

(1) Number of pages 3

(2) Date of repair 10-1-1911

(3) Initials of the Referencer

MADRAS RECORD OFFICE.

Government of Madras.

DEPARTMENT.

G.O. No. <u>2425</u>	Press Mis-
Dated <u>10-1-1911</u>	1861.

Not to be folded or roughly handled

*Proceedings of the Madras Government, Public Works Department,
10th August 1867.*

No. 241. Read the following Proceedings of the Madras Government in the
Public Department :—

Communicating letter from the Superintendent
of the Great Trigonometrical Survey of India,
regarding the execution of repairs to the Trigo-
nometrical Survey stations in the North-West
Provinces. } (Here enter 2nd August 1867, No. 944.)

No. 242. ORDER THEREON, 10th August 1867, No. 2,431.

CIVIL WORKS, No. 33.

Ordered to be recorded.

(True Extract.)

(Signed) J. H. M. SHAW STEWART, Major, R. E.,
Under Secretary to Government.

Erd. F. R. Bantleman.

*Proceedings of the Madras Government, Public Department,
2nd August 1867.*

Read the following :—

No. 9. Letter from the Superintendent of the Great Trigonometrical Survey of India, to the Secretary to the Government of India, Home Department, Simla; dated Dehra Doon, 13th June 1867, No. 45-289.

With reference to your No. 1146, dated 7th instant, forwarding a copy of the

Letter No. 4264 of 1867, dated 20th May, from the Secretary to the Government of the North Western Provinces, to the Secretary to the Government of India, Home Department, with accompaniment from the Secretary to the Board of Revenue, No. 817, dated 2nd May 1867

correspondence cited in the margin, and calling for an expression of my opinion as to whether the repairs of the Trigonometrical Survey stations in the North-

Western Provinces should be carried out by the local Officers, or whether some Officers in the Public Works or Survey Department should be deputed for the purpose, I have the honor to state that I do not think it is advisable to incur the heavy expenditure which will be required for the repair of all the stations of this Survey, as I consider that such operations should be limited to the base line and astronomical stations, for which I am making special provision.

2. The stations consist of two essentially distinct portions:—The central pillar, which contains the mark-stones, and on which instruments are placed for observations; and the external walls or platform, which are intended to carry the Observatory tent and Observers. The pillar is usually from three to four feet in diameter, and is invariably built of pucca materials, and intended to last as long as possible; but the external walls or platform are usually constructed of the cheapest materials procurable for the sake of economy; they enclose an area of from 10 to 12 feet square, and it has been found that, when built of pucca masonry, they cost about Rupees 100 for every foot of the height of the station above the ground, whereas they may be made of kutcha materials for from Rupees 7 to Rupees 10 per foot.

3. The cheaper structures are, of course, liable to give way during the rainy season; and this is attended with the inconvenience of requiring a Surveyor who has to observe from the station to rebuild the platform before he can commence work; on the other hand, the mass of debris acts as a natural protection to the central pillar, and effectually conceals the ground-level mark-stone from view, which is no small advantage.

4. The mischief is that, when an accident of this nature happens, people are liable to fancy that the station is destroyed; and instances have been brought to my notice in which, under this supposition, not only the debris of the fallen platform, but the pillar itself, which is usually unaffected by the fall of the platform, have been broken up and carried away by the villagers for building purposes. But, so long as the mark-stone in the centre of the basement of the pillar remains undisturbed, the utility of the station, as a point of reference for Survey purposes, remains unimpaired. Hence it is important that a station, even when apparently in ruins, should be cared for and protected from wilful injury; and this, I conceive, to be the main object which was contemplated when the stations were placed under the charge of the local authorities.

5. But though it is not necessary to repair the stations, I think it is very desirable to take a few simple and inexpensive steps for the protection of the pillars and existing platforms from the weather, and the mark-stones from mischief.

*Proceedings of the Madras Government, Public Department,
2nd August 1867.*

Cracks through which water may percolate into the centre of the station should be stopped up with earth and mud; open passages leading to the mark-stones should be closed with stones or kutchu masonry; and pyramidal piles of earth and stones, with a diameter of about six feet at base, and rising to a height of four to five feet, should be built over the mark-stones of the stations, which are placed on hills and mounds, where it has not been necessary to erect towers. The necessary precautions should be taken to conduct all rain-fall away from the station; these measures may easily be carried out by the Police, or the Village Chowkedars, under the orders of the District Officers in whose care the stations have been placed. They will probably not cost more, on an average, than Rupees 4 for each station, and will be paid for as the bills are received at this office.

6. If the above suggestions are approved of, I beg leave to request that they may be communicated to all the Local Governments, and circulated for the guidance of all Officers who have charge of any of the stations of this Survey.

No. 2462.

Copy forwarded for information and guidance to the Government of Madras, in continuation of No. 5916, dated 30th October 1866.

HOME DEPARTMENT,
SIMLA, 16th July 1867.

By Order, &c.
(Signed) A. H. HARRINGTON,
Offg. Under Secy. to the Govt. of India.

No. 10.

ORDER THEREON, 2nd August 1867, No. 944.

Communicated to the Revenue and Military Departments, in reference to G. O., dated the 17th November 1866, No. 1176.

(True Extract.)

[Signature]
Acting Chief Secretary.

To the Revenue Department.

- „ Military do.
- „ Public Works do. for information.
- „ Inspector General of Police.

Lil

2431

Recorded

Ed. J. Tulloch.

[Signature]
10th Aug 67

P. W. Dept
Pro of Govt for the Govt
No 2950

Pro of the Madras Govt
Public Dept

Dated 20
Recd 7 Aug 167

No 944

212,213,214, 104, 105, 106, 107

Comm. 9 letter from the Supt.
of the Great Trigonometrical
Survey of India, regarding
the execution of repairs to
the Trigonometrical Survey
Stations in the North West
Provinces.

Cts 211-242

With an Ann