

Type Approval Certificate



This is to certify that the undernoted product(s) has/have been tested in accordance with the relevant requirements of the GL Type Approval System.

Certificate No. 11 849 - 10 HH
Company ABB SACE S.p.A
Via Baioni 35
24123 Bergamo, ITALY

Product Description Air Circuit Breaker

Type E2N/E 1600
Emax DC

Environmental Category C

Technical Data / Range of Application
Kind of current: DC
Utilization category: B
Rated impulse withstand voltage U_{imp} : 12 kV
Rated insulation voltage U_i : 1000V
Rated current (40°C) I_n : 1600A
Short-circuit characteristics: 3 poles two in series

U_e/V_{dc}	I_{cm}/kA	I_{cu}/kA	I_{cs}/kA	I_{cw}/kA
500	50	50	50	50
750	25	25	25	25
1000*	25	25	25	25

*4 poles two in series

Release system: Electronic trip units SACE PR122/DC-123/DC
Communication port for monitoring purposes only

Test Standard Guidelines for the Performance of Type Approvals (2003)
IEC 60947-2 (2006)

Documents LOVAG Certificate No. IT 08.109, IT 08.110, IT 09.036, IT 09.094
ABB Test Report LBRP 8129/00, LBRP 8566/00, LBRP 8776/00
CESI Test report A8031253, ABB Spa Test Report 21714

Remarks None

Valid until 2015-10-06

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File No. I.K.01

Hamburg, 2010-10-07

Type Approval Symbol



Germanischer Lloyd


Christoph Kutzner


Harald Amberger

This certificate is issued on the basis of "Guidelines for the Performance of Type Approvals Part 1, Procedure".