DNV·GL

Certificate No:
TAE0000330
File No:
823.10
Job Id:
262.1-007889-4

TYPE APPROVAL CERTIFICATE

This is to certify:

That the Circuit Breaker

with type designation(s)
3WL1...

Issued to
Siemens AG Low Voltage
REGENSBURG, Germany

is found to comply with
DNV GL rules for classification – Ships, offshore units, and high speed and light craft

Application :

Product(s) approved by this certificate is/are accepted for installation on all vessels classed by DNV GL.
Rated voltage (V) up to 1150
Rated current (A) up to 6300

This Certificate is valid until **2023-12-18**.

Issued at **Hamburg** on **2018-12-19**
DNV GL local station: **Augsburg** for **DNV GL**

Approval Engineer: **Harald Amberger**

Arne Schaarmann
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.

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Product description

Ratings		3WL11 - 13 Air Circuit Breakers up to 6300A (AC)									
Size		I			II				III		
Type		3WL11			3WL12				3WL13		
Operating voltage U_e	V	690/1000			690/1000/1150				1150		
Insulation voltage U_i	V	1000/1150			1000/1150				1150		
Impulse withstand voltage U_{imp}	kV	12									
Frequency	Hz	50/60									
Number of poles		3/4									
Type of release		Electronic									
Method of installation		Fixed and withdrawable									
Utilization category		B									
Current I_n (40°C)	A	630 up to 2000			800 up to 4000 800 up to 3200 (Class-C)				4000 up to 6300		
Breaking Class		N	S	H	N	S	H	C	H	C 3-pole	C 4-pole
Ultimate Short-Circuit Breaking Capacity I_{cu}											
AC500V	kA	55	66	85	66	80	100	130	100	150	130
AC690V	kA	42	50	66	50	75	85	100	85	150	130
AC1000/1150V	kA			50			50		50	70	70
Service Short-Circuit Breaking Capacity I_{cs}	kA	$I_{cs} = I_{cu}$									
Making Capacity I_{cm}											
AC500V	kA	121	145	187	145	176	220	286	220	330	286
AC690V	kA	88	105	145	105	165	187	220	187	330	286
AC1000/1150	kA			105			105		105	154	154
Short-time withstand current I_{cw} (1s)	kA	42	50	66	55	66	85	100	100	100	100
Further ratings acc. manufacturer documentation.											

Application/Limitation

Location Classes:
Temperature: B, Humidity: B, Vibration: A, EMC:A, Enclosure: IP20,

Suitable for use in an IT system with a capacity of 1.2 times the maximum trip current (max. 50kA) at AC500V for 3LW11, AC690C for 3WL11 Class H, 3LW12 & 3LW13.

ACB Trip relays: Communication port for monitoring purpose only.

Operating instruction of the manufacturer to be observed

Type Approval documentation

Tests carried out

IEC 60947-2 including Annex H, vibration test, dry heat test, damp heat test, cold test and EMC test.

Marking of product

Acc. IEC 60947-2 subclause 5.2

Name and place of manufacturer

OEZ s.r.o. / Siemens AG
Sedivska 339, 56151 Letohrad
Czech Republic

Siemens Electrical Apparatus Ltd,
Suzhou, Jiangsu Province
CHINA

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 Routine Tests (RT) checked (if not available tests according to 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.

Periodical assessment is to be performed after 2 years and after 3.5 years. A renewal assessment will be performed at renewal of the certificate.

END OF CERTIFICATE