MSKSEMI















ESD

TVS

TSS

MOV

GDT

PLED

Broduct data sheet



Semiconductor

Complance

VOLTAGE RANGE 50 to 600 Volts CURRENT 2.0 Amperes



SMB

FEATURES

- * Ideal for surface mount applications
- * Easy pick and place
- * Built-in strain relief
- * Low forward voltage drop

MECHANICAL DATA

- * Case: Molded plastic
- * Epoxy: UL 94V-0 rate flame retardant
- * Metallurgically bonded construction
- * Polarity: Color band denotes cathode end
- * Mounting position: Any
- * Weight: 0.093 grams

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS

Rating 25°C ambient temperature unless otherwies specified. Single phase half wave, 60Hz, resistive or inductive load. For capacitive load, derate current by 20%.

P/N(MARK)	ES2AB	ES2BB	ES2CB	ES2DB	ES2EB	ES2GB	ES2JB	UNITS
Maximum Recurrent Peak Reverse Voltage		100	150	200	300	400	600	V
Maximum RMS Voltage		70	105	140	210	280	420	V
Maximum DC Blocking Voltage		100	150	200	300	400	600	V
Maximum Average Forward Rectified Current						•		
.375"(9.5mm) Lead Length at Ta=55°C		2.0				Α		
Peak Forward Surge Current, 8.3 ms single half sine-wave								
superimposed on rated load (JEDEC method)				60				Α
Maximum Instantaneous Forward Voltage at 2.0A		0.95 1.25 1.70			1.70	V		
Maximum DC Reverse Current Ta=25°C				5.0				μΑ
at Rated DC Blocking Voltage Ta=100°C	500		μΑ					
Maximum Reverse Recovery Time (Note 1)		35				nS		
Typical Junction Capacitance (Note 2)		60				pF		
Operating and Storage Temperature Range TJ, TstG		-65—+150				°C		

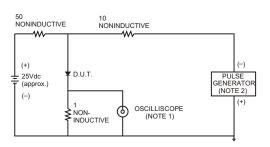
NOTES:

- 1. Reverse Recovery Time test condition: IF=0.5A, IR=1.0A, IRR=0.25A
- 2. Measured at 1MHz and applied reverse voltage of 4.0V D.C.



RATING AND CHARACTERISTIC CURVES (ES2AB THRU ES2JB)

FIG.1- TEST CIRCUIT DIAGRAM AND REVERSE RECOVERY TIME CHARACTERISTIC



NOTES: 1. Rise Time= 7ns max., Input Impedance= 1 megohm.22pF

2. Rise Time= 10ns max., Source Impedance= 50 ohms.

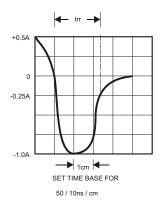


FIG.2-TYPICAL FORWARD CURRENT DERATING CURVE

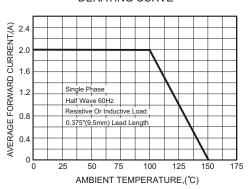


FIG.3-TYPICAL FORWARD

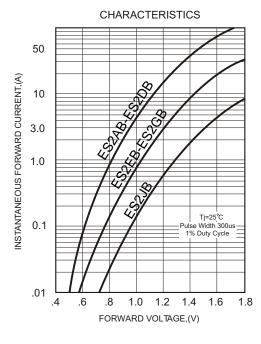
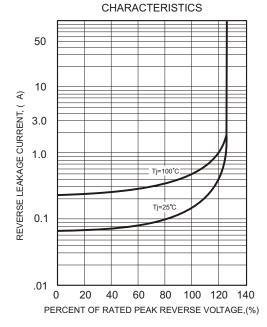
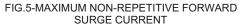


FIG.4-TYPICAL REVERSE





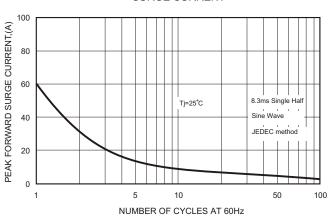
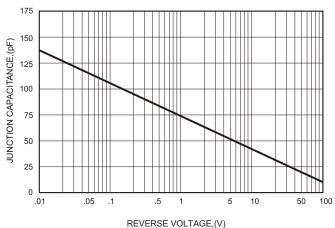
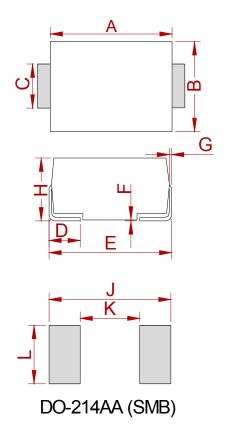


FIG.6-TYPICAL JUNCTION CAPACITANCE





PACKAGE MECHANICAL DATA



	Dimensions				
Ref.	Millimeters		Inches		
	Min.	Max.	Min.	Max.	
Α	4.25	4.75	0.167	0.187	
В	3.30	3.94	0.130	0.155	
С	1.85	2.21	0.073	0.087	
D	0.76	1.52	0.030	0.060	
Е	5.08	5.59	0.200	0.220	
F	0.051	0.203	0.002	0.008	
G	0.15	0.31	0.006	0.012	
Н	2.11	2.44	0.083	0.096	
J	6.80		0.270		
K		2.60		0.100	
L	2.40		0.090		

REEL SPECIFICATION

P/N	PKG	QTY
ES2AB THRU ES2JB	SMB	3000



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