



**FM220A  
THRU  
FM2200A**

**SURFACE MOUNT SCHOTTKY  
BARRIER RECTIFIER**

**VOLTAGE RANGE 20 to 200 Volts CURRENT 2.0 Amperes**

**FEATURES**

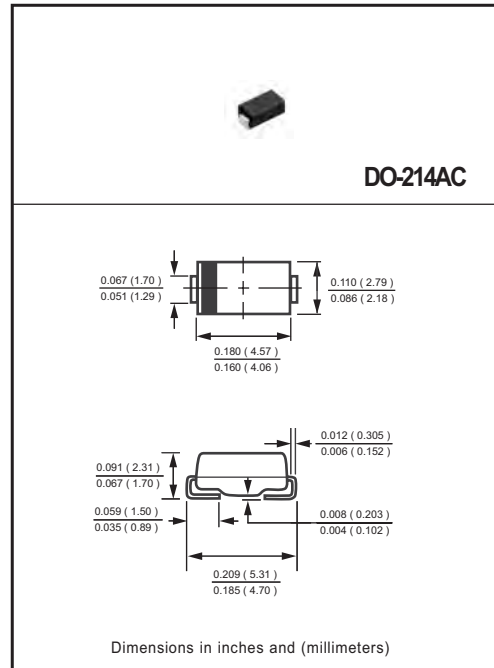
- \* Ideal for surface mounted applications
- \* Low leakage current
- \* Metallurgically bonded construction
- \* Mounting position: Any
- \* Weight: 0.057 gram

**MECHANICAL DATA**

- \* Epoxy: Device has UL flammability classification 94V-0

**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

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



**MAXIMUM RATINGS (@ TA=25 °C unless otherwise noted)**

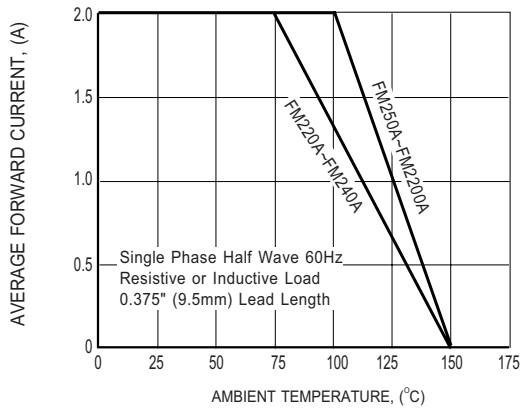
RATINGS	SYMBOL	FM220A	FM230A	FM240A	FM250A	FM260A	FM280A	FM2100A	FM2150A	FM2200A	UNITS
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	20	30	40	50	60	80	100	150	200	Volts
Maximum RMS Voltage	V <sub>RMS</sub>	14	21	28	35	42	56	70	105	140	Volts
Maximum DC Blocking Voltage	V <sub>DC</sub>	20	30	40	50	60	80	100	150	200	Volts
Maximum Average Forward Rectified Current at Ambient Temperature	I <sub>O</sub>	2.0									Amps
Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	I <sub>FSM</sub>	60									Amps
Typical Junction Capacitance (Note 2)	C <sub>J</sub>	130									pF
Operating Temperature Range	T <sub>J</sub>	150									°C
Storage Temperature Range	T <sub>STG</sub>	-55 to + 150									°C

**ELECTRICAL CHARACTERISTICS (@TA=25 °C unless otherwise noted)**

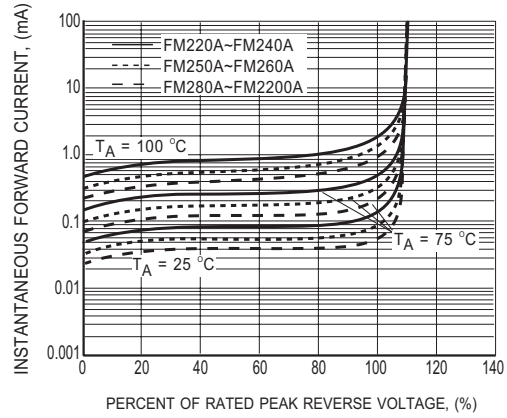
CHARACTERISTICS	SYMBOL	FM220A	FM230A	FM240A	FM250A	FM260A	FM280A	FM2100A	FM2150A	FM2200A	UNITS
Maximum Instantaneous Forward Voltage at 2.0A DC	V <sub>F</sub>	.55			.70		.85				Volts
Maximum Average Reverse Current @T <sub>A</sub> = 25°C	I <sub>R</sub>	0.2									mA
at Rated DC Blocking Voltage @T <sub>A</sub> = 100°C		2									mA

NOTES : 1. Measured at 1 MHz and applied reverse voltage of 4.0 volts.  
2. "Fully ROHS compliant", "100% Sn plating (Pb-free)".

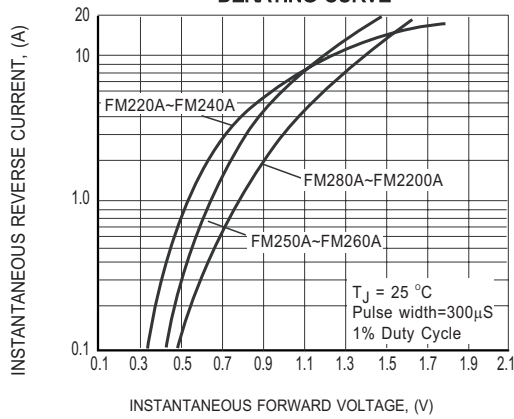
# RATING AND CHARACTERISTICS CURVES ( FM220A THRU FM2200A )



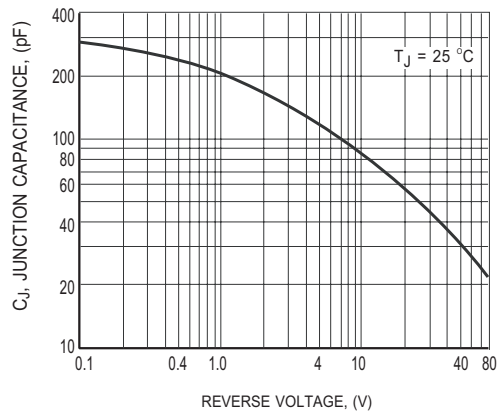
**FIG.1 TYPICAL FORWARD CURRENT DERATING CURVE**



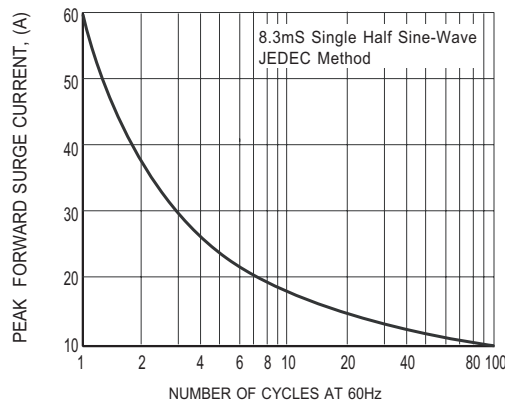
**FIG.2 TYPICAL REVERSE CHARACTERISTICS**



**FIG.3 TYPICAL INSTANTANEOUS FORWARD CHARACTERISTICS**

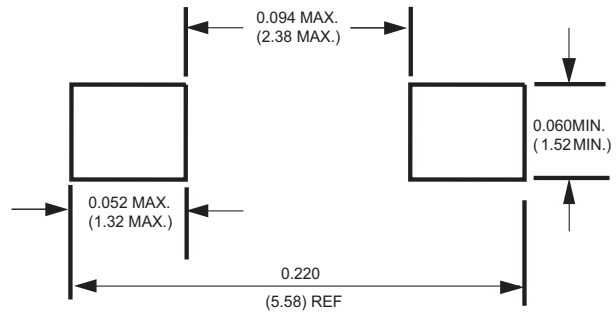


**FIG.4 TYPICAL JUNCTION CAPACITANCE**



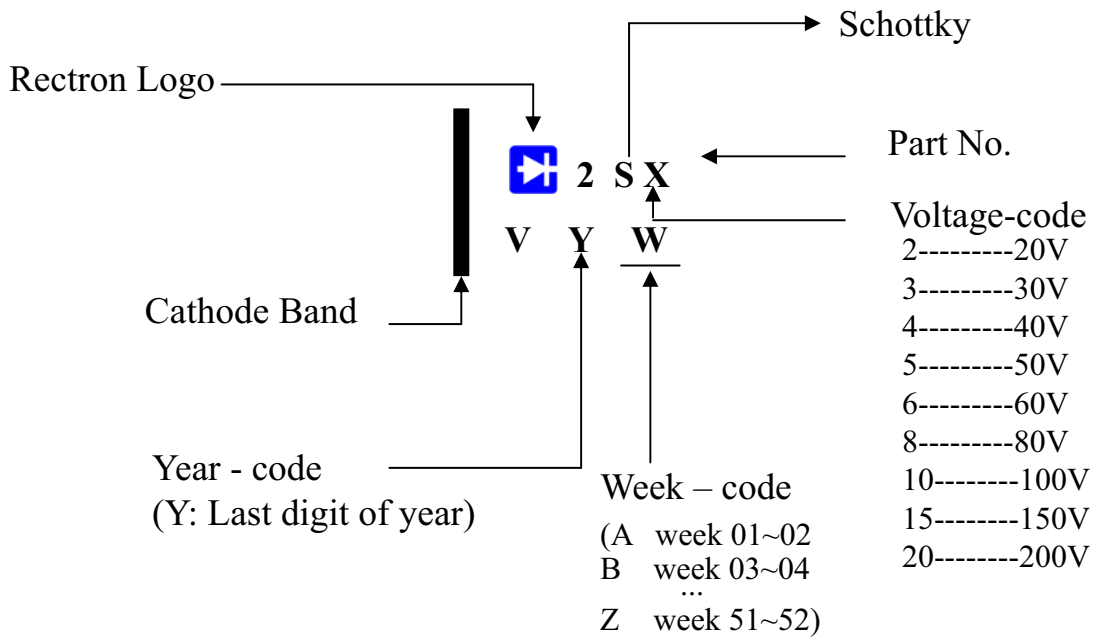
**FIG.5 MAXIMUM NON-REPETITIVE FORWARD SURGE CURRENT**

## Mounting Pad Layout



Dimensions in inches and (millimeters)

## Marking Description



# PACKAGING OF DIODE AND BRIDGE RECTIFIERS

## REEL PACK

PACKAGE	PACKING CODE	EA PER REEL	COMPONENT SPACE(mm)	TAPE SPACE (mm)	REEL DIA (mm)	CARTON SIZE (mm)	EA PER CARTON	GROSS WEIGHT(Kg)
SMA	-T	1500	---	---	178	390*205*310	48,000	8.40
SMA	-W	5,000	---	---	330	355*360*350	80,000	14.20

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