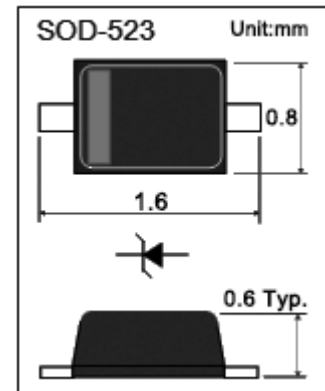


FAST SWITCHING DIODE / DATA SHEET

BAS516

- ◇ Fast switching devices
- ◇ **SOD523** Micro SMD package
- ◇ RoHS compliant / Green EMC
- ◇ Matte Tin (Sn) Lead finish
- ◇ Cathode Band / Device marking
- ◇ Surface Mount Package Ideally Suited for Automatic Insertion
- ◇ For General Purpose Switching Applications
- ◇ High Conductance



Device Marking Code	
BAS516	61

Maximum Ratings (Ta = 25 °C)

Symbol	Parameter	Value	Units
V_R	DC Reverse Voltage	75	V
I_F	Forward Current	250	mA
I_{FRM}	Repetitive Forward Current	500	mA
T_J	Junction Temperature	150	°C
T_{STG}	Storage Temperature	-55 to +150	°C

Electrical Characteristics (Ta = 25 °C)

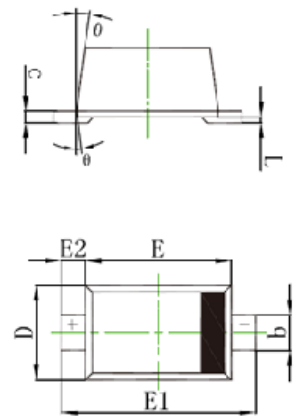
Symbol	Parameter	Conditions	Min	Max	Units
V_R	Reverse Voltage	$I_R = 100\mu A$,	75		V
V_F	Forward Voltage	$I_F = 1mA$		0.715	V
		$I_F = 10mA$		0.855	V
		$I_F = 50mA$		1.0	V
		$I_F = 150mA$		1.25	V
I_R	Reverse current	$V_R = 25V$		30	nA
		$V_R = 75V$		1	μA
C_D	Diode Capacitance	$V_R = 0V, f = 1MHz$		2	pF
t_{rr}	Reverse Recovery Time	$I_F = I_R = 10mA$, $V_R = 0V, R_L = 100\Omega$		4	ns

Ordering Information

Device	Package	Shipping	Tape wide	Emboss pitch	Tape specification	Notes
BAS516	SOD523	Tape & Reel 8000pcs /7" Reel	8 mm	4 mm	Conductive	

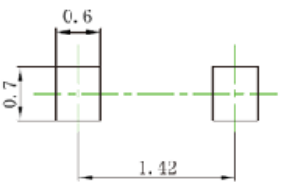
Package Dimensions

Package outline : SOD-523



Unit	A	A1	b	c	D	E	E1	E2	L	θ
Max.	0.77	0.70	0.35	0.15	0.85	1.30	1.70	0.20	0.07	7°
Min.	0.51	0.50	0.25	0.08	0.75	1.10	1.50	REF.	0.01	REF.

SOD523 Package Outline



End Pattern Recommendation

Note:

1. Halogen free,EMC
2. Pb free solder
3. Lead thickness includes solder plating
4. Lead frame: Cu
5. Other Tolerance: ± 0.05
6. Dimensions are exclusive of Burrs,Mold Flash and Tie Bar extrusions
7. Unit: mm