

# CERTIFICATE

Issued to:  
Applicant:  
**Zhejiang Chint Electrics Co., Ltd.**  
No. 1, Chint Road,  
Chint Industrial Zone,  
North Baixiang, Yueqing,  
Zhejiang, China

Licensee:  
**Zhejiang Chint Electrics Co., Ltd.**  
No. 1, Chint Road,  
Chint Industrial Zone,  
North Baixiang, Yueqing,  
Zhejiang, China

Product : Air Circuit Breaker  
Trade name(s) : CHINT  
Type(s)/model(s) : NA1-6300, NA1-6300N, NA1-6300X and NA1-6300XN

The product and any acceptable variation thereto is specified in the Annex to this certificate and the documents therein referred to.

DEKRA hereby declares that the above-mentioned product has been certified on the basis of:

- a type test according to the standard EN 60947-2:2006, EN 60947-2:2006/A1:2009 and EN 60947-2:2006/A2:2013
- an inspection of the production location according to CENELEC Operational Document CIG 021
- a certification agreement with the number 2032236

DEKRA hereby grants the right to use the KEMA-KEUR certification mark.

The KEMA-KEUR certification mark may be applied to the product as specified in this certificate for the duration of the KEMA-KEUR certification agreement and under the conditions of the KEMA-KEUR certification agreement.

This certificate is issued on 13 December 2017 and expires upon withdrawal of one of the above mentioned standards.

Certificate number: 33-102107

DEKRA Certification B.V.



drs. G.J. Zoetbrood  
Managing Director



Henk Barends  
Certification Manager

© Integral publication of this certificate is allowed

ACCREDITED BY THE  
DUTCH ACCREDITATION  
COUNCIL





**SPECIFICATION OF THE CERTIFIED PRODUCT**
**Product data**

Product	: Air Circuit Breaker
Trade name(s)	: CHINT
Type(s)/model(s)	: NA1-6300, NA1-6300N, NA1-6300X and NA1-6300XN
Number of poles	: 3 P and 4P (N pole does not have overcurrent protection, but has ground fault protection)
Protected pole	: 3 or 4
Rated operational voltage (Ue)	: 400 Vac / 415 Vac / 690 Vac
Rated insulation voltage (Ui)	: 1000 V for main circuit, 400 V for control circuits and auxiliary circuits
Rated impulse withstand voltage (Uimp)	: 12 kV for main circuit, 6 kV for control circuits and auxiliary circuits
Rated current (In)	: 4000 A, 5000 A, 6300 A for 3P 4000 A, 5000 A for 4P
Rated operational current (Ie)	: (0,4 - 1,0) x In
Conventional thermal current (Ith)	: Equal to In
Current rating for four-pole circuit-breakers	: Equal to In
Rated frequency	: 50 / 60 Hz
Suitable for isolation	: Suitable
Utilization category	: B
Safety distance (screen-circuit breaker)	: All sides: 0 mm
Method of mounting	: Withdrawable
EMC environment	: A
Reference temperature	: Independent
Shunt release	: AC: 127 V, 220 - 230 V, 380 - 400 V, 50 / 60 Hz DC: 110 V, 220 V
Under-voltage release	: AC: 127 V, 220 - 230 V, 380 - 400 V, 50 / 60 Hz DC: 110 V, 220 V
Closing coil	: AC: 127 V, 220 - 230 V, 380 - 400 V, 50 / 60 Hz DC: 110 V, 220 V
Stored energy motor	: AC: 127 V, 220 - 230 V, 380 - 400 V, 50 / 60 Hz DC: 110 V, 220 V
Auxiliary circuits	: Utilization category: AC-15: 1,3 A at 230 Vac, 0,75 A at 400 Vac, 50 / 60 Hz DC-13: 0,55 A at 110 Vdc, 0,27 A at 220 Vdc number and kind of contact elements: 4 NO and 4 NC or 6 NO and 6 NC rated conditional short-circuit current: 1 kA conventional free air thermal current (Ith): 6 A kind of protective device: fuse, RL6-25/6, gG, 6 A, 500 V, 7,5 kA
Line/load terminal	: Immaterial
Connection	: Copper busbar: (100 x 10) mm <sup>2</sup> x 5, if In = 4000 A (100 x 10) mm <sup>2</sup> x 7, if In = 5000 A (100 x 10) mm <sup>2</sup> x 8, if In = 6300 A
Rated tightening torque for terminals	: 50 Nm

**Product data – type NA1-6300**

Type of electronic release	: NST1-C
Rated ultimate short-circuit breaking capacity (Icu)	: 120 kA at 400 Vac, 85 kA at 415 / 690 Vac
Rated service short-circuit breaking capacity (Ics)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated short-time withstand current (Icw)	: 100 kA / 1 s at 400 Vac, 75 kA / 1 s at 415 / 690 Vac 50 kA / 3 s at 400 / 415 Vac

Inverse time delay release	: Ir (inverse time delay tripping setting): (0,4 - 1,0) x In, in step of 2 A
Time setting of the inverse time delay release	: tr (inverse time delay tripping setting): 15 s, 30 s, 60 s, 120 s, 240 s, 480 s with tolerance of ± 10% (at 1,5 Ir) Trip time at 2 Ir: Set at 15 s: 8,4 s, with tolerance of ± 10%, Set at 480 s: 270 s, with tolerance of ± 10%
Short time delay release	: Isd (short time delay tripping setting): (1,3125 - 15) x Ir, in step of 2 A, if li < 10 kA, in step of 0,02 kA, if li ≥ 10 kA (with maximum current setting 50 kA)
Time setting	: tsd (short time delay tripping setting): 0,1 s, 0,2 s, with tolerance of ± 32 ms, 0,3 s, 0,4 s, with tolerance of ± 25% Non-tripping duration: Set at 0,1 s: 0,06 s, Set at 0,4 s: 0,25 s
Instantaneous release	: li (instantaneous tripping setting): 1,3125 In - 70 kA, in step of 2 A, if li < 10 kA, in step of 0,02 kA, if li ≥ 10 kA
Ground fault release	: Ig: (0,2 - 0,8) x In, in step of 2 A Characteristic specified by manufacturer: When the fault current is 0,9 Ig, ACB shall not trip within 2 tg, When the fault current is 1,1 Ig, ACB shall trip within the limits of tg
Time setting of ground fault release	: tg: 0,1 s, 0,2 s, with tolerance of ± 32 ms 0,3 s, 0,4 s, with tolerance of ± 25%
Making current release	: 26 kA

**Product data – type NA1-6300N**

Type of electronic release	: NST1-C
Rated ultimate short-circuit breaking capacity (Icu)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated service short-circuit breaking capacity (Ics)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated short-time withstand current (Icw)	: 100 kA / 1 s at 400 Vac, 75 kA / 1 s at 415 / 690 Vac 50 kA / 3 s at 400 / 415 Vac
Inverse time delay release	: Ir (inverse time delay tripping setting): (0,4 - 1,0) x In, in step of 2 A
Time setting of the inverse time delay release	: tr (inverse time delay tripping setting): 15 s, 30 s, 60 s, 120 s, 240 s, 480 s with tolerance of ± 10% (at 1,5 Ir) Trip time at 2 Ir: Set at 15 s: 8,4 s, with tolerance of ± 10%, Set at 480 s: 270 s, with tolerance of ± 10%
Short time delay release	: Isd (short time delay tripping setting): (1,3125 - 15) x Ir, in step of 2 A, if li < 10 kA, in step of 0,02 kA, if li ≥ 10 kA (with maximum current setting 50 kA)

Time setting	: tsd (short time delay tripping setting): 0,1 s, 0,2 s, with tolerance of $\pm 32$ ms, 0,3 s, 0,4 s, with tolerance of $\pm 25\%$ Non-tripping duration: Set at 0,1 s: 0,06 s, Set at 0,4 s: 0,25 s
Instantaneous release	: li (instantaneous tripping setting): 1,3125 $I_n$ - 70 kA, in step of 2 A, if $I_i < 10$ kA, in step of 0,02 kA, if $I_i \geq 10$ kA
Ground fault release	: Ig: (0,2 - 0,8) $\times I_n$ , in step of 2 A Characteristic specified by manufacturer: When the fault current is 0,9 Ig, ACB shall not trip within 2 tg, When the fault current is 1,1 Ig, ACB shall trip within the limits of tg
Time setting of ground fault release	: tg: 0,1 s, 0,2 s, with tolerance of $\pm 32$ ms 0,3 s, 0,4 s, with tolerance of $\pm 25\%$
Making current release	: 26 kA
 <b>Product data – type NA1-6300X</b>	
Type of electronic release	: NST1-D
Rated ultimate short-circuit breaking capacity (Icu)	: 120 kA at 400 Vac, 85 kA at 415 / 690 Vac
Rated service short-circuit breaking capacity (Ics)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated short-time withstand current (Icw)	: 100 kA / 1 s at 400 Vac, 75 kA / 1 s at 415 / 690 Vac 50 kA / 3 s at 400 / 415 Vac
Inverse time delay release	: Ir (inverse time delay tripping setting): (0,4 - 1,0) $\times I_n$ , in step of 2 A
Time setting of the inverse time delay release	: tr (inverse time delay tripping setting): 15 s, 30 s, 60 s, 120 s, 240 s, 480 s with tolerance of $\pm 10\%$ (at 1,5 Ir) Trip time at 2 Ir: Set at 15 s: 8,4 s, with tolerance of $\pm 10\%$ , Set at 480 s: 270 s, with tolerance of $\pm 10\%$
Short time delay release	: Isd (short time delay tripping setting): (1,5 - 15) $\times I_r$ , in step of 2 A, if $I_i < 10$ kA, in step of 0,02 kA, if $I_i \geq 10$ kA (with maximum current setting 50 kA)
Time setting	: tsd (short time delay tripping setting): 0,1 s, 0,2 s, with tolerance of $\pm 40$ ms, 0,3 s, 0,4 s, with tolerance of $\pm 15\%$ Non-tripping duration: Set at 0,1 s: 0,05 s, Set at 0,4 s: 0,33 s
Instantaneous release	: li (instantaneous tripping setting): 1,5 $I_n$ - 75 kA, in step of 2 A, if $I_i < 10$ kA, in step of 0,02 kA, if $I_i \geq 10$ kA
Ground fault release	: Ig: 500 - 1200 A, in step of 2 A
Time setting of ground fault release	: tg: 0,1 s, 0,2 s, with tolerance of $\pm 40$ ms 0,3 s, 0,4 s, with tolerance of $\pm 15\%$
Making current release	: 26 kA

**Product data – type NA1-6300XN**

Type of electronic release	: NST1-D
Rated ultimate short-circuit breaking capacity (Icu)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated service short-circuit breaking capacity (Ics)	: 100 kA at 400 Vac, 75 kA at 415 / 690 Vac
Rated short-time withstand current (Icw)	: 100 kA / 1 s at 400 Vac, 75 kA / 1 s at 415 / 690 Vac 50 kA / 3 s at 400 / 415 Vac
Inverse time delay release	: Ir (inverse time delay tripping setting): (0,4 - 1,0) x In, in step of 2 A
Time setting of the inverse time delay release	: tr (inverse time delay tripping setting): 15 s, 30 s, 60 s, 120 s, 240 s, 480 s with tolerance of ± 10% (at 1,5 Ir) Trip time at 2 Ir: Set at 15 s: 8,4 s, with tolerance of ± 10%, Set at 480 s: 270 s, with tolerance of ± 10%
Short time delay release	: Isd (short time delay tripping setting): (1,5 - 15) x Ir, in step of 2 A, if Ii < 10 kA, in step of 0,02 kA, if Ii ≥ 10 kA (with maximum current setting 50 kA)
Time setting	: tsd (short time delay tripping setting): 0,1 s, 0,2 s, with tolerance of ± 40 ms, 0,3 s, 0,4 s, with tolerance of ± 15% Non-tripping duration: Set at 0,1 s: 0,05 s, Set at 0,4 s: 0,33 s
Instantaneous release	: Ii (instantaneous tripping setting): 1,5 In - 75 kA, in step of 2 A, if Ii < 10 kA, in step of 0,02 kA, if Ii ≥ 10 kA
Ground fault release	: Ig: 500 - 1200 A, in step of 2 A
Time setting of ground fault release	: tg: 0,1 s, 0,2 s, with tolerance of ± 40 ms 0,3 s, 0,4 s, with tolerance of ± 15%
Making current release	: 26 kA

**TESTS****Test requirements**

EN 60947-2:2006  
EN 60947-2:2006/A1:2009  
EN 60947-2:2006/A2:2013

**Test result**

The test results are laid down in DEKRA test file 331181500.

**Additional information**

Nomenclature breakdown:

NA1-6300XN/4

a b c d e

a = Model name: NA1

b = Frame size: 6300

c = Electronic release: X means NST1-D , blank means NST1-C

d = short-circuit capacity, 'N' or 'blank'

e = pole numbers: '3' means 3P ACBs, '4' means 4P ACBs

The product also complies with IEC 60947-2:2006, A1:2009 and A2:2013 and IEC 60947-5-1:2003 and A1:2009.

This certificate replaces certificate no. 3308635.01 issued on 2015-11-30.

The referred test reports are 3311815.50, 3308635.50, 3303046.52, W0808013.51, W0808013.53, S0501025.52 and ITS CB test report no. 300628.

**Conclusion**

The examination proved that all requirements were met.

**Factory location**

Zhejiang Chint Electrics Co., Ltd.

No. 1318, Binhai No. 2 Avenue,

Economic and Technical Development Zone,

Wenzhou, Zhejiang, China