

TEST REPORT IEC 60335-2-23 Part 1: Safety of household and similar electrical appliances Part 2: Particular requirements for appliances for skin or hair care	
Report Number	See cover page
Date of issue.....	See cover page
Total number of pages	See cover page
Applicant's name	Ningbo Saiding Electric Appliance Co.,Ltd
Address	No.328 xinzhoutang road Yuncheng village Zhouxiang town Cixi City, Ningbo 315324 P.R. China
Test specification:	
Standard	IEC 60335-2-23:2003 (5. edition) (incl. Corr.2:2008) + A1:2008 in conjunction with IEC 60335-1:2001 (4. edition) (incl. Corr.1:2002) + A1:2004 (incl. Corr.1:2005) + A2:2006 (incl. Corr.1:2006)
Test procedure	CE LVD & TUV GS Mark
Non-standard test method.....	N/A
Test Report Form No.....	IEC60335_2_23F
Test Report Form(s) Originator.	VDE
Master TRF.....	Dated 2009-01
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This report is not valid as a CB Test Report unless signed by an approved CB Testing Laboratory and appended to a CB Test Certificate issued by an NCB in accordance with IECEE 02.	

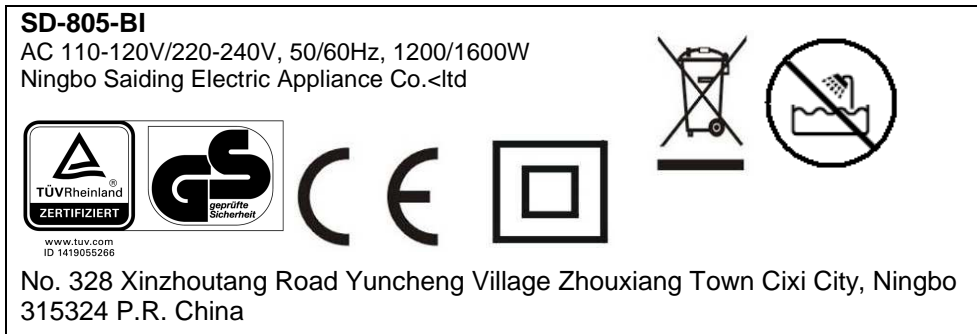
Test item description	Hair Dryer
Trade Mark	N/A
Manufacturer	Ningbo Saiding Electric Appliance Co.,Ltd No.328 xinzhoutang road Yuncheng village Zhouxiang town Cixi City, Ningbo 315324 P.R. China
Model/Type reference.....	SD-801; SD-801I; SD-802; SD-802I; SD-803; SD-803I; SD-805; SD-805I; SD-805-BI; SD-805-B; SD-806; SD-806I; SD-807; SD-808; SD-808I; SD-809; SD-809-B
Ratings	Refer to test report 14706403 001-004

Testing procedure and testing location:		
<input checked="" type="checkbox"/>	Testing Laboratory:	TÜV Rheinland /CCIC (Ningbo) Co., Ltd.
Testing location/ address		3F Building C13, R&D Park, No.32 , Lane 299 Guanghua Road, National Hi-Tech Zone, Ningbo, 315048, P.R.China
<input type="checkbox"/>	Associated CB Laboratory:	
Testing location/ address		
Tested by (name + signature)		See cover page
Approved by (name + signature) . .		See cover page
<input type="checkbox"/>	Testing procedure: TMP	
Testing location/ address		
Tested by (name + signature)		
Approved by (name + signature) . .		
<input type="checkbox"/>	Testing procedure: WMT	
Testing location/ address		
Tested by (name + signature)		
Witnessed by (name + signature):		
Approved by (name + signature) . .		
<input type="checkbox"/>	Testing procedure: SMT	
Testing location/ address		
Tested by (name + signature)		
Approved by (name + signature) . .		
Supervised by (name + signature):		
<input type="checkbox"/>	Testing procedure: RMT	
Testing location/ address		
Tested by (name + signature)		
Approved by (name + signature) . .		
Supervised by (name + signature):		

List of Attachments (including a total number of pages in each attachment): See cover page	
Summary of testing:Pass Reasonable foreseeable use is covered by the standard and related EK decision applied	
Tests performed (name of test and test clause): <p>For SD-801 was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-802I with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-803I with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-807 with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-808 with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-809 with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>For SD-805-BI with power cord was selected for CI 25.14 of EN 60335-2-23/A2</p> <p>Contruction check was done, no change found in the product.</p>	Testing location: TÜV Rheinland /CCIC (Ningbo) Co., Ltd. 3F Building C13, R&D Park, No.32 , Lane 299 Guanghua Road, National Hi-Tech Zone, Ningbo, 315048, P.R. China
Summary of compliance with National Differences List of countries addressed: EU GROUP DIFFERENCES AND NATIONAL DIFFERENCES refer to test report 14706403 001-004 <input checked="" type="checkbox"/> The product fulfils the requirements of EN 60335-2-23:2003 + A1 + A11+A2 EN 60335-1:2012+A11, EN 62233:2008 and AfPS GS 2014:01 (incl. Corr.:2008).	

Copy of marking plate:

The artwork below may be only a draft. The use of certification marks on a product must be authorized by the respective NCBS that own these marks.



The other types are similar as above one except rated input and type designation.

Manufacture or/and his importer shall ensure product bears label requirements in article 6 and article 8 of the 2014/35/EU relate to name, batch number, post address prior place the product into EU market.

Photographs:

N/A

Test item particulars	
Classification of installation and use	Hand-held appliance
Supply Connection.....	Type Y attachment with a plug
.....	
Possible test case verdicts:	
- test case does not apply to the test object.....	N/A
- test object does meet the requirement	P (Pass)
- test object does not meet the requirement	F (Fail)
Testing	
Date of receipt of test item	See cover page
Date (s) of performance of tests	See cover page
General remarks:	
The test results presented in this report relate only to the object tested. This report shall not be reproduced, except in full, without the written approval of the Issuing testing laboratory. "(see Enclosure #)" refers to additional information appended to the report. "(see appended table)" refers to a table appended to the report. Throughout this report a <input checked="" type="checkbox"/> comma / <input type="checkbox"/> point is used as the decimal separator.	
Manufacturer's Declaration per sub-clause 6.2.5 of IEC 60335-2-23:	
The application for obtaining a CB Test Certificate includes more than one factory location and a declaration from the Manufacturer stating that the sample(s) submitted for evaluation is (are) representative of the products from each factory has been provided	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> Not applicable
When differences exist; they shall be identified in the General product information section.	
Name and address of factory (ies)	Ningbo Saiding Electric Appliance Co.,Ltd No.328 xinzhoutang road Yuncheng village Zhouxiang town Cixi City, Ningbo 315324 P.R. China
General product information:	
The basic part of this report covers the assessment of the general IEC requirement.	
1. 1. All models used as hair dryer only for indoor use.	
2. SD-801 and SD-801I share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except negative ion generator; SD-801I have a negative ion generator. So RCY-801I is selected for testing.	
3. SD-802 and SD-802I share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except negative ion generator; SD-802I have a negative ion generator. So RCY-802I is selected for testing.	
4. SD-803 and SD-803I share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except negative ion generator; SD-803I have a negative ion generator. So RCY-803I is selected for testing.	
5. SD-805, SD805I, SD-805-B and SD-805-BI share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except negative ion generator and the heating element; SD-805 and SD805I share the same heating element. SD-805-B and SD-805-B share the same heating element. SD805I and SD-805-BI share same negative ion generator,The	

power heating element of SD-805-BI is bigger than the power heating element of SD-805I, So SD-805-BI is selected for testing.

6. SD-806 and SD-806I share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except the negative ion generator; SD-806I have a negative ion generator . SD-808 and SD-808I share same shape of the products, construction, power plug, power cord, self-resetting thermal cut-out, DC motor, internal wire and switch basically except the negative ion generator; SD-808I have a negative ion generator . SD-806I and SD-808I have the same construction, power plug, power cord, self-resetting thermal cut-out, DC motor and internal wire except the power heating element and the shape of the products. The power heating element of SD-808I is bigger than the power heating element of SD-806I, So SD-808I is selected for testing.

7. Other type model (SD-807, SD-809 and SD-809-B) have different construction, and also selected for testing.

Amendment test report 001:

The original Test Report Ref. No.14706403 001, dated 2011-11-25 was additionally modified on 2013-05-14 to standard upgrade.

The standard was upgraded from original EN 60335-1:2002+A1+A11+A12+A2+A13+A14, EN 60335-2-23:2003 +A1+A11, EN 62233:2008 to EN 60335-1:2012, EN 60335-2-23:2003+A1+A11, EN 62233:2008, ZEK 01.4-08/11.11.

Added alternative cooling switch M-10 with certificate number TUV 50142874.

Added alternative cooling switch MS-02 with certificate number TUV PS (B 09 07 69119 009).

Added alternative Voltage selector switch ZK-02 and ZK-03 with certificate number TUV PS (B 10 07 67701 018).

Construction check performed. CDF revised in table 24.1.

Amendment test report 002:

Added alternative internal wire, negative ion generator. The added components were in table 24.1.

Standard update from EN 60335-1:2012, EN 60335-2-23:2003 +A1+A11, EN 62333:2008, ZEK 01.4-08/11.11 to EN 60335-1:2012+A11, EN 60335-2-23:2003 +A1+A11, EN 62333:2008, AfPS GS 2014: 01.

Amendment 003 test report,

Issue LVD COC according to Low Voltage Directive 2014/35/EU.

Amendment test report 004:

Standard update from EN 60335-1:2012+A11, EN 60335-2-23:2003 +A1+A11, EN 62333:2008, AfPS GS 2014: 01 to EN 60335-1:2012+A11, EN 60335-2-23:2003 +A1+A11+A2, EN 62333:2008, AfPS GS 2014: 01.

Added alternative power cord, X2 capacitor and switch, which bold type in CDF, CDF revised.

This test report is only valid together with report 14705403 001-004.

EN 60335-2-23:2003/A2			
Clause	Requirement + Test	Result - Remark	Verdict
7	MARKING AND INSTRUCTIONS		P
7.10	Delete the addition including the note		P
7.12	Replace the text of Part 2 stating "7.12 replace the text of 7.12 in Part 1 and the addition in Part 2-23" by: Replace the text of 7.12 in Part 1 until and including the paragraph starting with "Children should be supervised..." and the addition in Part 2-23 by:		P
7.12.Z101	Delete subclause.		P
7.12.Z1	Addition to the second paragraph. The supplying of the instruction in an alternative format is not required for fixed hand dryers for which the operation is simple and clear.		N/A
7.14	Addition - Delete Note Z101.		P
8	PROTECTION AGAINST ACCESS TO LIVE PARTS		N/A
8.1.1	Replacement - Delete the text in the Part 2.		N/A
8.2	Modification Delete the text in the Part 2.		N/A
10	POWER INPUT AND CURRENT		N/A
10.1	Representative period for appliances incorporating PTC heating elements is 30 min. (IEC 60335-2-23/A2)		N/A
10.2	Representative period for appliances incorporating PTC heating elements is 30 min. (IEC 60335-2-23/A2)		N/A
11	HEATING		P
11.2	Hand-held appliances with an integral rest are also tested when placed on their rest away from the walls of the test corner. (IEC 60335-2-23/A2)		N/A
11.8	Modification Replace the current text in the Part 2.		P
	Modification: Replace the first paragraph of Part 1 by the following: "During the test, the temperature rises are monitored continuously and shall not exceed the values shown		P
	in Table 3 and Table Z101. In Table 3 delete the row "External enclosure of motor-operated appliances, except handles held in normal use" and the corresponding footnotes.		P
19	ABNORMAL OPERATION		P
19.2	- hand-held appliances without an integral rest are placed on the floor of the test corner in any stable position likely to occur (IEC 60335-2-23/A2).		P
20	STABILITY AND MECHANICAL HAZARDS		P

EN 60335-2-23:2003/A2			
Clause	Requirement + Test	Result - Remark	Verdict
20.2	Addition Delete the text "Replace the 1st paragraph of the compliance.....a force of 2,5 N"		P
22	CONSTRUCTION		P
22.12	Modification Delete the text in the Part 2.		P
22.Z101	Delete this subclause.		P
25	SUPPLY CONNECTION AND EXTERNAL FLEXIBLE CORDS		P
25.7	- light polyvinyl chloride sheathed cord (60227 IEC 52) are allowed regardless of the mass of the appliance. (IEC 60335-2-23/A2)		P
	Temperature rise limit of 75 K is increased to 130 K provided that the temperature risedecreases to 75 K within 5 min of the appliance being switched off. (IEC 60335-2-23/A2)		P
25.14	Number of flexings 10 000, rate of flexing being 6 /min (IEC 60335-2-23/A2).		P
	Flexing test, as described:		P
	- applied force (N).....:		P
	- number of flexings.....:		P
	The test does not result in:		P
	- short-circuit between the conductors, such that the current exceeds a value of twice the rated current		P
	- breakage of more than 10 % of the strands of any conductor		P
	- separation of the conductor from its terminal		P
	- loosening of any cord guard		P
	- damage to the cord or the cord guard		P
	- broken strands piercing the insulation and becoming accessible		P
25.15	For appliances with a swivel connection, the value of 30 N in Table 12 is increased to 60 N. (IEC 60335-2-23/A2)		N/A
Annex ZE	(normative) Specific additional requirements for appliances with motorized parts and intended for commercial use		N/A

24.1	TABLE: Components information					P
Object / part No.	Manufacturer/ trademark	Type / model	Technical data	Standard	Mark(s) of conformity ¹⁾	
Supplementary information: refer to CDF						
1) Provided evidence ensures the agreed level of compliance. See OD-CB2039.						

END OF TEST REPORT

Measurement Equipment List

Testing Start Date 30.01.2018
 Testing end date 03.02.2018

Project Manager Gui William

Test Report Number 14706403 005
 Order Item Number 1160042319A00080

Customer Ningbo Sading Electric Appliance
 Product Name hair dryer
 Comment

Old ID	Equip.	Description	Model	Manufacturer	Inte. (mon)	Due Date
1.243	1809691	Temp. & Humidity recorder	175H1	Testo	12	16.01.2019
1.004	1809429	Digital power meter	3332	HIOKI	12	06.09.2018
1.049A	1809498	Flexible cord bending tester	WZJ	shqk	12	03.01.2019

* No entry for devices that are not subject to regular gauging or calibration

Signature: 