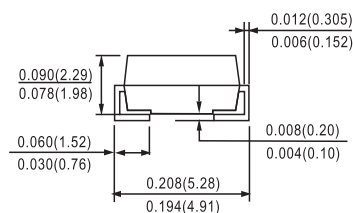
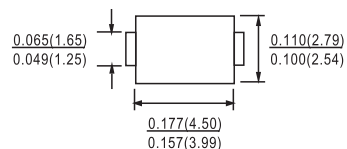


**TAYCHIPST****Surface Mount Schottky Power Rectifier****MBRA340T3****40V 3.0A****FEATURES**

- Small Compact Surface Mountable Package with J-Bent Leads
- Rectangular Package for Automated Handling
- Highly Stable Oxide Passivated Junction
- Very Low Forward Voltage Drop
- Guardring for Stress Protection
- Pb-Free Package is Available

MECHANICAL DATA

- Case: Epoxy, Molded
- Weight: 70 mg (approximately)
- Finish: All External Surfaces Corrosion Resistant and Terminal Leads are Readily Solderable
- Lead and Mounting Surface Temperature for Soldering Purposes: 260°C Max. for 10 Seconds
- Shipped in 12 mm tape, 5000 units per 13 inch reel
- Polarity: Cathode Lead Indicated by Polarity Band

DO-214AC(SMA)

Dimensions in inches and (millimeters)

MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS**MAXIMUM RATINGS**

Rating	Symbol	Value	Unit
Peak Repetitive Reverse Voltage Working Peak Reverse Voltage DC Blocking Voltage	V_{RRM} V_{RWM} V_R	40	V
Average Rectified Forward Current (At Rated V_R , $T_L = 100^\circ\text{C}$)	I_O	3.0	A
Non-Repetitive Peak Surge Current (Surge Applied at Rated Load Conditions Halfwave, Single Phase, 60 Hz)	I_{FSM}	100	A
Storage/Operating Case Temperature	T_{stg} , T_C	-55 to +150	$^\circ\text{C}$
Operating Junction Temperature	T_J	-55 to +125	$^\circ\text{C}$
Voltage Rate of Change (Rated V_R , $T_J = 25^\circ\text{C}$)	dv/dt	10,000	V/ μs

THERMAL CHARACTERISTICS

Characteristic	Symbol	Value	Unit
Thermal Resistance – Junction-to-Lead (Note 1)	$R_{\theta JL}$	15	$^\circ\text{C/W}$
Thermal Resistance – Junction-to-Ambient (Note 1)	$R_{\theta JA}$	81	$^\circ\text{C/W}$

ELECTRICAL CHARACTERISTICS

Maximum Instantaneous Forward Voltage (Note 2) ($I_F = 3.0\text{ A}$)	V_F	$T_J = 25^\circ\text{C}$	$T_J = 100^\circ\text{C}$	Volts
		0.450	0.390	
Maximum Instantaneous Reverse Current ($V_R = 40\text{ V}$)	I_R	$T_J = 25^\circ\text{C}$	$T_J = 100^\circ\text{C}$	mA
		0.3	15	

1. Mounted on 2" Square PC Board with 1" Square Total Pad Size, PC Board FR4.

2. Pulse Test: Pulse Width $\leq 250\text{ }\mu\text{s}$, Duty Cycle $\leq 2.0\%$.

RATINGS AND CHARACTERISTIC CURVES MBRA340T3

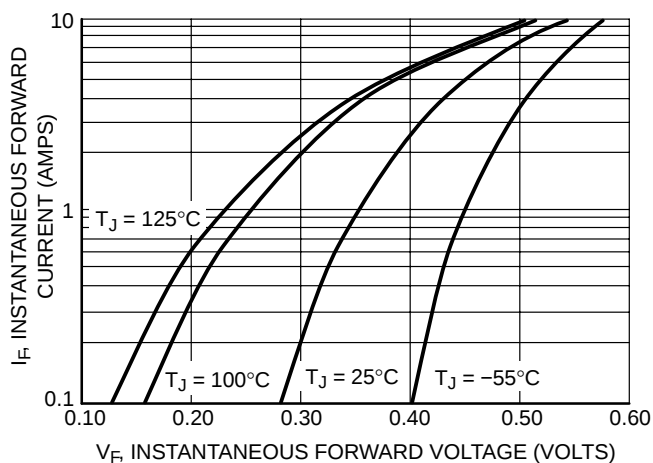


Figure 1. Typical Forward Voltage

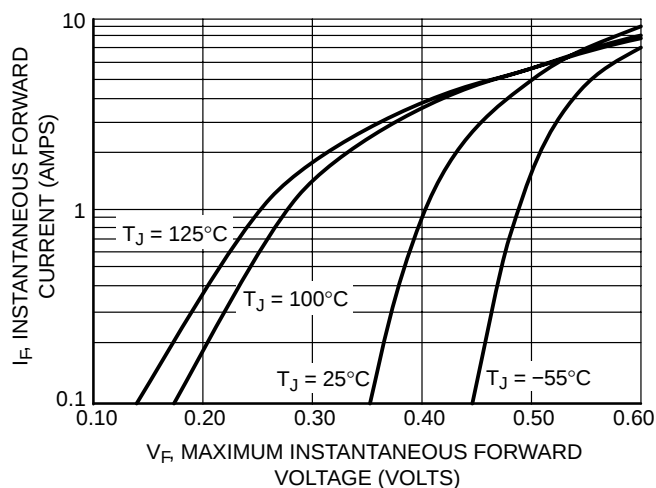


Figure 2. Maximum Forward Voltage

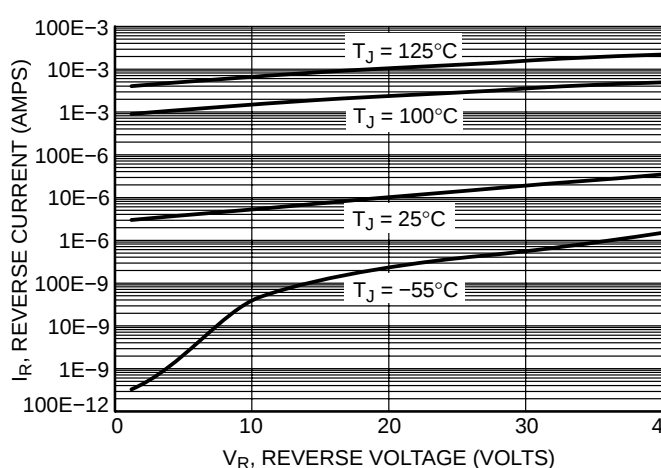


Figure 3. Typical Reverse Current

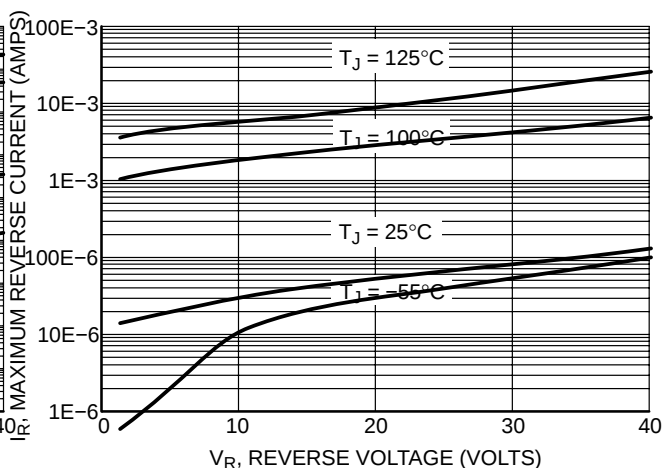


Figure 4. Maximum Reverse Current

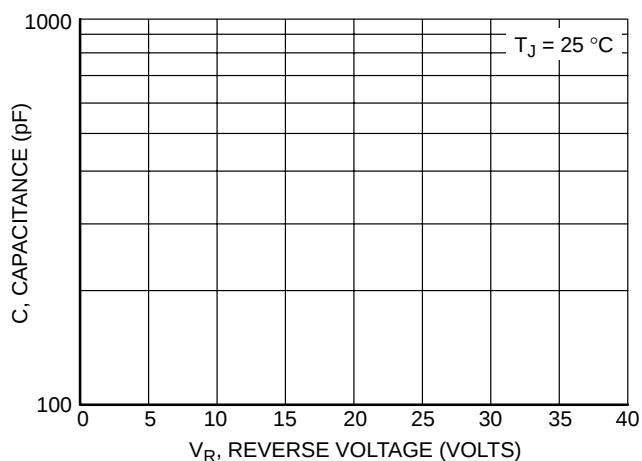


Figure 7. Capacitance

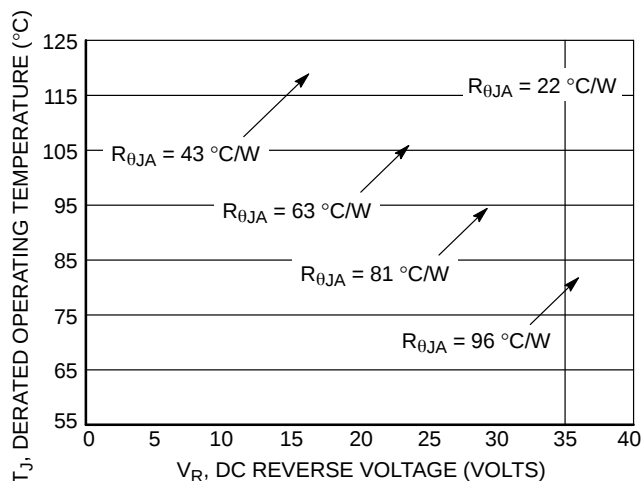


Figure 8. Typical Operating Temperature Derating

RATINGS AND CHARACTERISTIC CURVES MBRA340T3

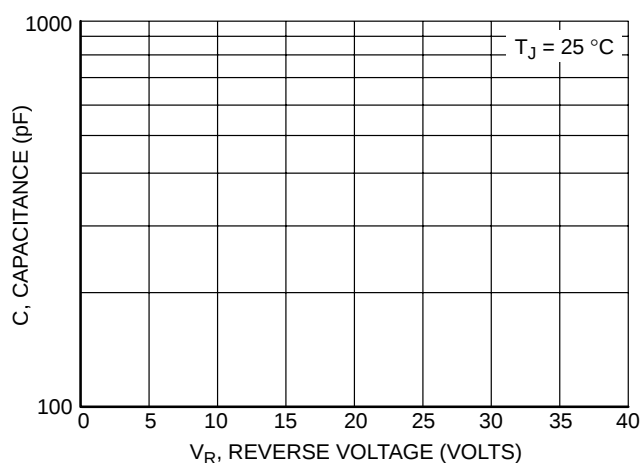


Figure 7. Capacitance

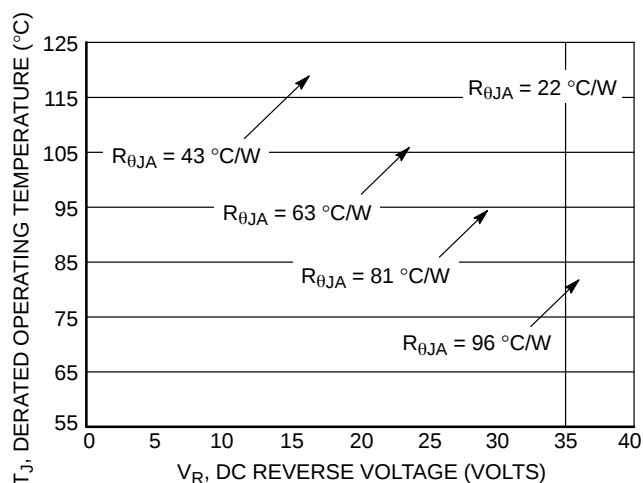


Figure 8. Typical Operating Temperature Derating

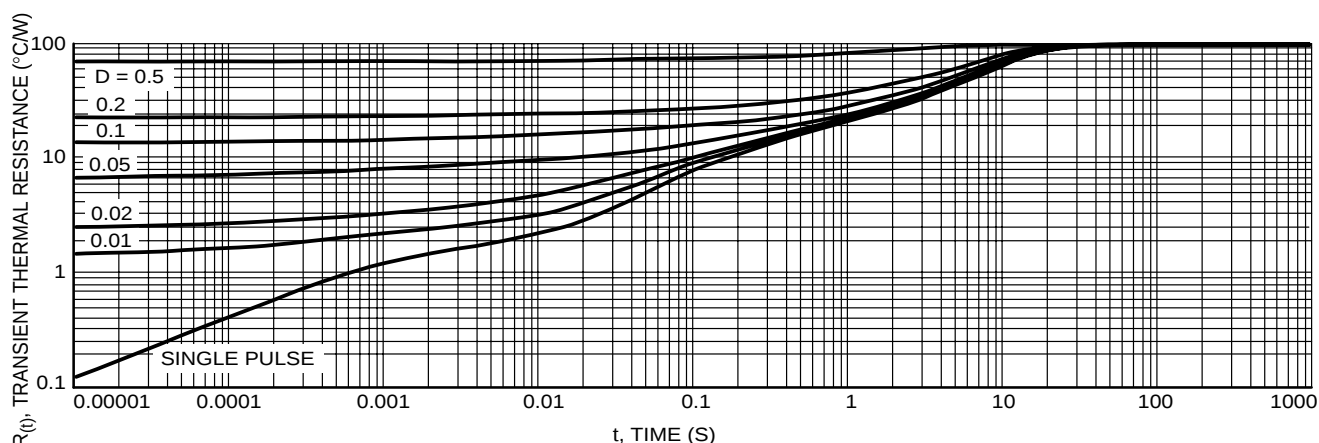


Figure 9. Thermal Response, Junction-to-Ambient (min pad)

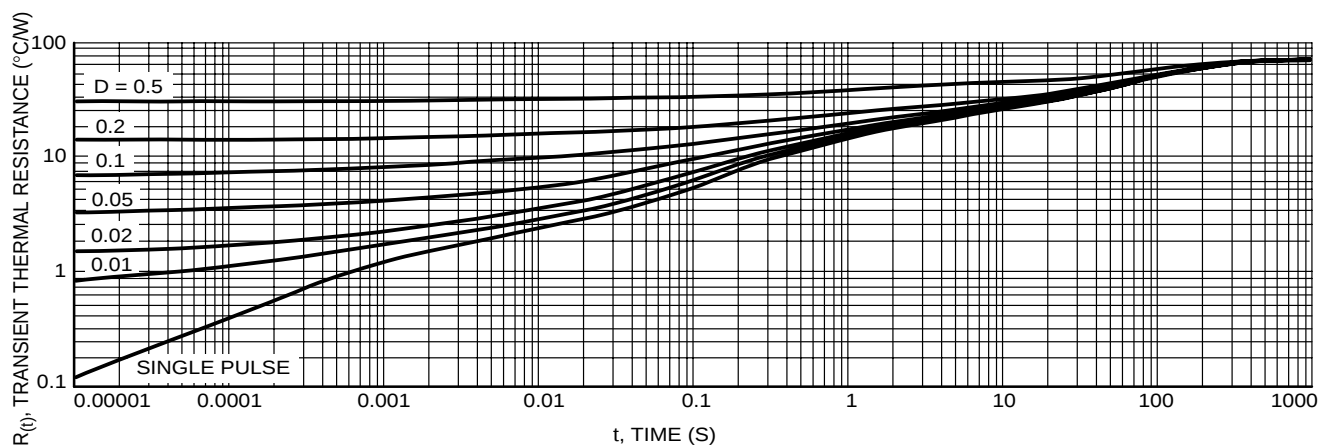


Figure 10. Thermal Response, Junction to Ambient (1 inch pad)