RB520S-30

Rev.A Aug.-2022

/ Descriptions

SOD-523

Schottky Diode in a SOD-523 Plastic Package.

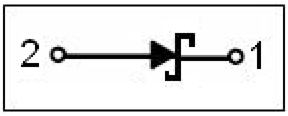
/ Features

Low forward voltage drop, HF Product.

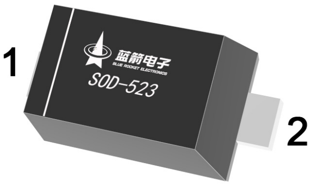
/ Applications

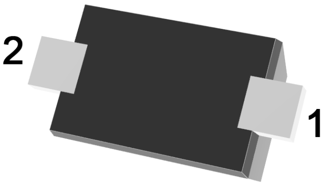
General purpose.

/ Equivalent Circuit



/ Pinning





PIN1: Cathode PIN2: Anode

/ Marking

Type number	Marking code
RB520S-30	B

/ Absolute Maximum Ratings(Ta=25)

Parameter	Symbol	Rating	Unit
Reverse Voltage	V_R	30	V
Forward Continuous Current	I_F	200	mA
Non-Repetitive Peak Forward Surge Current @t = 8.3ms	I_{FSM}	1	A
Power dissipation	P_D	200	mW
Junction Temperature	T_J	125	
Storage Temperature	T_{stg}	-55 to +125	

/ Electrical Characteristics(Ta=25)

Parameter	Symbol	Test Conditions	Rating			Unit
			Min	Typ	Max	
Reverse Breakdown Voltage	V_{BR}	I_R=500μA	30			V
Forward Voltage	V_F	I_F=200mA			0.60	V
Peak Reverse Current	I_R	V_R=10V			1.0	μA

/ Electrical Characteristic Curve

Fig.1 Power Derating Curve

Fig.2 Typical Instaneous Reverse Characteristics

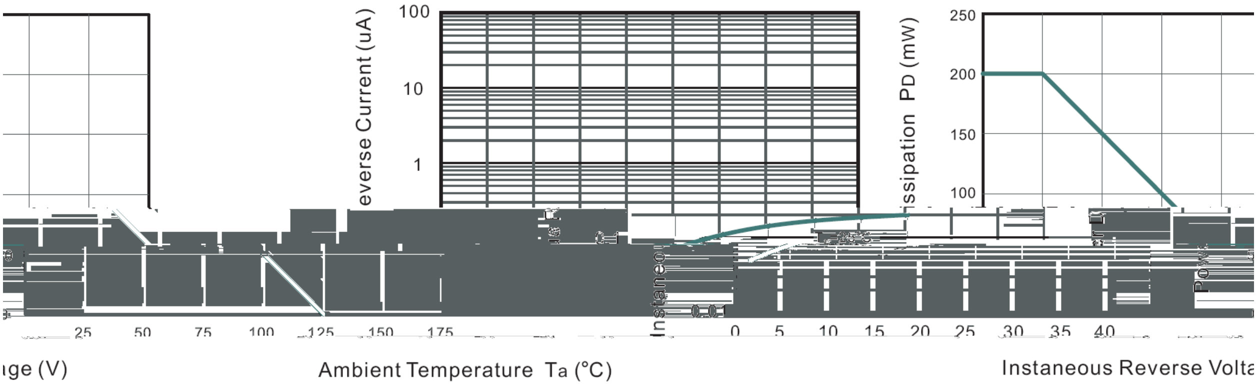
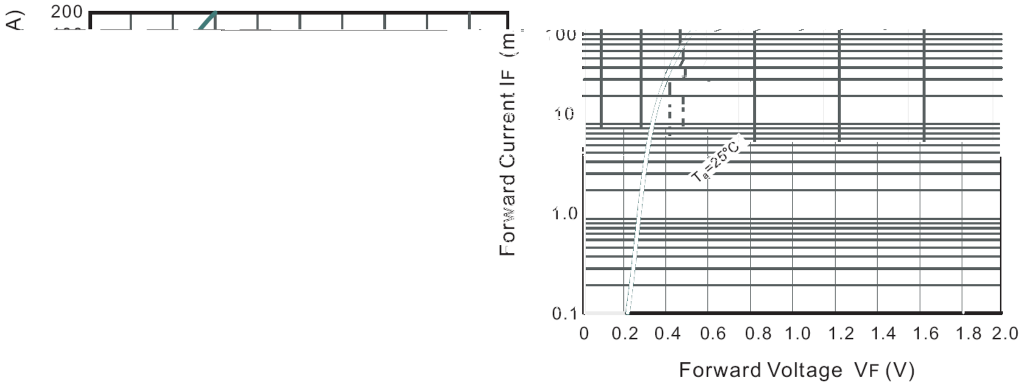
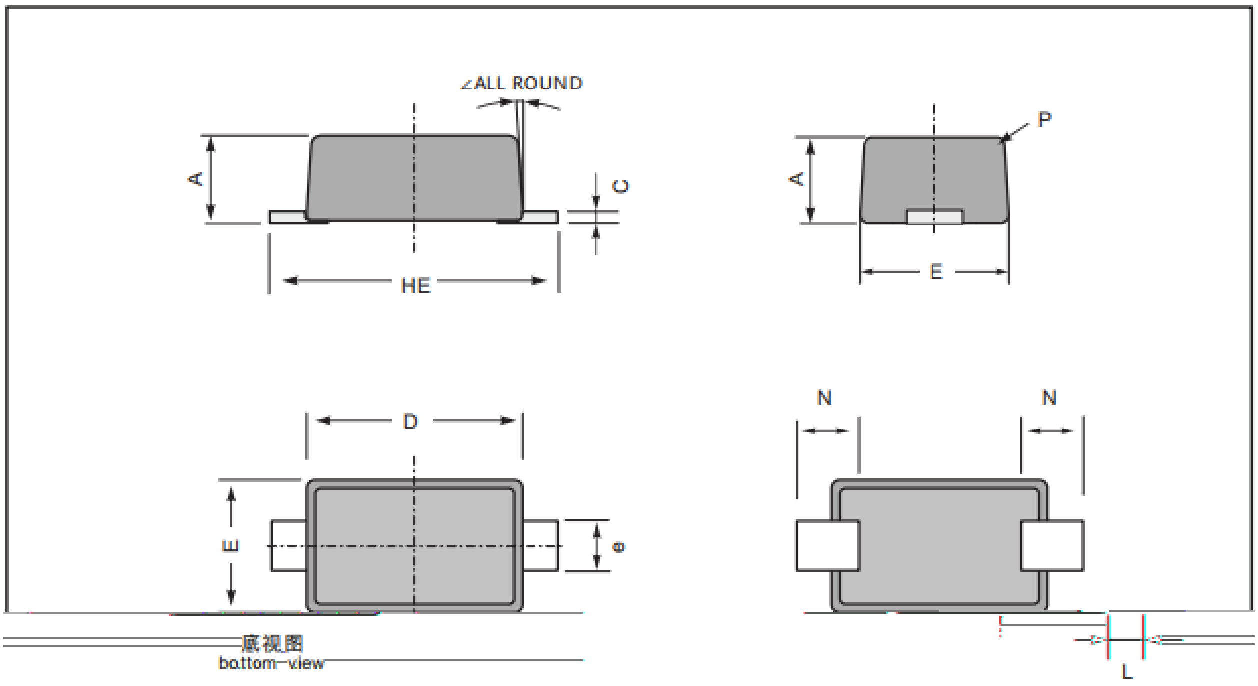


Fig.3 Typical Forward Characteristic



/ Package Dimensions

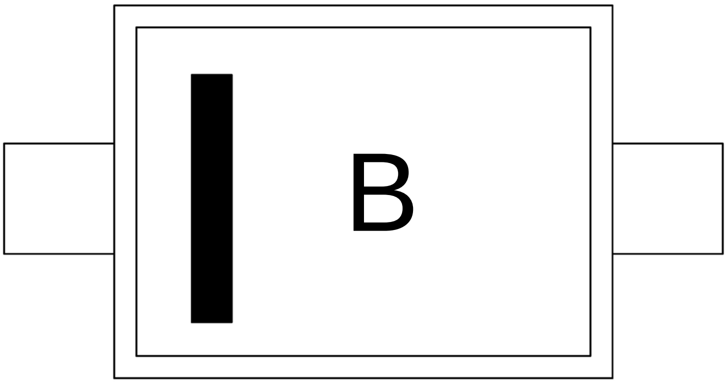
SOD-523



E	HE	N	[illegible]	P	∠
0.77	0.35	0.15	1.30	0.99	1.70
0.51	0.25	0.08	1.10	0.75	1.50
30	14	6	51	39	67
20	10	3	43	30	59

UNIT	[illegible]	A	e	C	D
0.35 ref	0.2 ref	R0.1 ALL ROUND	10° ±1°	mm	max min
14 ref	8.0 ref	R4.0 ALL ROUND		mil	max min

/ Marking Instructions

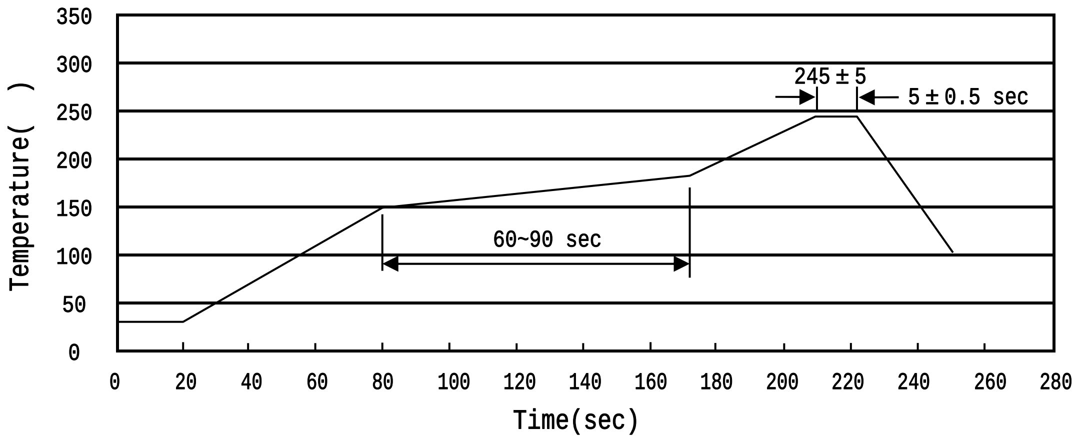


B

Note:

B :	Product Type

( ) / Temperature Profile for IR Reflow Soldering(Pb-Free)



1 150 180 60 90sec;
2 245±5 5±0.5sec;
3 2 10 /sec.

Note:
1.Preheating:150~180 , Time:60~90sec.
2.Peak Temp.:245±5 , Duration:5±0.5sec.
3. Cooling Speed: 2~10 /sec.

/ Resistance to Soldering Heat Test Conditions

260±5 10±1 sec.

Temp.:260±5 Time:10±1 sec

/ Packaging SPEC.

/ REEL

Package Type	Units					Dimension (unit mm^3)		
	Units/Reel /	Reels/Inner Box /	Units/Inner Box /	Inner Boxes/Outer Box /	Units/Outer Box /	Reel	Inner Box	Outer Box
SOD-523	3,000	10	30,000	6	180,000	7 ×8	180×120×180	390×385×205

/ Notices