


Reference No. STR L2564


Our ref. HEL-CERT211001264-01

STATEMENT OF TEST RESULTS

Product	Air-cooled frequency converter
Tested on request of	ABB Oy Drives, P.O. Box 184, FI – 00381 HELSINKI, FINLAND
Name and address of the manufacturer	ABB Oy Drives, Hiomotie 13, FI – 00380 HELSINKI, FINLAND
Name and address of the factory	See page 2
Rating and principal characteristics	Class I. For voltage, current and frequency ratings, see pages 3 and 4.
Trademark (if any)	
Type	ACH580-31, ACQ580-31, ACS880-11 and ACS880-31 See pages 3 and 4 for type code details.
Additional information (if any)	See page 2.
Sufficient samples of the product have been tested and found to be in conformity with the standard (number and edition)	IEC 61800-5-1:2007 + AMD1:2016 EN 61800-5-1:2007 + A1:2017
As shown in the test report (reference No.)	299881-1

This statement of test results is based on tested samples of the product. Samples of the product have been tested and found to be in conformity with above mentioned standard(s) which are harmonised under the Low Voltage Directive (2014/35/EU).

This statement of test results is not a FI certificate thus not giving the right to use the FI or SGS FI mark on products, its packaging or any marketing material or activities.

Date of issue	2021-10-28
	SGS Fimko Ltd
Signature	
	Product Certifier

Name and address of the factory

ABB Oy Drives
Hiomotie 13
FI-00380 Helsinki, Finland

ABB Inc., Drives & Power Products
16250 West Glendale Drive
WI 53151-2840, New Berlin, Wisconsin,
United States of America

ABB Beijing Drive Systems Co Ltd.
No1, Blk D, A-10, Jiuxianqiao Beilu
Chaoyang District, Beijing, 100015, China

Additional information (if any)

Air-cooled frequency converters / drives:

ACH580-31 (air-cooled frequency converter for HVAC applications)
ACQ580-31 (air-cooled frequency converter for water applications)
ACS880-11 (air-cooled regenerative frequency converter)
ACS880-31 (air-cooled low harmonic frequency converter)

Ambient temperature during operation (°C) with/without derating:

+40°C without output current de-rating, max. +55 °C with 1 % derating of rated output current per 1 K temperature increase above +40 °C.

Exceptions:

ACS880-11-206A-3 IP55 and ACS880-11-180A-5 IP55 models: +55 °C with 1,5 % derating of rated output current per 1 K temperature increase above +40 °C.

ACS880-11-...+X5663: +40 °C - +45 °C 95 % of rated output current, +45 °C - +50 °C 90 % of rated output current, +50 °C - +55 °C 85 % of rated output current.

Additional information:

Max. operation altitude 4000 m (TN, TT: neutral earthed network systems; IT: non-corner earthed network system)

Max. operation altitude 2000 m (TN, TT, IT: corner earthed network systems)

IP classes:

IP21 or IP55.

Cabinet installation (option +P940): IP20

Ratings:

Model ACS880- 11/31-	IEC ratings $U_N = 500\text{ V}$				UL ratings $U_N = 480\text{ V}$			
	I1 / A	S _N / kVA	I2 / A	P _N / kW	I1 / A	S _N / kVA	I _{LD} / A	P _{LD} / hp
-101A-5	71	87	101	55	74	87	96	75
-124A-5	96	107	124	75	100	107	124	100
-156A-5	115	137	156	90	120	137	156	125
-180A-5	141	156	180	110	147	156	180	150

with f1: 50/60 Hz, f2: 0...500 Hz and U2: 3~ 0...U1 V.

Model ACS880- 11-... +X5663	Input ratings				Nominal use		Cyclic load use		
	I1 / A	I1 / A	I _{max} / A	S _N / kVA	I2 / A	P _N / kW	Nominal	Acceleration	Deceleration
	(U1 = 380V)	(U1 = 500V)	(t < 2s)				I2 / A	I2 / A	I2 / A
-119A-5	125	95	264	82	119	72	100	240	60
-179A-5	187	142	396	124	179	110	150	360	90

with f1: 50/60 Hz, f2: 0...500 Hz and U2: 3~ 0...U1 V.

Model ACS880- 11/31-	IEC ratings $U_N = 400\text{ V}$			
	I1 / A	S _N / kVA	I2 / A	P _N / kW
-105A-3	88	73	105	55
-145A-3	120	100	145	75
-169A-3	144	117	169	90
-206A-3	176	143	206	110

with f1: 50/60 Hz, f2: 0...500 Hz and U2: 3~ 0...U1 V.

Ratings:

Model ACx580-31-	IEC ratings U _N = 400 V				IEC ratings U _N = 480 V			
	I ₁ / A	S _N / kVA	I ₂ / A	P _N / kW	I ₁ / A	S _N / kVA	I _{LD} / A	P _{LD} / hp
-106A-4	94	73,4	106	55	82	79,8	96	75
-145A-4	128	100,5	145	75	111	103,1	124	100
-169A-4	154	117,1	169	90	134	129,7	156	125
-206A-4	188	142,7	206	110	163	149,6	180	150

with f1: 50/60 Hz, f2: 0...500 Hz and U2: 3~ 0...U1 V.

Model ACx580-31-	UL ratings U _N = 480 V			
	I ₁ / A	S _N / kVA	I _{LD} / A	P _{LD} / hp
-96A-4	82	73	96	75
-124A-4	111	100	124	100
-156A-4	134	117	156	125
-180A-4	163	143	180	150

with f1: 50/60 Hz, f2: 0...500 Hz and U2: 3~ 0...U1 V.

With "-x" = "-H" or "-Q".