UMW BV03C

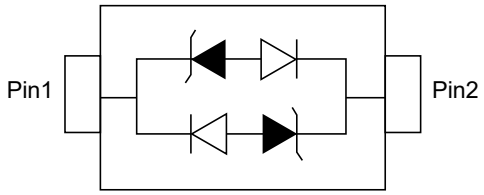
1.Features

- IEC 61000-4-2(ESD)±15KV(air), ±8KV(contact)
- 150Watts peak pulse power (tp=8/20μS)
- Ultra low capacitance: 1.5pF maximum
- Low clamping voltage
- Moisture sensitivity level： Level 1
- Weight 5.0 mg

2.Applications

- Ethernet
- xDSL secondary

3.Pinning information



SOD-323

4.Part Number and Electrical Parameter

Part Number	I_{DRM}@V_{DRM}		V_{BR}①@I_R		V_C@I_{PP}②		V_C@I_{PP}②		C_J③
	μA	V	V	mA	V	A	V	A	pF
	MAX		MIN		MAX		MAX		MAX
BV03C	20	3	4	1	5.15	1	13.9	8	1.5

Notes:

Absolute maximum ratings measured at T= 25ºC RH=45%-75% (unless otherwise noted).

① V_{BR} is measured at I_R=1mA.

② Surge Waveform: 8/20μs.

③ Off-state capacitance is measured in V_{DC}=0V,V_{RMS}=1V,f=1MHz.

5.Thermal Considerations

Parameter	Symbol	Value	Units
Junction Temperature Range	T_J	-55 to 150	°C
Storage Temperature Range	T_S	-55 to 150	°C

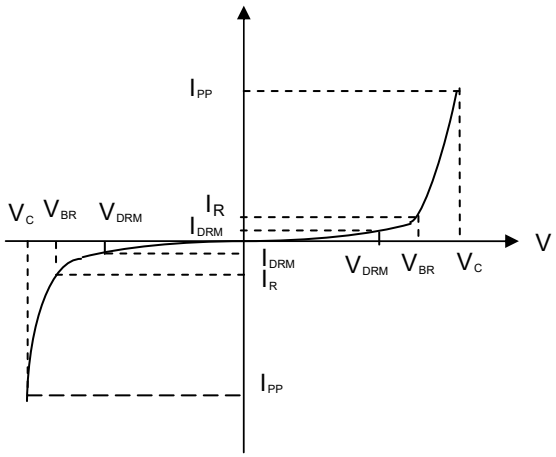
6.Environmental Characteristics

Parameter	Technical standards
High Temperature Reverse Bias Test	Temperature: 150±3°C Bias=80%, V_{DRM} Time:168H
High Temperature Life Test	Temperature: 150°C, Time:168H
High-low Temperature Cycle Test	Temperature:From -40°C, to125°C, Dwell time： 30min,10cycles
High Temperature &High Humidity Test	Temperature: 85°C Humidity:85%, Time:168H
Pressure Cooker Test	Temperature: 121°C, 2atm. Humidity:100% , Time:24H
Resistance of Soldering Heat	Temperature: 260±5°C, Time of dip soldering: 10s, 3times

Notes:

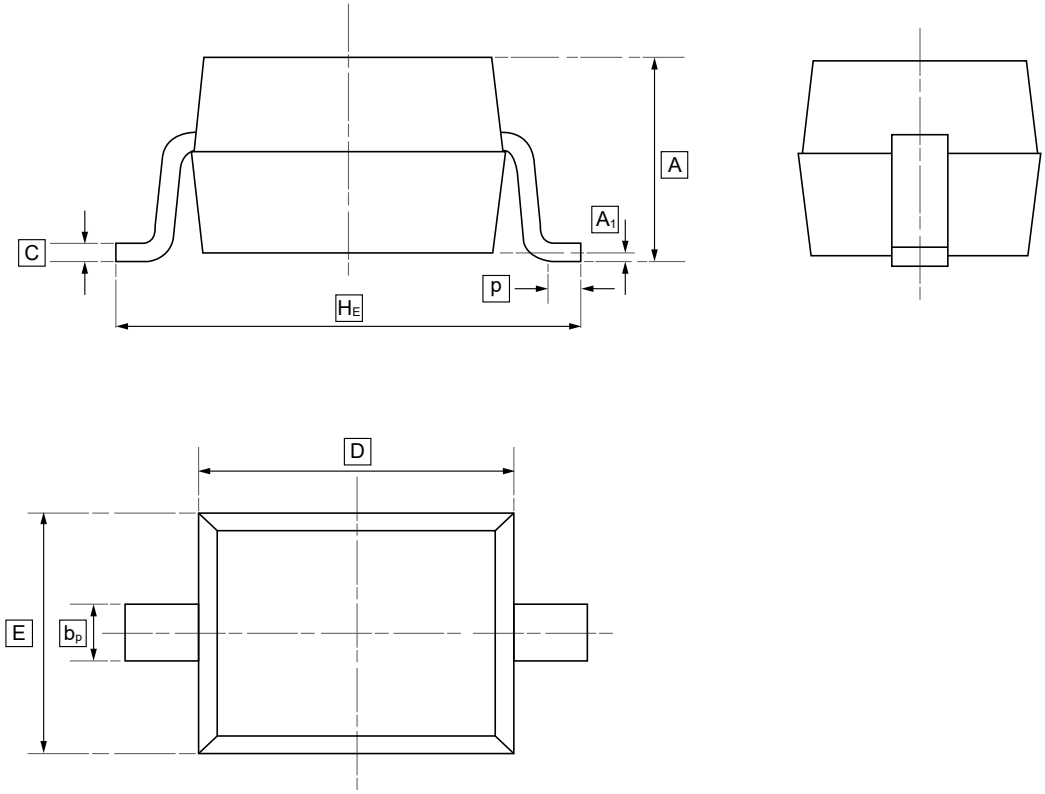
The above testing items can be specified by customer's special request.

7.Electrical Parameters (T_A=25°C unless otherwise noted)



Symbol	Parameter
V_C	Clamping Voltage
I_{PP}	Surge Waveform 8/20μs
V_{DRM}	Stand-off Voltage
V_{BR}	Breakdown Voltage
I_{DRM}	Reverse Leakage Current
I_R	Test Current
P_{PP}	Peak Pulse Power Dissipation

8.SOD-323 Package Outline Dimensions



DIMENSIONS (mm are the original dimensions)

Symbol	A	b_p	C	D	E	H_E	A_1	P
Min	0.90	0.25	0.10	1.60	1.15	2.30	0.01	0.20
Max	1.20	0.40	0.15	1.80	1.35	2.80	0.10	0.50

9.Ordering information

ww: Batch Code

Order Code	Package	Base QTY	Delivery Mode
UMW BV03C	SOD-323	3000	Tape and reel

10.Disclaimer

UMW reserves the right to make changes to all products, specifications. Customers should obtain the latest version of product documentation and verify the completeness and currency of the information before placing an order.

When applying our products, please do not exceed the maximum rated values, as this may affect the reliability of the entire system. Under certain conditions, any semiconductor product may experience faults or failures. Buyers are responsible for adhering to safety standards and implementing safety measures during system design, prototyping, and manufacturing when using our products to prevent potential failure risks that could lead to personal injury or property damage.

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