



Thank you for giving UL the opportunity to partner with you.

Please note, Follow-Up Procedure Revisions or Report Revisions do not include Authorization Pages, Indices, Section General, and/or Appendices unless revisions were required or requested.

Should you have any questions, after reviewing the material, or need to report any inaccuracies, please reach out to your UL representative or find UL contact details for your local Customer Service Department at

<https://www.ul.com/about/locations>.

Please find attached the related material

For your convenience, the below describes the related updates:

E252145-volX1-Index
E252145-20240606-CertificateofCompliance
E252145-A6016-DescriptionUL
Figure-20-Total
E252145-A6016-TestRecordUL

This material is provided on behalf of UL LLC (UL) or any authorized licensee of UL.

Times change, Trust Remains™

File		Volume	Page	Date:
E252145	Index	X1	1	06-Jun-24

Index

<u>Product Type</u>	<u>Model/Type Reference</u>	<u>Report Reference #</u>	<u>Status</u>
CRT Color Monitor	531****, ZV0069 Where * may be any alphanumeric character or blank.	E252145-A1-UL	
LCD MONITOR	HSG1124, HSG1126, HSG1178, HSG1180, HSG1182	E252145-A2-UL	
LCD Monitor	HSG1122, HSG1123	E252145-A3-UL	
LCD Monitor	HSG1223, HSG1225.	E252145-A10-UL	
LCD Monitor	HSG1252	E252145-A11-UL	
LCD Monitor	HSG1257	E252145-A12-UL	
Display	EM2450W and VS15964	E252145-A13-UL	
LCD Monitor	ED273, ED322Q, EDB322Q, 27H****, ED27****, ED32****, EM27C****, EM32C**** (*=a to z, A to Z, 0 to 9 or blank, not influencing on safety), ADDP32NR01.0	E252145-A14-UL	
LCD Monitor	ED242QR	E252145-A15-UL	
LCD Monitor	TSM24****, TSM2****, SM24****, SM2****, LM24****, LM2****, EM235****(*=a to z, A to Z, 0 to 9 or blank)	E252145-A20-UL	
Security LED Monitor	SMT-32****, SMT-40****, EC32****, EC40**** (*=a to z, A to Z, 0 to 9 or blank) (* has no relation to safety)	E252145-A21-UL	
Security LED Monitor	SMT-43****(*=a-z, A-Z, 0-9, -, /, \ or blank)	E252145-A6016-UL	

Certificate of Compliance

Certificate Number:

UL-US-2422704-0

Report Reference:

E252145-20240606

Issue Date:

2024-06-07

Issued to:

**WEIHAI DAEWOO ELECTRONICS CO LTD
ECONOMIC & TECHNICAL DEVELOPMENT ZONE
26 HONGKONG RD WEIHAI, Shandong 264205
China**

This certificate confirms that representative samples of:
**AZOT - Audio/Video, Information and Communication
Technology Equipment**

See Addendum Page for Product Designation(s).

Have been evaluated by UL in accordance with the Standard(s) indicated on this Certificate.

**UL 62368-1, 3rd Ed., Issue Date: 2019-12-13, Revision Date:
2021-10-22**

Additional Information:

See UL Product iQ® at <https://iq.ulprospector.com> for additional information.

This Certificate of Compliance indicates that representative samples of the product described in the certification report have met the requirements for UL certification. It does not provide authorization to apply the UL Mark. Only the Authorization Page that references the Follow-Up Services Procedure for ongoing surveillance provides authorization to apply the UL Mark.

Only those products bearing the UL Mark should be considered as being UL Certified and covered under UL's Follow-Up Services.

Look for the UL Certification Mark on the product.



David Piecuch
UL Mark Certification Program Manager



Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL. For questions, please contact UL Solutions Customer Service at <https://www.ul.com/contact-us>.

CERTIFICATE OF COMPLIANCE

Certificate number UL-US-2422704-0
Report reference E252145-20240606
Date 2024-06-07

This is to certify that representative samples of the product as specified on this certificate were tested according to the current UL requirements.

Model	Product Description
SMT-43*****, (*=a-z, A-Z, 0-9, -, /, \ or blank)	Security LED Monitor



David Piecuch
UL Mark Certification Program Manager

Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL. For questions, please contact UL Solutions Customer Service at <https://www.ul.com/contact-us>.



Certificate of Compliance

Certificate Number:

UL-CA-2418021-0

Report Reference:

E252145-20240606

Issue Date:

2024-06-07

Issued to:

**WEIHAI DAEWOO ELECTRONICS CO LTD
ECONOMIC & TECHNICAL DEVELOPMENT ZONE
26 HONGKONG RD WEIHAI, Shandong 264205
China**

This certificate confirms that representative samples of:
**AZOT7 - Audio/Video, Information and Communication
Technology Equipment Certified for Canada**

See Addendum Page for Product Designation(s).

Have been evaluated by UL in accordance with the Standard(s) indicated on this Certificate.

**CSA C22.2 No. 62368-1:19, 3rd Ed., Issue Date: 2019-12-13,
Revision Date: 2021-10-22**

Additional Information:

See UL Product iQ® at <https://iq.ulprospector.com> for additional information.

This Certificate of Compliance indicates that representative samples of the product described in the certification report have met the requirements for UL certification. It does not provide authorization to apply the UL Mark. Only the Authorization Page that references the Follow-Up Services Procedure for ongoing surveillance provides authorization to apply the UL Mark.

Only those products bearing the UL Mark should be considered as being UL Certified and covered under UL's Follow-Up Services.

Look for the UL Certification Mark on the product.



David Piecuch
UL Mark Certification Program Manager



Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL. For questions, please contact UL Solutions Customer Service at <https://www.ul.com/contact-us>.

CERTIFICATE OF COMPLIANCE

Certificate number UL-CA-2418021-0
Report reference E252145-20240606
Date 2024-06-07

This is to certify that representative samples of the product as specified on this certificate were tested according to the current UL requirements.

Model	Product Description
SMT-43*****, (*=a-z, A-Z, 0-9, -, /, \ or blank)	Security LED Monitor



David Piecuch
UL Mark Certification Program Manager

Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL. For questions, please contact UL Solutions Customer Service at <https://www.ul.com/contact-us>.



UL TEST REPORT AND PROCEDURE

Standard:	UL 62368-1, 3rd Ed, 2021-10-22 (Audio/video, information and communication technology equipment Part 1: Safety requirements) CAN/CSA C22.2 No. 62368-1:19, 3rd Ed, 2021-10-22 (Audio/video, information and communication technology equipment Part 1: Safety requirements)
Certification Type:	Listing
CCN:	AZOT, AZOT7 (Audio/video, Information and Communication Technology Equipment)
Complementary CCN:	N/A
Product:	Security LED Monitor
Model:	SMT-43*****(*=a-z, A-Z, 0-9 , - , / , \ or blank)
Rating:	100-240Vac, 50/60Hz, 1.0A
Applicant Name and Address:	WEIHAI DAEWOO ELECTRONICS CO LTD ECONOMIC & TECHNICAL DEVELOPMENT ZONE 26 HONGKONG RD WEIHAI Shandong Sheng 264205 CHINA

This is to certify that representative samples of the products covered by this Test Report have been investigated in accordance with the above referenced Standards. The products have been found to comply with the requirements covering the category and the products are judged to be eligible for Follow-Up Service under the indicated Test Procedure. The manufacturer is authorized to use the UL Mark on such products which comply with this Test Report and any other applicable requirements of UL LLC ('UL') in accordance with the Follow-Up Service Agreement. Only those products which properly bear the UL Mark are considered as being covered by UL's Follow-Up Service under the indicated Test Procedure.

The applicant is authorized to reproduce the referenced Test Report provided it is reproduced in its entirety.

UL authorizes the applicant to reproduce the latest pages of the referenced Test Report consisting of the first page of the Specific Technical Criteria through to the end of the Conditions of Acceptability.

Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL.

Prepared By: Zack Wu / Project Handler

Reviewed By: Coco Zhu / Reviewer

Supporting Documentation

The following documents located at the beginning of this Procedure supplement the requirements of this Test Report:

A. Authorization - The Authorization page may include additional Factory Identification Code markings.

B. Generic Inspection Instructions -

- i. Part AC details important information which may be applicable to products covered by this Procedure. Products described in this Test Report must comply with any applicable items listed unless otherwise stated in the body of this Test Report.
- ii. Part AE details any requirements which may be applicable to all products covered by this Procedure. Products described in this Test Report must comply with any applicable items listed unless otherwise stated in the body of each Test Report.
- iii. Part AF details the requirements for the UL Certification Mark which is not controlled by the technical standard used to investigate these products. Products are permitted to bear only the Certification Mark(s) corresponding to the countries for which it is certified, as indicated in each Test Report.

Product Description

The equipment under tests is a 43 inch LED Monitor with internal non-certified power supply for use in general office environment. The built-in power supply models WDL3353C09 is non-approved component, which was manufactured by Qingdao Ticon Electronics Co.,Ltd. see appended table 4.1.2 for the detail information. And wall-Mounting evaluated.

The unit has the following features:

1. The internal metal chassis which covering building-in switching power supply.
2. The external plastic enclosure is regarded as fire enclosure, electrical enclosure, mechanical enclosure.
3. The unit is configured with TFT-LCD panel (with LED backlight).
4. The unit is configured with DP port, HDMI port.

Model Differences

N/A

Test Item Particulars

Product group	end product
Classification of use by	Ordinary person Children likely to be present
Supply Connection	AC Mains
Supply tolerance	+10%/-10%
Supply connection – type	pluggable equipment type A - appliance coupler
Considered current rating of protective device	20 for USA and Canada, 16 for most countries A; Location: building
Equipment mobility	movable wall/ceiling-mounted
Over voltage category (OVC)	OVC II
Class of equipment	Class I
Special installation location	N/A
Pollution degree (PD)	PD 2
Manufacturer's specified Tma (°C)	40
IP protection class	IPX0

Power systems	TN
Altitude during operation (m)	2000 m or less
Altitude of test laboratory (m)	2000 m or less
Mass of equipment (kg)	Display:8.31kg Bracket: 2.49kg

Technical Considerations

- ☐ The product was submitted and evaluated for use at the maximum ambient temperature (Tma) permitted by the manufacturer's specification of : 40°C
- ☐ The product is intended for use on the following power systems : TN
- ☐ Considered current rating of protective device as part of the building installation (A) : 20 for USA and Canada, 16 for most countries
- ☐ Mains supply tolerance (%) or absolute mains supply : +10%/-10% .
- ☐ The equipment disconnect device is considered to be : Appliance inlet
- ☐ The following circuit locations (with circuit/schematic designation) were investigated as a limited power source (LPS) : All output terminals
- ☐ The Risk Group of a lamp or lamp system (including LEDs) is : Exempt
- ☐ The following are available from the Applicant upon request : Installation (Safety) Instructions / Manual.

Additional Information

N/A

Additional Standards

The product fulfills the requirements of: AS/NZS 62368.1:2022;
EN IEC 62368-1:2020+A11:2020;
CSA/UL 62368-1:2019

Markings and Instructions

Clause Title	Marking or Instruction Details
Equipment identification marking – Manufacturer identification	Listee's or Recognized Company's name, Trade Name, Trademark or File Number
Equipment identification marking – model identification	Model Number
Equipment rating marking – ratings	"Input Ratings (voltage, frequency/dc, current/power)", "Output Ratings (voltage, frequency/dc, current/power)"
Fuses – replaceable by skilled person	(component ID: F1), T2A L/ 250V, and (symbol of required characteristics) located on or adjacent to fuse or fuseholder or in service manual.
DVK 6.5 Inter-connecting cables - External detachable (Optional)	Listees Name and Part number (Marking or Instruction)

Special Instructions to UL Representative

For transformer test - When the tests are conducted at other location, inspect test record and specification sheet provided by the component manufacturer. Verify the specification sheet indicates 100% routine test specified in Production-Line Testing Requirements be conducted at the component manufacturer.

BD1.0	TABLE: Production-Line Testing Requirements					
BD1.1	Electric Strength Test Special Constructions – Refer to Generic Inspection Instructions, Part AC for further information.					
Model	Component	Removable parts	Test probe location	Test V rms	Test V dc	Test Time, s
All models	Transformer (T1)	--	Primary to secondary	1500	2100	1
BD1.2	Earthing Continuity Test Exemptions – This test is not required for the following models:					
	All models					
BD1.3	Electric Strength Test Exemptions – This test is not required for the following models:					
	All models					
BD1.4	Electric Strength Test Component Exemptions – The following solid-state components may be disconnected from the remainder of the circuitry during the performance of this test.					
	N/A					

BE1.0	Sample and Test Specifics for Follow-Up Tests at UL				
Model	Component	Material	Test	Sample (s)	Test Specifics
--	--	--	--	--	--

4.1.2	TABLE: List of critical components					Pass
Object / part No.	Manufacturer/ trademark	Type / model	Technical data	Product Category CCN(s)	Mark(s) of conformity	Supplement ID
01. Label	Interchangeable	Interchangeable	Minimum 60 degree C, suitable for affixed material.	PGDQ2 or PGJI2	UL	
02. Internal Wirings (Secondary Circuits)	Interchangeable	Interchangeable	Marked or rated VW-1, min. 30 V, min. 60 degree C, routed away from primary un- insulated live parts and primary circuit wiring.	AVLV2	UL	
03. Insulating Tubing/Sleeving	Interchangeable	Interchangeable	Marked or rated VW-1, min. 105 degree C, min. 300 V.	YDPU2	UL	
04. Connectors and Receptacles (Secondary Circuits)	Interchangeable	Metal/Plastic	Copper alloy pins housed in bodies of plastic rated min. V-2.	QMFZ2	UL	
04a. Connectors and Receptacles (Secondary Circuits) (Alternate)	Interchangeable	Interchangeable	--	ECBT2	UL	
05. Internal Plastic Part Materials	Interchangeable	Interchangeable	Rated min. V-2.	QMFZ2	UL	
06. Interconnecting Cable (Optional) (Detachable)	Interchangeable	Interchangeable	Min. 30V, 60 degree C, maximum 3.05m long, suitable for external use. Marked VW-1 or better.	AVLV2	UL	
06a. Interconnecting Cable, (Optional) (Detachable) (Alternate)	Interchangeable	Interchangeable	Suitable for external use. Type CMP, CMR, CMG, or CM. For type CMX, or CMUC, maximum 3.05m long.	DUZX	UL	

07. Power Supply Cord (Optional)	Interchangeable	Interchangeable	Detachable, Type SVT, SPT-2 or NISPT-2, min. 250 Vac, min. 18 AWG, min. 1.5 m and max. 2.4 m long, one end with grounding type NEMA 5-15P, the other end with appliance coupler.	ZJCZ and RTRT and AXUT or ELBZ	UL	
07a. Power Supply Cord (Optional)(alternate)	Interchangeable	Interchangeable	Detachable, Type SVT or NISPT-2, min. 250 Vac, min. 18 AWG, min. 1.5 m and max. 2.4 m long, marked VW-1, one end with grounding type NEMA 6-15P, the other end with appliance coupler.	ELBZ	UL	
08. Printed Wiring Boards	Interchangeable	Interchangeable	Rated V-0, 105 degree C.	ZPMV2	UL	
10. LCD Panel with LED backlight	SHENZHEN TONGLIANGCAI PHOTO ELECTRIC TECHNOLOGY CO.,LTD.	DW430E	43 inch, TFT LCD Module.	--	--	
11. Plastic enclosure-frame part and back cover	CHI MEI CORPORATION	PA-757(+)	ABS, 80°C, HB min. 2.0mm	QMFZ2	UL (E56070)	
11-01. Metal enclosure	--	--	Metal Min 0.8mm thickness.	--	--	
12. Mylar sheet (under power board)	Sichuan dongfang insulating material co.,ltd	DFR116ECOB	V-0, min. 0.40mm thickness.	QMFZ2	UL (E199019)	
13. Power Board	Qingdao Ticon Electronics Co., Ltd	WDL3353C09	Input: 100-240Vac, 50/60Hz Output: 5Vdc/12Vdc.	--	--	

13-01. AC-Inlet (CN1)	Yueqing yanhui electronic co ltd	DB-14	250Vac, 15A, Configuration C14.	AXUT2	UL (E334847)	
13-01a. AC-Inlet (CN1) (Alternate)	LECI Electronics Co., LTD	DB-14	250Vac, 15A. (UL); 10A,250Vac (VDE), 70°C.	AXUT2	UL (E302229)	
13-02. Fuse (F1)	Conquer Electronics Co., Ltd.	MST	T3.15A, AC 250V, standard sheet 4.	JDYX2	UL (E82636)	
13-02a. Fuse (F1) (Alternate)	Littelfuse Inc.	392	T3.15A, AC 250V, standard sheet 4.	JDYX2	UL	
13-02b. Fuse (F1) (Alternate)	Interchangeable	Interchangeable	T3.15A, AC 250V, standard sheet 4.	JDYX	UL	
13-03. NTC (TH101)	Interchangeable	Interchangeable	NTC 5D20, rated 5Ω at 25 degree C.	--	--	
13-04. Bleeder resistors (R101,R102,R103,R104,R105,R106)	Interchangeable	Interchangeable	Max.2MΩ, Min.1/4W.	--	--	
13-05. X2-capacitor (CX101)	COWELL FASHION CO LTD	PCX2 337	0.22uF, Min.275Vac,X2 type, min.110°C	FOWX2	UL (E165646)	
13-05a. X2-capacitor (CX101)- (Alternate)	Nantong City Haimen Yinyan Electronic Co.,Ltd	MKPX2	0.22uF, Min.275Vac,X2 type, min.100°C	FOWX2	UL (E354597)	
13-06. BD101	Interchangeable	Interchangeable	800V/10A	--	--	
13-07. Filter (LF101&LF102)	Qingdao taikong electric co.,ltd.	TKSQ1918-10mH	Min. 130 degree C, see 04-04 for dimension details.	--	--	
13-07-01. Filter (LF101&LF102) - core	Interchangeable	Interchangeable	FEERITE	--	--	

13-07-02. Filter (LF101&LF102) - Wire	Interchangeable	Interchangeable	Min. 130 degree C	OBWM2	UL	
13-07-03. Filter (LF101&LF102) - bobbin	Interchangeable	Interchangeable	Phenolic, Min. 130 degree C	QMFZ2	UL	
13-07-04. Filter (LF101&LF102) - varnish	ZHUHAI CHANGXIAN NEW MATERIALS TECHNOLOGY CO LTD	E962	Min. 130 degree C	OBOR2	UL	
13-08. Electrolytic Capacitor (C101)	Interchangeable	Interchangeable	Min.105 degree C, Min.450V, Max.82uF	--	--	
13-09. MOSFET (Q101)	Interchangeable	Interchangeable	Min 650V, 10A	--	--	
13-10. Printed Wiring Boards	Interchangeable	Interchangeable	V-0, 130 degree C.	ZPMV2	UL	
13-11. Y1- Capacitor (CY1, CY2, CY3)	Yinan Don's Electronic Component Co.,Ltd.	CT81	CY1 =470pF, CY2=470pF, CY3=2.2nF, AC 250V min., 125°C, Y1 Type	FOWX2	UL (E145038)	
13-11a. Y1- Capacitor (CY1, CY2, CY3)- (Alternate)	Xiamen Sino Faith Electronic Technology Co., Ltd.	HCY	CY1 =470pF, CY2=1nF, CY3=2.2nF, AC 250V min., 125°C, Y1 Type	FOWX2	UL (E328673)	
13-12. Photocoupler (OP1)	LITE-ON Technology Corporation	LTV-817	115°C, reinforced insulation, 5300V	FPQU2	UL (E113898)	
13-12a. Photocoupler (OP1)- (Alternate)	Changzhou Galaxy Century Micro-Electronics Co., Ltd.	BL817	100°C, reinforced insulation, 5000V.	FPQU2	UL (E340048)	
13-13. Transformer (T1)	DEZHOU SANHE ELECTRONIC CO. LTD	EE42-1	See Enclosure 04-05 for details.	--	--	

13-13-01. Insulation system of Transformer (T1)	DEZHOU SANHE ELECTRIC CO LTD	SH130B	Class B Insulation System	OBJY2	UL	
13-13-02. Transformer (T1)-Core	Interchangeable	Interchangeable	Ferrite	--	--	
13-13-03. Transformer (T1)-Bobbin	SUMITOMO BAKELITE CO.,LTD	PM-9820	V-0, 150 degree C, Phenolic	QMFZ2	UL	
13-13-04. Transformer (T1)-insulation tape	JINGJIANG YAHUA PRESSURE SENSITIVE GLUE CO LTD	CT* (c)(g)	130 degree C	OANZ2	UL	
13-13-05. Transformer (T1)-WIRE	Interchangeable	Interchangeable	130 degree C, MW75-C	OBMW2	UL	
13-13-05a. Transformer (T1)-WIRE(alternate)	Interchangeable	Interchangeable	155 degree C, MW79-C	OBMW2	UL	
13-13-06. Transformer (T1)-TRIPLE INSULATED WIRE	FURUKAWAELECTRONIC CO LTD	TEX-E	130 degree C	OBJT2	UL	
13-13-06a. Transformer (T1)-Tube	CHANGYUAN ELECTRONICS GROUP CO LTD	CB-TT-L	200 degree C	YDPU2	UL	
13-13-07. Transformer (T1)-VARNISH	SUZHOU TAIHU ELECTRONIC ADVANCED MATERIAL CO LTD	T-4260(a)	130 degree C	OBOR2	UL	
13-14. Protective Bonding Wiring	Interchangeable	Interchangeable	Green/Yellow, minimum 18AWG, one end mechanically secured then soldered to earthing terminal of	AVLV2	UL	

			inlet, the other end connected with metal ring terminal and secured to enclosure by metal stand, star washer and screw (min 3.5mm).			
13-15. Heat-shrink tube	Interchangeable	Interchangeable	VW-1, 125 Degree C, 600V	UZFT2, YDPU2, YDTU2	UL	
13-16. Current Sensor resistor	Interchangeable	Interchangeable	Max.0.47Ω, Min.2W	--	--	
13-17. Filter (L103&L104)	Qingdao taikong electric co.,ltd.	EQ25-1	Min. 130 degree C, see 04-12 for dimension details.	--	--	
13-17. Filter (L103&L104) -core	Interchangeable	Interchangeable	FEERITE	--	--	
13-17. Filter (L103&L104) -Wire	Interchangeable	Interchangeable	Min. 130 degree C	OBWM2	UL	
13-17. Filter (L103&L104) - bobbin	Interchangeable	Interchangeable	Phenolic, Min. 130 degree C	QMFZ2	UL	
13-17. Filter (L103&L104) - varnish	KYOCERA Corporation	TVB2180T*(a)	Min. 155 degree C	OBOR2	UL	
14. Internal tape and Glue	Interchangeable	Interchangeable	Less than 4g	--	--	
15. Adhesive for aluminium foil pasted around internal metal chassis (CN2,CN3, CN4 Port)	Kunshan Rich&Crown Electronic Materials CO.,LTD	FAP-3875	120 degree C, refer to enclosure 03-14 for details.	--	Test with equipment, comply with P.4.2	
16. Base (Optional)	Interchangeable	Interchangeable	HB or better	QMFZ2	UL	

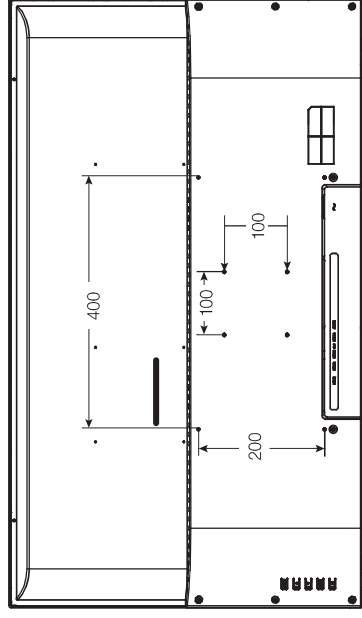
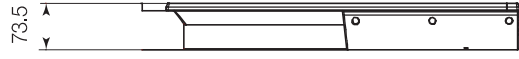
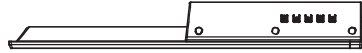
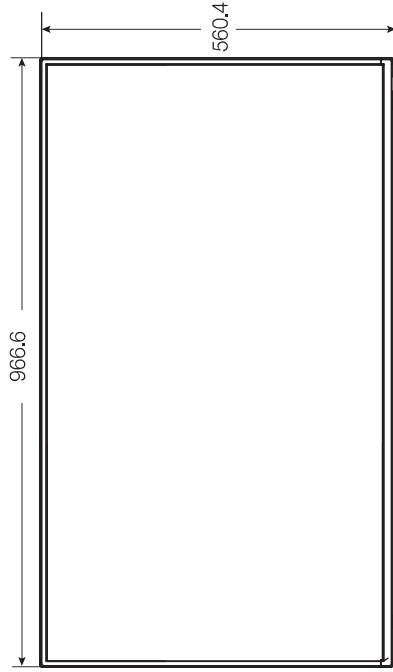
Enclosures

Type	Supplement Id	Description
Photographs	03-01	Overall view-1
Photographs	03-02	Overall view-2
Photographs	03-03	Overall view-3
Photographs	03-04	Overall view-4
Photographs	03-05	Overall view-5
Photographs	03-09	Overall view-6
Photographs	03-10	Internal view-1
Photographs	03-11	Internal view-2
Photographs	03-12	Powerboard veiw 1
Photographs	03-13	Powerboard veiw 2
Photographs	03-14	Mainboard veiw 1
Photographs	03-15	Mainboard veiw 2
Diagrams	04-01	Dimension of product enclosure
Diagrams	04-03	Dimension of mylar (cover power board)
Diagrams	04-04	Line chock spec LF101&LF102
Diagrams	04-05	Transformer Spec for EE42-1
Diagrams	04-12	Line chock spec L103&L104
Schematics + PWB	05-01	Power board layout-1
Schematics + PWB	05-02	Power board layout-2
Manuals	06-01	Install Manual

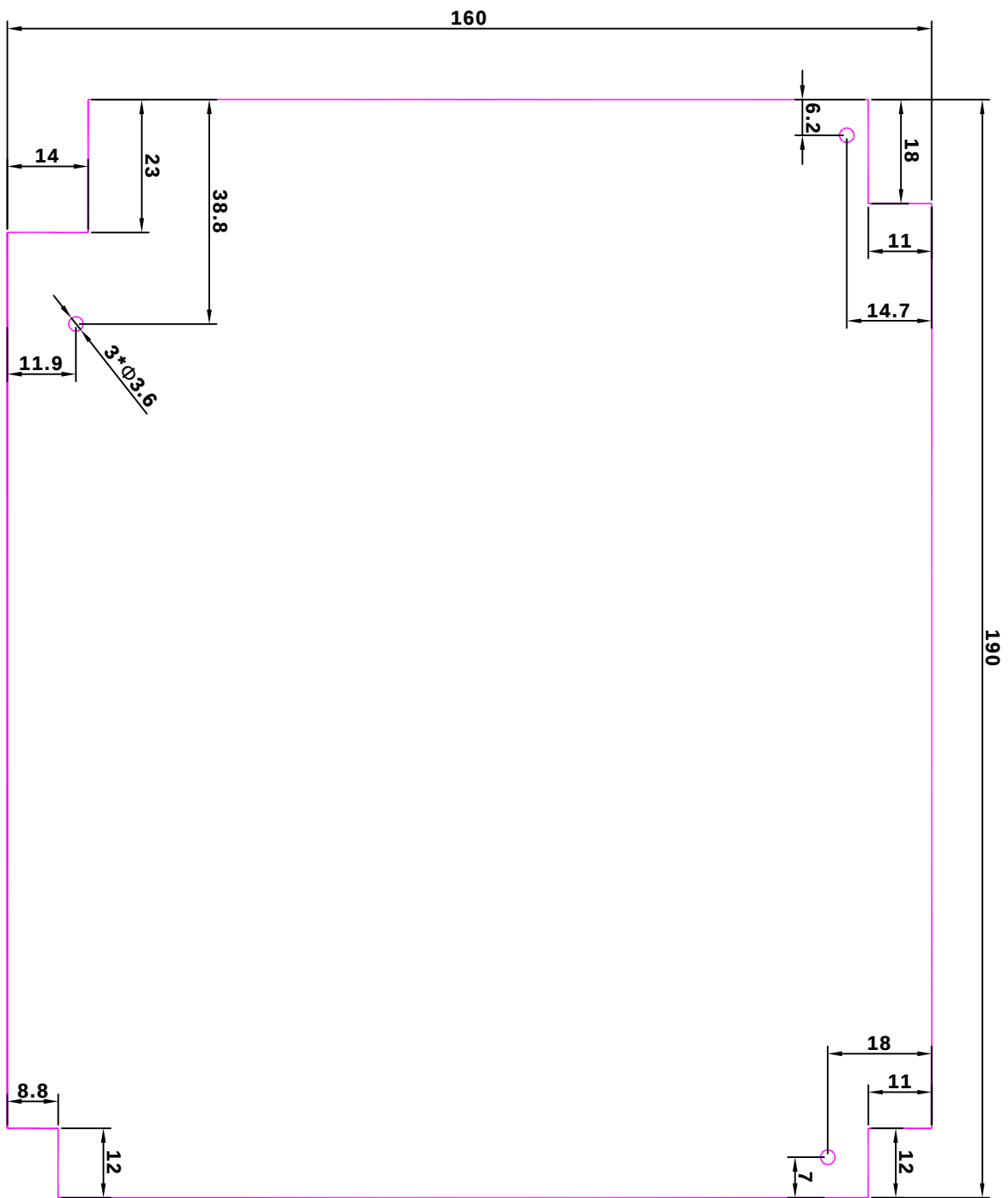
The following Page(s) are related to Diagrams-01. The next supplement, if applicable, will be identified with a new Supplement Page Heading.

PRODUCT OVERVIEW

Unit : mm



The following Page(s) are related to Diagrams-03. The next supplement, if applicable, will be identified with a new Supplement Page Heading.



The following Page(s) are related to Diagrams-04. The next supplement, if applicable, will be identified with a new Supplement Page Heading.

青 岛 钛 空 电 子 有 限 公 司
QINGDAO TAIKONG ELECTRIC CO., LTD

产品承认书
SPECIFICATION FOR APPROVAL

客户名称/CUST NAME: 大宇

物料编号/PART NO.: SQ1918-10mH

品名规格/PART NAME: SQ 卧式 2+2 共模电感

承认书编号/FILE NO.: TKSQ1918-10mH

版 本 号/VER NO.: 1.0

发行日期/ISSUE DATE.: 2019.03.15

收到承认书请回签!

供应商确认			客户确认: ☐ 通过 ☐ 不通过		
拟 制 DESIGN	审 核 CHECKED	核 准 APPROVED	拟 制 DESIGN	审 核 CHECKED	核 准 APPROVED
吴兵	陈青松	解本山			

青岛钛空电子有限公司

地址: 青岛市南区软件园

电 话 : 0532 -81818089 13310663808 传 真 : 0532-
81729123 86511577

EMAIL: xiebenshan1999@126.com ; tsingtaoticon@163.com

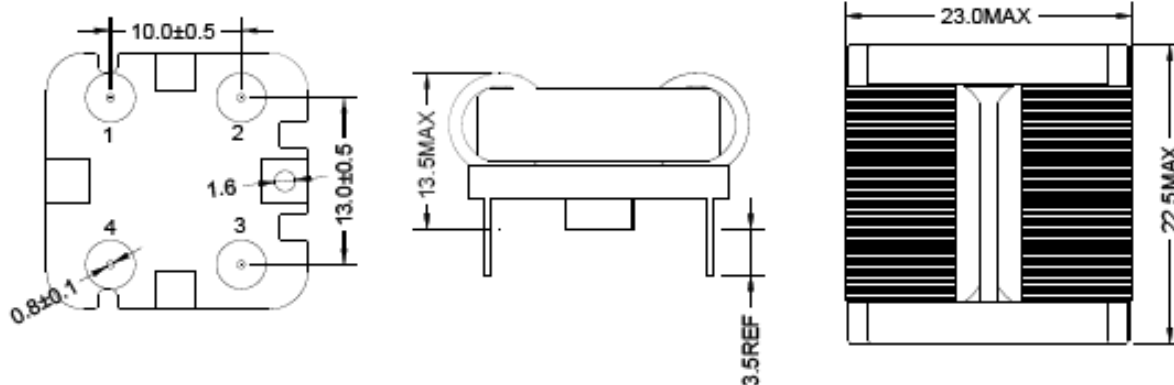
SPECIFICATION FOR APPROVAL

[illegible]

SPECIFICATION FOR APPROVAL

客户代码 CUST CODE	大字	客户型号 CUST P/N	SQ1918-10mH	P/N	P2/5
品 名 PART NO.	共模电感	产品规格 SPEC.	SQ1918	DATE	2019. 03. 15

1. MECHANICAL & ASSEMBLY (UNIT:mm)



备注:

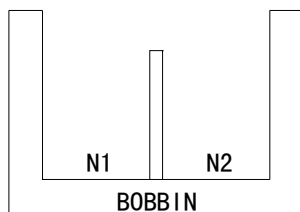
1. 真空浸漆烘干;

DRAWN	CHECHED	APPROVED	ISSUE NO	1. 0
吴兵	陈青松	解本山	DRAW NO	A/0
			TYPE	

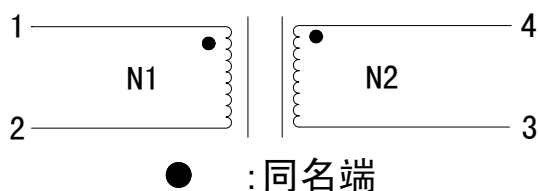
SPECIFICATION FOR APPROVAL

客户代码 CUST CODE	大宇	客户型号 CUST P/N	SQ1918-10mH	P/N	P3/5
品 名 PART NO.	共模电感	产品规格 SPEC.	SQ1918	DATE	2019. 03. 15

2. WINDING: (剖面图)



3. SCHEMATIC: (线路图)



4. WINDING TABLE: (绕线结构)

序号 NO	起头 S	收尾 F	漆包线 WIRE	圈数 TURNS	套管 TUBE	挡墙 MARGIN TAPE	胶带 TAPE	绕制方式
N1	1	2	0.20*1.0mm(扁平 UEW 线)	51 REF			/	密绕
N2	4	3	0.20*1.0mm(扁平 UEW 线)	51 REF			/	密绕

备注: 圈数仅供参考, 以电感达到为准;

DRAWN	CHECKED	APPROVED	ISSUE NO	1.0
吴兵	陈青松	解本山	DRAW NO	A/0
			TYPE	

SPECIFICATION FOR APPROVAL

客户代码 CUST CODE	大字	客户型号 CUST P/N	SQ1918-10mH	P/N	P4/5
品 名 PART NO.	共模电感	产品规格 SPEC.	SQ1918	DATE	2019. 03. 15

5. ELECTRIC CHARACTERICS (电气参数):

NO.	ITEM 项目	TEST PIN 测试脚位	SPECIFICATION 测试规格	TEST CONDITION 测试条件	TEST APPARATUS 测试仪器
1	INDUCTANCE 电感	1-2 4-3	10mH MIN	1. 0KHz, 0. 25Vrms	CH1062 OR EQU
2	DCR 直流电阻	1-2 4-3	155mΩ MAX	AT 20℃	CH502A OR EQU
3	HI-POT 高压测试	COIL-COIL	NO BROKEN 无击穿	AC1. 0KV/5mA/50Hz/3Sec	CH19073 OR EQU
		COIL-CORE	NO BROKEN 无击穿	AC0. 50KV/5mA/50Hz/3Sec	CH19073 OR EQU
4	INSULATION RESISTANCE 绝缘电阻	COIL-COIL:	100MΩ MIN	DC500V	CH19073 OR EQU
		COIL-COIL:			

* TEST CONDITION: TEMPERATURE 20℃±5℃, HUMIDITY 65%±20%.

DRAWN	CHECHED	APPROVED	ISSUE NO	1. 0
吴兵	陈青松	解本山	DRAW NO	A/0

SPECIFICATION FOR APPROVAL

客户代码 CUST CODE	大宇	客户型号 CUST P/N	SQ1918-10mH	P/N	P5/5
品 名 PART NO.	共模电感	产品规格 SPEC.	SQ1918	DATE	2019. 03. 15

6. MATERIAL LIST:

NO.	P/N	DESCRIPTION	MATERIAL	MANUFACTURER	TEMP	认证
1	CORE	FEERITE	R12K	HENGDIAN GROUP DMEGC MAGNETICS CO., LTD	N/A	N/A
2	WIRE	POLYURETHANE	UEW	WELL ASCENT ELECTRONIC (GANZHOU) CO LTD	130℃	E318511
3	BOBBIN	PHENOLIC	T375HF	CHANG CHUN PLASTICS CO LTD	130℃	E59481
4	VARNISH	EPOXY RESIN ALKYD	E962	ZHUHAI CHANGXIAN NEW MATERIALS TECHNOLOGY CO LTD	130℃	E335405

DRAWN	CHECHED	APPROVED	ISSUE NO	1.0
吴兵	陈青松	解本山	DRAW NO	A/0
			TYPE	

The following Page(s) are related to Diagrams-05. The next supplement, if applicable, will be identified with a new Supplement Page Heading.



德州三和电器有限公司

DEZHOU SANHE ELECTRIC CO., LTD

客户承认书

SPECIFICATION

CUSTOMER NAME/客户名称: 青岛钛空

PRODUCT NAME/产品名称: TRANSFORMER

CUSTOMER P/N./客户料号: EE42-1

SANHE P/N./三和型号: SANHE-42-434

S.W NO./编码:

AUTHORIZED SIGNATURE&COMPANY CHOP

客户认可签回。(盖章)

DESIGN/拟制	陈明	CHECK/审核	任岳	APPROVAL/批准	闫洪俊
PAGE/页码	1/6	EDITION/版本	01	DATE/日期	209. 03. 04

Add: No. 1227 Jinghua Road, Dezhou, Economic Development Zone, Shandong, China.

地址: 中国山东省德州市经济开发区晶华大道 1227 号.

Tel: 0534-2552182

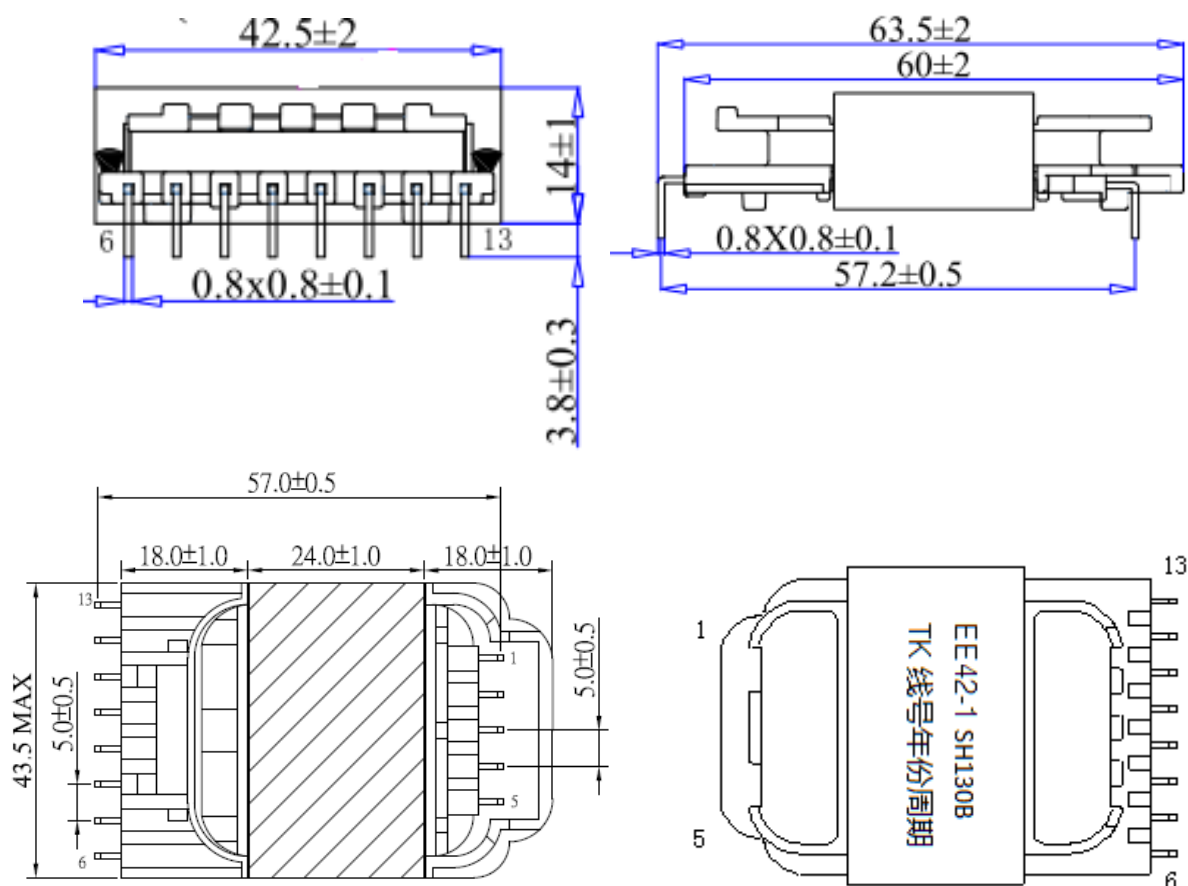
Postcode: 253034

Fax: 0534-2552182

<http://www.sanhe-china.com>

CUSTOMER P/N	EE42-1	SANHE P/N	SANHE-42-434
EDITION NO.	01	ISSUE DATE	2019.03.04

1. CONFIGRATION & DIMENSIONS (安装尺寸及外形图): (UNIT:mm)

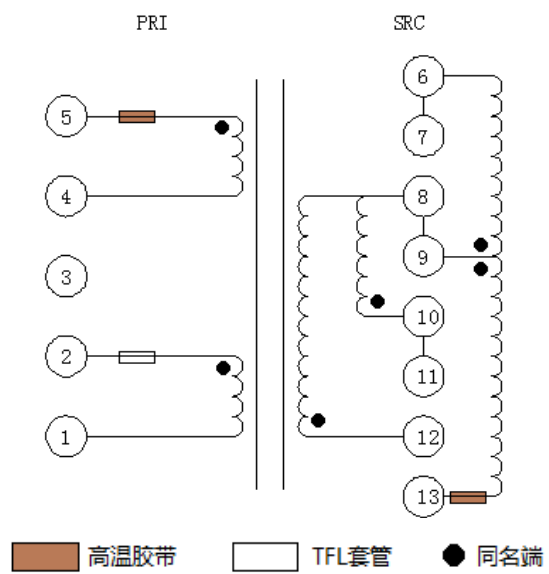


NOTE:

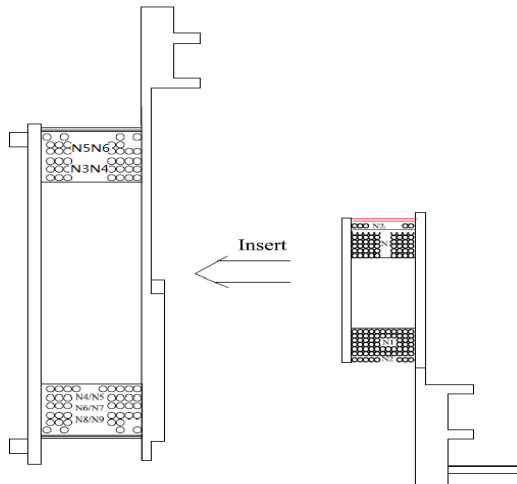
1. 全要。
2. 磁芯包 2TS 淡黄胶带固定。
3. 产品浸油处理。
4. 产品喷印如图所示。

CUSTOMER P/N	EE42-1	SANHE P/N	SANHE-42-434
EDITION NO.	01	ISSUE DATE	2019.03.04

2. SCHEMATIC(原理图):



3. WINDING CONSTRUCTION(绕组结构图):



4. WINDING DATA(绕组数据):

绕组 WINDING	脚位/PIN		线材 WIRE	圈数 TURNS	绕线方式 WI D M O E	绝缘胶带 IN ULATION TAP
	起始	结束				
N1	5	4	UEW $\Phi 0.1 \times 20$	51	密绕	1TS
N2	2	1	TEX-E $\Phi 0.2$	6	密绕	1TS
N3	12	8	UEW $\Phi 0.1 \times 30$	10	并密绕	
N4	9	13	UEW $\Phi 0.1 \times 30$	10		
N5	10	8	UEW $\Phi 0.1 \times 50$	3	并密绕	2TS
N6	9	6	UEW $\Phi 0.1 \times 50$	3		

备注: 6, 7 钉在 PCB 板上为同一焊盘; 8, 9 钉在 PCB 板上为同一焊盘; 10, 11 钉在 PCB 板上为同一焊盘;
变压器本身同一焊盘两钉之间可焊连也可不焊连

CUSTOMER P/N	EE42-1	SANHE P/N	SANHE-42-434
EDITION NO.	01	ISSUE DATE	2019.03.04

5. ELECTRIC CHARACTERICS (AT 电气参数:AT 25℃±5℃, 60±5%RH)

NO.	ITEM 项目	TEST PIN 测试脚位	SPECIFICATION 测试规格	TEST CONDITION 测试条件	TEST APPARATUS 测试仪器
1	INDUCTANCE 电感	5-4	700uH±10%	10KHz, 0. 3Vrms	HP4284A OR EQU
2	LEAKAGE INDUCTANCE 漏感	5-4 (SEC SHORT)	160μH±10%		
3	DC RESISTENCE 直流电阻	5-4	550m Ω MAX	T=25℃	CH-502A
4	HI-POT 高压测试	PRI-SEC	NO BROKEN 无击穿	AC3. 75KV/5mA/50Hz/3S	CH19073 OR EQU
		PRI-CORE		AC2. 0KV/5mA/50Hz/3	
		SEC-CORE		AC0. 5KV/5mA/50Hz/3S	
5	INSULATION RESISTANCE 绝缘电阻	PRI-SEC	100MΩ MIN	DC500V	
		PRI-CORE			
		SEC-CORE			

6. MATERIAL LIST (材料清单)

NO. 序号	PARTS NAME 材料名称	MATERIAL 材质	SPEC/规格		MANUFACTURER 供应商	UL NO. 安规号
			℃	UL94		
1	CORE	EE42 PC40 同等	N/A	N/A	ZAOZHUANG YIYUANG ELECTRONICS CO.,LTD ZAOZHUANG JUHENG ELECTRONICS CO.,LTD ZHAOTIAN ELECTRONICS CO.,LTD	N/A
2	BOBBIN	PM-9820	150℃	V-0	SUMITOMO BAKELITE CO LTD	E41429
3	POLYESTER TAPE	CT* (c) (g)	130℃	N/A	JINGJIANG YAHUA PRESSURE SENSITIVE GLUE CO LTD	E165111
4	WIRE	*UEW/130	130℃	N/A	SHANDONG SAINT ELECTRIC CO LTD	E194410
5	SOLDER	SN-CU-NI			TIANJIN QINGHE SCIENCE-TECH DEVELOPMENT CO.,LTD	
6	TUBE	TFL	200℃	VW-1	GREAT HOLDING INDUSTRIAL CO LTD	E156256
7	VARNISH	TVB2180T*(a)	155℃		KYOCERA CHEMICAL CORP	E83702
8	TRIPLE INSULATION WIRE	TEX-E			FURUKAWA ELECTRIC CO LTD	E206440

The following Page(s) are related to Diagrams-12. The next supplement, if applicable, will be identified with a new Supplement Page Heading.



德州三和电器有限公司

DEZHOU SANHE ELECTRIC CO., LTD

客户承认书

SPECIFICATION

CUSTOMER NAME/客户名称: 青岛钛空

PRODUCT NAME/产品名称: TRANSFORMER

CUSTOMER P/N./客户料号: EQ25-1

SANHE P/N./三和型号: SANHE-28-541

S.W NO./编码: _____

AUTHORIZED SIGNATURE&COMPANY CHOP

客户认可签回。(盖章)

--	--

DESIGN/拟制	陈明	CHECK/审核	任岳	APPROVAL/批准	闫洪俊
PAGE/页码	1/6	EDITION/版本	01	DATE/日期	2019. 03. 04

Add: No. 1227 Jinghua Road, Dezhou, Economic Development Zone, Shandong, China.

地址: 中国山东省德州市经济开发区晶华大道 1227 号.

Tel: 0534-2552182

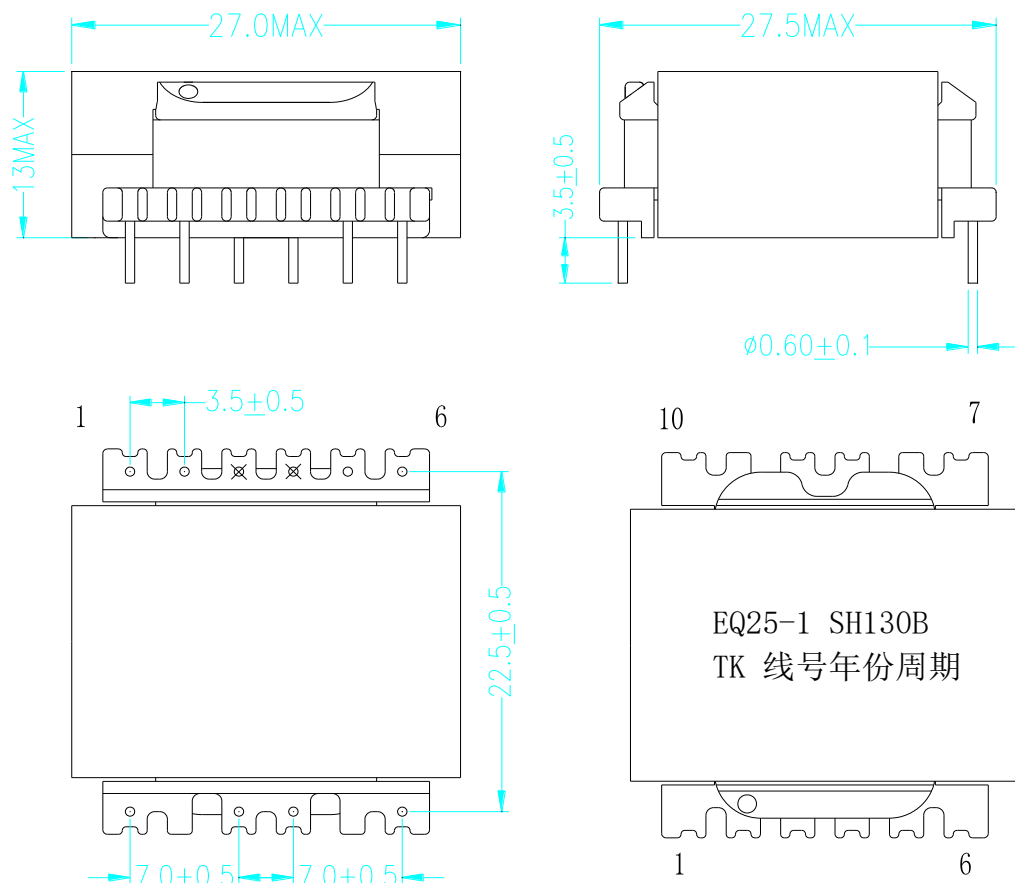
Postcode: 253034

Fax: 0534-2552182

<http://www.sanhe-china.com>

CUSTOMER P/N	EQ25-1	SANHE P/N	SANHE-28-541
EDITION NO.	01	ISSUE DATE	2019.03.04

1. CONFIGRATION & DIMENSIONS (安装尺寸及外形图): (UNIT:mm)

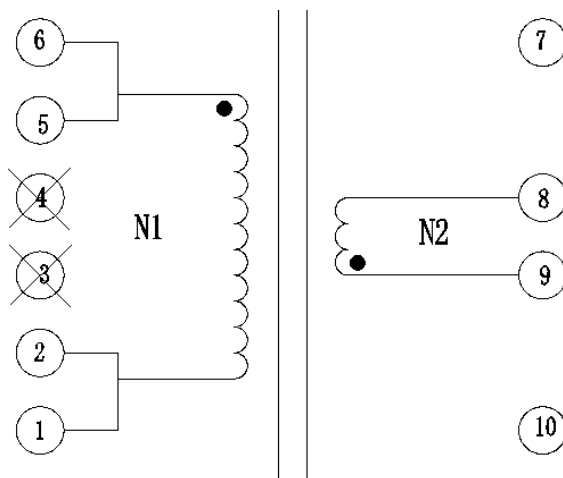


NOTE:

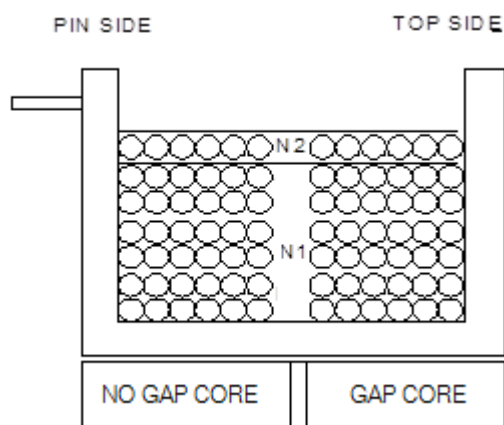
- PIN3, 4 空。
- 磁芯包 2TS 淡黄胶带固定。
- 产品浸油处理。
- 产品喷印如图示。

CUSTOMER P/N	EQ25-1	SANHE P/N	SANHE-28-541
EDITION NO.	01	ISSUE DATE	2019.03.04

2. SCHEMATIC(原理图):



3. WINDING CONSTRUCTION(绕组结构图):



4. WINDING DATA(绕组数据):

绕组 WINDING	脚位/PIN		线材 WIRE	圈数 TURNS	绕线方式 WI D M O E	绝缘胶带 IN ULATION TAP
	起始	结束				
N1	5, 6	1, 2	UEW $\Phi 0.1 \times 30$	28	密绕	2TS
N2	9	8	UEW $\Phi 0.25$	2	密绕	2TS

CUSTOMER P/N	EQ25-1	SANHE P/N	SANHE-28-541
EDITION NO.	01	ISSUE DATE	2019.03.04

5. ELECTRIC CHARACTERICS (AT 电气参数:AT 25℃±5℃, 60±5%RH)

NO.	ITEM 项目	TEST PIN 测试脚位	SPECIFICATION 测试规格	TEST CONDITION 测试条件	TEST APPARATUS 测试仪器
1	INDUCTANCE 电感	5, 6-1, 2	110uH±10%	10KHz, 0. 3Vrms	HP4284A OR EQU
3	DC RESISTENCE 直流电阻	5, 6-1, 2	130m Ω MAX	T=25℃	CH-502A
4	HI-POT 高压测试	COIL-COIL	NO BROKEN	AC1. 0KV/5mA/50Hz/3S	CH19073 OR EQU
		CORE-CORE	无击穿	AC0. 5KV/5mA/50Hz/3	
5	INSULATION RESISTANCE 绝缘电阻	COIL-COIL	100MΩ MIN	DC500V	
		CORE-CORE			

6. MATERIAL LIST (材料清单)

NO. 序号	PARTS NAME 材料名称	MATERIAL 材质	SPEC/规格		MANUFACTURER 供应商	UL NO. 安规号
			℃	UL94		
1	CORE	EQ25 PC40 同等	N/A	N/A	ZAOZHUANG YIYUANG ELECTRONICS CO., LTD ZAOZHUANG JUHENG ELECTRONICS CO., LTD ZHAOTIAN ELECTRONICS CO., LTD	N/A
2	BOBBIN	PM-9820	150℃	V-0	SUMITOMO BAKELITE CO LTD	E41429
3	POLYESTER TAPE	CT* (c) (g)	130℃	N/A	JINGJIANG YAHUA PRESSURE SENSITIVE GLUE CO LTD	E165111
4	WIRE	*UEW/130	130℃	N/A	SHANDONG SAINT ELECTRIC CO LTD	E194410
5	SOLDER	SN-CU-NI			TIANJIN QINGHE SCIENCE-TECH DEVELOPMENT CO., LTD	
6	VARNISH	TVB2180T*(a)	155℃		KYOCERA CHEMICAL CORP	E83702

The following Page(s) are related to Manuals-01. The next supplement, if applicable, will be identified with a new Supplement Page Heading.

installation

Please take note of the followings before using this product.

- Do not use the product outdoor.
- Do not spill water or liquid in the connection part of the product.
- Do not impose the system to excessive shock or force.
- Do not pull out the power plug forcefully.
- Do not disassemble the product on your own.
- Do not exceed the rated input/output range.
- Use a certified power cord only.
- For the product with an input ground, use a grounded power plug.

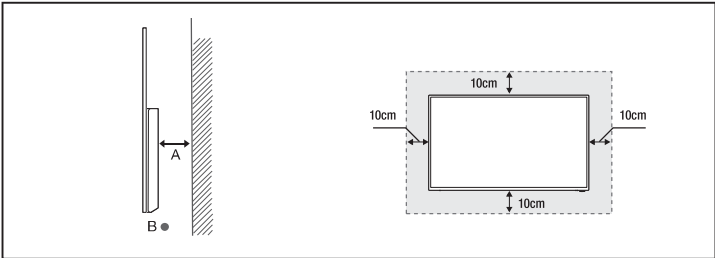
BEFORE INSTALLING THE PRODUCT

Ventilation requirement

Installing the product in an environment where the air does not circulate well could cause product damage due to increased temperature. Make sure to secure enough space around the product for proper air ventilation.

Vertical wall mount condition

- A. Minimum 40 mm
- B. Ambient temperature Measuring point <35°C



INSTALLING WALL MOUNT PARTS

Installing Wall Mount Kits

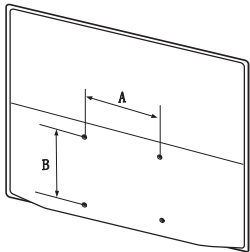
The wall mount kit (sold separately) allows you to hang the product on a wall.

For more information on wall mounting, refer to the owner's manual supplied with the wall mount parts. When installing the wall mount, seek the help of a technician.

Hanwha Techwin is not responsible for any damage to the product or injury to the user or others caused by any accident due to a user's attempt to install the product.

Wall Mount Kit Specifications (VESA)

- ! Install the wall mount kit on a solid wall perpendicular to the floor.
- ! Please refer to the nearest store when installing on other materials.
- ! Installing on an inclined wall may cause the product to fall, which can result in serious injury.
- ! When using a VESA mount, select a product that can hold 4 times the weight of the monitor.



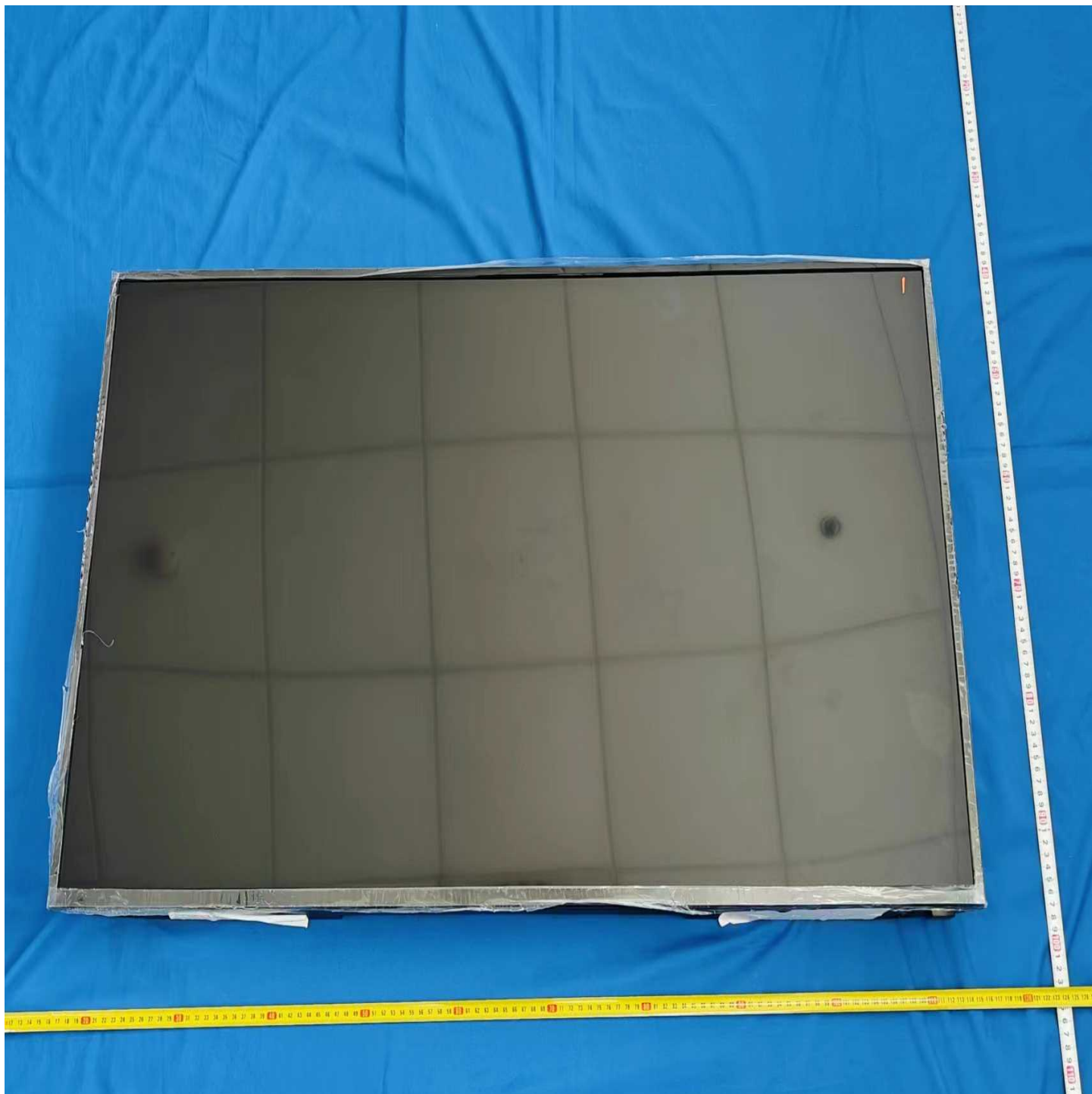
- When you purchase our wall mount kit, you will find a detailed installation guide and all parts required for assembly.
- Do not use screws that are longer than the standard dimensions or that do not conform to the VESA standard screw specifications. Using screws that are too long may damage the inside of the product.
- For wall mount parts that do not conform to the VESA standard screw specifications, the screw length may vary depending on the wall mount specifications.
- Do not over-tighten the screws. The product may be damaged, or may fall, resulting in injury. Hanwha Techwin is not responsible for any damage to the product or injury to the user or others caused by any accident due to a user's attempt to install the product.
- Hanwha Techwin is not responsible for damage to the product or injury to the user caused by using non-compliant or non-VESA wall mount parts, or by the customer not following the product installation instructions.
- When hanging on a wall, two people should always lift the product.
- The standard dimensions of the wall mount kit are shown in the table below. [Unit: mm]

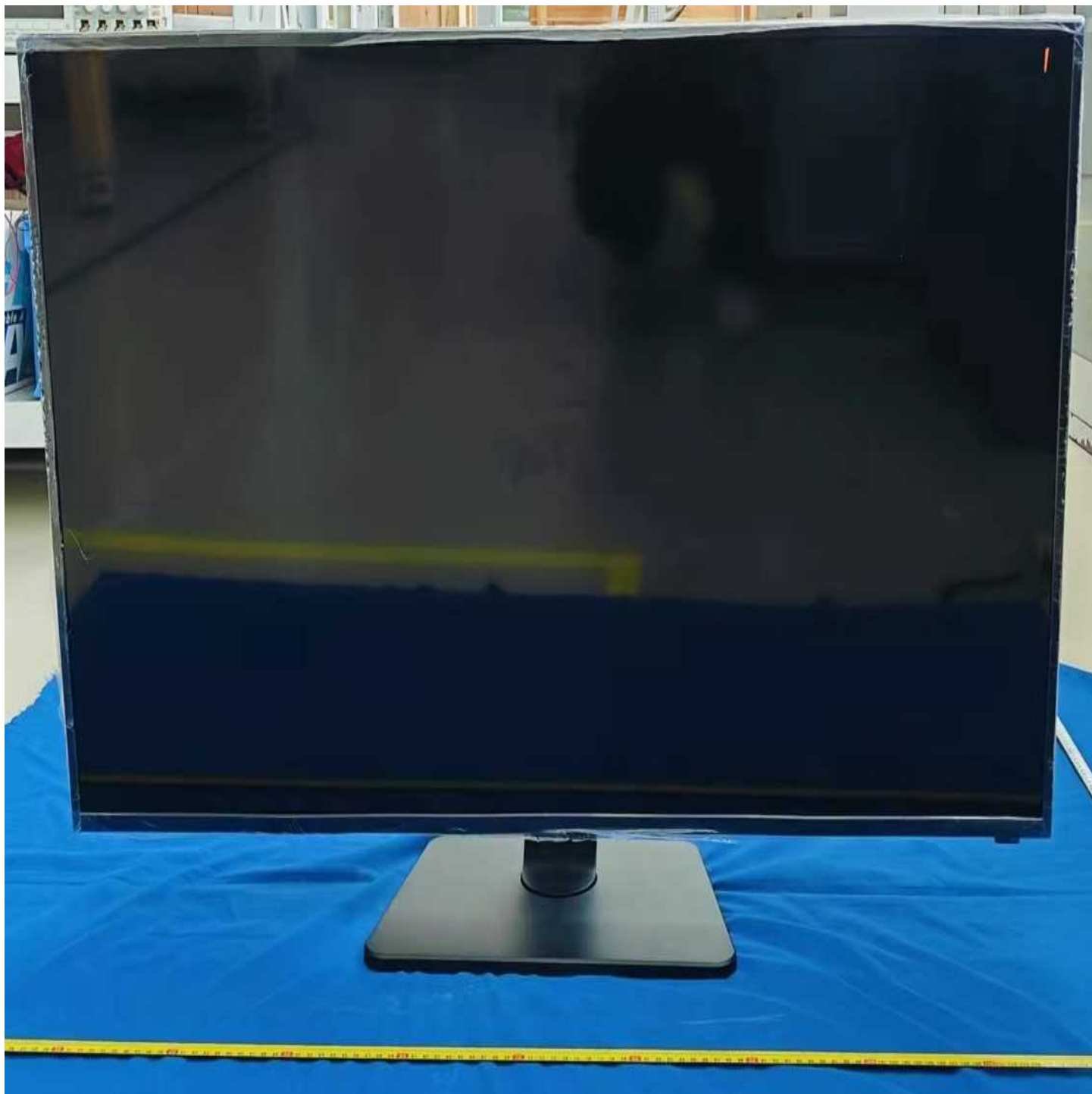
Model name	VESA dimensions (A * B)	Standard screws	Quantity
SMT-4344	100 x 100 / 400 x 200	M4/L12	4

- ! Do not install the wall mount kit with the product turned on. This may lead to injury due to electric shock.







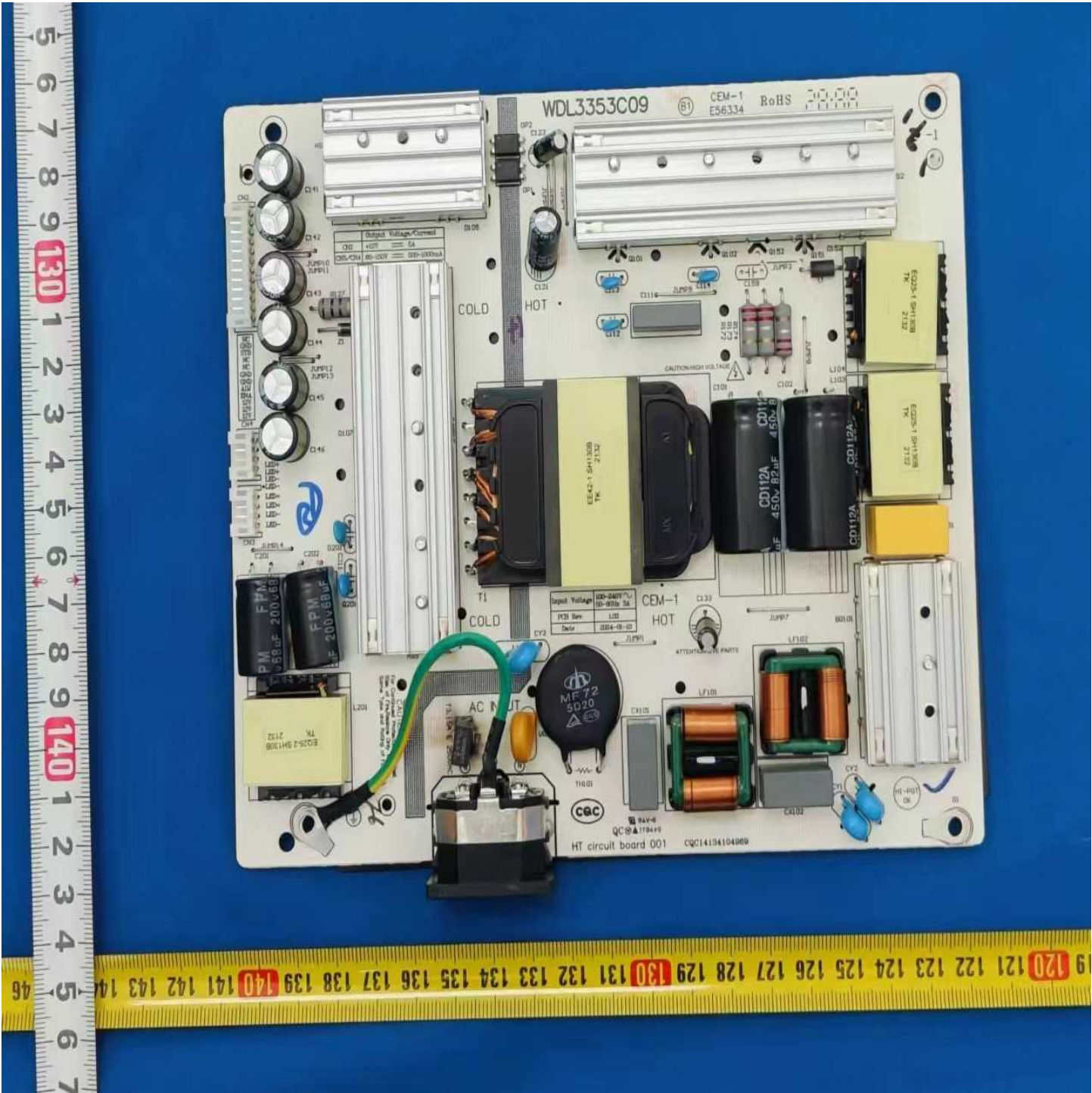


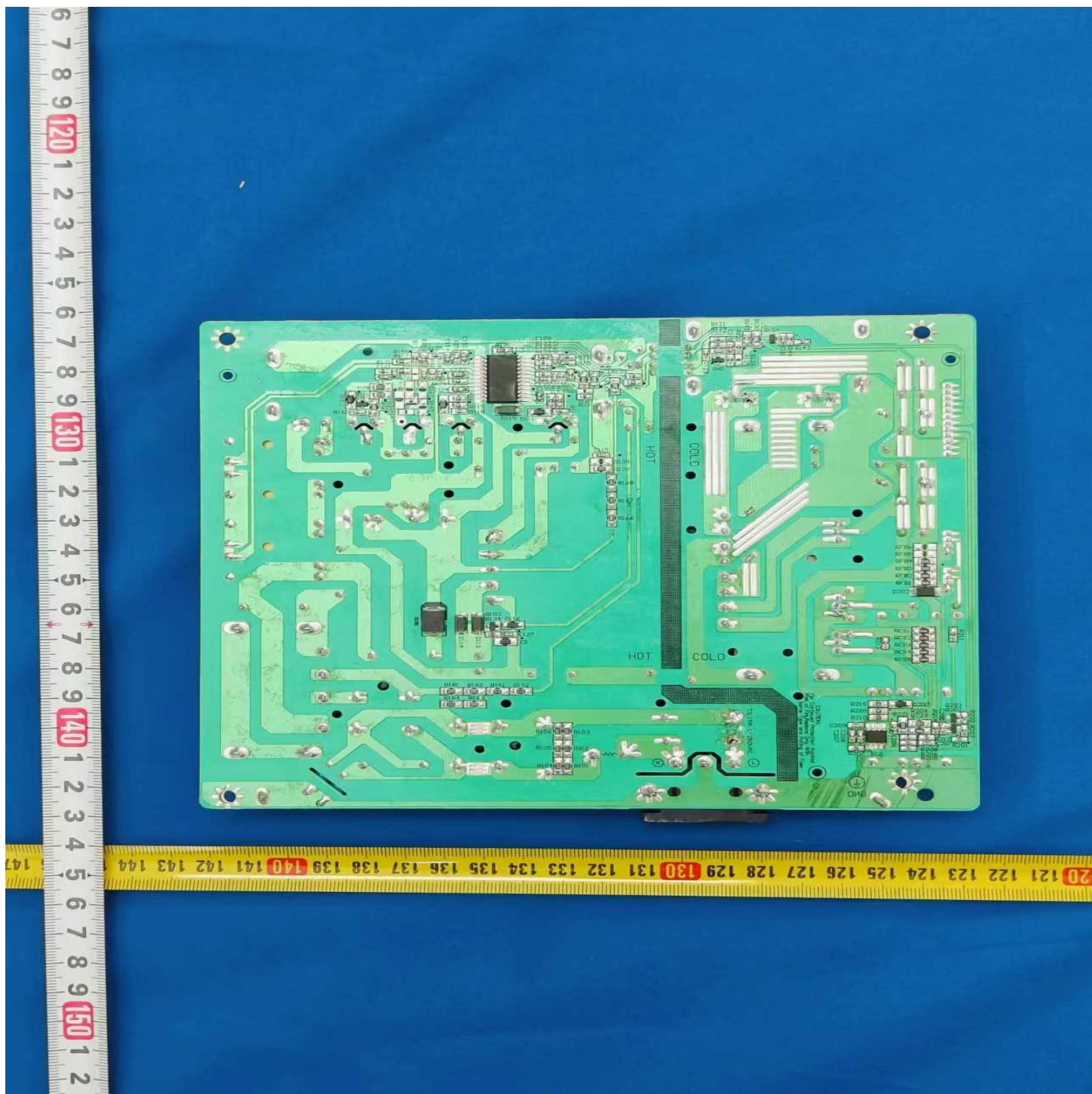


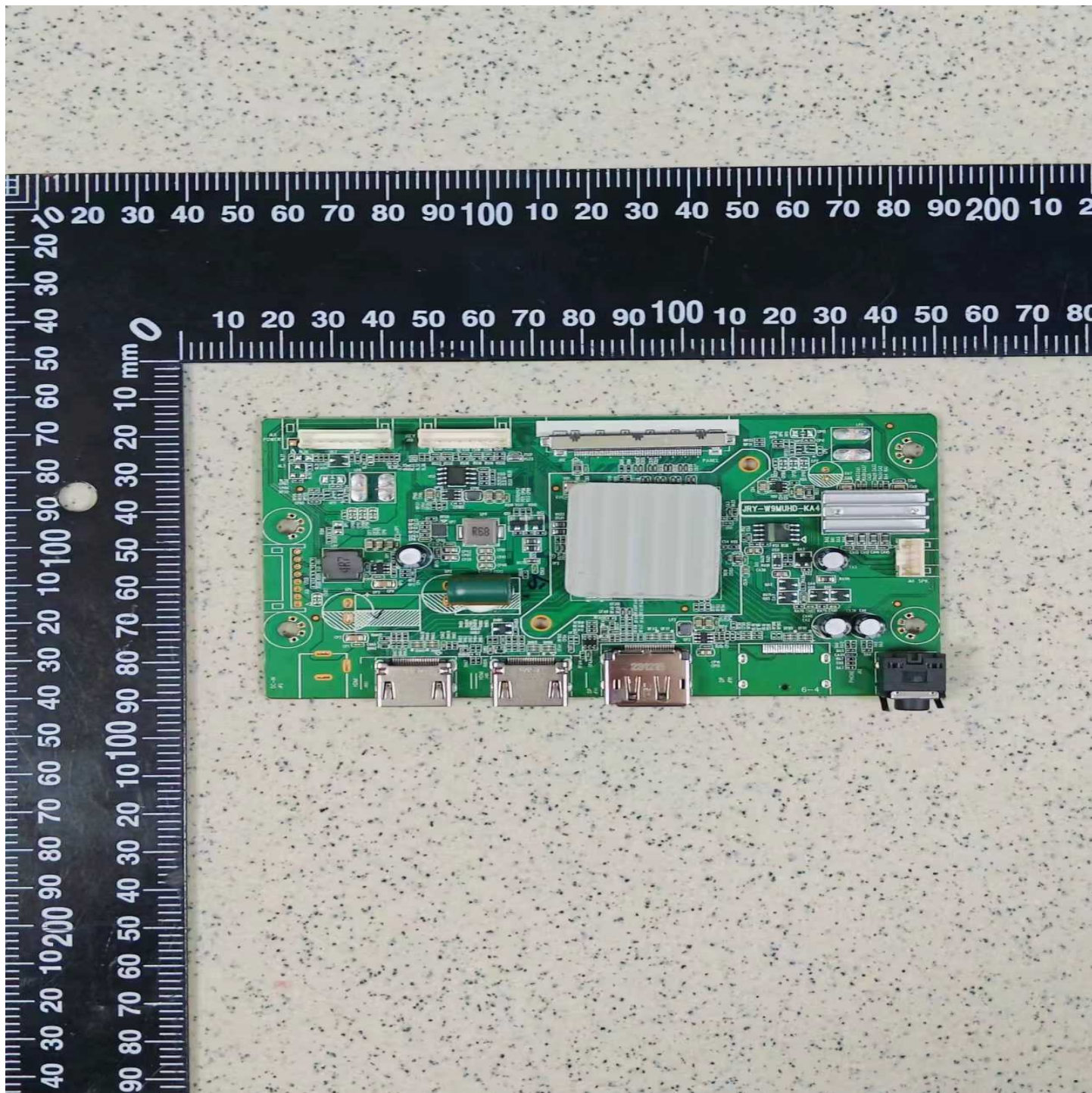






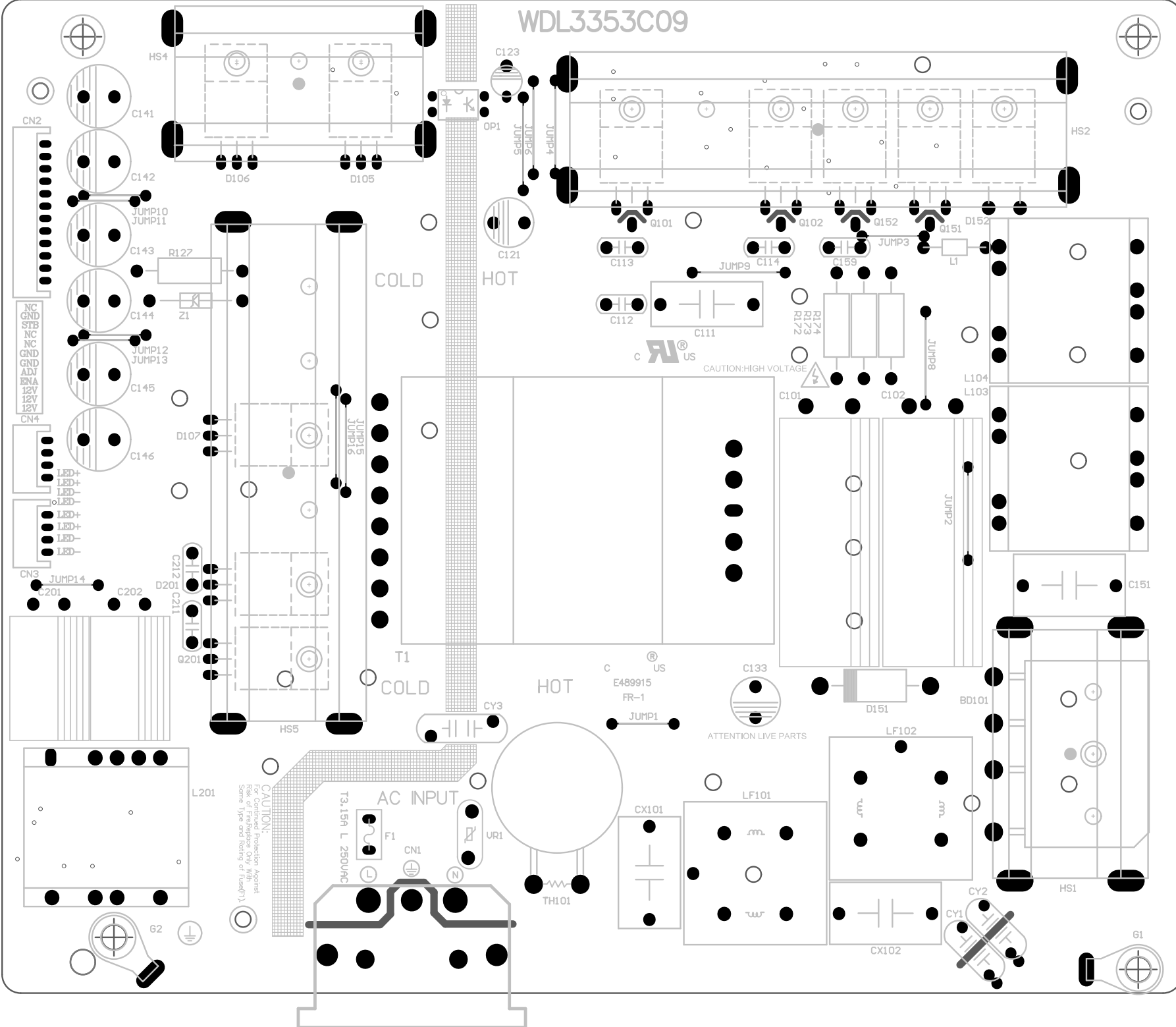






The following Page(s) are related to Schematics-01. The next supplement, if applicable, will be identified with a new Supplement Page Heading.

WDL3353C09



NC
GND
STB
NC
NC
GND
GND
ADJ
ENA
12V
12V
12V

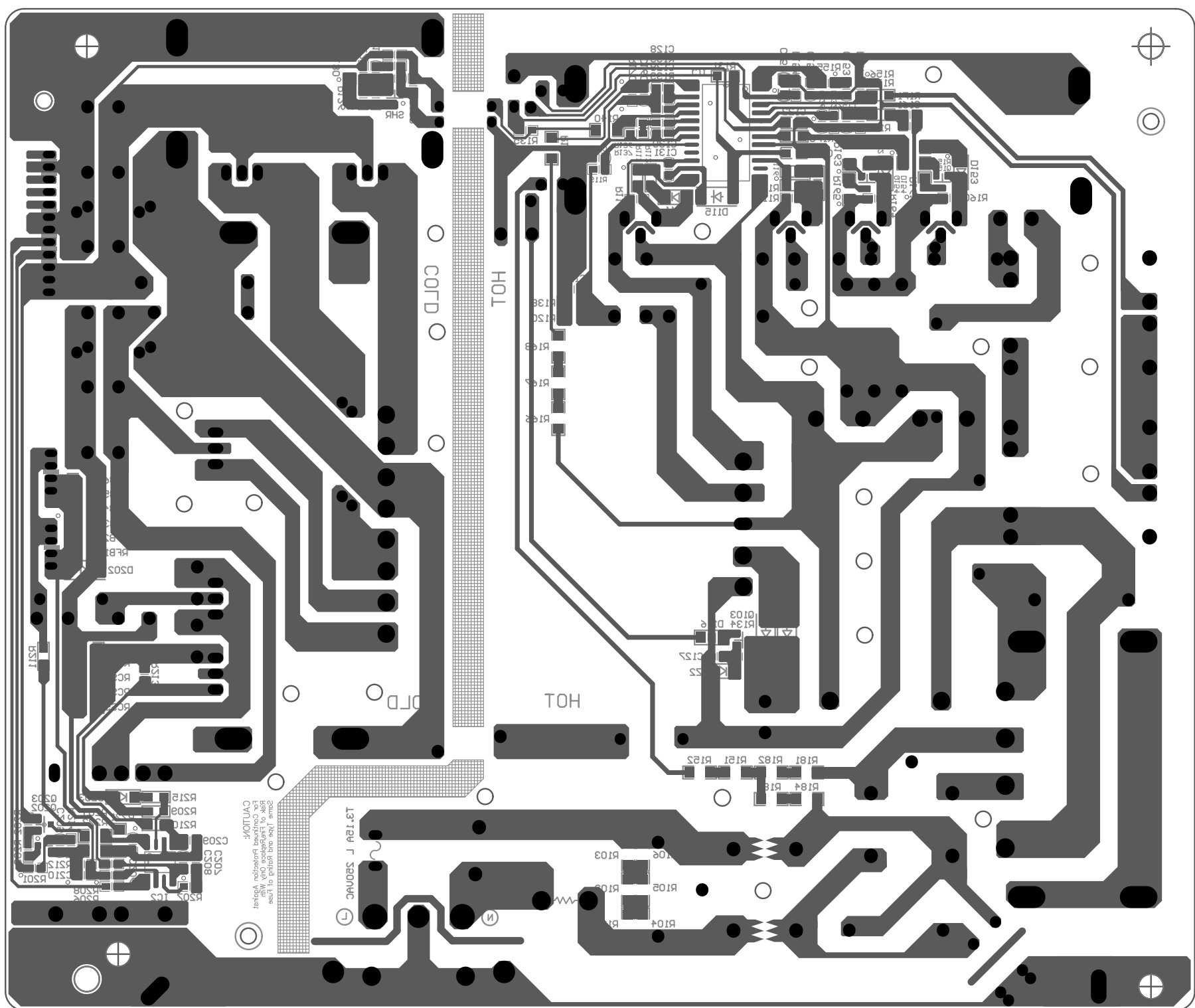
LED+
LED+
LED+
LED+
LED+
LED+
LED-

CAUTION:
For Continued Protection Against
Risk of Fire/Explosion Only With
Same Type and Rating of Fuse(F1)

CAUTION: HIGH VOLTAGE

ATTENTION LIVE PARTS

The following Page(s) are related to Schematics-02. The next supplement, if applicable, will be identified with a new Supplement Page Heading.



Test Record No. 1

- The manufacturer submitted representative production sample of Security LED Monitor, Model SMT-43*****(*=a-z, A-Z, 0-9, -, /, \ or blank) for construction review and testing.
- Unless otherwise indicated, all tests were conducted in UL-CCIC Company Limited Suzhou Lab.
- Unless otherwise indicated, all tests were conducted on Model SMT-4344.
- Tests performed on Model SMT-4344 were considered to be representative of original model SMT-43*****(*=a-z, A-Z, 0-9, -, /, \ or blank).
- Any information and documentation involving UL Mark services are provided on behalf of UL LLC (UL) or any authorized licensee of UL.

The following tests were conducted:

Tests performed (name of test and test clause):	Testing location: UL-CCIC Company Limited No. 2, Chengwan Road, Suzhou Industrial Park, Suzhou 215122, China
4.4.3.2, T.5 – STEADY FORCE TEST, 250 N	
4.4.3.4, T.6 - IMPACT TEST	
4.4.3.7, T.9 – GLASS FIXATION TEST	
4.4.3.8, T.8 – STRESS RELIEF TEST	
5.2.2.1-5.2.2.6 – CLASSIFICATION OF ELECTRICAL ENERGY SOURCES	
5.4.1.3 – TEST FOR HYGROSCOPIC MATERIALS	
5.4.1.8 – DETERMINATION OF WORKING VOLTAGE	
5.4.4.6.2 – SEPARABLE THIN SHEET MATERIAL	
5.4.9.1 – ELECTRIC STRENGTH TEST – TYPE TESTING OF SOLID INSULATION	
5.5.2.2 – CAPACITOR DISCHARGE AFTER DISCONNECTION OF A CONNECTOR	
5.6.6.2 – RESISTANCE OF THE PROTECTIVE BONDING SYSTEM	
5.7.4 – TOUCH VOLTAGE AND TOUCH CURRENT MEASUREMENT – UNEARTHED ACCESSIBLE PARTS	
5.7.5 – TOUCH CURRENT MEASUREMENT – EARTHED ACCESSIBLE CONDUCTIVE PARTS – SINGLE-PHASE EQUIPMENT ON IT SYSTEM	
8.7 – WALL, CEILING, OR OTHER STRUCTURE MOUNTING TESTS	
B.2.5 – INPUT TEST: SINGLE PHASE	
B.2.6, 5.4.1.4, 6.3, 9.3, B.1.5 – NORMAL OPERATING CONDITIONS TEMPERATURE MEASUREMENT	
B.3 – SIMULATED ABNORMAL OPERATING CONDITIONS	
B.4 – SIMULATED SINGLE FAULT CONDITIONS	
G.5.3.3 – TRANSFORMER OVERLOAD	
Q.1 – LIMITED POWER SOURCE	
T.2, 5.4.2.6, 5.4.3.2, G.15.2.6 – STEADY FORCE TEST, 10 N	
The following tests were waived:	Rationale for Waiving

--	--

Test results are valid only for the tested equipment. These tests are considered representative of the products covered by this Test Report. The test methods and results of the above tests have been reviewed and found to be in accordance with the requirements in the Standard(s) referenced at the beginning of this Test Report.

The following supplements are provided as part of this Test Record. NOTE: These supplements are only available to the Applicant via the myUL™ Client Portal.

Type	Supplement Id	Description
Datasheet	02-01	Datasheet
Attachment	02-02	CRD