

Public Works (1897) Department.

G.O., No. 280-1R

DATED 23rd April 1897.

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[Despatch Abstract.]

Bezwada - Madras Railway

Inspection report of the Govt. Inspector of Railways on the — for the year ending 31st March 1897, ordered to be forwarded to the Govt. of India.

Bezwada - Madras Railway

Forwarding the Inspection report of the Govt. Inspector of Railways on the — for the year ending 31st March 1897.

P.W. 32
1897-98-11-99

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26/4/97

26/4/97

FURTHER PAPERS.

RAILWAY.

Government { 1897 } of Madras.
PUBLIC WORKS.

Recd.

Regd.

{ 1897.

Enclosures

Spare copies

G.O., Nos. 280, 281 R., 23rd April 1897.

APRIL.

Bezwada-Madras Railway

Forwarding the Inspection report of the Government Inspector of Railways on the — for the year ending 31st March 1897.

No. 280 R., 23RD APRIL 1897.

GOVERNMENT OF MADRAS.
PUBLIC WORKS DEPARTMENT.

Railway.

Read the following paper :—

Inspection report of the Bezwada-Madras Railway (under construction) for the year ending 31st March 1897.

ORDER—No. 280 R., dated 23rd April 1897.

Ordered to be forwarded to the Government of India, with reference to circular No. II, Railway, dated 4th May 1895.

[Here enter No. 281 R., dated 23rd April 1897.]

(True Extract.)

(Signed) F. J. E. SPRING,
Offg. Joint Secy. to Govt.,
Railway Branch.

To the Engineer-in-Chief, Bezwada-Madras Railway.

ENDORSEMENT—No. 281 R., dated 23rd April 1897.

Forwarded.

(By order.)

Offg. Joint Secretary to Government,
Railway Branch.

BEZWADA-MADRAS RAILWAY.

Standard gauge 5' 6".

INSPECTION report for year ending 31st March 1897.

The annual inspection of this railway was permitted to be deferred by the Government of India (*vide* letter, No. 1673 R.C., dated 4th November 1896). Advantage was taken of the inspection of other railways to visit the terminal works at Bezwada and Ennur and the bridge over the Pennér river at Nellore.

Formation.—The earthwork is practically complete throughout the line with the exception of gaps at the bridges.

Bridging.—A list of major bridges is given in the appendix; they are all plate-girder bridges with the road on the upper boom. Most of them are built on single 12-foot wells of depths varying from 20 to 60 feet: they are nearly all founded and superstructure is in progress. It is expected that they will be completed during the current working season. The following have been delayed for various causes, heavy rain, want of materials, etc.:—

- | | |
|---------------------------------|---------------------------|
| (1) Bridge over Pulicat lake. | (5) Bridge over Ramperu. |
| (2) Do. over Swarnamukhi river. | (6) Do. over Nallamadu. |
| (3) Do. over Palar. | (7) Do. over Tungabhadra. |
| (4) Do. over Gundlakama. | |

The minor bridging is approaching completion in all divisions, except the Bápatla division where some are delayed owing to the great distances from which materials have to be brought and the difficulties of transport.

Pennér bridge.—This is the largest bridge on the railway: it was inspected on February 9th. It is situated about half a mile below the anicut and is of about the same length but built at an angle to it. The design is 23 spans of 70-foot plate girders and 5 of 40-foot girders, the road being on the top boom. It is built on single circular wells 16 feet external diameter of 50 feet maximum depth. It was found that wells could be dispensed with at the south abutment and at the six piers on the northern bank, which were built with open founds on laterite. It was proposed by the District Board, Nellore, in November 1896, that the bridge should be so constructed as to admit of cart and passenger traffic; several alternative schemes were considered, but it was found that the expense of any of them would be heavy and that the bridges having been designed for railway traffic only were not well adapted for carrying a cart road. The scheme was accordingly abandoned and it was decided, instead, to open temporary stations on both banks during flood time at which trains could be stopped to take passengers across.

A temporary metre-gauge road has been laid across the river to bring materials to site. All the wells except five had been sunk; no particular difficulties were encountered. Masonry was in progress on all the other piers. The girders at the two spans nearest Nellore were ready for lifting. The piers are being built of burnt stone of excellent quality which is trained from Tirupati West on the South Indian Railway. The bridge was commenced on the 14th May 1896 and it is expected that it will be completed about the same date this year.

Ennore Bridge.—This bridge was inspected on March 10th. It spans the creek beyond the open (Madras-Ennore) section of the railway and consists of 30 spans of 40-foot plate girders on single 12-foot wells averaging 34 to 35 feet below M.S.L. The deepest is 44 feet. All wells were sunk except No. 26 which had still a few feet to go. Fourteen spans were completed and girders in place. Eight piers were up to

formation, and the rest in progress with the exception of two. The bridge is built of gneiss which is trained from Solinghur on the Madras Railway; it is not well bedded and requires a good deal of dressing, but makes strong work. The girders are hoisted from boats, two of which are lashed together and rails laid across to carry the trolley on which the girder is placed. The bridge was commenced in April 1896 and is expected to be completed in April this year.

Ballast and Permanent-way.—Seventy-five lb. rails and pyngadu sleepers are used. Platelaying from the Bezwada end commenced at beginning of February and half a mile a day has been regularly laid, but progress will, it is feared, be much retarded for lack of sleepers.

Platelaying from Nellore northwards has commenced, the line being laid to the metre gauge so as to enable some ballasting to be done. One rail will be moved out to 5' 6" gauge when this rail-head meets the one from Bezwada.

Arrangements are being made to convert the Gudur-Nellore section to 5' 6" gauge. Diversions will be necessary at some of the bridges, which show signs of cracking and which will have to be rebuilt.

Stations and offices.—Practically, nothing has been done beyond earthwork in platforms and collections of materials.

MADRAS,
24th March 1897.

(Signed) F. D. FOWLER,
Govt. Inspector of Railways.

APPENDIX.

Arni	...	...	...	...	...	...	7	spans of 60 ft.
Arm of the Pulicat lake	...	...	...	...	...	...	10	" of 40 "
Nalareddi kalva	...	...	...	...	...	...	4	" of 40 "
Kalinga	...	...	...	...	...	...	6	" of 60 "
Swarnamukhi	...	...	...	...	...	...	22	" of 40 "
Mamadi kalva	...	...	...	...	...	...	6	" of 40 "
Jaffer Sahib canal	...	...	...	...	...	...	2	" of 60 "
Paidaru	...	...	...	...	...	...	5	" of 40 "
Pillay vagu	...	...	...	...	...	...	3	" of 40 "
Mungamur vagu	...	...	...	...	...	...	3	" of 40 "
Obal vagu	...	...	...	...	...	...	4	" of 40 "
Manner	...	...	...	...	...	...	9	" of 60 "
Palar	...	...	...	...	...	...	21	" of 40 "
Musi	...	...	...	...	...	...	14	" of 40 "
Spill (Mudigonda)	...	...	...	...	...	...	7	" of 40 "
Mudigonda	...	...	...	...	...	...	13	" of 40 "
Gundlakama	...	...	...	...	...	...	13	" of 60 "
Spill (Gundlakama)	...	...	...	...	...	...	10	" of 20 "
Kommanur canal I	...	...	...	...	...	...	1	" of 60 "
							& 2	" of 20 "
							13	" of 40 "
Ramperu	...	...	...	...	...	...	5	" of 60 "
Nallamadu	...	...	...	...	...	...	7	" of 40 "
Tungabhadra drain	...	...	...	...	...	...	4	" of 40 "
Kommanur canal II	...	...	...	...	...	...	& 1	" of 20 "

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Print

BEZWADA-MADRAS RAILWAY.

Standard gauge 5' 6".

INSPECTION report for year ending 31st March 1897.

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November

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Govt. Inspector of Railways.

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Kalinga	...	...	...	...	...	6	" of 60 "
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Kommanur canal II	...	...	...	...	...	4	" of 40 "
						& 1	" of 20 "

Bombay

(R.) Form No. 3.

- (1) His Excellency the Governor
- (2) The Honble Mr. Bliss, C.S.
- (3) The Honble Mr. Grose, C.S.

No. 280. Dated 23/4/97
DEPARTMENT

PROCEEDINGS OF THE MADRAS GOVERNMENT.

Read the following

Present
2nd

Inspection Report of the Beavada -
(under construction)
Madras Railway for the year ending
31st March 1897.

Ordered to be forwarded
to the Government of
India, with reference
to Circular No. II Railway
of 4. May 1895.
H. do. 281/R 23/4/97
Forwarded

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To

The Secy. to Govt. of India

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Report of the
Board of Directors
for the year
1897.

A/-
No. 280. Dated 23/4/97
281