



Certificate Of Fire Approval

This is to certify that the product detailed below will be accepted for compliance with the applicable Lloyd's Register Rules and Regulations and with the International Convention for the Safety of Life at Sea, (SOLAS), 1974, as amended, for use on ships and offshore installations classed with Lloyd's Register, and for use on ships and offshore installations when authorised by contracting governments to issue the relevant certificates, licences, permits etc.

Manufacturer	Rockwool International A/S
Address	Hovedgaden 501, 2640 Hedehusene, Denmark
Type	A-60 Deck
Description	Fire Resisting 'A' Class Deck – Type: "A60 Deck SeaRox FM 6040 ALU" steel deck insulated on underside side with one layer of rockwool insulation material (50mm thick, 60kg/m3 density)
Trade Name	"A60 Deck SeaRox FM 6040 ALU"
Specified Standard	IMO Res. MSC.307(88) - (2010FTP Code) Annex 1 Part 3 IMO MSC.1/Circ.1435

This certificate is not valid for equipment, the design or manufacture of which has been varied or modified from the specimen tested. The manufacturer should notify Lloyd's Register North America, Inc. of any modification or changes to the equipment in order to obtain a valid Certificate.

The Design Appraisal Document and its supplementary Type Approval Terms and Conditions form part of this Certificate.

This certificate remains valid unless cancelled or revoked, provided the conditions in the attached Design Appraisal Document are complied with and the equipment remains satisfactory in service.

1330 Enclave Parkway, Houston, Texas, 77077,
United States

Bruce McDonald

Technical Authority - Statutory to Lloyd's
Register North America, Inc.
A member of the Lloyd's Register group

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ATTACHMENT TO CERTIFICATE OF TYPE APPROVAL No. LR23132999SF

The undernoted documents have been appraised for compliance with the relevant requirements of International Conventions, and this Design Appraisal Document forms part of the Certificate.

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APPROVAL DOCUMENTATION

Rockwool Technical Insulation Drawing No. R-019, dated 2015-09-15.

TEST REPORTS

Danish Institute of Fire and Security Technology, Jernholmen 12, DK-2650 Hvidovre, Denmark; Test Report No. PGA10732 dated 9th November 2015.

CONDITIONS OF CERTIFICATION

1. When used in conjunction with an approved A Class deck.
2. A-60 steel deck insulation system 'A60 Deck SeaRox FM 6040 ALU' consisting of: steel deck insulated on underside with one layer of rockwool insulation "SeaRox FM 6040 ALU" (50mm thick, 60 kg/m³ density), manufactured by Rockwool Technical Insulation, coated on the fire hazard side with 0.25mm thick 'AG 18-2/2-20' reinforced aluminium foil manufactured by Röthel GmbH & Co. KG. The Insulation applied on the steel plate and around the stiffeners. Total thickness of the insulation is 30mm.
3. Insulation on the steel plate retained by 3mm diameter steel pins and 30mm diameter washers at maximum 300mm horizontal, 500mm staggered vertical, 300mm diagonal centres, and 100mm from insulation joints with 2 pin rows, 150mm from insulation joints with 1 pin rows. Insulation wrapped around the stiffeners.
4. Maximum width of insulation blankets following installation: 1000mm.
5. Insulation fixing method should be same as tested arrangement in all cases.
6. Composition and application of insulation material to be maintained in production and use in accordance with originally tested composition formula and method of application, and manufacturer's instructions.
7. Production items are to be manufactured in accordance with a quality control system which shall be maintained to ensure that items are of the same standard as the approved prototype.
8. The certificate holder is solely responsible for the products supplied under this Certificate and to ensure that their products, whether manufactured by themselves or their licensee manufacturers, if agreed by Lloyd's Register, are fully compliant with the relevant statutory regulations and Lloyd's Register Class rules as applicable and designed, manufactured and installed to the same quality and specifications as the prototype tested, including components that are designed and manufactured by third parties.



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PLACES OF PRODUCTION

Rockwool A/S

Moss
Trondheim
Norway

Roxul Asia Sdn. Bhd.

75450 Melaka
Malaysia

Rockwool Hungary

8300 Tapolca
Hungary

Rockwool BV

NL-6045 JG Roermond
The Netherlands

Rockwool Peninsular S.A.U.

E-31380 Caparrosa
Spain

Rockwool a.s.

735 31 Bohumin 3
Czech Republic

Rockwool Ltd

Pencoed
Bridgend
Wales, CF35 6NY
United Kingdom

Roxul Rockwool Insulation India Pvt. Ltd.

Plot – Z/4, Dahej SEZ, Dahej
District Bharuch – 392 130
Gujarat
India

Deutsche Rockwool GmbH & Co. OHG

Ruhrstrasse 13
DE-86633
Neuburg a.d. Donau
Germany

Rockwool A/S

Rockwoolvej
Ø Doense
DK-9500 Hobro
Denmark

Rockwool A/S

Industrivej
DK-6580 Vamdrup
Denmark

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Supplementary Type Approval Terms and Conditions

This certificate and Design Appraisal Document relates to type approval, it certifies that the prototype(s) of the product(s) referred to herein has/have been found to meet the applicable design criteria for the use specified herein, it does not mean or imply approval for any other use, nor approval of any products designed or manufactured otherwise than in strict conformity with the said prototype(s)