

*Proceedings of the Madras Government, Revenue Department,
14th February 1873.*

Read the following papers:—

No. 98. From the Officiating Under-Secretary to the Government of India, Financial Department, to the Secretary to the Government of Madras Revenue Department, dated Fort William, 4th January 1873, No. 54.

1872, forwarding an Indent for Sykes's Hydrometers, I am directed to transmit a copy of a memorandum by Dr. F. Macnamara, Chemical Examiner to the Government of Bengal, and to request that, with the permission of His Excellency the Governor in Council, you will be good enough to state whether the Government of Madras is willing to try the cheaper "Guy Lussac's Alcoholometer," so strongly recommended by Dr. Macnamara.

ENCLOSURE No. 1.

Memorandum by Dr. F. N. MACNAMARA, Chemical Examiner to Government, dated 30th March 1872.

THERE is no such rule; spirits of each degree of strength expand differently under the influence of heat, hence the necessity for elaborate tables. The department should use either Sykes's Hydrometer or Guy Lussac's Alcoholometer; these cheap, save trouble, Hydrometers are of no use; worn, they are certain to mislead.

The objections to Sykes's are its expense, its liability to deterioration from wear and tear, and the fact that any little indentation, not perceptible if not specially looked for, spoils the instrument; further, being of metal, it may be readily tampered with. I believe Sykes's Hydrometers are made of glass, but so made they must be very delicate.

I would most strongly recommend Guy Lussac's Alcoholometer, the instrument which is used in France; it is cheap. I suppose a first rate one, with thermometer and tables, would cost eight shillings; the tables are much simpler than those of Sykes's. The instrument is of glass, and can therefore suffer only from a smash. The Alcoholometer I have, has the thermometer included in the stem, and therefore shows at one glance the temperature and indication; but an instrument so prepared is more expensive than the other form.

You should get from Murray and Heaths in Jermyn Street for trial a dozen Guy Lussac's Alcoholometers, each with a thermometer in a plain wooden case; the tables should be in English. The Guy Lussac gives percentage by *volume* of alcohol. If you need percentage of alcohol *by weight* you must have an additional table, which would not be sent with the instrument, unless specially asked for. The ordinary tables only go so far as 86° Fahrenheit, but I have no doubt more extended tables are to be had, and if not, it would not be difficult to cut down the spirit below 86°.

REFERRED to the Board of Revenue for report.

10th January 1873.

(Signed) W. HUDLESTON,
Chief Secretary.

No. 99. Proceedings of the Board of Revenue, dated 29th January 1873.
Read Endorsement of Government dated 10th January 1873 on letter from the Under-Secretary to Government of India, dated 4th January 1873.

ABSTRACT.—Requesting to be informed whether the Madras Government is willing to try the cheaper "Guy Lussac's Alcoholometer" recommended by Dr. Macnamara.

*Proceedings of the Madras Government, Revenue Department,
14th February 1873.*

The Board have carefully considered Doctor F. Macnamara's observations and resolve to inform Government, that though they would be glad to have some of Guy Lussac's Glass Alcoholometers for use at the Presidency, they would, from the system of graduations adopted, be quite unfit for the use of the Gaugers who must be employed in the Mofussil, for whom however a somewhat similar instrument has been indented in the Board's Proceedings, dated 19th November 1872, No. 2,228.

2. The objections to the metal Sykes' Hydrometer pointed out in the Board's Indent and by Doctor Macnamara will be obviated if the Instruments are made in glass, and the Board do not see why such Instruments should be more delicate than Guy Lussac's Alcoholometer.

3. Much time has been lost by this reference, and it is of great importance that the indent should be complied with as soon as possible.

No. 100. ORDER THEREON, 14th February 1873, No. 181.

Miscellaneous.

ORDERED that the foregoing Proceedings of the Board of Revenue be forwarded to the Government of India,

with reference to the letter from that Government, dated 4th January 1873, No. 54.

(True Extract.)

(Signed) D. F. CARMICHAEL,

To the Board of Revenue

REVENUE DEPARTMENT.

PROCEEDINGS OF THE BOARD OF REVENUE,

Dated 29 January 1873.

Read

Indorsement of Government dated 10 January 1873 in letter from the Under Secretary to Government of India dated 4 January 1873. requesting to be informed whether the Madras Government is willing to try the cheaper Guy Lussac's Alcoholometers recommended by Dr Macnamara.

The Board have carefully considered Doctor F. Macnamara's observations and resolve to inform Government, that though they would be glad to have some of Guy Lussac's glass Alcoholometers for use at the Presidency, they would, from the system of graduations adopted, be quite unfit for the use of the Gaugers, who must be employed in the Mofussil, for whom however a somewhat similar hydrometer

hydrometer but adapted to
the requirements of the Department,
has been indicated for in the
Board's Proceedings dated
19 November 1872 No 2228.

2 The objections to the metal
Sykes Hydrometer pointed out
in the Board's Indent and by
Doctor Macnamara will be
obviated if the Instruments
are made in glass, and the
Board do not see why such
instruments should be more
delicate than Guy Lussac's
Alcoholometer.

3 Much time has been lost
by this reference and it is
of great importance that
the indent should be

Complied

Complied with as soon as possible
(See Indent)

J. G. M.
Secretary

The Chief Secretary for the
Public Department

Compld
Specd railway again

H-182

PROCEEDINGS of the MADRAS GOVERNMENT.

Under date *the 11th* 1873

Read the following Papers.

From the Govt of India Ind. Dept.
Forwarding copy
of a Memo by Dr. Maenamara,
Chemical examiner to the Govt
of Bengal and requesting to be
informed whether the Madras
Govt is willing to try the cheaper
Guy Lussac's Alcoholmeters
recomm. by Dr. Maenamara

H.E. 4th January 1873 No. 54.

Proceedings of the Bd of Revenue
Submitting opinion
with reference to the proposed intro-
duction into Madras Presidency
of Guy Lussac's glass alcohol-
meters.

H.E. 29th January 1873.

Ordered that the
foregoing Proceedings of the
Board of Revenue be for-
warded to the Government of
India with reference to
the letter from that
Govt dated 4th January 1873

G.O. 20 December 1872
C.P. 6/173

Revenue
H.E. 1873 No. 11
Proceedings of the Board of Revenue.

H-284

Dated 29 January 1873
Despatched
Recd 31st 1873

No. 98-100

Submitting opinion
with reference to the
proposed introduction
into the Madras Presidency
of Guy Lussac's glass
alcoholmeters

Sd/- 11th February 1873

No. 54.

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Memorandum to the
President of the Board
of Governors of the
University of California
at Berkeley

1913

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