



Manual of Petroleum Measurement Standards Chapter 17.10.2

Liquefied Petroleum and Chemical Gases

El Hydrocarbon Management HM 55

THIRD EDITION, MARCH 2025

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Liquefied Petroleum and Chemical Gases

1 Scope

This standard details the steps needed to properly measure and account for the quantities of liquefied petroleum and chemical gas cargoes described in IGC Chapter 19, excluding liquefied natural gas (LNG), on board refrigerated and/or pressurized gas carriers. This standard covers all measurement systems commonly used on refrigerated and/or pressurized gas carriers designed to carry those types of cargoes.

2 Normative References

The following referenced documents are indispensable for the application of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

API MPMS Chapter 3.6, *Measurement of Liquid Hydrocarbons by Hybrid Tank Measurement Systems*

API MPMS Chapter 16.2, *Mass Measurement of Liquid Hydrocarbons in Vertical Cylindrical Storage Tanks by Hydrostatic Tank Gauging*

IMO¹, *International Code for the Construction and Equipment of Ships Carrying Liquefied Gases in Bulk (IGC Code)*

IMO, *Code for Existing Ships Carrying Liquefied Gases*

3 Terms, Definitions, Acronyms, and Abbreviations

3.1 Terms and Definitions

For the purposes of this document, the following terms and definitions apply.

3.1.1

aerating

The introduction of fresh air with an acceptable dew point into the tank to purge inert gases and to increase the oxygen content to ~21 % of volume so as to ensure a breathable atmosphere.

3.1.2

approved equipment

Equipment of a design that has been approved by an appropriate authority such as a governmental agency, classification society or other accredited authority. Such an authority will have certified the particular equipment as safe for use in a specified hazardous atmosphere.

3.1.3

automatic tank gauge

ATG

An instrument that automatically measures and displays liquid levels or ullages in one or more tanks either continuously, periodically, or on demand.

3.1.4

automatic tank thermometers

ATT

Instrument that automatically measures and displays the temperature of the contents in a tank, continuously, periodically or on demand.

¹ International Maritime Organization, 4 Albert Embankment, London, SE1 7SR, United Kingdom, www.imo.org.