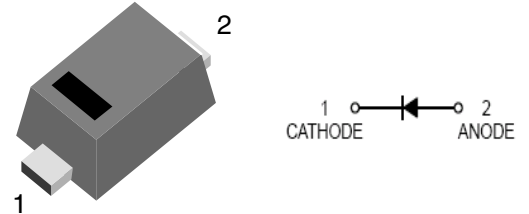


High Speed Switching Diode in SOD-523

Features

- Small surface mounting type
- High speed
- High reliability with high surge current handing capability



Mechanical Data

- **Case:** SOD-523 (plastic package).
Lead free; RoHS compliant
- **Molding Compound Flammability Rating:**
UL 94 V-0
- **Terminals:** High temperature soldering guaranteed:
260 °C/10 sec. at terminals

Applications

- High Speed Switching and Reverse Polarity Protection
- High Speed Rectifying Applications
- Consumer, Automotive and Telecommunication Industry

Absolute Maximum Ratings

Ratings at 25 °C, ambient temperature unless otherwise specified

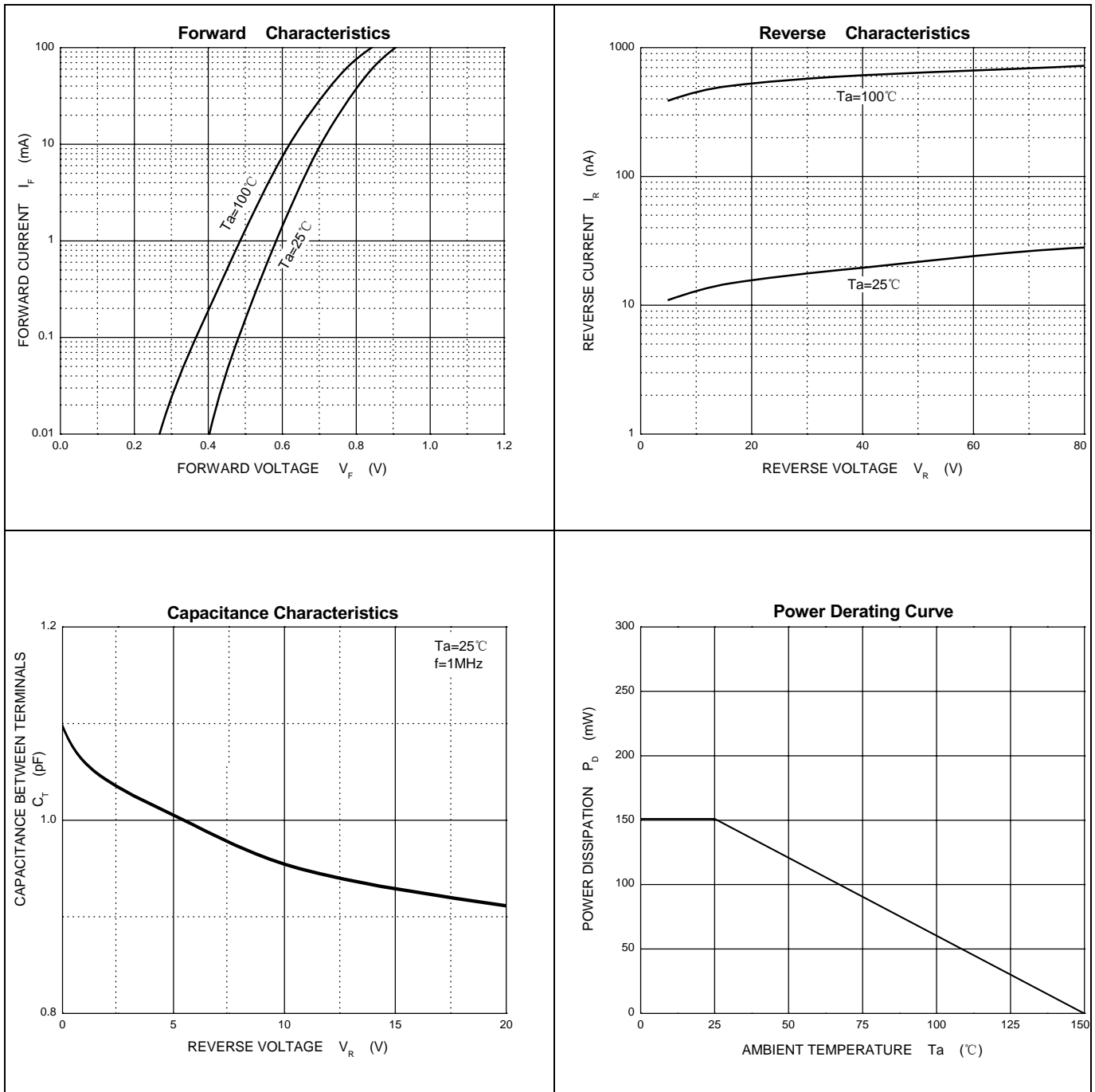
Symbol	Parameter	Value	Unit
V_{RRM}	Peak Repetitive Reverse Voltage	90	V
V_R	DC Blocking Voltage	80	
I_O	Continuous Forward Current	100	mA
I_{FSM}	Non-repetitive Peak Forward Surge Current@t=8.3ms	2.0	A
P_D	Power Dissipation	150	mW
$R_{\theta JA}$	Thermal Resistance from Junction to Ambient	883	°C/W
T_j	Junction Temperature	150	°C
T_{stg}	Storage Temperature	-55~+150	°C

Electrical Characteristics

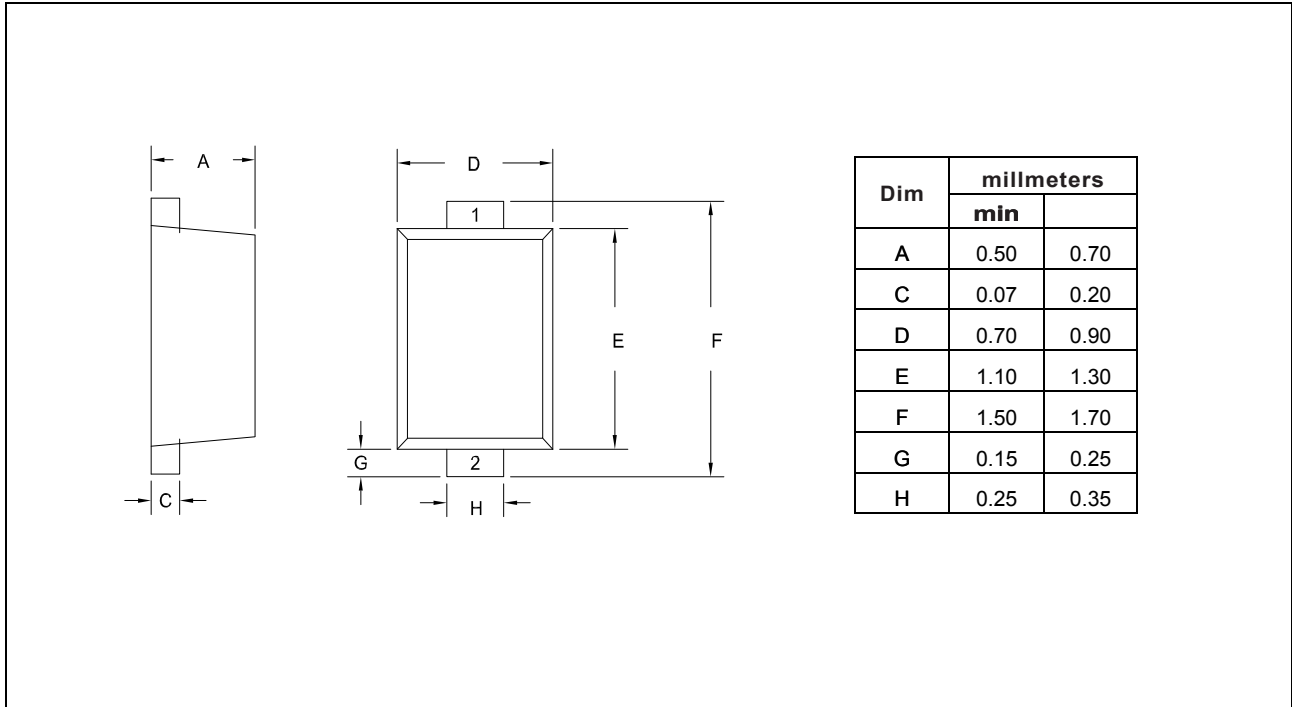
($T_A = 25\text{ °C}$ unless otherwise specified)

Parameter	Symbol	Min	Typ	Max	Unit	Conditions
Forward voltage	V_F			1.2	V	$I_F=100\text{mA}$
Reverse current	I_R			0.1	μA	$V_R=80\text{V}$
Capacitance between terminals	C_T			3	pF	$V_R=0.5\text{V}, f=1\text{MHz}$
Reverse recovery time	t_{rr}			4	ns	$I_F=10\text{mA}, V_R=6\text{V}, R_L=100\Omega$

Typical Characteristics ($T_{amb} = 25\text{ }^{\circ}\text{C}$ unless otherwise specified)



Package Dimensions



Marking



Ordering information

Order code	Package	Packaging option	Base quantity	Packaging specification
1SS400	SOD-523	Tape and reel	4000/8000pcs / reel	EIA STD RS-481

Revision history

Date	Revision	Changes
23-May-2012	1.0	Initial release

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