

# ERA81-004

**PRV : 40 Volts**  
**Io : 1.0 Ampere**

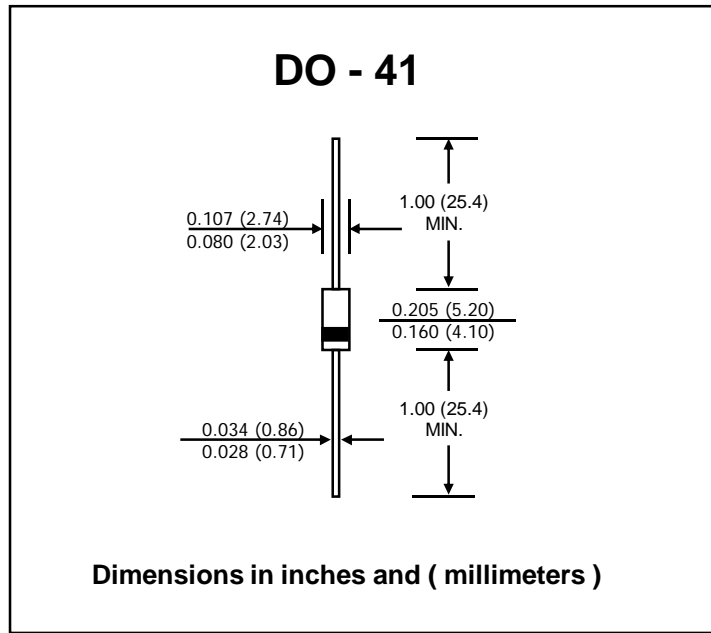
**FEATURES :**

- \* High current capability
- \* High surge current capability
- \* High reliability
- \* High efficiency
- \* Low power loss
- \* Low forward voltage drop
- \* Low cost
- \* **Pb / RoHS Free**

**MECHANICAL DATA :**

- \* Case : DO-41 Molded plastic
- \* Epoxy : UL94V-O rate flame retardant
- \* Lead : Axial lead solderable per MIL-STD-202, Method 208 guaranteed
- \* Polarity : Color band denotes cathode end
- \* Mounting position : Any
- \* Weight : 0.339 gram

# SCHOTTKY-BARRIER RECTIFIER DIODES



**MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**

Rating 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%.

RATING	SYMBOL	VALUE	UNIT
Maximum Recurrent Peak Reverse Voltage	V <sub>RRM</sub>	40	V
Maximum DC Blocking Voltage	V <sub>DC</sub>	40	V
Maximum Average Forward Current T <sub>L</sub> = 115 °C	I <sub>F(AV)</sub>	1.0	A
Maximum Non-Repetitive Peak Forward Surge Current (Sin wave, 10ms )	I <sub>FSM</sub>	50	A
Maximum Forward Voltage at I <sub>F</sub> = 1.0 A	V <sub>F</sub>	0.55	V
Maximum Reverse Current at V <sub>R</sub> = V <sub>RRM</sub>	I <sub>R</sub>	2.0	mA
Junction Temperature Range	T <sub>J</sub>	- 40 to + 125	°C
Storage Temperature Range	T <sub>STG</sub>	- 40 to + 125	°C



### RATING AND CHARACTERISTIC CURVES ( ERA81-004 )

FIG.1 - FORWARD CURRENT DERATING CURVE

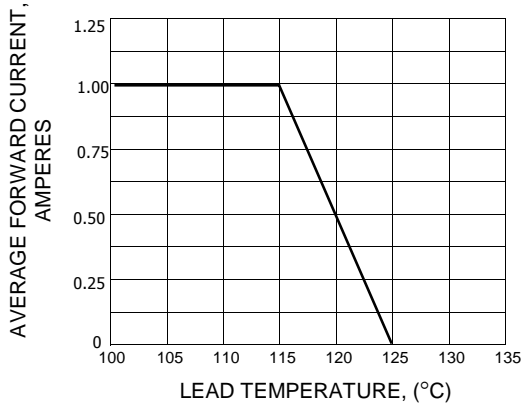


FIG.2 - MAXIMUM NON-REPETITIVE PEAK FORWARD SURGE CURRENT

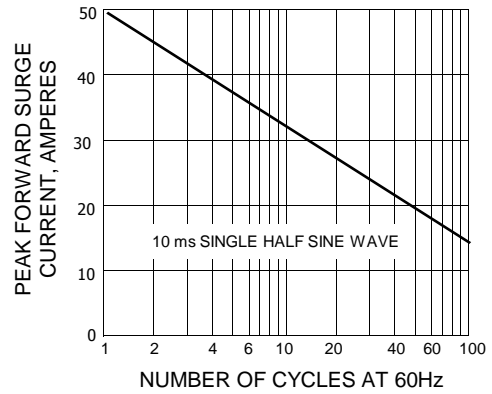


FIG.3 - TYPICAL FORWARD CHARACTERISTICS

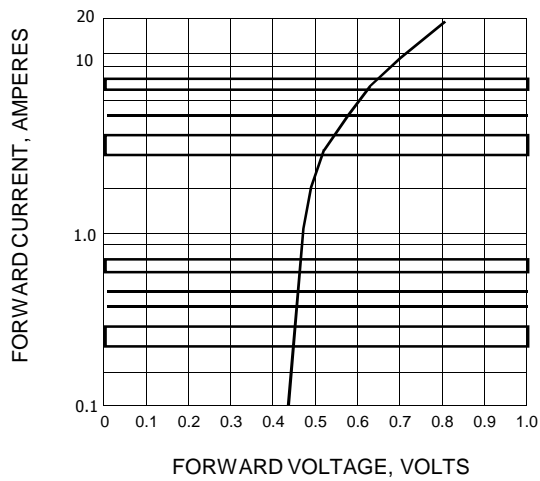


FIG.4 - TYPICAL REVERSE CHARACTERISTICS

