.  
*Masonry Works, Bridges and Culverts.*—A culvert of 4 feet span has been commenced at 7th mile 77th chain. Wells for the foundations have been found necessary, and these are being successfully sunk. The work is progressing well.

A 2 feet culvert at 8th mile 21st chain is completed.

A 6 feet girder bridge at 8th mile 31st chain is completed with exception of copings.

*Quality of Masonry.*—The masonry work is excellent throughout.

*Building Materials.*—Gneiss of good quality. About 600 cubic yards of "burnt stone" have been delivered at sites of bridges. Excellent stone is being procured from a quarry at Skandamully about five miles south of Madura. It is being quarried in the usual way by blasting. The portion of line between Madura and Skandamully is being pushed on as rapidly as possible, so as to utilize it in conveying stone from the quarry to the bank of the Vygar for the Railway bridge over that river at Madura.

50,000 bricks have been collected at the site of the station-yard at Madura.

*Engineer's and Inspector's Bungalows.*—The bungalow for the Engineer of this district is situated in the station-yard at Madura and is just completed.

An Inspector's bungalow at 20th mile 60th chain is completed. A Sub-Assistant Engineer's bungalow at 5th mile 50th chain and an Inspector's bungalow at 8th mile 50th chain have been also completed and are now occupied.

*Earthwork.*—Earthwork is in progress on the 1st, 2nd, 3rd, 4th, 5th, 7th, 8th, 9th, 10th, and 12th miles. About 85,000 cubic yards have been thrown up in embankment.

DISTRICT VIII.—Inspected 19th July 1872. Engineer in charge, Mr. White.

*Masonry Works, Bridges, and Drains.*—None yet commenced.

*Building Material.*—Gneiss, none yet delivered.

*Engineer's and Inspector's Bungalows.*—An Inspector's bungalow at 4th mile just commenced.

The District Engineer's bungalow at 7th mile 40th chain is about half finished.

An Inspector's bungalow at 11th mile 10th chain is in progress and is about half finished.

*Earthwork.*—Earthwork has lately been commenced on the 1st, 8th, 11th, 14th, and 15th miles.

(Signed) R. THOMPSON, Captain, R.E.,  
Offg. Dy. Consq. Engineer for Railways.

No. 394.

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RAILWAY, No. 65.

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(Signed) G. W. WALKER, Colonel, R.E.,  
Secretary to Government.

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From Capt. R. Thompson R.E.  
Offg. Dy. Consq. Engineer for Railways

J. H. Coll. J. H. M. Stewart R.E.  
Consulting Engineer for Railways  
Madras

Sir, I have the honor to report to you that I have inspected that portion of the G. S. R. Way Extension which lies between Trichinopoly and Tirumangalam, a town about 13 miles South of Madura.

This portion of line is divided into Eight Districts; the Eighth District ending a little to the South of Tirumangalam.

The Officers in Charge of these Districts are as follows.

District I. Mr. Rhodes  
II. Mr. Hemans  
III. Mr. Cunningham  
IV. } Mr. Spalding  
V. }  
VI. } Mr. Jopp  
VII. }  
VIII. } Mr. White.

Mr Griffiths has been sent to  
take charge of the District-Situated  
Dept. Inticorin. — Work has  
just been commenced there, bet-  
between Lincunungulum and  
Inticorin or Timmelly no work  
has as yet been undertaken

Upon the close of my inspection  
the State of progress in Districts  
I to VIII was as follows:

### District I

Inspected. 12<sup>th</sup> July 1872  
Engineer in Charge. Mr Rhodes

A Bridge of one 12 ft Arch in the  
bed of the Coolum Tank — Masonry Works  
Completed with the Exception of  
Copings on parapets, and lining  
walls. Bridges & Drains

A 3 ft Culvert for Irrigation purposes  
below the bend of the Coolum Tank  
Completed

A Bridge of one 12 ft Arch over  
Drainage north of the Corayau  
River Completed with Exception  
of Parapet and lining walls  
Copings

Two 2 ft Culverts South of the  
Corayau River, one just com-  
menced, and the other about half  
finished

Bridge over the Corayau River  
Consisting of five 30 ft Sider  
Spans, commenced

The foundations of the Abut-  
ment on the North Bank have  
been laid on Rock at a depth  
of 14 feet below the River bed  
at its lowest part, at point of  
crossing. The masonry has  
been carried up to about the  
level of River bed.

Excavations are in progress  
for the pier next the North  
Abutment.

### Quality of Masonry

The above mentioned masonry  
works have been executed by  
the Railway Engineer Dept.  
and are intended as standards  
of Excellence in masonry, up  
to which all Contractors on  
the line will be required to  
work. — The quality of  
the work is excellent —

### Building Material

The stone used is Gneiss, procured  
from Quarries situated in  
the 4<sup>th</sup> and 12<sup>th</sup> miles, from

from which two Quarries all the Stone required for the Masonry works of this District will have been carried. The Stone is of Excellent-Quality.

It is quarried or rather "Burnt" made of out by means of fire, the action Quarrying of which causes the Stone to split or scale off the rock bed in layers varying from six to twelve inches in thickness. It is then broken to the size required for working up.

This method is considerably cheaper than the ordinary one of Quarrying by blasting, and has the advantage of leaving the Stone, so far as the upper and lower surfaces almost always parallel to each other, thus saving an enormous amount of labour in dressing.

It is not advisable to use "Burnt-Stone" for covering Culverts or drains of greater span than a foot or eighteen inches, from its liability to crack when not supported below. Covering slabs for such works are therefore being quarried in the usual way by means of wedges &c.

Advantages of "Burnt-Stone"

"Burnt-Stone" not suitable for covering Slabs.

Engineers  
Inspectors  
Bungalows.

A Bungalow for the District-Engineer has been nearly completed at the 7<sup>th</sup> m. 40<sup>th</sup> Ch. The thatching of the roof and the roof of the out-houses being now in progress.

At the 4<sup>th</sup> mile an Inspector Bungalow has been completed and is now occupied by the District Inspector of District-I.

At the 11<sup>th</sup> m. 40<sup>th</sup> Ch. an Inspector Bungalow has been completed and is now fit for occupation. These buildings are all of Sun dried bricks, the work being substantial and good of its kind.

Earthwork.

The Earthwork of District-I is being carried out on Contract by Messrs Oliver & Co of Nagapattinam and about 90,000 cubic yards of Embankment have been already thrown up. When the Embankments through the Centre, the Embankments are being pushed on to completion, so that the action of the water upon them during the approaching monsoon may be noted and any necessary made for strengthening and protecting them during

## Evening Seasons

In the Coolum Tank. Embankment - Completed.  
 " Cotammagalum do 500 ft. of 7 cts do  
 " Nalgordy do 5 do 10. do  
 " Punganoor do 3 do 6 do

## District II

Inspected 13<sup>th</sup> July 1872  
 Engineer in Charge Mr. Hemans.

Some yet commenced

Masonry  
Bridges & Drains

About 1100 Cubic Yards of "Burnt-  
 Stone" (Gneiss) have been delivered  
 at the Sites of Bridges in this  
 District

Building  
Material

The Bungalow for the No II  
 District - Engineer at 9 m. 10 cts  
 has been completed and is  
 now fit for Occupation

Engineers  
Inspector's  
Bungalows

An Inspector's Bungalow at  
 3 m. 40 cts is completed but  
 not quite fit for Occupation  
 yet. The floors not being  
 sufficiently dry

An Inspector's Bungalow at  
 11 m. 30 cts. The same as the  
 above.

## Earthwork.

Earthwork is being carried on  
 within 1. 3. 4. 5. 6. 8. 9. 10  
 11. 13 and 15<sup>th</sup> miles, and  
 about 7500 Cubic Yards have  
 been thrown up in embank-  
 ment.

## District III

Inspected 13<sup>th</sup> and 14<sup>th</sup> July 1872  
 Engineer in Charge Mr. Cunningham

Masonry Works  
Bridges & Drains

No masonry work commenced  
 yet.

Building  
Material

Gneiss of good quality - similar to  
 that found in Districts I & II.  
 About 650 Cubic Yards have  
 been delivered at the Sites of  
 Bridges

Engineers and  
Inspector's  
Bungalows

The Bungalow for the Engineer  
 in Charge of District III is  
 finished with the exception  
 of Roofing and Plastering  
 The Site it occupies is ex-  
 ceedingly fine and pretty well

Our Inspector Bungalow has  
just been completed and  
another just commenced.

About 9000 Cubic Yards of Earthwork  
have been thrown up at Embank-  
ment in the 1. 2. 5. 6 and 9th  
Miles

### District - IV

Inspected 14th July 1872  
Engineer in Charge Mr Spalding

At 9m. 21 Chs there is a 2ft Culvert  
in progress, and masonry up to  
ground level

Masonry Works  
Bridges & Drains

At 9m. 34 Chs. A 6ft Arch is in  
progress. Foundations at 10ft  
below ground level. Seven  
feet of masonry have been built  
up and a flooring of 1' 10" concrete  
and 1' 6" stone on edge laid.

At 9m 66 Chs. A four ft Culvert  
is in progress. Foundations at  
4ft below channel bed. Six  
courses of masonry laid

At 13m 15 Chs. A 15ft Arch in  
progress. Six courses of  
masonry laid. Flooring  
9" concrete and 1' stone on edge

Quality of  
Masonry

Building  
Material

Engineers &  
Inspector  
Bungalows

The Quality of the Masonry  
Excellent throughout

Specimens of good quality. About  
1500 Cubic Yards of "Burnt Stone"  
have been delivered at Bridge  
Site

At 7m. 30 Chs. The District Engineer's  
Bungalow is completed and  
fit for occupation. The site  
is a very fine, healthy and  
fruitful one. Well in course of  
excavation in the compound.

At 3m. An Inspector Bungalow  
is completed with exception  
of thatching and whitewashing.  
The site is a fine one, very  
open and healthy. The well  
is not yet commenced pending  
arrangement of the station  
ground.

At 13m. Inspector Bungalow  
at Dindigul Station. Yard  
completed and fit for occupation.  
The well not yet commenced  
pending arrangement of  
station ground

Earthwork is in progress on the  
following miles. viz.  
1. 2. 3. 4. 7. 8. 9. 11. And 13<sup>1/2</sup>  
And about 50,000 Cubic Yards  
thrown up in Embankment.  
Where Earths are crossed  
Earthwork is in progress and  
well advanced

Earthwork

District - V.  
Inspected 15<sup>th</sup> July 1872.  
Engineer in Charge Mr Spalding

Excavations in progress for a  
6<sup>ft</sup>-Arch Bridge at 0m. 16 Ctn.

Masonry works  
Bridges & Drains

Stores of good quality. About  
100 Cubic Yards of "Burnt-Stone"  
have been delivered at Sites of  
Bridges.

Building  
Material

The Bungalows for this District  
Engineer is completed and  
has been occupied. The  
well has been sunk 28 feet  
and is nearly completed.

Engineers and  
Inspectors -  
Bungalows.

The water is excellent, and  
the site of the Bungalow is  
a fine, high, open and  
healthy one.

Earthwork

The two Inspectors Bungalows  
are also finished and fit  
for occupation. The sites  
they occupy are excellent.  
The well for the Inspector  
Bungalow at Ammanaitkanoor  
is not yet sunk pending  
arrangement of station ground.

Earthwork is in progress in  
the 1. 3. 4. 5. 7. 9. 10. 11. 12  
and 14<sup>th</sup> miles. About  
1000 Cubic Yards of Cutting  
and 35,000 Cubic Yards  
of Embankment completed.

District - VI  
Inspected 16<sup>th</sup> July 1872.  
Engineer in Charge Mr Jaffo.

Masonry works  
Bridges & Drains

Stone yet commenced

Building  
Material

Stores ("Burnt-Stone"). Stone yet  
delivered

Engineers and  
Inspectors  
Bungalows

An Inspector Bungalow  
at 3m. 40 Ctn just commenced

An Inspector Bungalow at  
12m. just completed

The Bungalow for the Engineer  
of the VI<sup>th</sup> District has  
been completed and  
occupied for about a month-  
part.

Earth work is in progress in the  
2. 3. 5. 6. 7. 8. 9. 10. 11. 12. 13. 14  
and 15<sup>th</sup> miles and about  
68,000 Cubic Yards have been  
brung up in embankment.

Earth work

District - VII  
Inspected 17<sup>th</sup> July 1872  
Engineer in Charge. J. M. White.

A Culvert of 4 ft-Span has been  
commenced at 7 m. 77 Chs.  
Cells for the foundations have  
been found necessary and they  
are being successfully sunk.  
The work is progressing well.

Masonry Works  
Bridges & Culverts

A 2 ft-Culvert at 8 m. 21 Chs is  
Completed.

A 6 ft-Side Bridge at 8 m. 31 Chs  
is Completed with Exception  
of Copings.

The Masonry Work is Excellent -  
Throughout.

Quality of  
Masonry

Building  
Materials

Stores of Good Quality -  
About 600 Cubic Yards of  
"Burnt-Stone" have been  
delivered at Sites of Bridges.  
Excellent-Stone is being procured  
from a Quarry at Skandamully  
about 5 miles South of Madura.  
It is being quarried in the usual  
way by Blasting. The portion  
of River between Madura and  
Skandamully is being pushed  
on as rapidly as possible, so  
as to bring it in connection  
with the Quarry to the  
banks of the Teygar for the  
Railway Bridge over that  
river at Madura.  
50,000 Bricks have been  
collected at the Site of the  
Station Yard at Madura.

Engineers &  
Inspectors  
Bengal

The Bungalow for the Engineer  
of this District is situated  
in the Station Yard at  
Madura and is just  
Completed.

An Inspector's Bungalow at  
20 m. 60 Chs is Completed.

A Sub Assistant-Engineer's Bungalow  
at 5 m. 50 Chs and an  
Inspector's Bungalow at  
8 m. 50 Chs have been also

Completed and are now  
occupied

Earthwork is in progress at the  
1. 2. 3. 4. 5. 7. 8. 9. 10 and  
12 miles. About 85,000 Cubic  
Yards have been thrown up in  
embankment.

### District - VIII

Inspected 19th July 1872  
Engineer in Charge. Mr White.

Work yet commenced

Masonry Works  
Bridges & Drains

Gravel, some yet delivered

Building  
Material

An Inspector Bengal at  
4 P.M. just commenced

Engineers &  
Inspectors  
Bengal

The District Engineer Bengal  
at 7 P.M. 1400 hrs is about half  
finished

An Inspector Bengal at  
11 P.M. 1000 hrs is in progress and  
is about half finished

Earthwork. Earthwork has lately been  
commenced at the 1. 8. 11. 14  
and 15<sup>th</sup> miles 10

Santho Thomas Esq  
Genl M. M. - Chet. Sect  
Capt. R. E. J. J.  
Off. D. C. E. J. J. J. J.

RAILWAY DEPARTMENT.

CONSULTING ENGINEER'S OFFICE.

From

No. 413.  
Lieut Colonel J M Shaw Stewart R.E.

Consulting Engineer for Railways,

To

Colonel L. W. Walker R.E.

Secretary to Government,

Public Works Department,

Fort Saint George.

SIR,

I have the honour to submit, for the information of Government, a report drawn up by the officiating Deputy Consulting Engineer upon the work in progress along the southern extension of the Great Southern of India Railway, between Secchiampaly and Sivomungalam. Captain Sherrington did not go further south than this, as little or no work is yet in progress between —  
Sivomungalam

2. August 72.

1892/3/87/72

Seremungalum and Suteeser.

Madras. I leave the business to be.  
3<sup>rd</sup> August 1872

Sir,  
Ours most best  
Mantiony bel 10  
Cous. Eng. for 1000

*[Faint, mostly illegible handwritten text in the left column]*

P. W. 1872 Repair  
12<sup>th</sup> 3787.

RAILWAY DEPARTMENT.

1872.

From  
The Consulting Engineer  
for Railways,  
To  
The Secretary to Government,  
P. W. Department,  
Fort Saint George.

*[Handwritten signature/initials]*

*[Vertical handwritten note: Order to the records]*

Dated 3<sup>rd</sup> Aug. 1872.  
Recd. 5<sup>th</sup> Aug.

Encl. 1/1  
No. 413.

Inclosing report  
drawn up by Offg. Asst.  
Com. Engineer of the  
Southern extension  
of the Great Southern  
of India Railway  
No 2014 - R. H. [Signature]

*[Handwritten note: Receipt 6/10/72]*

C/2 3787

Govt. of {1872} Madras.

PUBLIC WORKS.

To

Dated

Recd.

Encl. /

G. O. 23<sup>rd</sup> Aug 2014

Nos. 393 & 394

Southern Extension. R.R.

From the Engineer Submitting  
Report as the By Engineer  
Who proposes the  
extension of the  
R.R. between Trichi-  
nopoly & Tiruchirappalli  
Recorded.