

Organization/Unit:	إدارة مختبر دبي المركزي	الوحدة التنظيمية:
Organization, onit.	Dubai Central Laboratory Department	•
	Specific Rules for Certification of Mineral Fiber	70 2 3
Document Title:	Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:
	ractory Assessment	
Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:



Issue Date	Rev. No.	Summary Of Amendments
02-07-2005	0	First draft for comments
09-07-2005	0	Final draft
06-08-2005	1	Issue for use
19/11/2008	2	Reviewed with the requirements of the current version of the standard (2008) and found
		to be still suitable.
09-08-2009	3	Document reference number and format is changed according to the new IMS, statement
		for the independent testing plan was changed, and the statement for surveillance was
		shortened by referring the appropriate procedure, RD-DP21-2096 (IC).
03-07-2011	4	Reviewed with the requirements of the current version of the standard (2011) and found
		to be still suitable.
06/04/2014	5	Reviewed with the requirements of the current version of the standard (ASTM C533-13)
		and found to be still suitable
13/07/2017	6	Revised to align with the fire test requirements of the UAE Fire & Life Safety Code of
		Practice. 2016; Removed version of ISO 9001 Standard for QMS requirements
05/11/2018	7	Reviewed as per the fire test requirements with the UAE Fire and Life Safety Code of
		Practice 2018, and found to be still the same. Change the format of documents.
21/03/2019	8	Revision of Scope to reflect that the DCL Certification of above subject product does not
		cover compliance to the requirements of UAE Fire & Life Safety Code of Practice 2018.
06/09/2020	9	Revised to add the options for initial audit by the approved CAB and remotely by PCAS.
		Adding definition for authorized auditor. Update for the new numbering system and
		followed terminologies. Add provision for accepting valid test reports.
26/09/2021	10	Removal of the documents in clause 2.1.2, in addition to further amendment in the
		provision for accepting valid test reports (clause 2.4.2.4), in line with DM 30% reduction
		of requirements (both service and specialized). Modifications in the auditing part for the
		factories already certified against ISO 9001 to opt for auditing only the areas of
		production and monitoring stages of product realization, quality control and final product
		testing and evaluation.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 1 of 9



Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بـلديـة دبي Dubai MunicipaLity
Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	



1. **GENERAL**

1.1 INTRODUCTION

- 1.1.1 This document prescribes the specific rules for the implementation of the DM Third Party Product Certification Scheme Through Factory Assessment as applied to the specific product(s) identified herein, taking into consideration the applicable normative references and standard specifications.
- 1.1.2 The applicant shall comply with these specific rules, and to those already mentioned in the "General Rules for DM Third Party Product Certification Scheme Through Factory Assessment, DM-DCLD-RD-DP21-2001 (IC).
- 1.1.3 DCLD-PCAS shall take into consideration the requirements of Administrative Order 66-2003 on Regulations on Technical Specifications for Thermal Insulation Systems. Only products that are deemed to meet the requirements of this Order shall be certified.

SCOPE 1.2.

- 1.2.1 This specific rule covers the requirements for factory made mineral wool thermal insulation products in a form of blanket, with or without facings intended for commercial and industrial application.
- 1.2.2 This specific rule does not cover compliance to the requirements of UAE Fire & Life Safety Code of Practice 2018.
- 1.2.3 For certification of Mineral Fiber Blanket Insulation compliance to the requirements of UAE Fire & Life Safe Code of Practice 2018, the Specific Rules DM-DCLD-RD-DP21-2210 (IC) shall apply.
- 1.3 PRODUCT IDENTIFICATION AND APPLICABLE STANDARD/NORMATIVE REFERENCE
- 1.3.1 Product Name: Mineral Fiber Blanket Thermal Insulation for Commercial and Industrial Applications
- Applicable Standard/Normative Reference: ASTM C 553-13 Standard Specification for Mineral Fiber 1.3.2 Blanket Thermal Insulation for Commercial and Industrial Application

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 2 of 9

133200	Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
GOVERNMENT OF DUBAI	Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بـلديـة دبي DUBAI MUNICIPALITY
	Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	

1.3.3 Additional References:

- 3.1.1 ISO 9001- Quality Management System Requirements
- 3.1.2 ISO 19011:2002 Guidelines for Auditing Management System

1.4 DEFINITION OF TERMS

In addition to the definitions given in ASTM C 168 and DM-DCLD-RD-DP21-2001 (IC) the following shall also apply:

- 1.4.1 Independent Testing Laboratory Dubai Central Laboratory (DCL) or any testing laboratory recognized by the DCLD-PCAS.
- 1.4.2 Independent Test test performed or conducted by the recognized Independent Testing Laboratory or any testing laboratory recognized by DCLD-PCAS.
- 1.4.3 Standard Specification ASTM C 553-13 Standard Specification for Mineral Fiber Blanket Thermal Insulation for Commercial and Industrial Applications
- 1.4.4 QMS Quality Management System aligned with the requirements of ISO 9001 Standard
- 1.4.5 Client: Manufacturer of mineral fiber blanket insulation
- 1.4.6 DM Certification Body Products Conformity Assessment Section- Dubai Central Laboratory (DCLD-PCAS)
- 1.4.7 Authorized auditor: is any approved auditor by DCLD-PCAS either internal within DCLD or external (Approved CAB's auditor or approved auditor based on a signed contract)

2 REQUIREMENTS FOR CERTIFICATION

2.1 APPLICATION

2.1.1 The client shall apply to DCLD-PCAS for the certification and authorization to use of DCL Conformity Mark.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 3 of 9

13.32.03	Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
GOVERNMENT OF DUBAI	Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بـلديـة دبي DUBAI MUNICIPALITY
	Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	

- 2.1.2 Application form shall be submitted by client to DCLD-PCAS.
- 2.1.3 Separate application shall be submitted for each product type or group of products that refers to a different specifications / specific rules.

2.2 FACTORY OPERATION

2.2.1 Quality Management System

The client shall have a Quality Management System that is aligned to the requirements of ISO 9001 standard. NOTE: Having a certificate of ISO 9001 is not a mandatory requirement; however the structure of the manufacturer's QMS shall be in line with its requirements

2.2.2 Laboratory

The client shall have a quality assurance laboratory to carry out factory production control testing to ensure that the mineral fiber blanket insulation comply with the requirements of the standard specification.

The laboratory can be part of the factory facilities, or, can be through a documented agreement with an accredited external laboratory. As a minimum requirement, the laboratory shall have the following testing equipment:

- a. Weighing Scale
- b. Dimensional measuring instruments

2.3 INITIAL FACTORY AUDIT

2.3.1 Initial factory audit will be carried out by duly authorized auditor(s) which will cover auditing of the quality management system to verify its compliance with the requirements of ISO 9001, in addition to verify the implementation of DCLD-PCAS certification's requirements. Where possible; the audit can be carried out remotely as per (DM-DCLD-RD-DP21-2098 (IC) Guidelines for Remote Audit) or as per the related approved guidelines which are followed by the approved outsourced CAB.

NOTE: An independent certification to ISO 9001 issued by a QMS certification body recognized by DCLD-PCAS may be considered as having satisfied this requirement; however, DCLD-PCAS may still opt to carry out verification audit to confirm that the factory is in compliance with requirements of DCLD certification schemes and rules, mainly the areas of production and monitoring stages of product realization, quality control and final product testing and evaluation.

2.3.2 Factory audit shall be conducted by designated audit team in accordance with ISO 19011 – Guidelines for Auditing Management Systems.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 4 of 9

133200	Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
GOVERNMENT OF DUBAI	Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بـلديـة دبي DUBAI MUNICIPALITY
	Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	

2.4 PRODUCT EVALUATION

2.4.1 Sampling

- 2.4.1.1 Sampling for initial testing shall be shall be taken randomly by the authorized auditor from the products to be certified (sizes and quantities to be determined) either from production lines or the factory warehouse, in accordance with the requirements of the standard specification.
- 2.4.1.2 Three sets of sample per product per type should be selected as applicable from the production line or from the warehouse and shall be subjected to testing; the first set, where possible, will be tested in the plant witnessed by a duly authorized auditor, the second set will be sent to DCLD-PCAS approved Independent Testing Laboratory. The third set will be kept by the client as reference for future use.
- 2.4.1.3 Sample(s) for independent test shall be packed/sealed and signed in the presence of the authorized auditor and shall be submitted to DCLD-PCAS approved lab.
- 2.4.2 Product Evaluation and Testing
- 2.4.2.1 Physical Properties The product/s shall conform to the requirements specified in the standard specification as per ASTM C 553
- 2.4.2.2 Workmanship The product/s shall not have defects that will adversely affect installation or service quality
- 2.4.2.3 The test to be carried out shall be in accordance with the test method mentioned in the standard specification as follows:
 - 2.4.2.3.1 Maximum Density and Dimension as per ASTM C 167
 - 2.4.2.3.2 Shots Content of Inorganic Fibrous Thermal Insulation as per ASTM C1335
 - 2.4.2.3.3 Apparent Thermal Conductivity as per ASTM C 177, ASTM C 518, ASTM C 1114
 - 2.4.2.3.4 Maximum Use Temperature and Exothermic Temperature Rise as per ASTM C 411, ASTM C 447
 - 2.4.2.3.5 Odor Emission as per ASTM C 1304
 - 2.4.2.3.6 Corrosion to Steel as per ASTM C 665
 - 2.4.2.3.7 Flexibility and Rigidity as per ASTM C 1101/ C 1101M
 - 2.4.2.3.8 Water Vapor Sorption as per ASTM C 1104 / C 1104M

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 5 of 9

133200	Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
GOVERNMENT OF DUBAI	Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بـلديـة دبي
	Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	

- 2.4.3 The results of testing must meet the requirements as per the standard specification.
- 2.4.4 Wherever applicable, Independent test shall only be conducted if the result of the in-plant test shows satisfactory results. DCLD-PCAS shall accept available valid test reports conducted by an approved DCLD-PCAS independent laboratory within one year from the date of the initial assessment, in line with the internal quality control testing plan of the factory. In such case, the testing of that particular parameter(s) shall be waived accordingly.
- 2.4.5 If the result of the test conducted by the DCLD-PCAS approved independent testing laboratory shows non-conformance to the specified requirements, the provision for rejection specified in the standard shall apply. The retest shall be carried out on the reference sample kept by the client or on new samples collected by the authorized auditor on which full testing shall be carried out, if necessary.
- 2.4.6 If the re-test passed, the initial product assessment is considered conforming to product specification. If not, the client will be advised to take corrective action.
- 2.4.7 Only after reassessment and subsequent product compliance shall the client be allowed to use DCL Conformity Mark on his product(s) that have been tested and found complying with the certification requirements.

3. GRANTING OF THE DCL CERTIFICATION

- 3.1 CONDITIONS FOR GRANTING THE DCL PRODUCT CONFORMITY CERTIFICATE
- 3.1.1 When the results of the factory audit (clause 2.3) and product evaluation (clause 2.4) show conformity to the requirements specified in the general rule and specific rule, the Certificate of Conformity and authorization to use the DCL Conformity Mark shall be issued to the client for the type(s)/model(s)/brand(s) of the product covered by the assessment.
- 3.1.2 The client shall agree with DCLD-PCAS for the preparation and implementation of a product quality assurance plan /mechanism to ensure continuing compliance with the Standard Specifications and the requirements of this certification scheme. It shall consist of (1) an internal product quality assurance plan, and (2) an independent testing plan.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 6 of 9

123200	Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
GOVERNMENT OF DUBAI	Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	بلديـة دبي DUBAI MUNICIPALITY
	Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	

3.1.3 Factory Production Control System (Internal Product Quality Assurance Plan)

The client shall have an internal product quality assurance plan giving details of the tests to be carried out at the factory. This will include as a minimum, the following details: (1) location of sampling; (2) frequency of sampling; (3) quantities of samples; (4) tests to be carried out; (5) results acceptance criteria; and (6) responsible person to carry out the activity. The plan shall cover all inspections carried out thru out the whole manufacturing process; i.e. (raw materials production lines- finished product testing and evaluation as per standard specifications – final packing.

The plan shall take into consideration the control of raw materials, production process, the volume of production, the criticality of the test to be specified, and other relevant factors

3.1.4 Independent Testing Plan

The client shall agree to an independent testing plan to be carried out on samples which are collected in accordance with DM-DCLD-RD-DP21-2096 (IC) – Surveillance of Certified Clients under the Factory Assessment Scheme, and implemented by the DCLD-PCAS.

3.2 ISSUANCE OF DCL CERTIFICATE OF CONFORMITY

If the conditions mentioned in clause 3.1 above have been complied, the client shall be issued a DCL Certificate of Conformity and a Scope of Certification that covers the type(s) and size(s) of the products that are certified and will be authorized to use the DCL Conformity Mark on the certified products

3.3 RESPONSIBILITIES OF THE CERTIFIED CLIENT

- 3.3.1 The client shall ensure that his product, for which a certificate of conformity has been issued, conforms at all times to the requirements of the General Rule and Specific Rules and shall maintain to the satisfaction of DCL, a system of quality control including inspection and testing.
- 3.3.2 The client shall give the duly authorized auditor(s) by DCLD-PCAS, access during working hours, without prior notification, to the premises of the factory where certified product is manufactured, for the purpose of evaluating the materials, production processes, finished products, quality assurance facilities, records and others in accordance with the requirements of the scheme.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 7 of 9



			_
Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	
Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	



- 3.3.3 The client shall inform DCLD-PCAS in writing of any change of management, transfer of plant site, modification in the product, manufacturing process or factory's quality management system.
- 3.3.4 Upon transfer of plant site, the certificate of conformity shall be deemed valid only after factory and product audit at the new site has been satisfactorily completed.
- 3.3.5 Any infraction stated in the terms and conditions of the certification scheme and the use of DCL Conformity Mark shall constitute sufficient grounds for suspension, withdrawal and termination of certification in accordance with DM-DCLD-IMS-RD-07.
- 3.3.6 Any dispute that may arise in connection with the Terms and Conditions of the certification scheme shall be settled in accordance with DM-DCLD-IMS-RD-08 Appeals, Disputes, and Complaints Procedure.
- 3.3.7 The client shall pay all applicable fees related to the certification process.
- 3.4 USE OF THE DCL CONFORMITY MARK
- 3.4.1 The design and use of the DCL Conformity Mark shall be in accordance with the Terms and Conditions for the Use of the DCL Conformity Mark, DM-DCLD-IMS-RD-13.
- 3.4.2 The client shall submit a product-marking proposal for approval by the DCLD-PCAS. The proposal shall include drawings and/or diagrams showing the location and size of the marking for each size of the product/product package, where applicable.
- 3.4.3 The Certificate of Conformity and the authorization to use the DCL Conformity Mark is non-transferable.

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 8 of 9



Organization/Unit:	إدارة مختبر دبي المركزي Dubai Central Laboratory Department	الوحدة التنظيمية:	
Document Title:	Specific Rules for Certification of Mineral Fiber Blanket Insulation (ASTM C 553-13) Through Factory Assessment	عنوان الوثيقة:	ديـة دبي DUBAI MUNICIPA
Doc Ref.	DM-DCLD-RD-DP21-2109 (IC)	رقم الوثيقة:	



4. SURVEILLANCE

- 4.1 DCLD-PCAS or their approved CAB shall carry out periodic surveillance to ensure consistent compliance with the requirements of this certification scheme as per DM-DCLD-RD-DP21-2096 (IC) Surveillance of Certified Clients under the Factory Assessment Scheme.
- 4.2 Testing as part of the surveillance shall be in accordance with the Independent Testing Plan (clause 3.1.4) that has been agreed between DCLD-PCAS and the client.

5. FEE SCHEDULE

- The client shall pay the applicable fees and charges related to the granting of the certificate of conformity and the authorization to use the DCL Conformity Mark based on the DCL Official Fee Structure, DM-DCLD RD-DP21-2097 (IC).
- 5.2 The fees for this certification scheme shall include but not limited to the following
 - 5.2.1 Application Fee
 - 5.2.2 Initial Assessment Fee
 - 5.2.3 Certification Fee
 - 5.2.4 Marking Fee
 - 5.2.5 Surveillance Fee
 - 5.2.6 Annual Renewal Fee
 - 5.2.7 Testing Fee
 - 5.2.8 Outsource Activity Fee , where applicable

Approved by HOU	Authorized by PCASM
Date of Issue : 26/09/2021	Rev. No. : 10
درجة السرية / Level of Confidentiality : عام / General	Page 9 of 9