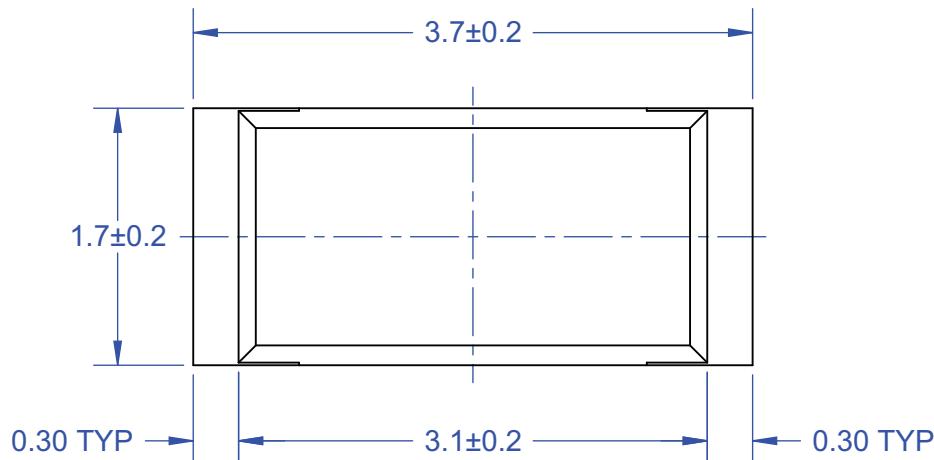
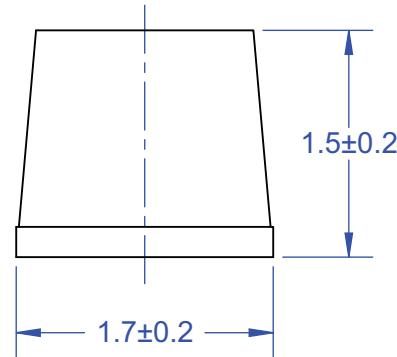


# SOD123FW-ISO OUTLINE FLAT WIDE LEADS

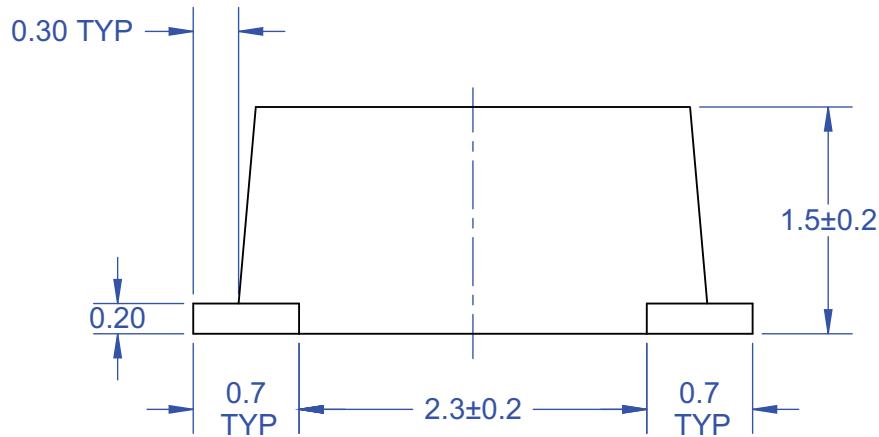
TOP VIEW



END VIEW

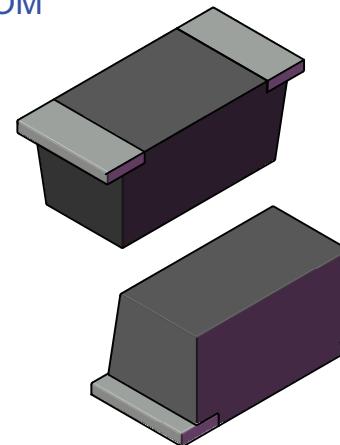


SIDE VIEW



MODEL

BOTTOM



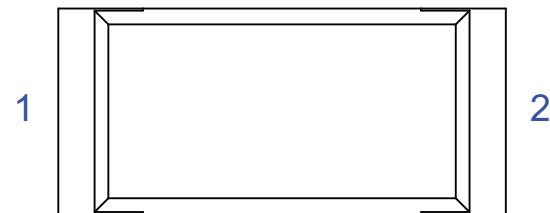
TOP

Notes: (Unless Otherwise Specified).

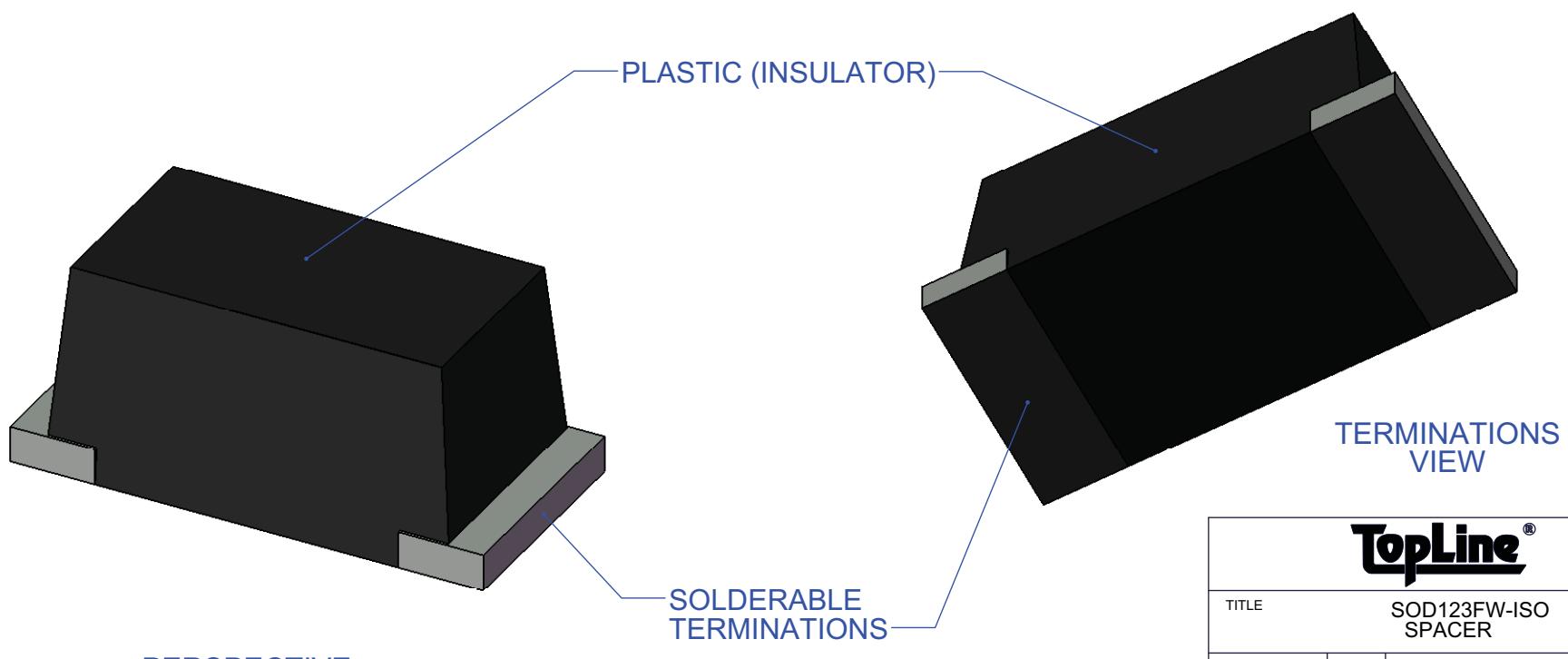
- 1) DIMENSIONS IN mm.
- 2) SEE JUMPER AND SPACER DIAGRAMS (PAGE 2).
- 3) SEE PART NUMBER CONFIGURATION (PAGE 4).
- 4) RECOMMENDED PC BOARD LAYOUT PATTERN (PAGE 5).
- 5) MOUNTING POSITION: ANY (NON-POLARIZED).
- 6) CASE: UL94-V RATED FLAME RETARDANT.

APPROVALS		DATE	TopLine®			
DRAWN	T.Au	01/15/13	TITLE			
ENG	M. Hart	11/2019	SOD123FW-ISO SPACER			
MFG						
QA			SCALE	SIZE	DRAWING NO.	REV
CUST			20:1	A	164321	A
REVISED		DO NOT SCALE DRAWING				SHEET 1 OF 1

**INTERNAL WIRING CIRCUIT**  
PART NUMBER SUFFIX  
TOP VIEW



**ISO**  
NO CONNECTION  
FULLY ISOLATED  
NON-CONDUCTIVE SPACER



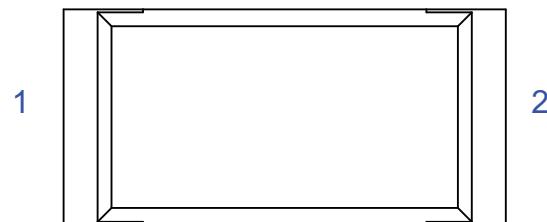
PERSPECTIVE  
VIEW

TERMINATIONS  
VIEW

**TopLine®**

TITLE		SOD123FW-ISO SPACER	
SCALE 20:1	SIZE A	DRAWING NO. 164321	REV A
DO NOT SCALE DRAWING		SHEET 2 OF 7	

SCHEMATIC EQUIVALENT INTERNAL CIRCUIT



ISOLATED CIRCUIT  
NO CONNECTIONS

PIN 1 ————— PIN 2

IR (INSULATION RESISTANCE)

INSULATION RESISTANCE GIGA OHM (DC) MIN	
CIRCUIT	PIN 1 TO PIN 2
ISO	> 10 G Ω

THERMAL RESISTANCE	SOD123FW
JUNCTION TO AMBIENT (Ta=25°) R <sub>th(j-a)</sub>	60 °C/W

MAXIMUM ELECTRICAL (DC) RATING	
SOD123FW	
V <sub>R</sub> WORKING VOLTAGE	1000V
V <sub>F</sub> FORWARD @ RATED CURRENT	< 0
I <sub>O</sub> FORWARD CURRENT	0
I <sub>FSM</sub> FORWARD SURGE CURRENT	0
I <sub>R</sub> REVERSE CURRENT	0
C <sub>J</sub> JUNCTION CAPACITANCE	15 pF

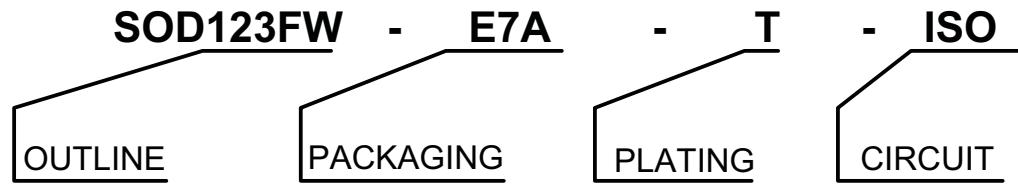
TEMPERATURE RATING	
JUNCTION TEMP T <sub>J</sub>	150 °C
STORAGE TEMP T <sub>stg</sub>	-65 °C TO 150 °C
PEAK REFLOW TEMP T <sub>reflow</sub> 10 SECONDS	260 °C

**TopLine®**

TITLE SOD123FW-ISO SPACER

SCALE 15:1	SIZE A	DRAWING NO. 164321	REV A
DO NOT SCALE DRAWING		SHEET3 OF 7	

## PART NUMBERING SYSTEM



E4A 4-INCH REEL

E7A 7-INCH REEL

T =  
Pb-FREE  
RoHS  
LEAD FREE

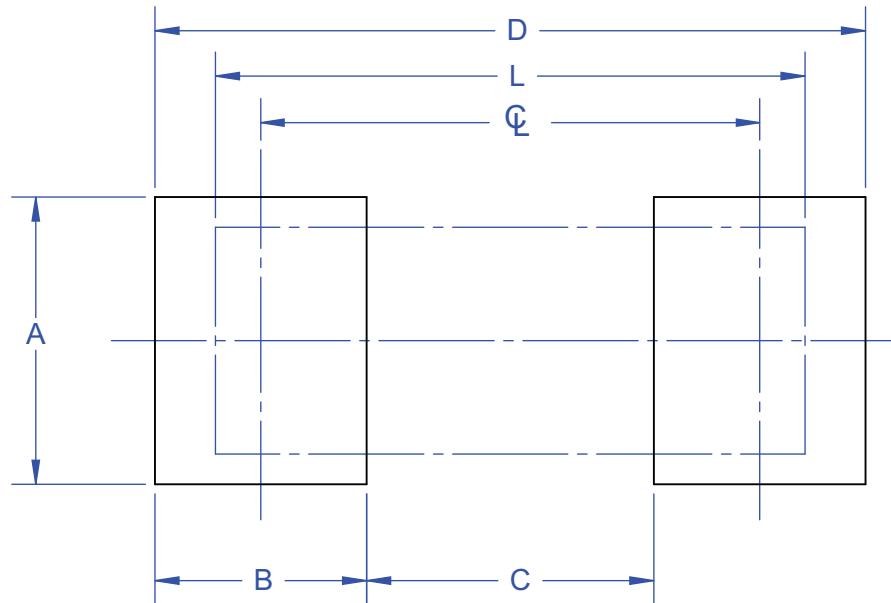
Sn100  
MATTE TIN  
5µm THICK

ISO= ISOLATED  
NO CONNECTION

OUTLINE	REEL QTY	NOTES	RoHS	MSL LEVEL	HALOGEN FREE	APPLICATION	TOP MARK	REF	DP#
SOD123FW-E7A-T-ISO	2500	OPEN CIRCUIT	YES	1	YES	SPACER	N	FM400N-M	164321

<b>TopLine®</b>			
TITLE                    SOD125FW-ISO SPACER			
SCALE 1:1	SIZE A	DRAWING NO. 164321	REV A
DO NOT SCALE DRAWING		SHEET 4 OF 7	

## PC BOARD LAND PATTERN



ALL DIMENSIONS IN mm

## PCB PAD DIMENSIONS

SYMBOL	SOD123FW
A	1.90
B	1.40
C	1.90
D	4.70
Q	3.3
L	3.7

Notes: (Unless Otherwise Specified).

1) DIMENSIONS IN mm.

2) PCB BOARD DIMENSIONS ARE PRESENTED ONLY AS A GUIDELINE.  
DESIGNERS SHOULD USE THEIR OWN EXPERIENCE WHEN DESIGNING PCB.

**TopLine®**

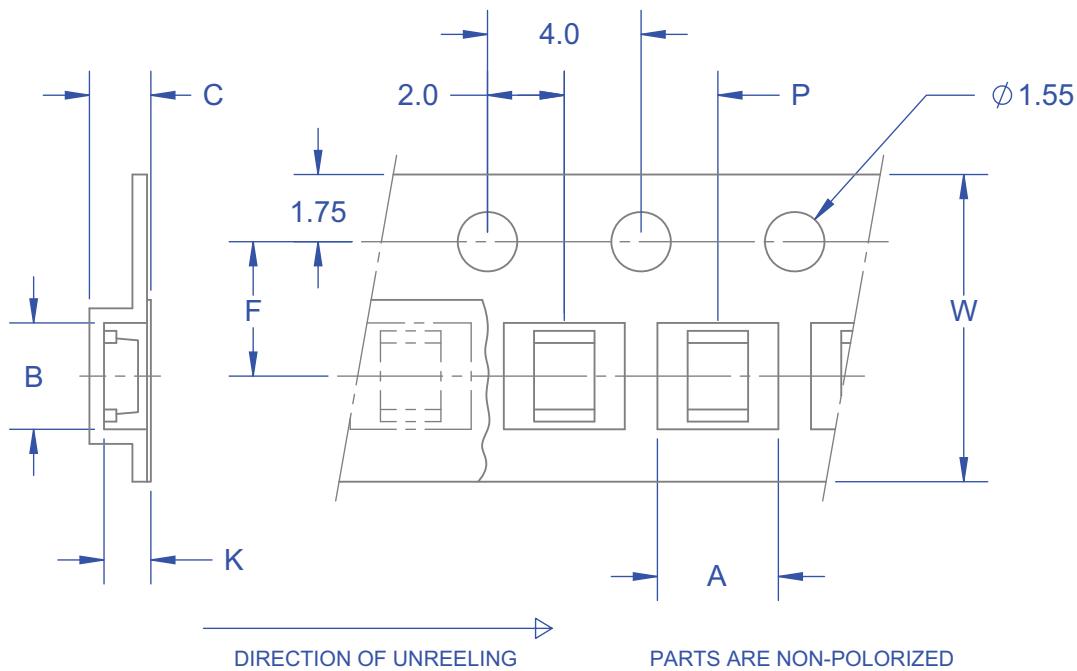
TITLE SOD123FW-ISO  
SPACER

SCALE 20:1 SIZE A DRAWING NO. 164321 REV A

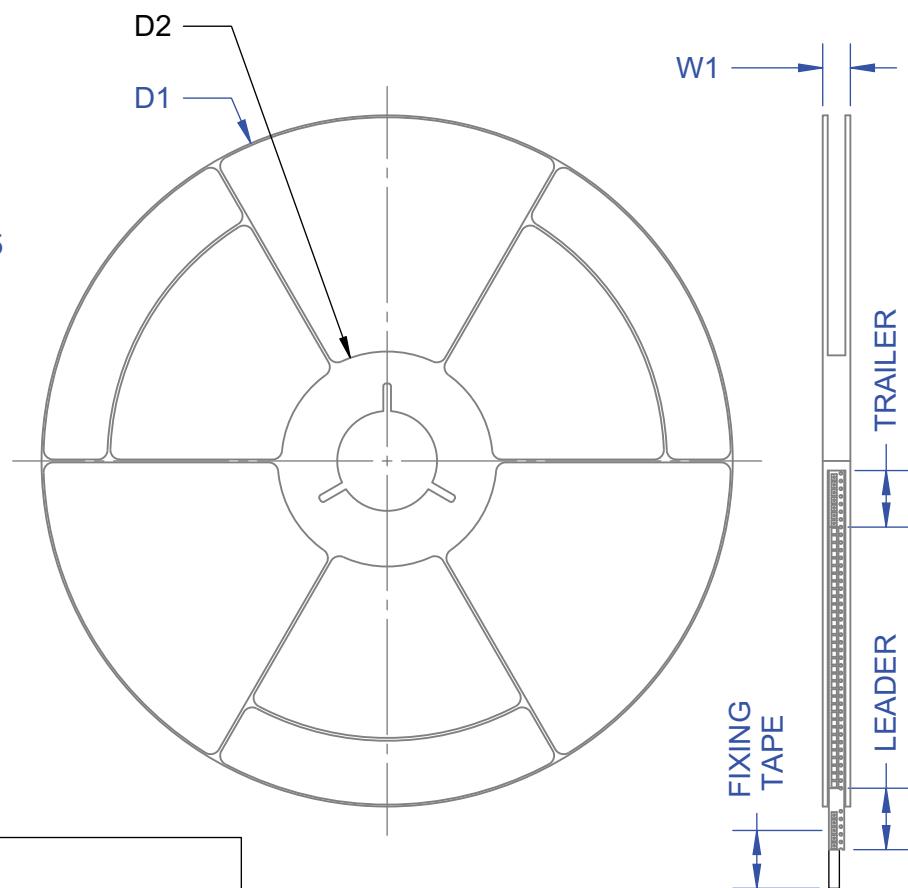
DO NOT SCALE DRAWING

SHEET 5 OF 7

# TAPE SPECIFICATION SURFACE MOUNT DEVICE



# 7 INCH PACKAGE REEL

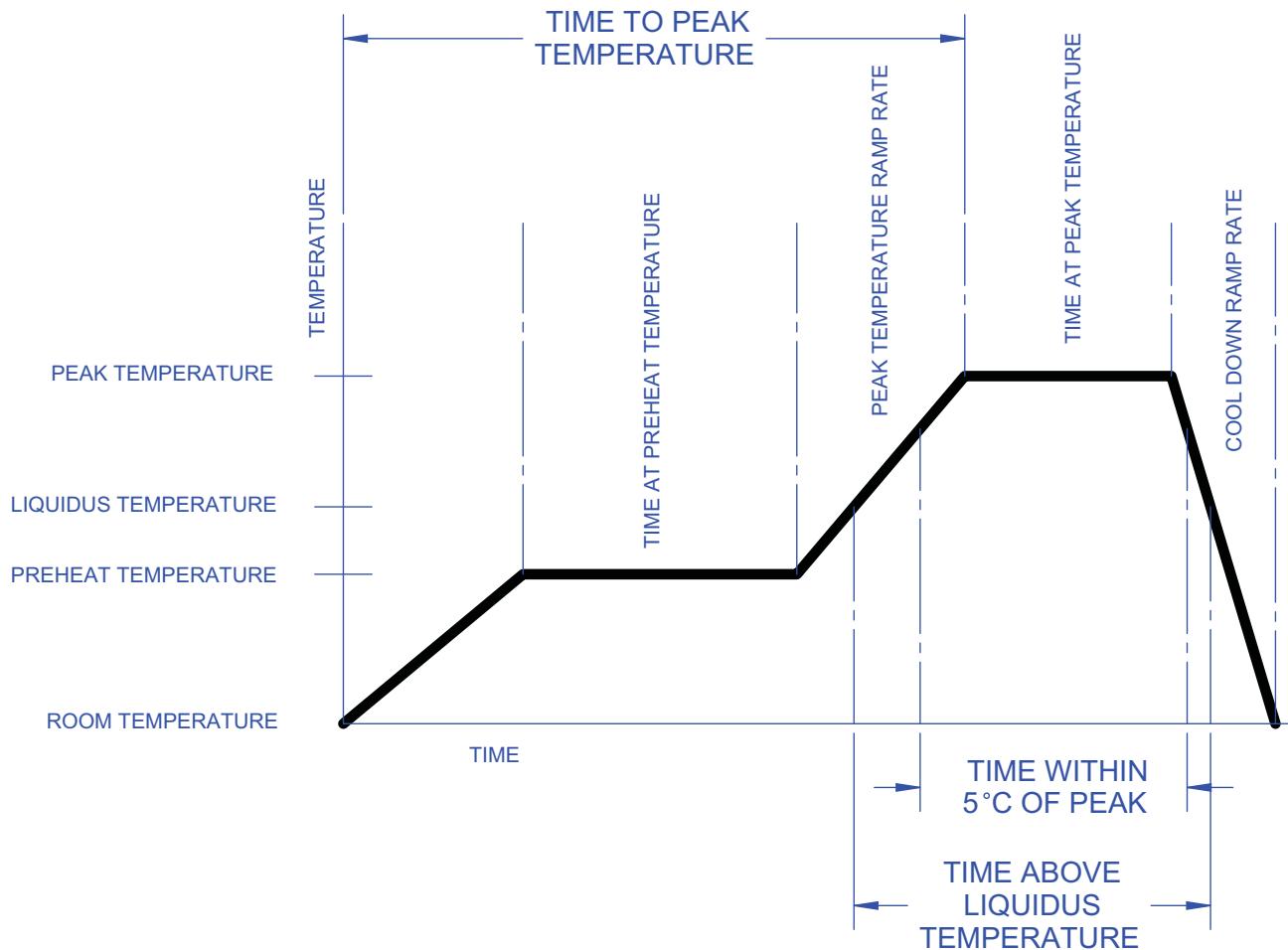


ALL DIMENSIONS IN mm.

TAPE AND REEL DIMENSIONS		E7A 7-INCH	
	SYMBOL	SOD123FW	
TAPE WIDTH	W	8	
PITCH OF COMPONENTS	P	4	
POCKET WIDTH	A	1.9	
POCKET LENGTH	B	3.9	
POCKET DEPTH	K	1.68	
CARRIER THICKNESS	C	1.91	
REEL DIAMETER	D1	178	
HUB DIAMETER	D2	50	
PUNCH HOLE POSITION	F	3.5	
MAX REEL WIDTH	W1	11.4	
REF (JUMPER)	-	FM400S-M	
REF (SPACER)	-	FM400N-M	
QUANTITY (PSC)	-	2500	

<b>TopLine®</b>			
TITLE	SOD123FW-ISO SPACER		
SCALE	1:5	SIZE	A
DRAWING NO.			REV A
DO NOT SCALE DRAWING			SHEET 6 OF 7

# LEAD FREE REFLOW PROFILE OF SMD PACKAGE



DESCRIPTION	REQUIREMENT
AVERAGE PREHEAT RAMP RATE	3°C /SECOND MAXIMUM
PREHEAT TEMPERATURE	150°C MINIMUM, 200°C MAXIMUM
PREHEAT TIME	60 TO 120 SECONDS
RAMP TO PEAK	3°C /SECOND MAXIMUM
TIME OVER LIQUIDUS (217°C)	60 TO 260 SECONDS
PEAK TEMPERATURE	260°C +0/-5°C
TIME WITHIN 5°C OF PEAK	10 TO 30 SECONDS
RAMP - COOL DOWN	6°C /SECONDS MAXIMUM
TIME 25°C TO PEAK	6 MINUTES MAXIMUM

<b>TopLine®</b>			
TITLE SOD123FW-ISO SPACER			
SCALE 20:1	SIZE A	DRAWING NO. 164321	REV A
DO NOT SCALE DRAWING		SHEET 7 OF 7	