

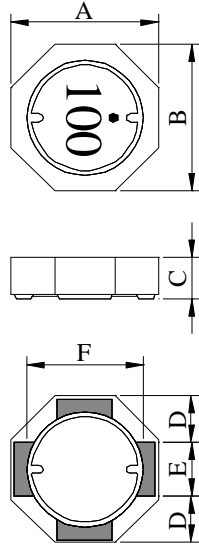
SPECIFICATION FOR APPROVAL

REF :20080804-A

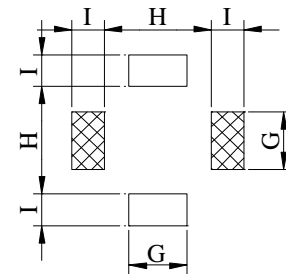
PAGE: 1

PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO. ABC'S ITEM NO.	SU5016□□□□L□-□□□
---------------	--------------------------------	---------------------------------	------------------

I . CONFIGURATION & DIMENSIONS :

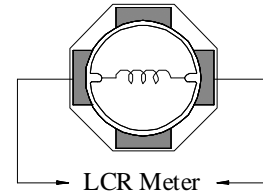


A :	5.20 ±0.20	m/m
B :	5.20 ±0.20	m/m
C :	1.60 ±0.20	m/m
D :	1.70 typ.	m/m
E :	1.80 typ.	m/m
F :	3.90 typ.	m/m
G :	2.00 ref.	m/m
H :	3.70 ref.	m/m
I :	1.10 ref.	m/m



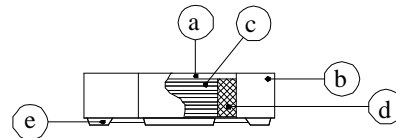
(PCB Pattern Suggestion)

II . SCHEMATIC DIAGRAM :



III . MATERIALS :

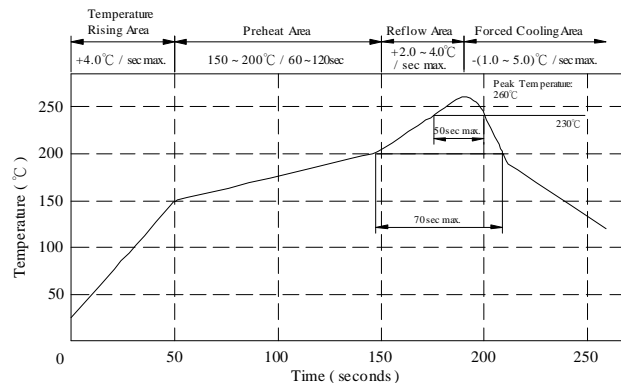
- a . Core : Ferrite DR core
- b . Core : Ferrite RI core
- c . Wire : Enamelled copper wire (class F & H)
- d . Adhesive : Epoxy resin
- e . Terminal : Ag/Ni/Sn
- f . Remark : Products comply with RoHS' requirements



Peak Temp : 260°C max.
 Max time above 230°C : 50sec max.
 Max time above 200°C : 70sec max.

IV . GENERAL SPECIFICATION :

- a . Temp. rise : 40°C max.
- b . Rated current :
Base on temp. rise & $\Delta L / LOA=35\%$ typ.
- c . Storage temp. : -40°C ----+125°C
- d . Operating temp. : -40°C ----+105°C
- e . Resistance to solder heat : 260°C .10 secs.



AR-001A

SPECIFICATION FOR APPROVAL

REF : 20080804-A

PAGE: 2

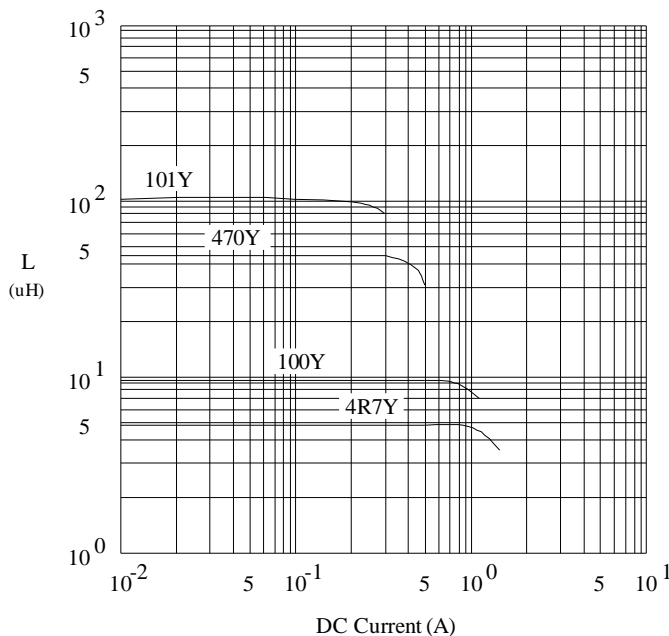
PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO.	SU5016□□□□L□-□□□
		ABC'S ITEM NO.	

V . ELECTRICAL CHARACTERISTICS :

DWG No.	Inductance (μ H)	Q ref.	Test Freq. (Hz)		RDC (m Ω)		SRF (MHz)	Irms (mA)	Isat (mA)
			L	Q	typ.	max.	typ.	max.	typ.
SU50161R8YL□-□□□	1.8 \pm 30 %	9.0	100K	7.96M	24	32	100	1750	1700
SU50163R3YL□-□□□	3.3 \pm 30 %	9.0	100K	7.96M	35	48	80	1550	1500
SU50164R7YL□-□□□	4.7 \pm 30 %	9.0	100K	7.96M	43	57	60	1300	1200
SU50166R8YL□-□□□	6.8 \pm 30 %	8.0	100K	7.96M	50	78	50	1200	1100
SU5016100YL□-□□□	10.0 \pm 30 %	15.0	100K	2.52M	84	110	40	1000	900
SU5016150YL□-□□□	15.0 \pm 30 %	15.0	100K	2.52M	130	170	32	800	720
SU5016220YL□-□□□	22.0 \pm 30 %	15.0	100K	2.52M	195	250	28	650	560
SU5016330YL□-□□□	33.0 \pm 30 %	13.0	100K	2.52M	300	375	22	540	500
SU5016470YL□-□□□	47.0 \pm 30 %	18.0	100K	2.52M	390	480	18	460	420
SU5016680YL□-□□□	68.0 \pm 30 %	18.0	100K	2.52M	560	700	15	360	330
SU5016101YL□-□□□	100.0 \pm 30 %	18.0	100K	796K	850	1050	12	300	270

- 1) . □ : Packaging Information... **A** : Bulk **B** : Taping Reel
- 2) . "- □□□ " : Reference code
- 3) . Inductance Test Freq. : 100KHz / 0.1V
- 4) . Isat base on $\Delta L / L0A = 35\%$ typ.
- 5) . Irms base on Temp. rise 40°C max.

@ Inductance vs. DC Current curve



AR-001A



SPECIFICATION FOR APPROVAL

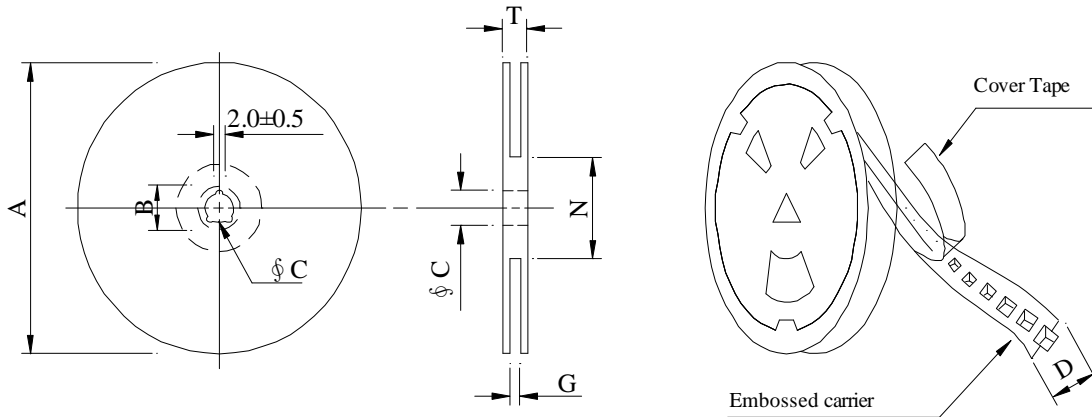
REF :20080804-A

PAGE: 3

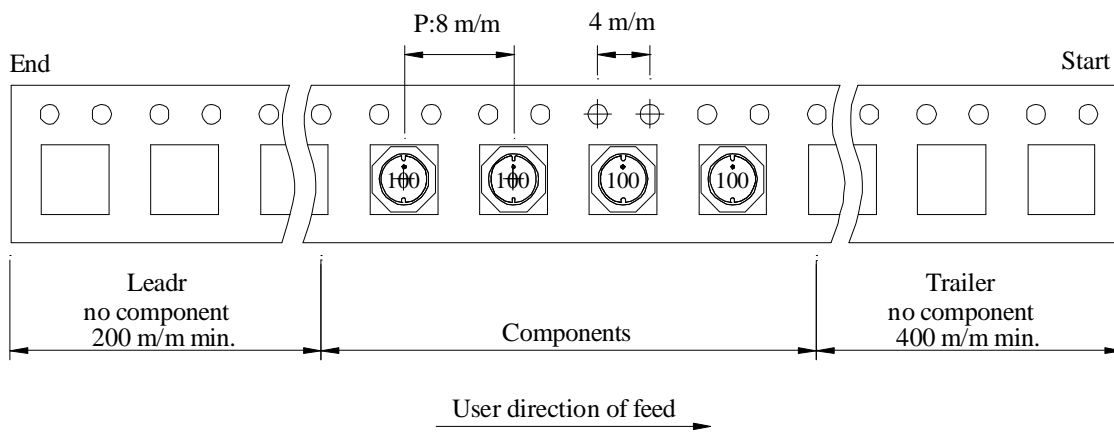
PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO.	SU5016□□□□L□-□□□
		ABC'S ITEM NO.	

VI . PACKAGING INFORMATION :

(1) Configuration



※Carrier tape width : D



(2) Dimensions

Unit:m/m

Style	A	B	C	D	G	N	T
07 - 12	178	21±0.8	13	12	14 ⁺⁰	50 ⁻⁰	16.5

(3) Q'TY & G.W. Per package

Series	Inner : Reel			Outer : Carton		
	Q'TY (pcs)	G.W. (gw)	Style	Q'TY (pcs)	G.W. (Kg)	Size (cm)
SU5016	1,000	175	07 - 12	40,000	8.0	42 x 41 x 24

AR-001A

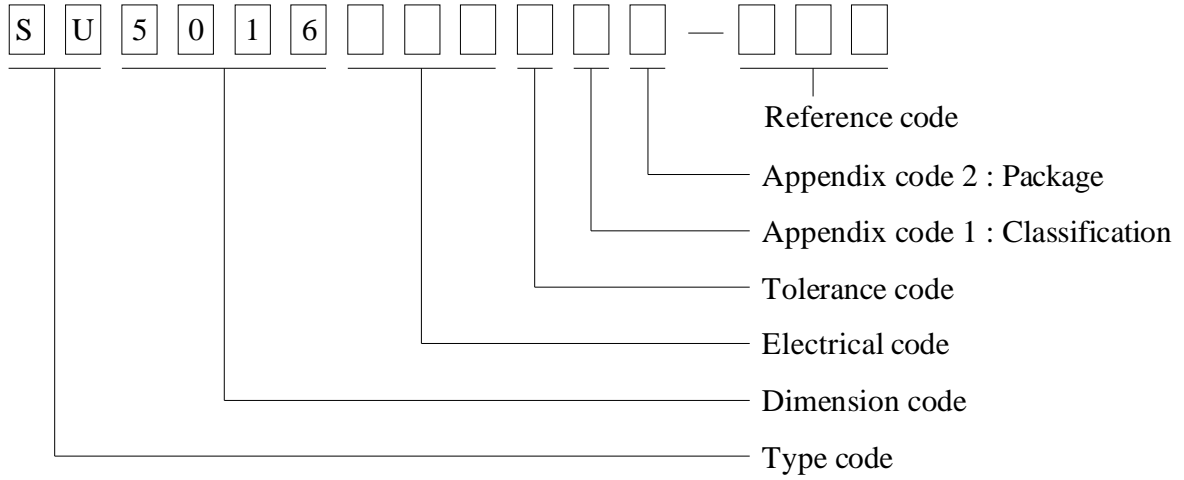
SPECIFICATION FOR APPROVAL

REF : 20080804-A

PAGE: 4

PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO.	SU5016□□□□L□-□□□
		ABC'S ITEM NO.	

VII . DWGING NUMBER EXPRESSION :



Appendix code 1 : Product Classification

- L : Lead Free Standard products comply with RoHS' requirements
- 1 ~ 9 : Lead Free Special products comply with RoHS' requirements

Appendix code 2 : Package Information

Code	Inner package	Inner package Q'TY	Remark
A	T.B.D.	T.B.D.	
B	T / R (Reel package)	1,000 pcs	

SPECIFICATION FOR APPROVAL

REF : 20080804-A

PAGE: 5

PROD.	SHIELDED SMD	ABC'S DWG NO.	SU5016□□□□L□-□□□
NAME	POWER INDUCTOR	ABC'S ITEM NO.	

VIII . RELIABILITY TEST :

Test item	Specification	Test condition						
Solderability	More than 95% of the terminal electrode shall be covered With fresh solder.	Preheat : 155 °C / 4 hours. Solder : Sn96.5 / Ag3 / Cu0.5 or equivalent Solder temp. : 235±5 °C Flux : Rosin Dip time : 5±0.5 seconds						
Thermal shock test (Temp. cycle)	Electrical characteristics shall not change more than ±20%	<table style="width: 100%; border: none;"> <tr> <td style="text-align: center;">Room temp. 15 minutes</td> <td style="text-align: center;">→</td> <td style="text-align: center;">-40 °C 30 minutes</td> </tr> <tr> <td style="text-align: center;">Room temp. 15 minutes</td> <td style="text-align: center;">→</td> <td style="text-align: center;">+105 °C 30 minutes</td> </tr> </table> <p>Total : 50 cycles</p>	Room temp. 15 minutes	→	-40 °C 30 minutes	Room temp. 15 minutes	→	+105 °C 30 minutes
Room temp. 15 minutes		→	-40 °C 30 minutes					
Room temp. 15 minutes		→	+105 °C 30 minutes					
Humidity test		Temperature : 40±2 °C Humidity : 90±5% Time : 1000 hours						
High temp. Resistance test	Temperature : 105±5 °C Applied current : Per spec. Time : 96 hours							

AR-001A



SPECIFICATION FOR APPROVAL

REF: 20080804-A

PAGE: 6

PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO.	SU5016□□□□L□-□□□
		ABC'S ITEM NO.	

IX . UL CARD :

OBMW2 September 8, 2000
Magnet Wire-Component

JUNG SHING WIRE CO LTD E174837
231 CHUNG CHENG RD, SEC 3 JEN-TEH HSIANG, TAINAN
HSIEN TAIWAN

Mtl Dsg	Mark Dsg	BC	Coat Typ	OC	ANSI Type	Temp Class
AIW	---	Polyamideimide		---	MW81-C	220
CFUEWB	---	Polyurethane		---	MW75C	130
EIAIW	---	Polyesterimide		Polyamideimide	MW35C	200
EILOCKY	---	Polyesterimide		Polyamide	---	180
EILOCKW	---	Polyesterimide		Modified Epoxy	---	200
EIW	---	Polyesterimide		---	---	220
EIW-2	---	Polyesterimide		---	MW74-C	200
FL_EILOCKY	---	Modified Polyester		Polyamide	---	155
LSFFW	---	Polyurethane		---	MW79-C	155
LSUEW	---	Polyurethane		---	---	130
PEW	---	Polyester		---	---	155
PEY	---	Polyester		Nylon	MW24-C	155
SF.FLW	---	Modified Polyester		---	MW26C	155
SF.EIW	---	Polyesterimide		---	MW77C	180
SF.BY@	---	Modified Polyester		Nylon	MW27-C	155
SF.FLY@	---	Modified Polyester		Nylon	MW27-C	155
SF.BLOCKBS	---	Modified Polyester		Modified Polyamide	---	155
SF.EILOCKY#	---	Polyesterimide		Polyamide	---	180
SF.EILOCKBS	---	Polyesterimide		Modified Polyamide	---	180
SF.BW@	---	Modified Polyester		---	MW26C	155
SFFW	---	Polyurethane		---	MW79	155

287806002 Page 1 of 2

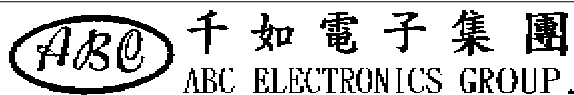
A not-for-profit organization
dedicated to public safety and
committed to quality service

Mtl Dsg	Mark Dsg	BC	Coat Typ	OC	ANSI Type	Temp Class
SFFY	---	Polyurethane		Polyamide	MW80C	155
UEW-1	---	Polyurethane		---	MW2-C	105
UEW-2	---	Polyurethane		---	---	130
UEW-4	---	Polyurethane		---	MW75C	130
UEY	---	Polyurethane		Nylon	MW28-C	130
UEY-2	---	Polyurethane		Polyamide	MW28-C	130

287806002 Page 2 of 2

OBMW2E174837
September 8, 2000

AR-001A



SPECIFICATION FOR APPROVAL

REF :20080804-A

PAGE: 7

PROD. NAME	SHIELDED SMD POWER INDUCTOR	ABC'S DWG NO.	SU5016□□□□L□-□□□
		ABC'S ITEM NO.	

OBMW2 August 27, 1999
Magnet Wire-Component

ELEKTRISOLA (MALAYSLA) SDN BHD E143312
IALAN DAMN SATU IANDA BAIK 28750 BENTONG, PAHANG
DARUL MAKMUR MALAYSIA

Mtl Dsg	Mark Dsg	Coating Type	ANSI Typ	Temp Class
		BC	OC	
Estersol 160	E180	Polyesterimide (solderable)	---	MW-77 180
Amldester 200	A200	Polyesterimide	---	MW-74 200
Polysol-N 155	PN155	Polyurethane	Nylon	MW-80, 155, MW-28 100
Polysol 155	P155	Polyurethane	---	MW-79, 155, MW-79 130
Polysol 155g	Pg155	Polyurethane	---	MW-79 130
Polysol 155p	Pp155,Gp155	Polyurethane	---	MW-79 155
Polysol 160	P160	Polyurethane	---	MW-79 155
Polysol 180	P180	Polyurethane	---	MW-79 155
Polysol 170	P170 or G170	Polyurethane	---	MW-79 156
Polysol-N 180	PN180	Polyurethane	Nylon	180

Marking : Company name/material designation or marked designation and factory identification on package ok reel

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

AR-001A

