



Schottky Barrier Diode



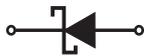
FEATURES

- Low forward voltage.
- Designed for mounting on small surface.
- Extremely thin package.
- Majority carrier conduction.

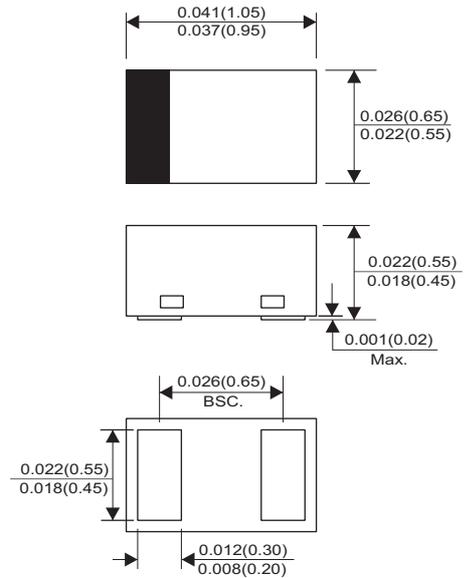
APPLICATIONS

- Case: DFN1006 standard package, molded plastic.
- Terminals: Gold plated, solderable per MIL-STD-750, method 2026.
- Polarity: Color band denotes cathode end.
- Mounting position: Any
- Weight: 0.001 grams(approx.).

CIRCUIT DIAGRAM



DFN1006



Dimensions in inches and (millimeter)

Maximum Ratings (at TA=25°C unless otherwise noted)

Parameter	Conditions	Symbol	Min.	Typ.	Max.	Unit
Reverse stand-off voltage		VRRM			30	V
DC reverse voltage		VR			30	V
Mean rectifying current		IO			500	mA
Peak forward surge current	8.3ms single half sine-wave superimposed on rate load, 1cycle (JEDEC method)	IFSM			3	A
Thermal resistance	Junction to ambient	REJA			250	°C/W
Total power dissipation	TA ≤ 25°C	PD			400	mW
Junction temperature range		TJ	-40		+125	°C
Storage temperature range		TSTG	-40		+125	°C

Electrical Characteristics (at TA=25°C unless otherwise noted)

Parameter	Conditions	Symbol	Min.	Typ.	Max.	Unit
Forward voltage	IF = 10mA	VF			0.25	V
	IF = 100mA				0.34	
	IF = 500mA				0.45	
Reverse current	VR = 30V, TA=25°C	IR		90	200	uA
Diode capacitance	VR = 1V, f=1MHz	CD		36		pF

DEVICE CHARACTERISTICS

B0530BS

Fig.1 - Forward Characteristics

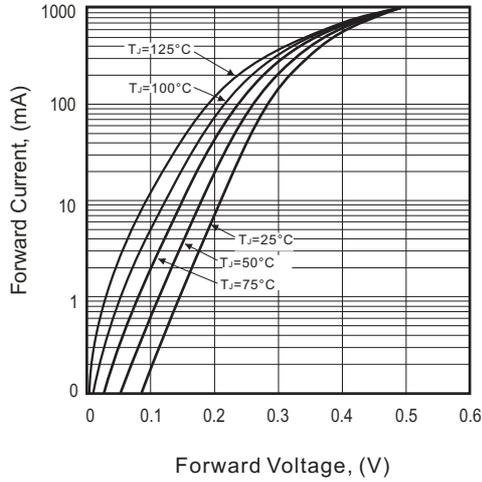


Fig.2 - Reverse Characteristics

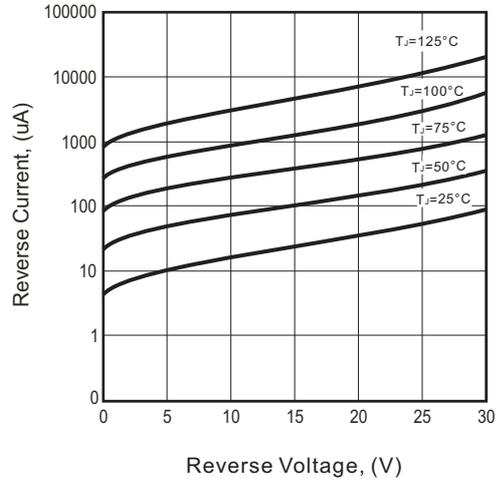


Fig.3 - Capacitance Characteristics

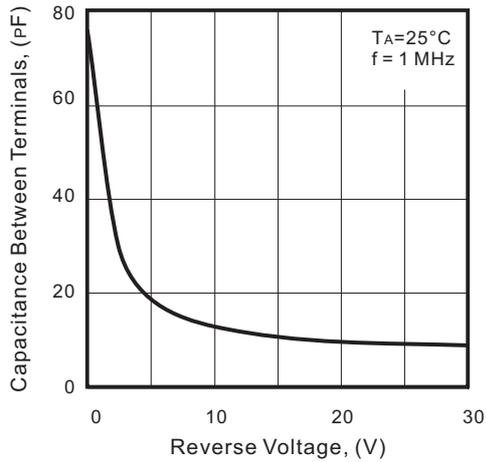


Fig.4 - Forward Current Derating Curve

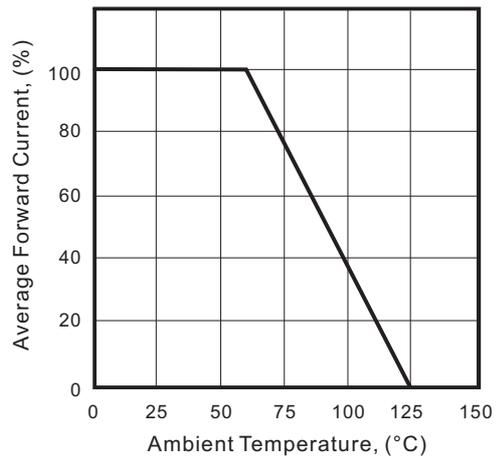
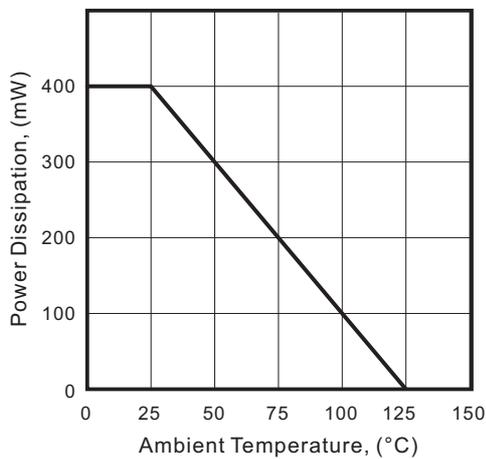


Fig.5 - Power Derating Curve



PACKAGE OUTLINE & DIMENSIONS

B0530BS

Marking Code

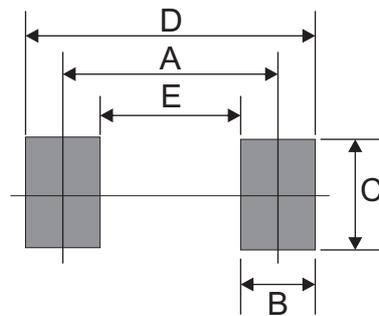
Part Number	Marking Code
B0530BS	BW



xx = Product type marking code

Suggested PAD Layout

SIZE	DFN1006	
	(mm)	(inch)
A	0.70	0.028
B	0.40	0.016
C	0.60	0.024
D	1.10	0.043
E	0.30	0.012



Standard Packaging

Case Type	REEL PACK	
	REEL (pcs)	Reel Size (inch)
DFN1006	5,000	7