

**VOLTAGE RANGE: 60V**  
**CURRENT: 2.0 A**

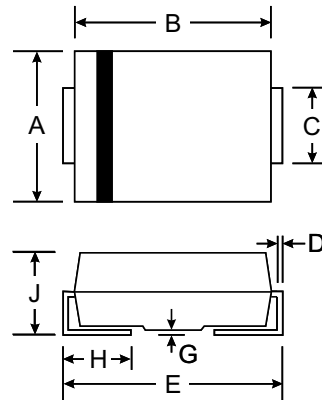
### Features

- Miniature Size, Surface Mount Device
- Low Forward Voltage Drop
- High Surge Capability
- Low Power Loss, High Efficiency
- 30 Volts through 100Volts Types Available
- Packaged in 12mm Tape and Reel
- Not Rolling During Assembly



### Mechanical Data

- Case: SMB/DO-214AA, Molded Plastic
- Terminals: Solder Plated, Solderable per MIL-STD-750, Method 2026
- Polarity: Cathode Band or Cathode Notch
- Marking: Type Number
- Weight: 0.093 grams (approx.)



SMB(DO-214AA)		
Dim	Min	Max
A	3.30	3.94
B	4.06	4.70
C	1.91	2.21
D	0.15	0.31
E	5.00	5.59
G	0.10	0.20
H	0.76	1.52
J	2.00	2.62
All Dimensions in mm		

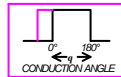
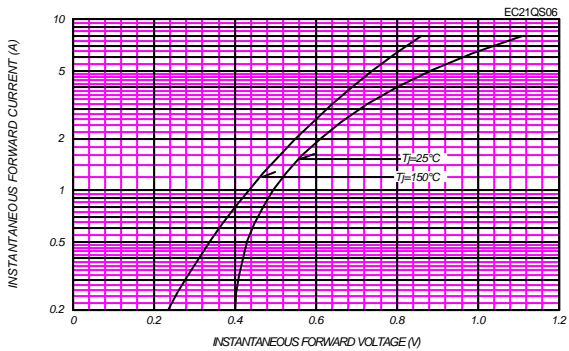
### Maximum Ratings @ T<sub>A</sub> = 25°C unless otherwise specified

Characteristic	Symbol	Limits	Unit
Repetitive Peak Reverse Voltage	VRRM	60	V
Non-repetitive Peak Reverse Voltage	VRSM	65	V
Average Rectified Output Current 50Hz Half Sine Wave Resistive Load	I <sub>o</sub>	1.0 2.0	A
R.M.S. Forward Current	IF(RMS)	3.14	A
Surge Forward Current 50Hz Half Sine Wave, I <sub>c</sub> cycle, Non-repetitive	IFSM	40	A
Operating Junction Temperature Range	T <sub>jw</sub>	-40 to +150	°C
Storage Temperature Range	T <sub>stg</sub>	-40 to +150	°C

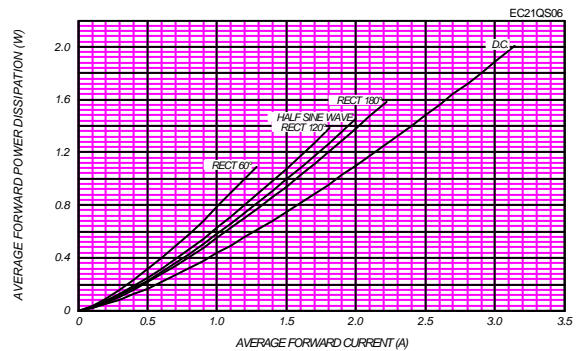
### Electrical Characteristics @ T<sub>A</sub> = 25°C unless otherwise specified

Characteristic	Symbol	Min	Typ	Max	Unit
Peak Reverse Current	IRM	-	-	2	mA
Peak Forward Voltage	VFM	-	-	0.61	V
Thermal Resistance Junction to Ambient Alumina Substrate Mounted *1 Junction to Lead	R <sub>th(j-a)</sub>	-	-	108	°C /W
		-	-	23	

FORWARD CURRENT VS. VOLTAGE

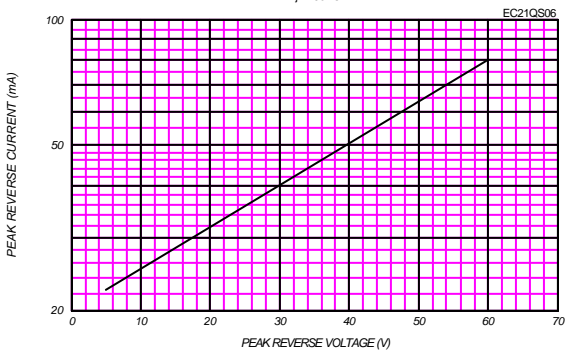


AVERAGE FORWARD POWER DISSIPATION

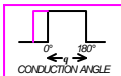
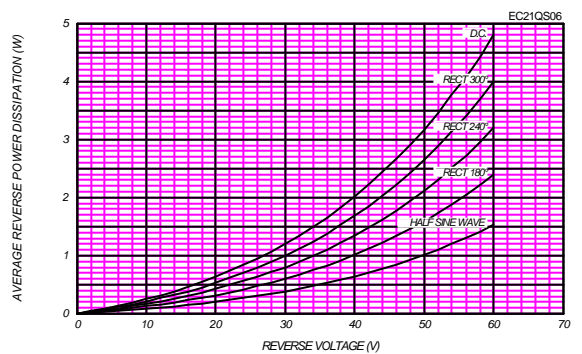


PEAK REVERSE CURRENT VS. PEAK REVERSE VOLTAGE

T<sub>j</sub> = 150 °C

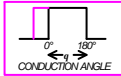
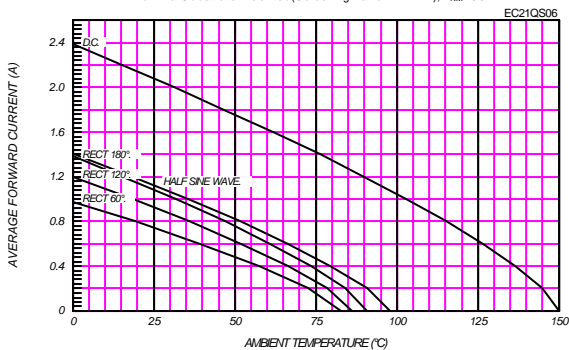


AVERAGE REVERSE POWER DISSIPATION



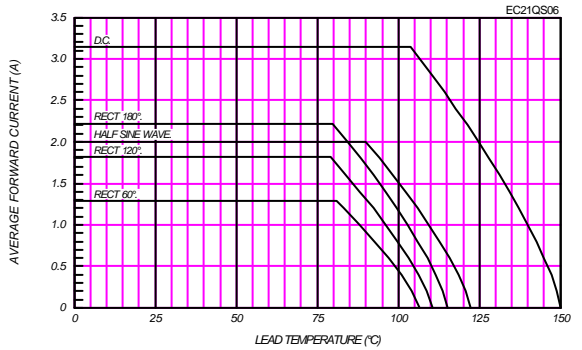
AVERAGE FORWARD CURRENT VS. AMBIENT TEMPERATURE

Alumina Substrate Mounted (Soldering Land=2x2mm), V<sub>RM</sub>=60V



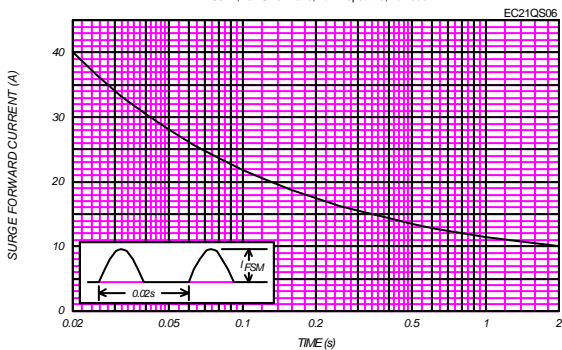
AVERAGE FORWARD CURRENT VS. LEAD TEMPERATURE

V<sub>RM</sub>=60V



SURGE CURRENT RATINGS

f=50Hz, Half Sine Wave, Non-Repetitive, No Load



JUNCTION CAPACITANCE VS. REVERSE VOLTAGE

T<sub>j</sub>=25°C, V<sub>m</sub>=20mV<sub>RMS</sub>, f=100kHz, Typical Value

