

# S P E C I F I C A T I O N

## APPLICATION FOR APPROVAL OF

- ITEM : RADIAL INDUCTOR ■
- DESCRIPTION : DR 8.0 x 11.0mm ■
- CODE NO : DR4A) 4.7uH (BLUK & TAPING) ■
- MODEL NO : ■

This space is used for customer's approval

■ DATE : 2011.03.02. ■

DRAWN BY Y . H . JEON	DATA 2011. 03.02.
CHECKED BY	DATA
APPROVED BY J . G . KIM	DATA 2011. 03.02.

CUSTOMER :

<b>SPECIFICATION</b>		SHEET NO.	1 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

1. GENERAL SPECIFICATION

1) SCOPE

This specification applies to part number 4.7uH **RADIAL INDUCTOR(or PEAKING COIL)** for use in electronic appliances which is supplied for

2. MECHANICAL CHARACTERISTIC

**PEAKING COIL** shall conform in size, dimension, and other mechanical properties, to the part drawing attached here to.

1) Marking

**PEAKING COIL** shall be permanently and legibly marked with the part number on the specification position.

2) Terminal strength

Terminal shall withstand for 30 seconds without breakdown on losing when a static load of 2 Kg is applied in the drawing direction to the terminal at the point where the external load.

3. ENVIRONMENTAL & LIFE CHARACTERISTIC

1) Temperature rise

Temperature rise of the each winding and core shall be less than ambient + 65°C , when the **PEAKING COIL** continuously operated at full load(test load) until constant temperature is attained.

2) Heat-resistance

Immediately after **PEAKING COIL** being placed in room for 96 Hours maintained AT 105°C ± 2°C ambient temperature, the **PEAKING COIL** shall conform with the above part paragraph (4) and also insulation resistance shall be more than 100 MΩ.

3) Moisture resistance

Immediately after **PEAKING COIL** being placed in room for 120 Hours in such humidity chamber this is maintained at 90 - 95% relative humidity and 55°C ± 2°C temperature and wipped a drop of water, **PEAKING COIL** shall conform with the above paragraph(4) and also insulation shall be the 10 MΩ.

4) Safety consideration

**PEAKING COIL** shall meet all the requirements subject to IEC-950 standards for safety of information technology equipment including electrical business equipment.

5) Solderability

Dip pads in RMA flux, 96.5/0.5/3 solder (Sn/Cu/Ag)at 260°C for 5±2 seconds

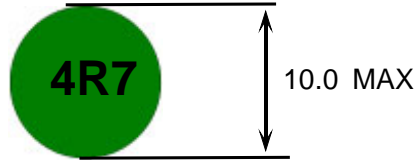
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CUSTOMER :

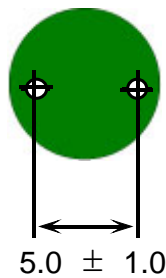
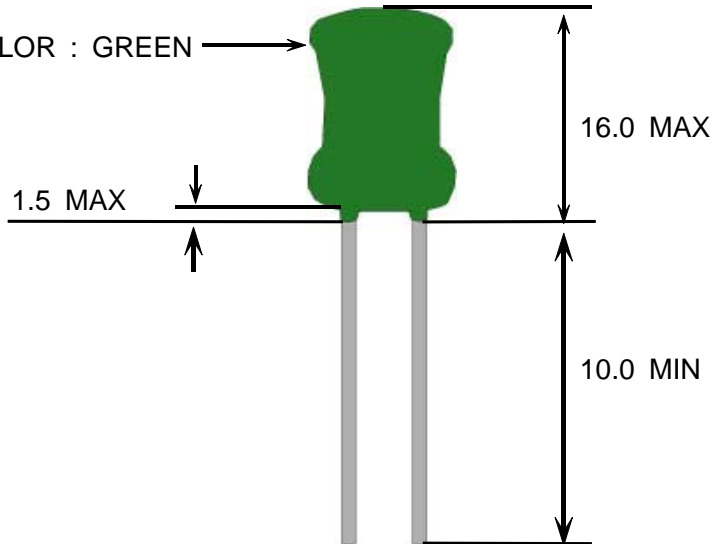
<b>SPECIFICATION</b>		SHEET NO.	2 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

4. APPEARANCE & DIMENSION (UNIT:m/m)

MARKING : 4R7K or 4R7



EPOXY COLOR : GREEN



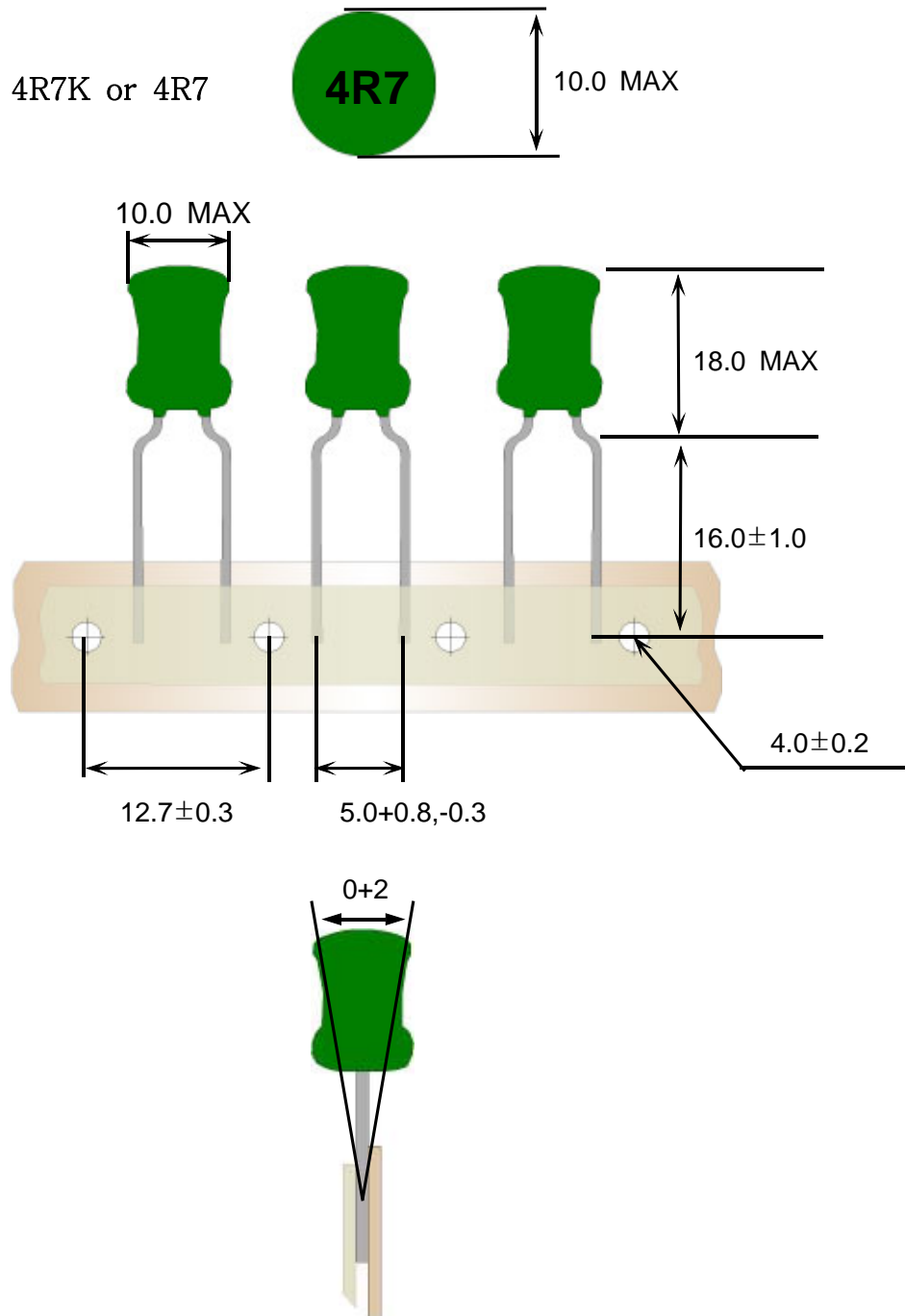
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CUSTOMER :

<b>SPECIFICATION</b>		SHEET NO.	3 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

4-1. APPEARANCE & DIMENSION (UNIT:m/m)

MARKING : 4R7K or 4R7



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CUSTOMER :

<b>SPECIFICATION</b>		SHEET NO.	4 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

5. WINDING SPEC

START & FINISH	TYPE OF WIRE	T U R N S	WINDING METHODE
	2UEW 0.5Φ	11.5_Ts REF	SOLENOID WINDING [C . C . W]

6. ELECTRICAL CHARACTERISTIC

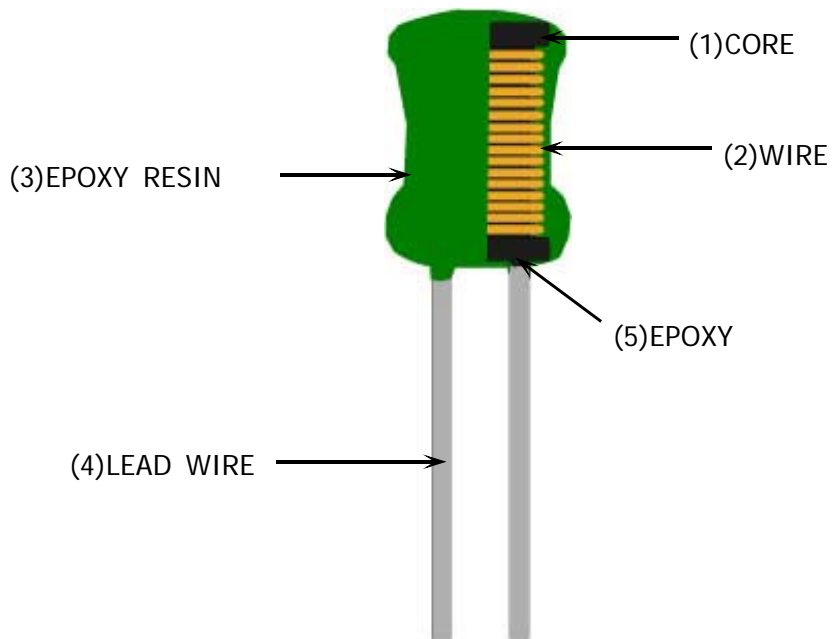
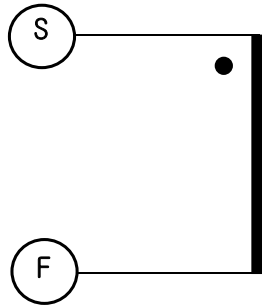
NO	I T E M	MESURE	SPECIFICATION	REMARKS
1	INDUCTANCE	START & FINISH	4.7 [uH] ± 20%	HIOKI3522 LCR METER at 1kHz 1V
2	DC RESISTANCE	START & FINISH	0.003 [Ω] MAX	WHEATSTONE BRIDGE TYPE 2755
3	DIELECTRIC WITHSTANDING TEST	COIL & CORE	AC 1 [KV] , FREQUANCY 60 [Hz] , 1 MINUTES, CUT OFF CURENT 2 [mA]	NO BREAKDOWN HPT-5010
4	INSULATION RESISTANCE	COIL & CORE	DC 500 [V] , 100 [MΩ] MIN	DM-500AD

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<b>SPECIFICATION</b>		SHEET NO.	5 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

7. SCHEMATIC DIAGRAM



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CUSTOMER :

<b>SPECIFICATION</b>		SHEET NO.	6 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR		MODEL NAME
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

8. MATERIAL LIST

NO	ITEM	MATERIAL & DIMENSION	MANUFACTURE	REMARK
1	CORE	JA3 DR 8.0 X 11.0mm	JIACI(ZHUHAI)ELECTRONICS CO.,LTD.	EQV
2	WIRE	2UEW 0.5Φ 2UEW 0.5Φ	DONG YANG ELECTRONICS CO., LTD. CHUNHUI ELECTRICAL APPLANCES CO.,LTD.	E102761S E198440
3	EPOXY RESIN	DP-402NH-P 930A.B	DAE JOO FINE CHEMICAL CO., LTD. SAM SIN CHEMICAL CO.,LTD.	EQV
4	LEAD WIRE	TPC 0.6Φ COPPER-WIRE	SAMATRON CO.,LTD YEHUA ELECTRON MATERIAL LIMITED CO.,LTD.	EQV
5	EPOXY	FK661 EPI CHEM-2001HS	QIFU ELECTRONIC MATERIALS FACTORY SAMSIN CHEMICAL CO.,LTD.	EQV
-	SOLDER BAR	HSE-09 SN 100	HEESUNG MATERIAL LTD. JIAMENG CO.,LTD.	EQV
-	FLUX	F181	ZHUHAI FRIEND INDUSTRIAL CO.,LTD.	EQV
-	INK	270BK	DOMINO KOREA CO.,LTD.	EQV

9. TABLE OF STANDARD CHARACTERISTICS OF MATERIALS

PROPERTY UNIT MATERIAL	$\mu_{ic}$ ±25%	Bms GAUSS	Br GAUSS	Tc ℃	WORKING Frequency(MHz)
JA3	300	2400	1300	150	0.1 ~ 2.0

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PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

10. REMARK

DONG YANG [UL CARD]

DONG YANG ELECTRONICS IND CO LTD				E102761 (S)	
660-1 BANWOL-RI TAIAN-EWB HWASUNG-GUN, KYUNGGI-DO KOREA					
Mtl Dsg	BC	Cost typ	OC	ANSI Type	TI
AI-EIW	Polyesterimide		Polyamideimide	MW35	200
EIW	Polyesterimide			MW30	180
NY-EIW	Polyester- amide-imide		Polyamide	MW96	180
NY-PEW	Polyester		Polyamide	MW24	155
NY-PEW(F)	Polyester		Polyamide	MW24	155
NY-UEW	Polyurethane		Polyamide	MW23	130
UEW	Polyurethane		-	MW75	130

Marking: Company name or "E102761" and material designation or marked designation on package or reel, and recognized Component Mark.

CHUN HUI [UL CARD]

OBMW2		July 19, 2002			
(Systems, Electrical Insulation) Magnet Wire - Component					
GUANGZHOU CHUNHUI ELECTRICAL APPLIANCES CO LTD					E198410
BLK 7, 8TH FL, ROOM H JIANADA GARDEN ZHONGSHAN DA DAO, GUANGZHOU GUANGDONG CHINA					
Mtl Dsg	Mark Dsg	Coat Type	OC	ANSI Type	Temp Class
XUEW-UL0	(1)	Polyurethane	-	MW75	130

(1)-Marked designations are the same as the material designations.  
 @-X may be replaced by a 0, 1 or 2.  
 Marking: Company name, material designation or marked designation on package or reel, and Recognized Component Mark.

See General Information Preceding These Recognitions  
 For use only in equipment where the acceptability of the combination is determined by Underwriters Laboratories Inc.

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CUSTOMER :

<b>SPECIFICATION</b>		SHEET NO.	8 OF 8
		DATA	2011. 03.02.
PART NAME	RADIAL INDUCTOR	MODEL NAME	
PART NO.	DR4A-4.7uH	DESCRIPTION	DR 8.0 X 11.0mm

11. INSPECTION DATA

NO	INDUCTANCE	DC RESISTANCE	내전압	절연저항
SPEC	4.7uH ± 20%	0.003Ω MAX	AC 1KV 1분 MIN	DC 500V 100MΩMIN
1	4.86	0.0021	OK	OK
2	4.75	0.0022	OK	OK
3	4.98	0.0022	OK	OK
4	4.76	0.0023	OK	OK
5	4.88	0.0021	OK	OK
6	4.86	0.0023	OK	OK
7	4.92	0.0021	OK	OK
8	4.9	0.0022	OK	OK
9	4.83	0.0021	OK	OK
10	4.8	0.0023	OK	OK
$\bar{X}$	4.854	0.0021		
MIN	4.75	0.0021		
MAX	4.98	0.0023		

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