

#### **SCHOTTKY BARRIES SWITCHING DIODES**

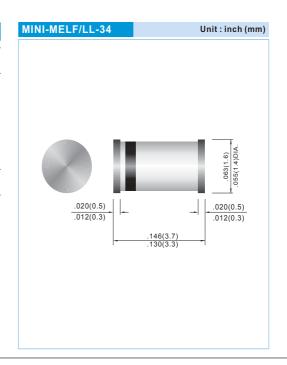
VOLTAGE 30 Volt" CURRENT 0.2 Ampere

#### **FEATURES**

- Low Forward Voltage Drop
- Guard Ring Construction for Transient Protection
- Low Reverse Recovery Time
- Low Reverse Capacitance
- Lead free in compliance with EU RoHS 2011/65/EU directive

#### **MECHANICAL DATA**

- Case: Molded Glass MINI MELF
- Terminals: Solderable per MIL-STD-750, Method 2026
- · Polarity: See Diagram Below
- Mounting Position: Any



#### MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS (TJ = 25°C unless otherwise noted)

PARAMETER		SYMBOL	BAS85	UNITS
Peak Repetitive Reverse Voltage		V <sub>RRM</sub>	30	V
Continuous Reverse Voltagee		V <sub>R</sub>	30	V
Forward Continuous Currentt		I <sub>F</sub>	200	mA
Peak Forward Current		I <sub>FM</sub>	300	mA
Peak Forward Surge Current, t < 1s		I <sub>FSM</sub>	600	mA
Power Dissipation Derate Above 25°C		P <sub>D</sub>	200	mW
Maximum Forward Voltage	F=0.1mA  F=1mA  F=10mA  F=100mA	V <sub>F</sub>	0.24 0.32 0.40 0.80	V
Maximum Reverse Current V <sub>R</sub> =25V		I <sub>R</sub>	2	μА
Typical Junction Capacitance (Note 1)		C <sub>J</sub>	10	pF
Typical Reverse Recovery (Note 2)		t <sub>rr</sub>	10	ns
Typical Thermal Resistance		R <sub>eJA</sub>	430	°C / W
Storage Temperature Range		T <sub>STG</sub>	-55 to +150	°C
Operating Junction Temperature Range		T <sub>J</sub>	-55 to +125	°C

#### NOTE:

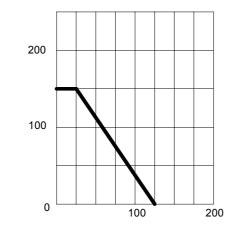
- 1. CJ at VR=0, f=1MHZ
- 2. From I==50mA to IR=200mA, RL=100 $\Omega$



Ptot-Power (mW)

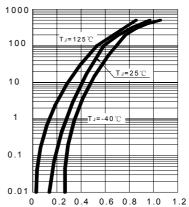
#### **RATING AND CHARACTERISTIC CURVES**

# FIG.1 -- ADMISSIBLE POWER DISSIPATION VS. AMBIENT TEMPERATURE



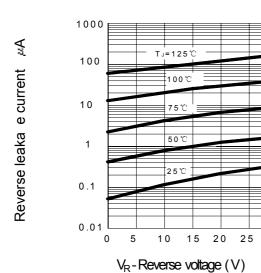
# FIG. 2-TYPICAL INSTANTANEOUS FORWORD CHARACTERISTICS



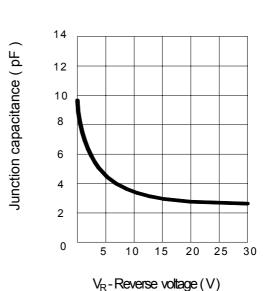


 $V_F$ -Forward Voltage (V)

#### FIG. 3 - TYPICAL REVERSE CHARACTERISTICS

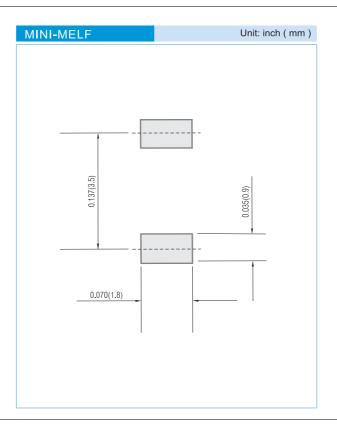


#### FIG.4 - TYPICAL JUNCTION CAPACITANCE





#### **MOUNTING PAD LAYOUT**



#### **ORDER INFORMATION**

• Packing information

T/R - 10K per 13" plastic Reel

T/R - 2.5K per 7" plastic Reel



### Part No\_packing code\_Version

BAS85\_R1\_10001 BAS85\_R2\_10001

## For example :



Packing Code XX					Version Code XXXXX		
Packing type	1 <sup>st</sup> Code	Packing size code	2 <sup>nd</sup> Code	HF or RoHS	1 <sup>st</sup> Code	2 <sup>nd</sup> ~5 <sup>th</sup> Code	
Tape and Ammunition Box (T/B)	Α	N/A	0	HF	0	serial number	
Tape and Reel (T/R)	R	7"	1	RoHS	1	serial number	
Bulk Packing (B/P)	В	13"	2				
Tube Packing (T/P)	Т	26mm	х				
Tape and Reel (Right Oriented) (TRR)	S	52mm	Y				
Tape and Reel (Left Oriented) (TRL)	L	PANASERT T/B CATHODE UP (PBCU)	U				
FORMING	F	PANASERT T/B CATHODE DOWN (PBCD)	D				



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