

FML120 THRU FML140

DO-214AC

SUPER LOW Vf SCHOTTKY BARRIER RECTIFIER

VOLTAGE RANGE 20 to 40 Volts CURRENT 1.0 Ampere

FEATURES

- * Low switching noise
- * Low forward voltage drop
- * High current capability
- * High switching capability
- * High surge capabitity
- * High reliability

MECHANICAL DATA

- * Case: Molded plastic
- * Epoxy: Device has UL flammability classification 94V-O
- * Lead: MIL-STD-202E method 208C guaranteed
- * Metallurgically bonded construction
- * Mounting position: Any
- * Weight: 0.09 gram

NEW RELASI 0.012 (0.305) 0.008 (0.203)

Dimensions in inches and (millimeters)

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	FML120	FML130	FML140	UNITS
Maximum Recurrent Peak Reverse Voltage	V _{RRM}	20	30	40	Volts
Maximum RMS Voltage	V _{RMS}	14	21	28	Volts
Maximum DC Blocking Voltage	V _{DC}	20	30	40	Volts
Maximum Average Forward Rectified Current at T _A =75°C	Io	1.0			Amps
Peak Forward Surge Current 8.3 ms single half sine-wave superimposed on rated load (JEDEC method)	I _{FSM}	40			
Typical Thermal Resistance (Note 1)	R _{θJA}	85			
Typical Thermal Resistance (Note 1)	RθJL	25			
Typical Junction Capacitance (Note 2)	CJ	110			
Operating Temperature Range	TJ	150			
Storage Temperature Range	T _{STG}	-55 to + 150			°C

FI FCTRICAL CHARACTERISTICS(@TA=25 °C unless otherwise noted)

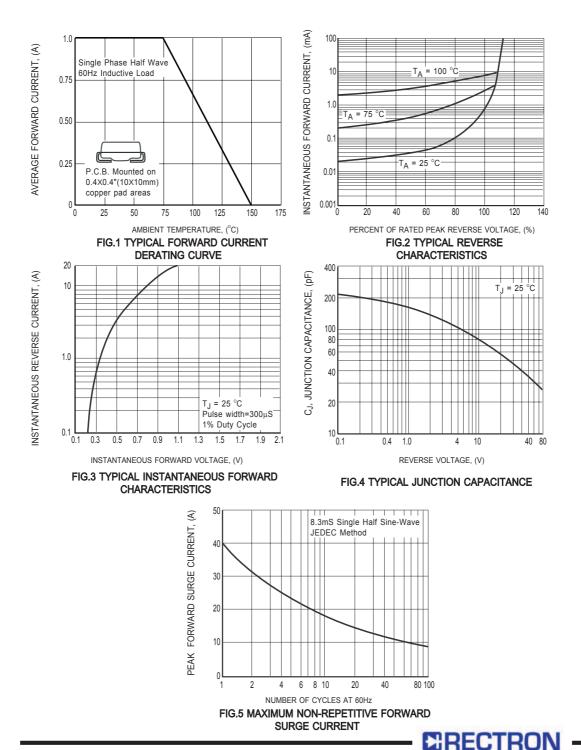
ELECTRICAL CHARACTERIOTICS (@17/ 20 "O unicoo outerwise noted)										
CHARACTERISTICS		SYMBOL	FML120	FML130	FML140	UNITS				
Maximum Instantaneous Forward Voltage at 1.0A DC		VF	.36			Volts				
Maximum Average Reverse Current	@T _A = 25°C	1-		1.0		mΑ				
at Rated DC Blocking Voltage	@T _A = 100°C	i 'R		10		mΑ				

NOTES: 1. Thermal Resistance: Mounted on PCB.

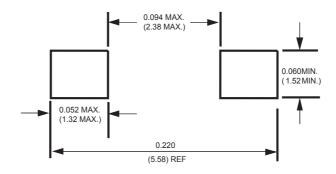
- Measured at 1 MHz and applied reverse voltage of 4.0 volts.
- 3. Also available in DO-214AA (SMB).
- 4. "Fully ROHS compliant", "100% Sn plating (Pb-free)".

2006-11

RATING AND CHARACTERISTICS CURVES (FML120 THRU FML140)



Mounting Pad Layout



Dimensions in inches and (millimeters)



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