

TYPE APPROVAL CERTIFICATE

This is to certify:

That the Thermal Overload Relay

with type designation(s)
3RU21

Issued to

**Siemens AG, GWA
Amberg, Germany**

is found to comply with
DNV GL rules for classification – Ships and offshore units

Application :

Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.

This Certificate is valid until **2021-06-26**.

Issued at **Hamburg** on **2016-06-27**

DNV GL local station: **Augsburg**

Approval Engineer: **Harald Amberger**

for **DNV GL**

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**Duy Nam Le
Head of Section**

This Certificate is subject to terms and conditions overleaf. Any significant change in design or construction may render this Certificate invalid. The validity date relates to the Type Approval Certificate and not to the approval of equipment/systems installed.

Product description

Thermal overload relay 3RU21... Ratings	
Operational voltage Ue	690V
Insulation voltage Ui	690V
Impulse withstands voltage Uimp	6kV
Type / Size	3RU2116. / S00 3RU2126. / S0 3RU2136. / S2
Operational current Ie (40°C)	3RU2116 : max. 16A 3RU2126 : max. 40A 3RU2136 : max. 80A
Trip class	class 10 : for types 3RU2116 and 3RU2126 class 10 : for types 3RU2136 rated 5,5-65A class 10A : for types 3RU2136 rated 62-80A
Range of settings	3RU2116 : 0,11-0,16A up to 11-16A 3RU2126 : 1,8-2,5A up to 34-40A 3RU2136 : 5,5-8A up to 70-80A
Method of control	Manual / Automatic

Further ratings according manufacturer documentation

Accessories; Basic types	
3RU2916-	Terminal support for stand-alone installation, Size S00
3RU2926-	Terminal support for stand-alone installation, Size S0
3RU2936-	Terminal support for stand-alone installation, Size S2
3RU2900-1A	Mechanical RESET (for all sizes)
3RU2900-1B/1C	Cable releases with holder for RESET
3RU1900-2A...	Modules for remote RESET, electrical
3RU29.../3RT29...	Terminal covers

Ratings and mounting locations according manufacturer documentation.

Application/Limitation

Location Classes:

Temperature: D, Humidity: B, Vibration: A, Enclosure: IP20,

For installation inside switchboards/ enclosures onboard ships and offshore units.
With Uimp=6kV; Overvoltage category II applies for applications in IT systems > 600 V.

Type Approval documentation

Certificate No.: 2995b, 2996b, 3208a, 15068ENV01, 09055TMs

Job Id: **262.1-020882-1**
Certificate No: **TAE000014S**

Tests carried out

IEC 60947-4-1, IEC 60947-5-1, cold, dry heat, damp heat, vibration, flame retardancy

Marking of product

Manufacturers label containing data and manufacturers type number.

Name and place of manufacturer

Siemens AG, GWA
Werner-von-Siemens-Str. 29
93413 Cham
Germany

Periodical assessment

The scope of the periodical assessment is to verify that the conditions stipulated for the Type approval are complied with and that no alterations are made to the product design or choice of materials.

The main elements of the assessment are:

- Inspection on factory samples, selected at random from the production line (where practicable).
- Results from Production Sample Tests (PST) and Routines (RT) checked (if not available tests according to PST and RT to be carried out).
- Review of type approval documentation.
- Review of possible change in design, materials and performance.
- Ensuring traceability between manufacturer's product type marking and Type Approval Certificate.
- Assessment to be performed at least every 2½ year.

END OF CERTIFICATE