



Date: 02.05.2022 Case number: 2022/43465 Case handler: KAP/LIS

# Bulk cargoes that may liquefy

# Background

The Norwegian Maritime Authority has received a marine accident report from the Norwegian Safety Investigation Authority about the foundering of a vessel. One of the factors of the accident was that the vessel carried bulk cargoes with the ability to liquefy. This means that a layer of reduced friction between the particles in the bulk cargoes will occur if the moisture content is too high, or if moisture is added. This may cause solid bulk cargoes to behave more like liquid.

## Requirements

The carriage of bulk cargoes not classified as "dangerous goods" in the IMDG Code is regulated in the Regulations of 1 July 2014 No. 945 on the carriage of cargoes on Norwegian ships and barges. The provisions of SOLAS Chapter VI are made applicable by section 1 of these Regulations. Furthermore, SOLAS Chapter VI refers to the IMSBC Code and the "Form for cargo information" (MSC/Circ.663). The IMSBC Code contains provisions related to bulk cargoes which may liquefy when the moisture content exceeds a certain level, i.e. the cargo's transportable moisture limit (TML). This applies to cargoes classified as "Group A" cargoes in the IMSBC Code.

SOLAS regulation VI/2.1 states that the "shipper shall provide the master or his representative with appropriate information on the cargo sufficiently in advance of loading to enable the precautions which may be necessary for proper stowage and safe carriage of the cargo to be put into effect. Such information shall be confirmed in writing and by appropriate shipping documents prior to loading the cargo on the ship." For a concentrate or other cargo which may liquefy, this includes a certificate stating the moisture content of the cargo and its transportable moisture limit.

Bulk cargoes that may liquefy shall only be accepted for loading when the actual moisture content of the cargo is less than its transportable moisture limit (TML), unless the ship is specially constructed for this, cf. IMSBC Code, section 7.3.1.

# NIS // NOR

IM-038

Postal address: P.O. Box 2222 N-5509 HAUGESUND Visiting address: Smedasundet 50 A N-5528 HAUGESUND

Tel.: +47 52 74 50 00 Fax: +47 52 74 50 01

E-mail: <u>post@sdir.no</u> Website: <u>www.sjofartsdir.no</u> Organisation No.: NO 974 761 262 MVA



## Measures



The Norwegian Maritime Authority finds it necessary, on a general basis, to bring to the attention current requirements described above. Both shippers and companies are requested to make themselves acquainted with these requirements and review their procedures to ensure that:

- shipping documents contain correct information about the TML of the cargo, and that the moisture level of the cargo is set; and
- bulk cargoes that may liquefy are not loaded if the moisture content is above the TML, and that the moisture limit cannot be exceeded during transport.

## References

Regulations of 1 July 2014 No. 945 on the carriage of cargoes on Norwegian ships and barges SOLAS Chapter VI IMSBC Code

Knut Arild Hareide Director General of Shipping and Navigation

> Håvard Gåseidnes Acting Head of Department

This document has been electronically approved, and therefore does not contain handwritten signatures.