

Public Works (1896) Department.

G.O., No. 1634 W

DATED 1 June 1896

[Despatch Abstract.]

Mangalore Harbour - Annual Report
on the Condition of the — for the year ending 31st
December 1895, Communicated to the Marine
Department.

BUILDINGS AND ROADS.
CIVIL WORKS.

Gobt. of {1896} Madras.

PUBLIC WORKS.

Dated June, 1st.

Recd.

Encl.

G.O. No. 1634 W., 1st June 1896.

JUNE.

Mangalore Harbour

Annual report on the condition of the —
for the year ending 31st December 1895,
communicated to the Marine Department.

GOVERNMENT OF MADRAS.

PUBLIC WORKS DEPARTMENT.

Buildings and Roads.
Civil Works.

READ—the following paper :—

From Mr. S. X. SALDANHA, Sub-Divisional officer, Mangalore, dated 28th January 1896, No. 16.

With reference to paragraph 2 of the Chief Engineer's order, No. 1432 W., dated 26th May 1887, I beg to submit the following annual report on the condition of the Mangalore Harbour for the year ending 31st December 1895 :—

(1) The general aspect of the backwater from the Marine yard to the Custom House shows that the whole of the eastern side has silted considerably, compared with previous years. The western bank along the sand spit on the contrary shows a greater number of indentations, from which it may be seen that the actual width of the deep water channel has narrowed considerably.

(2) Passage for small craft not exceeding 10 tons burthen still remains navigable, although subject to much fluctuation in direction.

(3) The southern end of the backwater opposite the entrance and Ullal has become a deep pool similar to that of seven years ago, and the sand shoals of last season immediately facing the entrance have entirely disappeared since the monsoon, although latterly there is sign of silting over this whole area.

(4) Vessels do not avail themselves of this pool, as the ground does not hold well and currents are too strong for safety ; but as in last season the larger craft anchor to the west of the marine yard. The small steamers of Messrs. Shepherd and Co. still continue to anchor outside the bar.

(5) The bar and passage to sea is much in the same position as last season, and the southern sand spit with outlying shoal much enlarged. (On the northern side also the sand shoals of last season have very considerably increased. In September these sands were clearly visible at low water, but in December their presence under water is shown by breakers a long distance to west of north spit.

(6) The least depth at low water spring tides is 8 feet on the bar itself, and the whole outside area between the sand spits and bar is somewhat shoaler than last season.

(7) The northern or Guppur mouth has permanently closed, as the breadth of sand is more extensive by 80 feet on the sea side than last year.

(8) The total rainfall for 1895 has been 116.70 inches, of which 53.98 inches fell in the month of July. The annual average is 10 inches less than the average of the three preceding years.

(9) A small vessel with its cargo was totally lost in February, owing to the channel outside having been mistaken by an attempt to enter after sunset without a pilot. This has been the only accident from the natural dangers of this port.

(10) Under the directions of Mr. G. T. Walch, the Port officer has taken regular monthly soundings until the end of May, and in October sounding on an enlarged scale of 106 feet to an inch of the bar and entrance. Buoys were laid down in October for leading marks into the entrance and at intervals over the backwater.

The loss of the bar, buoy and the variable quicksands have proved buoyage to be a failure. The extremities of each spit were measured early in October and more frequently by the Port officer at the beginning of the year, but drift sand or erosion soon caused the stone marks to disappear. Fluctuations by erosion or silt are so rapid and frequent from local causes, that the Port officer has reported the schemes

I shall offer some remarks on this question in my report on the Harbour improvement estimates.

(Initld.) J. C. L.

of improvement of the harbour entrance to be almost impracticable and local opinion is now moving for the construction of an iron screw-pile pier extending into the deep water of the backwater opposite the present quay as the most desirable remedy for facilitating landing and shipping operations. The temporary wooden jetty erected on the occasion of the visit of His Excellency the Governor in November 1893 has been thoroughly repaired and has been of immense benefit for passengers; but it is not strong enough for cargo purposes, as boats alongside would soon cause destruction by the tidal current.

(11) The dredger *Wenlock* arrived on 14th January 1895, but many attempts to dredge were unsuccessful on account of the quicksands, and the dredger left the port on 1st April.

No. 53 S.E.

Forwarded to the Superintending Engineer.

(Signed) G. P. CARLESS,
Executive Engineer.

3rd February 1896.

No. 182 W.

Copy submitted to the Chief Engineer, Public Works Department, with reference to G.O. No. 373 W., dated 10th February 1894.

(Signed) J. C. LARMINIE,
Suptg. Engineer, IV Circle.

23rd April 1896.

ORDER—No. 1634 W., dated 1st June 1896.

Communicated to the Marine Department.

2. The last report on the Mangalore harbour submitted with reference to G.O. No. 1432 W., dated 26th May 1887, appears to be that embodied in G.O. No. 1032 W., dated 21st April 1894.

(True Extract.)

Under Secy. to Govt., P.W.D.

To the Marine Department.
„ Superintending Engineer, IV Circle.

Exd. T. K. Narayana Aiyangar.
Spare Copies

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B. 10 373 W 10-2-94

Returns - orders on
the list of periodical - submitted
by the Superintending Engineer.
IV Circle.

The show 60 was
destroyed on 29.4.96

1634 W

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(2) Passage for small craft not exceeding 10 tons burthen still remains navigable although subject to much fluctuation in direction.

(3) The Southern end of the Backwater opposite the entrance and Ullal has become a deep pool similar to that of seven years ago, and the sand shoals of last season immediately facing the entrance have entirely disappeared since the monsoon, although latterly there is sign of silting over this whole area.

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(4) Vessels do not avail themselves of this pool as the ground does not hold well and currents are too strong for safety, but as in last season the larger craft anchor to the west of the marine yard. The small Steamers of Messrs Shepherd and Company still continue to anchor outside the ~~mouth~~ Bar.

(5) The ^{present} ~~Bar~~ and Passage to Sea is much in the same position as last season and the Southern Sand Spit with its outlying shoal much enlarged. On the northern side also the sand shoals of last season have very considerably increased. In September these sands were clearly visible at low water, but in December their presence under water is shewn by breakers a long distance to west of north spit.

(6) The least depth at low water spring tides is eight feet on the Bar itself and the whole outside area between the Sand spits and Bar is somewhat shallower than last season.

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than last year.

(8.) The total rainfall for 1895 has been 116.70 inches of which 53.98 inches fell in the month of July. The annual average is 10 inches less than the average of the three preceding years.

(9) A small vessel with its cargo was totally lost in February owing to the channel outside having been mistaken by an attempt to enter after sunset without a Pilot. This has been the only accident from the natural dangers of this Port.

(10) Under the directions of Mr G. J. Walsh, the Port officer has taken regular monthly soundings until the end of May and in October sounding on an enlarged scale of 100 feet to an inch of the Bar & Entrance. Buoys were laid down in October for leading marks into the Entrance and at intervals over the Backwater. The loss of the Bar Buoy and the variable quicksands have proved buoyage to be a failure. The extremities of each spit were measured early in October and more frequently by the Port officer at the beginning of the year, but

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many }
28 January 1896 }

(Sd) S. X. Saldanha,
Sub Divisional Officer.
28-1-96.

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No 53/96

Forwarded to the Superintendent
Engineers.

(Sd) G. P. Carless,
Executive Engineer.
3-2-96.

No 182 dated 23rd April 1896.

Copy. Submitted to the Chief Engineer,
P.W. Department, with reference to G.O. No 373
dated 10 February 1894.

J. C. Carless
Supg. Engineer, Circle
28/4

SP

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From
The Supg. Engineer,
4th Circle

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Caul Works
Dec. 27. 96

Dated 23rd
Dec 25th } April 1896

- 1882
- 1032 W of 21-4-94
 - 1432 W of 26-5-87
 - 1353 W of 30-5-94
 - 1091 W of 30-6-94
 - 594 W of 12-3-94
 - 453 W of 17-2-94
 - 3277-78 W of 16-12-93

Mangalore Harbour.
Submitting annual report
on the condition of the — for
the year ending 31st December
1895.

A No 1634 W, d/1 June 1896
Caused:
to be communicated
to the Marine Dept.
by the Marine Dept.
The last report
on the Mangalore Harbour
submitted with reference
to G.O. No. 1432 W dated
26 May 1887 appears
to be that embodied
in G.O. No. 1032 W d/1
21 April 1884.
21 April 1884

18/5/96
Secretary D.W.

DEPARTED

Marine Dept
S.G. IV Circle