

EDITORIAL AND TECHNICAL GROUP OF
THE SUB-COMMITTEE ON CARRIAGE OF
CARGOES AND CONTAINERS
25th session
Agenda item 3.2

E&T 25/3/10
8 January 2016
ENGLISH ONLY

PREPARATION OF DRAFT AMENDMENT 04-17 TO THE IMSBC CODE

**New proposals of amendments to the Code, new individual schedules
or amendments to existing ones**

Classification on Monocalciumphosphate (MCP)

Submitted by the European Chemical Industry Council (CEFIC)

SUMMARY

Executive summary: This document provides four test reports on MCP and proposes that the MCP should not be classified as a Group A cargo but as a Group B (MHB) cargo

Strategic direction: 5.2

High-level action: 5.2.3

Output: 5.2.3.3

Action to be taken: Paragraph 5

Related documents: CCC 2/5/3 and CCC 2/INF.3

Introduction

1 In document CCC 2/5/3, Sweden has proposed that Monocalciumphosphate (MCP) should be classified as a Group A cargo.

Test information

2 Four different samples have been analysed. These four samples all have a moisture content of less than 3-4%.

3 The average Flow Moisture Point (FMP) of the four samples is 20.09% (m/m) with a standard deviation of 2.4 and the average Transportable Moisture Limit (TML = 90% x FMP) is 18.08% (m/m) with a standard deviation of 2.16. The test reports are set out in the annexes 1 to 4.

Conclusion

4 Liquefaction of MCP is unlikely as demonstrated by the analysis of the four samples. Therefore, MCP should not be classified as a Group A cargo. As MCP can be corrosive to eyes, MCP could be classified as a Group B (MHB) cargo.

Action requested of the group

5 The group is invited to consider the comments and proposals above and take action as appropriate.

ANNEX 1

CERTIFICATE OF FMP/TML ANALYSIS FOR A SUBMITTED SAMPLE

Inspectorate Estonia AS
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www.inspectorate.ee



CERTIFICATE OF FMP / TML ANALYSIS for a SUBMITTED SAMPLE

Customer/Shipper: YARA AB (hereinafter referred to as the "Shipper")
Sample reference: Bolifor MCP-F
Inspectorate reference: J098527
Certificate reference number: E18778-2
Material (Said to be): Monocalcium Phosphate Feed Grade
Received Date / Carrier: 10.02.2015 Weight Received (Kg) 30
AWB Number: N/A

The samples said to be Monocalcium Phosphate Feed Grade drawn on behalf of YARA AB (hereinafter referred to as "the shipper") were delivered by Courier Service, of total weight 30 kg, packed in one plastic bag, received in our laboratory on 10.02.2015. The samples received with instructions to carry out FMP/TML testing. THESE SAMPLES WERE NOT TAKEN BY INSPECTORATE ESTONIA. Inspectorate Estonia laboratory therefore relies totally on the assurance of the shipper that these samples are representative samples of the bulk of the entire product / shipment and that such sampling was carried out in accordance with good practice. Inspectorate has performed FMP/TML testing, processing and analysis, acting as agent on behalf of the shipper, with the following results:

Flow moisture point (FMP) 17.06 % (m/m)
Transportable moisture limit (TML = 90% x FMP) 15.35 % (m/m)
Tamping pressure used or simulated conditions attempted 80.0 kPa

Authorised signatories of Inspectorate Estonia AS:

General Mgr. Viktor Rutkovsky
OST/Technical Mgr. Roman Molchanov

Date of issue of this certificate: 23.02.2015

Date testing performed in our laboratory: 20-21.02.15

Flow Moisture Point (FMP) Determinations / Transportable Moisture Limit (TML) as per International Maritime Organization (IMO), International Maritime Solid Bulk Cargo Code 2012 edition (Appendix 2, cl. 1.3) – Flow table test procedure carried out in accordance with ISO 12742:2007

FMP/TML method as stated in IMO Code of Safe Practice for Solid Bulk Cargoes and ISO 12742:2007 was developed for relatively homogeneous mineral concentrates with particle size up to 1 mm. We refer to test in IMO Code of Safe Practice for Solid Bulk Cargoes: "It may be applicable to materials with a maximum grain size up to 7 mm. It will not be suitable for materials coarser than this and may also not give satisfactory results for some materials with high clay content. If the flow table test is not suitable for the material in question, the procedures to be adopted should be those approved by the authority of the port State." In the absence of approved, adopted procedures FMP/TML testing is carried out on fraction 0<7 mm for materials with nominal top size over 7 mm.

This report is evidence of our laboratory analysis results only and does not relieve any of the parties from their contractual obligations, nor does the certificate suggest that the results pertain to a specific event / vessel or shipment.

It is the obligation of the shipper to further assure that where the bulk of the product has been or will be consigned, in whole or in part, to a particular consignee/vessel/voyage, that Inspectorate is fully entitled to assume that the shipper (or any other party acting with the shipper's consent or authority) has or will have supplied the Master, Terminal Operator or all lawful authorities, prior to loading, with a full complete and bona-fide cargo declaration in respect of the bulk cargo.

If and when this certificate is copied to third parties other than the shipper, it must be copied in full without deletion or amendment. Where such third party is the Master of a vessel (defined here to include any party either wholly or partly responsible for loading the vessel) he or she is reminded that this certificate is based on a sample taken on a specific date and in specific circumstances. Accordingly, it remains the exclusive responsibility of such Master (as defined above) to consider whether further testing or sampling is necessary or desirable before loading commences.

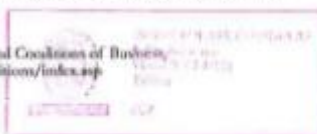
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ANNEX 2

CERTIFICATE OF FMP/TML ANALYSIS FOR A SUBMITTED SAMPLE

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CERTIFICATE OF FMP / TML ANALYSIS for a SUBMITTED SAMPLE

Customer/Shipper: **TIMAB INDUSTRIES** (hereinafter referred to as the "Shipper")
Sample reference: **Spanish MCP (finest fraction)**
Inspectorate reference: **EEESTJ15001238**
Material (Said to be): **Spanish MCP**
Received Date / Carrier: **17.12.2015** Weight Received (Kg) **12**
AWB Number: **781905980550**

The samples said to be Spanish MCP drawn on behalf of TIMAB INDUSTRIES (hereinafter referred to as "the shipper") were delivered by Courier Service, of total weight 12 kg, packed in one plastic bag, received in our laboratory on 17.12.2015. The samples received with instructions to carry out FMP/TML testing. THESE SAMPLES WERE NOT TAKEN BY INSPECTORATE ESTONIA. Inspectorate Estonia laboratory therefore relies totally on the assurance of the shipper that these samples are representative samples of the bulk of the entire product / shipment and that such sampling was carried out in accordance with good practice. Inspectorate has performed FMP/TML testing, processing and analysis, acting as agent on behalf of the shipper, with the following results:

Flow moisture point (FMP) 22.48 % (m/m)
Transportable moisture limit (TML = 90% x FMP) 20.23 % (m/m)
Tamping pressure used or simulated conditions attempted 80.0 kPa

Authorised signatories of Inspectorate Estonia AS:

General Mgr

Viktor Rulkovsky

CST/Technical Mgr

Roman Molchanov

Date of issue of this certificate: 22.12.2015

Date testing performed in our laboratory: 18-21.12.15

Flow Moisture Point (FMP) Determinations / Transportable Moisture Limit (TML) as per International Maritime Organization (IMO), International Maritime Solid Bulk Cargo Code 2012 edition (Appendix 2, cl. 3.3) – Flow table test procedure carried out in accordance with ISO 12742:2007.

FMP/TML method as stated in IMO Code of Safe Practice for Solid Bulk Cargoes and ISO 12742:2007 was developed for relatively homogeneous mineral concentrates with particle size up to 3 mm. We refer to test in IMO Code of Safe Practice for Solid Bulk Cargoes: "but may be applicable to materials with a maximum grain size up to 7 mm. It will not be suitable for materials coarser than this and may also not give satisfactory results for some materials with high clay content. If the Flow table test is not suitable for the material in question, the procedures to be adopted should be those approved by the authority of the port State." In the absence of approved, adopted procedures FMP/TML testing is carried out on fraction 0x7 mm for materials with nominal top size over 7 mm.

This report is evidence of our laboratory analysis results only and does not relieve any of the parties from their contractual obligations, nor does the certificate suggest that the results pertain to a specific event / vessel or shipment.

It is the obligation of the shipper to further assure that where the bulk of the product has been or will be consigned, in whole or in part, to a particular consignee/vessel/voyage, that Inspectorate is fully entitled to assume that the shipper (or any other party acting with the shipper's consent or authority) has or will have supplied the Master, Terminal Operator as all lawful authorities, prior to loading, with a full complete and bona-fide cargo declaration in respect of the bulk cargo.

If and when this certificate is copied to third parties other than the shipper, it must be copied in full without deletion or amendment. Where such third party is the Master of a vessel (defined here to include any party either wholly or partly responsible for loading the vessel) he or she is reminded that this certificate is based on a sample taken on a specific date and in specific circumstances. Accordingly, it remains the exclusive responsibility of such Master (as defined above) to consider whether further testing or sampling is necessary or desirable before loading commences.

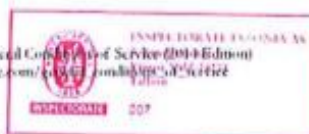
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According to ISO 17025



ANNEX 3

CERTIFICATE OF FMP/TML ANALYSIS FOR A SUBMITTED SAMPLE

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**CERTIFICATE OF FMP / TML ANALYSIS for a SUBMITTED SAMPLE**

Customer/Shipper:	TIMAB INDUSTRIES	(hereinafter referred to as the "Shipper")
Sample reference:	French MCP - minigranules (fine fraction)	
Inspectorate reference:	EEESTJ15001238-2	
Material (Said to be)	French MCP - minigranules	
Received Date / Carrier:	17.12.2015	Weight Received (Kg) 12
AWB Number:	775178807717	

The samples said to be French MCP - minigranules drawn on behalf of TIMAB INDUSTRIES (hereinafter referred to as "the shipper") were delivered by Courier Service, of total weight 12 kg, packed in one plastic bag, received in our laboratory on 17.12.2015. The samples received with instructions to carry out FMP/TML testing. THESE SAMPLES WERE NOT TAKEN BY INSPECTORATE ESTONIA, Inspectorate Estonia laboratory therefore relies totally on the assurance of the shipper that these samples are representative samples of the bulk of the entire product / shipment and that such sampling was carried out in accordance with good practice. Inspectorate has performed FMP/TML testing, processing and analysis, acting as agent on behalf of the shipper, with the following results:

Flow moisture point (FMP)	21.46 % (m/m)
Transportable moisture limit (TML = 90% x FMP)	19.31 % (m/m)
Tamping pressure used or simulated conditions attempted	80.0 kPa

Authorised signatories of Inspectorate Estonia AS:

General Mgr.		Viktor Rutkovsky
OST/Technical Mgr		Roman Molchanov

Date of issue of this certificate: 22.12.2015 Date testing performed in our laboratory: 18-21.12.15

Flow Moisture Point (FMP) Determinations / Transportable Moisture Limit (TML) as per International Maritime Organization (IMO), International Maritime Solid Bulk Cargo Code 2012 edition (Appendix 2, cl. 1.1) – Flow table test procedure carried out in accordance with ISO 1782:2002

FIMP/TML method as stated in IMO Code of Safe Practice for Solid Bulk Cargoes and RID 12742:2007 was developed for relatively homogeneous mineral concentrates with particle size up to 3 mm. We refer to text in IMO Code of Safe Practice for Solid Bulk Cargoes: "but may be applicable to materials with a maximum grain size up to 7 mm. It will not be suitable for materials coarser than this and may also not give satisfactory results for some materials with high clay content. If the flow safe test is not suitable for the material in question, the procedures to be adopted should be those approved by the authority of the port State." In the absence of approved, adopted procedures FIMP/TML testing is carried out on fraction 0/7 mm for materials with nominal top size over 7 mm.

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ANNEX 4

ANALYTICAL REPORT

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Analytical Report

Aliphos Rotterdam B.V.
Attn: Dhr. J. Pannekoek
Zevenmanshaven Oost 139
3133 CA Vlaardingen
Netherlands

Reportnr.	: 603255 version 1	Disponent Number	: 000020150826
Product recognized as	: Minerals/Minerals	Sampling Date	: 26-Aug-2015
Product Specification	: Monocalciumfosfaat	Sample size (kg)	: 50
Reference	: 01176	Sealed / Seal Code	: No /
AWB / BarCode	:	Sample Arrival Date	: 18-Dec-2015 09:41
Packing	: Plastic, ambient	ReportDate Version	: 05-Jan-2016 11:35
Sample Type	: BIS		
B.L. - D.O.	: THT: 26/08/2016		

Other Analysis

Common Parameter	Amount (a.r.)	Amount (o.d.)	Amount (as det.)	
Average Weighted Moisture			2,18	%
Flow moisture Point (FMP)			19,35	%
TML, Transportable Moisture Limit			17,41	%

Demanded 18-Dec-2015 by Aliphos Rotterdam B.V.
Analyses according to annex
Drs. ing. H. Janssens Director TLR International Laboratories



Page 1 of 2



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Findings are based on the sample as submitted. TLR does not assume responsibility for sampling, selection, representativity and identifications such as codes, markings or product names. Data's regarding methodology and measuring uncertainty will be provided upon request. Contact info@tlr.nl

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website: www.tlr-international.com



Analytical Report

Reporter	: 603255 version 1	Disponent Number	: 000020150826
Product recognized as	: Minerals/Minerals	Sampling Date	: 20-Aug-2015
Product Specification	: Monocalciumfosfaat	Sample size (kg)	: 50
Reference	: 01176	Sealed / Seal Code	: No /
AWB / BarCode	:	Sample Arrival Date	: 18-Dec-2015 09:41
Packing	: Plastic, ambient	Report Date Version	: 05-Jan-2016 11:35
Sample Type	: BIS		

ANNEX

Method Descriptions

Other Analysis

Common

Method Description

Calculation of transportable moisture limit (TML) at 90% of the measured flow moisture point (FMP)

Determination of flow moisture point (FMP) expressed as a percentage of the sample by mass using tamping pressure for an estimated max 10 meter cargo depth as per IMSBC2012 code flow table method

Determination of the natural moisture - calculation of the "loss of mass"

Method Code

Flow Table

Of ISO 10261-2008

Demanded 18-Dec-2015 by Alipho Rotterdam B.V.
Analyses according to annex
Drs. ing. H. Janssens Director TLR International Laboratories



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Findings are based on the sample as submitted. TLR does not assume responsibility for sampling, selection, representativity and identification such as codes, markings or product names. Details regarding methodology and measuring uncertainty will be provided upon request. Contact info@tlr.nl



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