M.R.O. 1—32,400—22-11-30.

MADRAS RECORD OFFICE.

Government of Madras.

Revenue **DEPARTMENT.**

G.O. No. 120	Press ~~Mis.~~
Dated 5-4-1939	

Not to be folded or roughly handled

No. 5. From Colonel P. M. MELVILL, Secretary to Government of Bombay; to the Chief Secretary to the Government at Fort Saint George, dated Bombay Castle, 11th March 1859, No. 392.

SIR,

I am directed by the Right Honorable the Governor in Council to acknowledge the receipt of your letter, No. 503, dated 23rd December last, and in reply to communicate to you, for the information of the Government at Fort Saint George, the accompanying copies of one from the Commander-in-Chief of the Indian Navy, No. 179, dated 17th February last, and of its enclosure.

From Commodore G. G. WELLESLEY, C. B., R. N., Commander-in-Chief H. M. I. N.; to the Right Honorable Lord ELPHINSTONE, G. C. H., Governor and President in Council, dated Bombay, 17th February 1859, No. 179.

MY LORD,

I do myself the honor of transmitting to your Lordship in Council the accompanying letter to my address from Lieutenant Fergusson, Indian Naval Draftsman, on the subject of the inaccuracies in the Track Chart of the Coast of Western India, which has been drawn up in compliance with the instructions conveyed to me in Secretary Colonel Melvill's letter, No. 69 of 15th January 1859.

2nd. This letter furnishes information as to the nature of the Chart, *viz.* that it is a "Track Chart," and also that it was compiled by Lieutenant Fergusson for that purpose alone, and published by the Chamber of Commerce at Bombay under the sanction of the Honorable Court of Directors.

3rd. But I differ from some of the observations made by Lieutenant Fergusson in excuse for the omission of this reef off Quilon. There is no point more strictly adhered to in the compilation of Charts than the retention of all doubtful reefs, or shoals, until the most conclusive proof has been obtained that the danger does not exist. In McCluer's Chart, dated 1790 and 1803, to which Lieutenant Fergusson refers, and which is on a larger scale than his, the reef off Quilon is shewn as of considerable extent, and consists of rocks above water, extending above two miles off shore, and is no doubt exaggerated. In the Chart of Lieutenant Selby's Survey in 1850-51, which is on a still larger scale, and from which this portion of Lieutenant Fergusson's Chart has been compiled on a very reduced scale, the reef is not shewn at all, though a patch with one fathom only on it is marked at the distance of a mile from the shore.

4th. This patch may have been overlooked in the compilation of Lieutenant Fergusson's Chart, but I consider that, even if it was so, Lieutenant Fergusson, before he erased a danger so clearly laid down in a Chart previously used for Navigation, should have communicated with Lieutenant Selby on the subject, and ascertained its non-existence; and it does not diminish his responsibility in this respect, that, as he himself states, there is perhaps no Coast in the world so safe to approach as the Coast of Western India, there was therefore the greater necessity for not hastily omitting a danger on a Coast along which, from its general character, a navigator would think himself perfectly safe in the absence of intimation to the contrary, and thus be more bold in keeping close to the shore.

5th. Nor does what Lieutenant Fergusson advance in his 7th para. relative to the Soundings marked in his Chart off Quilon, relieve it from the charge of misleading. No one would suppose, on looking at it, that there was any deviation then from the general character of the Soundings on the Coast.

6th. I must, however, state, that I quite agree with Lieutenant Fergusson's remarks as to the use of a Track Chart; and also that it is quite impossible on one of the scales ordinarily used for that purpose, to note all the Soundings close in shore. This Chart has no doubt been productive of great benefit to Shipping; and with the exception of the two instances noticed, *viz.* this reef off Quilon and the position of Sacrifice Rock, there are probably no errors of any consequence in it, and had the Commander of the "Lady Hodgkinson" attended to the instructions given in Horsburgh's Directory, as quoted by Lieutenant Fergusson, he would not have approached the reef on which he struck.

7th. While, therefore, I am of opinion that Lieutenant Fergusson has not satisfactorily established the fact of sufficient care in the compilation of his Chart, I do not think that the Commander of the "Lady Hodgkinson" has any right to relieve himself of a charge of neglecting the usual precautions in approaching a Coast by attention to the sailing directions, and use of his lead, on the plea of the danger not being marked on a Chart of this scale.

8th. It is a very extreme measure to prohibit the sale of a most useful Chart merely on account of one or two inaccuracies which can be easily rectified, and which ought not, in my opinion, to throw doubt and discredit on the whole publication.

From Lieutenant E. F. T. FERGUSSON, H. M. I. N., Indian Naval Draftsman; to Commodore G. G. WELLESLEY, C. B., R. N., Commander-in-Chief H. M. I. N., dated 27th January 1859, No. 13.

SIR,

In reference to your Secretary's Memo. No. 231 of the 21st Instant and accompaniment herewith returned,) I beg to offer the following remarks.

2nd. The Track Chart of the Coast of Western India was compiled by me originally in 1852 and 1853, as McCluer's Charts of the Coast (made I believe in 1789) were considered incorrect. At first the Track Chart was only issued to the Vessels of the Indian Navy, but the Captains of Merchant Ships becoming cognizant of it, applied for copies and were supplied with manuscript copies of it on payment, and the Chart was in great request.

3. It was purposely called a "*Track*" Chart, as it was not compiled from actual Surveys, but from the best data procurable; and the Captains were all informed that it was not a Chart which could be used in pilot waters.

4. The demand for the Chart was so great that it could not be met, which led the Chamber of Commerce at Bombay to solicit the Government to get it engraved. The matter was, I believe, referred to the Honorable the Court of Directors, and they declined to publish the Chart under their auspices, as it was not all compiled from actual Surveys, it being merely a "Track Chart;" but they afterwards, to satisfy the demand of the Mercantile Marine, authorized the Chart to be published by the Chamber of Commerce at Bombay, if it would undertake to do so; this was in 1855, and by this time, many additions and corrections had been made, to render the original Chart as correct as possible.

5. The Chamber of Commerce readily accepted the Honorable Court's offer, and placed the Chart in the hands of Messrs. Smith, Elder and Co., London, to be engraved; and the engraved edition was first issued to the public in 1856. The only error that I could detect in the engraved edition (and that was not a serious one for a mere Track Chart) was that "Sacrifice Rock" was placed nearly three miles too far off shore, but the Soundings around it were correct. I intimated this to several Captains, and they all said, it was an error of no consequence, as no one ever thought of going inside the rock, and if steering for it, a proper "look out," would present any thing untoward; the error is now, however, noted on the Track Chart. Several hundred copies of this Chart have been sold to the public; I am not sure of the exact number, but I believe it is over a thousand. I have had innumerable compliments paid me about the Chart, and its being all, and even more, than could be expected of a Chart having no higher pretension than that of a "Track Chart," and the only complaints against it have been, once when a Vessel got on shore and was wrecked off Calicut, the Captain laid the blame to my Track Chart, and said the reef off Calicut was not marked; but as he could not produce the Track Chart he had used, his assertion fell to the ground, by the reef being shewn clearly marked in the Track Chart. The only other person who has complained of the Track Chart, and, I regret to say, done so anonymously, is Lieutenant A. D. Taylor, Indian Navy of the Survey Department, in an article in one of the early numbers of the Bombay Quarterly Review, making it appear wanting in minutal of detail, to which by its title and small scale, it clearly has no pretensions. Had I had the audacity to call it a "Chart," as it is erroneously named in the letters of the Superintendent of Marine and the Chief Secretary to the Madras Government, I have no doubt the Honorable the Court would have published it under their auspices, as readily as they have several Charts compiled by me; but I

was determined from the first, to avoid all risk of misleading either those who would have to publish, or to use the Chart, by styling it a "Track Chart," and this, my experience has taught me, every Sailor would consider a Chart not to be used in pilot waters, or in soundings of less than ten fathoms.

6. With reference, however, to the late wreck of the "Lady Hodgkinson," off Quilon, on the Tungacherry reef, there is no proof that that Vessel had my Track Chart on board, but supposing even that she had, I consider the soundings on the Track Chart, such as to indicate the approach to Quilon, as requiring great caution; for to this portion of the Track Chart, I paid particular attention, in order to put Captains of Ships on their guard, and, further, this portion of the Coast was compiled from Lieutenant Selby's Trigonometrical Surveys, in which there is no mention of the Tungacherry reef, or any special reef off Quilon; the only indication of danger off Quilon, is the remark "very foul ground" printed in amongst the soundings off that part, in one sheet in which the Roadstead of Quilon is only partly Surveyed; but in the next sheet, in which the Roadstead is completely Surveyed, the remark "very foul ground," is omitted, plainly shewing, that though the soundings do decrease with some irregularity, Lieutenant Selby did not consider them of such a nature, as to make the approach of a Vessel dangerous, so long as she did not come heedlessly too close to the shore.

7. According to the general rule amongst hydrographers, the last Survey takes precedence of all others, and there is a standing order from the Honorable the Court of Directors, that when they send out a new edition of a Chart, all former editions of the same Chart are to be destroyed. Acting therefore upon this rule and standing order, I implicitly relied upon Lieutenant Selby's Survey, which is more than half a century later than McCluer's, but as the scale of the "Track Chart" would not admit of the words "very foul ground" being put between the soundings, I marked the soundings so that Captains of Ships could not help seeing, from the sudden shallowing, that the approach to Quilon required particular caution. Referring to the Track Chart in question, which is now before me, I observe that off Quilon, the soundings abreast of that Port are fifteen, ten and two fathoms, the fifteen being only five miles off shore, and the ten being only three. A little to the Northward, there are seventeen, ten, four, the seventeen being only six to seven miles off shore; and again, a little to the Southward, there are seventeen, seven, three, and the seventeen is only four miles off shore. This surely is sufficiently indicative that the Port of Quilon should be approached with special caution and not too closely, even though a Captain did place implicit reliance on the "Track Chart" in question. It may, however, be urged that Horsburgh recommends Vessels which in the N. E. monsoon are working up to Bombay, to stand in as close to the shore as practicable, to get the full benefit of the land breezes; but then, I beg to add, if as a rule, Horsburgh is to be referred to as a guide in one instance, it ought also to be referred to as a guide in all its instructions respecting this Coast, and on this principle, by referring to Horsburgh, I find at page 510 in the edition of 1855, under the head of "Quilon," the following remarks.

8. "Quilon bank of hard ground extends from Iviker round Quilon Point where it becomes "very uneven and dangerous to approach under 12 or 13 fathoms, for under these depths abreast "the Point, there are sudden overfalls from 9 to 4, 3 and 2½ fathoms, rocky bottom."

9. Lieutenant Selby's Trigonometrical Survey of Quilon Roads, does not shew the overfalls to be as extensive as stated in Horsburgh, the overfalls in Lieutenant Selby's Chart, are in no way remarkable; and, generally, the soundings decrease pretty regularly to three fathoms; but a little to the Northward of Quilon, within eight hundred yards of the shore, there are two spots in less than two fathoms, with a few rocks dotted here and there, but as they are in less than two fathoms, and close in shore, no Ship has any business there.

10. The scale of my "Track Chart" of the Coast is two inches to a degree, or three miles to the tenth part of an inch, so that a single figure covers more than a mile, and double figures nearly three. This simple fact, connected with that of the Chart being called a "Track Chart," must, I should think, make it clear to all Sailors, that the "Track Chart" ought not to be used when a Vessel is in pilot water or under ten fathoms. There is perhaps no Coast in the world so safe to approach as the Coast of Western India; every known danger on it is to be found in Horsburgh with ample directions how to avoid them; and though I make no pretensions to my Track Chart being faultless, still I can safely assert, that I have endeavoured to omit no danger in

it, that I could find in the most recent Surveys of the Coast, and I have done my best to provide the public with a "Track Chart" that would, with common caution, serve the purposes of Navigation, until the large scale Charts, compiled from the latest Trigonometrical Surveys, are published, and when that takes place, it is my intention to make all necessary correction in the "Track Chart," so as to make it entirely the result of actual Surveys.

11. Had Mr. Franklin, Superintendent of Marine at Madras, done me the justice to view the Chart in its proper light, namely as a "Track Chart," and considered what was to be expected from a Track Chart on so small a scale, he would, I feel assured, have been compelled to allow that it was not a Chart intended for pilot waters, and if he had, further, taken the trouble to examine the soundings on the "Track Chart" off Quilon, he would not (previous to making any reference to me, or allowing me an opportunity to offer an explanation,) have stigmatized the "Track Chart" so strongly as he has done, or prohibited the sale of it. Mr. Franklin does not seem to be aware that Government is in no way responsible to the public for the correctness of the Chart, it having been published by a private party, on the responsibility and under the auspices of the Bombay Chamber of Commerce, and not by Government.

12. Since the wreck of the "Lady Hodgkinson" several Merchant Captains have informed me that, even had she had my "Track Chart" on board, it was in their opinion no fault of the Chart, for it clearly indicates the approach to Quilon to be very precarious, and they further added, "It is all very well abusing your 'Track Chart,' but how were we off before you made it, and where can we find a better?"

13. I leave these remarks for your consideration, and for you to decide, whether the Track Chart is not all that it professes to be. Mr. Franklin's remarks upon it, however, reflect not only upon myself, but also on the Chamber of Commerce at Bombay, and Captains of Merchant Ships in general, who, from what he has thought necessary to do, are apparently too ignorant to select their own Charts, or able to judge for themselves, the purport and intention of a "Track Chart," or the extent to which it may be relied on; whilst, for the last three or four years, they have had every opportunity of testing the correctness of the one in question, and not a single complaint against it has been made to my knowledge, except the two instances I have already stated; and I may add, that I have often been told by Merchant Captains, that with my "Track Chart" and Horsburgh's Directory, a ship ought with ease to be navigated clear of all dangers on the Coast of Western India, which was the only object I had in view when I compiled it.

14. In conclusion, I beg to say that, opportunely, there is a small blank space on the "Track Chart" abreast of Quilon, where the Tungacherry reef is reported to be, and in this, I have marked two crosses, representing a reef, in all the copies of the Track Chart now remaining in store, so that all future issues of it will be corrected up to date; and I would beg to suggest that, if Mr. Franklin does the same to those copies which the Madras Government has in store, and also if he puts a remark on each Chart abreast the Sacrifice Rock, "that it is laid down three and a half miles too far off shore, but the surroundings around it are correct," then the "Track Chart" will have no appreciable error remaining.

I beg to forward, for your examination, the sheets of Lieutenant Selby's Survey, and the Horsburgh referred to in paras. 6, 7 and 8.

No. 6. ORDER THEREON, No. 125; dated 5th April 1859.

Resolved that the foregoing letter and its annexures be communicated to the Superintendent of Marine.

2. Resolved also, that the correspondence that has passed on the subject be brought, through the Right Honorable the Secretary of State for India, to the notice of the Indian Hydrographer, in view to early measures being taken for obtaining accurate Charts of the Western Coast of India. Meanwhile the Superintendent of Marine will cause the Tangacherry reef to be marked in all the copies of the "Track Chart" in his charge, and will also note in them the error in regard to

the position of the Sacrifice Rock. When this has been done, the sale of the Charts may be resumed. The Superintendent will further notify these errors of the Chart in the Fort Saint George Gazette for the information of parties who may be already in possession of it. He will also continue, from time to time, to note in the Charts any further errors that may be discovered, and to notify them in the Gazette for the information of the Public.

(Signed) T. PYCROFT,
Chief Secretary.

Exd. J. Wright.

the Commander of the "Lady Hodgkinson" attended to the instructions given in Horsburgh's Directory, as quoted by Lieutenant Fergusson, he would not have approached the reef on which he struck.—

7th. While, therefore, I am of opinion that Lieutenant Fergusson has not satisfactorily established the fact of sufficient care in the Compilation of his Chart, I do not think that the Commander of the "Lady Hodgkinson" has any right to relieve himself of a charge of neglecting the usual precautions in approaching a Coast by attention to the Sailing Directions, and use of the lead, on the plea of the danger not being marked on a Chart of this Scale.

8th. It is a very extreme measure to prohibit the Sale of a Most useful Chart merely on account of one or two inaccuracies which can be easily rectified, and which ought not in my

opinion

opinion to throw doubt and discredit on the whole publication.—

Office of the
Comm.r in Chief
Indian Navy
Bombay
17th February 1859.

I have the honor to be &c.a
Signed/ G. G. Wellesley
Commander in Chief I.N.

No. 13 of 1859.—

From.

Lieutenant C. J. J. Fergusson H.M.I.N.
Indian Naval Draftsman

To.

Commodore G. G. Wellesley C.B. R.N.
Commander in Chief H.M.I.N.

Sir,

In reference to your Secretary's Memo. No. 231 of the 21st instant and accompaniment (herewith returned) I beg to offer the following remarks.—

2d The track Chart of the Coast of Western India was compiled by me originally in 1852 and 1853 as McCluers Charts of the Coast (made I believe in 1789) were considered incorrect.— At first the Track Chart was only issued

issued to the Vessels of the Indian Navy, but the Captains of Merchant Ship becoming cognizant of it, applied for Copies and were supplied with Manuscript Copies of it on payment, and the Chart was in great request.—

3d It was purposely called a "track" Chart as it was not compiled from actual surveys but from the best data procurable; and the Captains were all informed that it was not a Chart which could be used in pilot waters.—

4 The demand for the Chart was so great that it could not be met, which led the Chamber of Commerce at Bombay to solicit the Government to get it engraved. The matter was I believe referred to the Honble the Court of Directors, and they declined to publish the Chart under their Auspices, as it was not all Compiled from actual Surveys it being merely a

a "track chart," but they afterwards to satisfy the demand of the Mercantile Marine authorized the chart to be published by the Chamber of Commerce at Bombay, if it would undertake to do so: this was in 1855, and by this time, many additions and corrections had been made to render the original chart as correct as possible.

5. The Chamber of Commerce readily accepted the Worthy Courts offer, and placed the chart in the hands of Messrs. Smith, Elder & Co. London to be engraved, and the engraved edition was first issued to the public in 1856. The only error that I could detect in the engraved edition (and that was not a serious one for a mere track chart) was that "sacrifice rock" was placed nearly three miles too far off shore, but the soundings around it were correct. I intimated this to several Captains, and they all said, it was an error of no

consequence

consequence, as no one ever thought of going inside the rock, and if steering for it, a proper "look out" would prevent any thing untoward: the error is now however noted on the track chart. Several hundred copies of this chart have been sold to the public, I am not sure of the exact number, but I believe it is over a thousand. I have had innumerable compliments paid me about the chart, and its being all, and even more, than could be expected of a chart having no higher pretension than that of a "Track Chart" and the only complaints against it have been, once when a Vessel got on shore and was Wrecked off Calicut, the Captain laid the blame to my track chart, and said the reef off Calicut was not marked, but as he could not produce the track chart he had used, his assertion fell to the ground, by the reef being shewn clearly marked in the track chart. The only other person who has

complained

complained of the track chart, and I
regret to say done so anonimously.
It is Lieutenant A. D. Taylor Indian Navy
of the Survey Department, in an article
in one of the early numbers of the
Bombay Quarterly Review, making
it appear wanting in minutal of
detail, to which by its title and
small scale, it clearly has no pre-
tensions. Had I had the audacity
to call it a "chart" as it is erroneously
named in the letters of the Superintendent
of Marine and the Chief Secretary
to the Madras Government, I have
no doubt the Honorable the Court
would have published it under
their Auspices, as readily as they
have several Charts Compiled by
me; but I was determined from the
first, to avoid all risk of misleading
either those who would have to publish,
or to use the chart, by styling it
a "Track Chart", and this my experience
has taught me every Sailor would
consider a chart not to be used

in

chart in its proper light, namely
as a "track chart," and considered
what was to be expected from a
track chart on so small a scale,
he would I feel assured, have been
compelled to allow that it was not
a chart intended for pilot waters,
and if he had further taken
the trouble to examine the Soundings
on the "track chart" off Dunbar, he
would not (previous to making
any reference to me or allowing
me an opportunity to offer an
explanation) have stigmatized the
track chart so strongly as he has
done, or prohibited the sale of it.
Mr. Franklin does not seem to be
aware that Government is in no
way responsible to the public for
the correctness of the chart; it
having been published by a private
party, on the responsibility and
under the Auspices of the Bombay
Chamber of Commerce, and not
by Government.

12th

12. Since the Wreck of the Lady Hodgkinson Several Merchant Captains have informed me that even had she had my "track Chart" on board, it was in their opinion no fault of the Chart, for it clearly indicates the approach to Quilon to be very precarious, and they further added. "It is all very well abusing your "track Chart," but how were we off before you made it, and where can we find a better?

13. I leave these remarks for your consideration, and for you to decide, whether the track Chart is not all that it professes to be, Mr. Franklin's remarks upon it however reflect not only upon myself, but also on the Chamber of Commerce at Bombay and Captains of Merchant Ships in general, who from what he has thought necessary to do, are apparently too ignorant to select their own Charts, or able to judge for themselves, the purport and intention

Must read them with the Letter Records of Differences between "Charts" & Track Chts!

Note by the Honorable W. Elliot:

I must say the letter of the Commander in Chief. Indian Navy is extremely unsatisfactory and unphilosophical. He admits the existance of two grave errors in a chart published under a sort of quasi authority and yet proposes no steps for rectifying them. It is all very well to say that Navigators should have been more careful-but the ordinary run of seamen when finding no notice, in a chart compiled by the Hydrographer Indian Navy and published by a Chamber of Commerce of any danger on a frequented portion of a coast so well known as that of Malabar will naturally conclude that none exist and will run on

on in that confidence so that we shall have more wrecks and loss in consequence.

It appears strange that there should not be an authoritative chart of a coast so often examined by our Cruisers and so long in our possessions. I would bring the whole subject to the notice of the Indian Hydrographer's office thro' the Secretary of State and meantime Mr. Franklin should be desired to make the corrections, (with a note opposite the Jamaica Reef to this effect "Reef on which the Lady Hodgkinson was wrecked in 1858,") as recommended by Lieut. Fergusson in the copies in store, the sale of which can then be resumed and at the same time a notice should be published in the Gazette and repeated from time to time that such corrections have been made and that they should be entered in the copies already sold.

Marine Department.

No. 125

Extract from the Minutes of Consultation

Dated 5th April 1859.

Read the following letter from the Government of Bombay. (Here enter 11th March 1859. No. 392.)

1. Resolved that the foregoing letter and its enclosures be communicated to the Superintendent of Marine

2. Resolved also that his correspondence that has passed on the subject be brought thro' the Right Honorable the Secretary of State for India, to the notice of the Indian Hydrographer in view to early measures being

Orders are requested in reference to Mr. Franklin's letter - 13th Decr. last - whether the scale of the Chart which has been stopped shall be resumed. -

It was suggested that it should be carefully examined with the latest surveys extant - but I do not see that this has been done. -

To The Superintendent of Marine.

being taken for obtaining accurate charts of the Western Coast of India. Meanwhile the Superintendent of Marine will cause the Tangachery Reef to be marked in all the copies of the Track Chart in his charge, and will also note in them the error in regard to the position of the Sacrifice Rock. When this has been done, the sale of the Charts may be resumed. The Superintendent will further notify these errors of the Charts in the Fort Saint George Gazette for the information of parties who may be already in possession of

of it. He will also continue from time to time to note in the Charts any further errors that may be discovered, and to notify them in the Gazette for the information of the public.

J.C.

To the Supt. of Marine Dept. &c.

Cons 5 April 1859

Marine Ltr to Engt dated 3d May No 9 of 1859.

Marine 1859. Department.

No. 125

Extract Mins. Cons.

Dated 5th April 1859.

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Madras—Printed at the Government Press.

C19 Amount 125