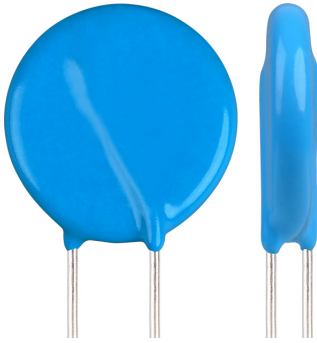


# Standard MOV Varistor

## Round, 25mm

**multicomp** PRO

**RoHS  
Compliant**



### Description

Metal Oxide Varistor (MOV) as one nonlinear resistance element is mainly made of zinc oxide (ZnO), which has very high surge capacity and big nonlinear coefficient. Below the threshold voltage, its resistance is very high, nearly no current flows through, but above the threshold voltage, the resistance reduces sharply, huge current can be discharged. Due to this characteristic, varistor as a protection component in electronic and electrical equipment can absorb abnormal over-voltage and lightning surge.

Varistor is with High Surge Current Density, Low Clamping Voltage, and Good Surge Capacity

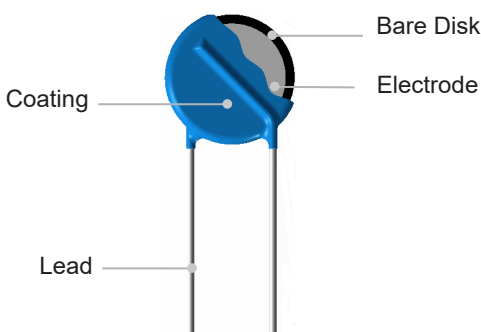
### Applications

- Power Supplies
- Home Electrical Appliances
- Industrial Devices
- Surge Protectors
- Telecom Devices

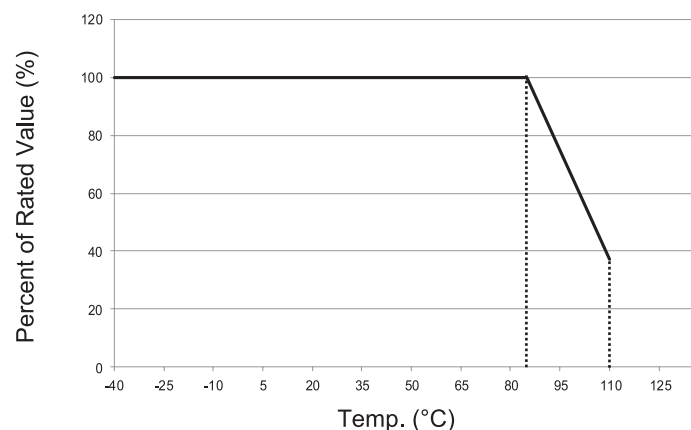
### Features

- Epoxy Resin Coating
- Silicone Resin Coating
- Low Leakage Current
- Bidirectional and Symmetrical V/I Characteristics
- Operating Temperature Range
- Low Temperature: -40°C
- High Temperature: +85°C to +105°C

### Product Structure



### Temp. Derating Curve



For Normal Temp. Series

Note:

When ambient Temp. exceeds 85°C, the peak surge current and energy rating should be reduced as shown in the left curve.

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Farnell.com/multicomp-pro  
sg.element14.com/b/multicomp-pro

**multicomp** PRO

# Standard MOV Varistor

## Round, 25mm

**multicomp** PRO

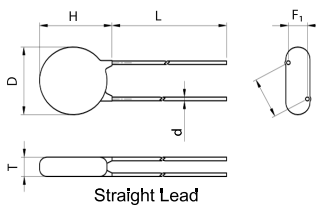
### General Technical Data

Item	Value	Unit
Operating Temperature	-40 to +85	°C
Storage Temperature	-40 to +125	°C
Voltage Proof	≥2500	Vac
Insulation Resistance	≥100	MΩ

### Dimensions

Model	L (Min.)	H (Max.)	T (Max.)	D (Max.)	d	F	F <sub>1</sub>	A (Max.)
MPV25D102KNK	20	32	10.5	28	1.2 ±0.05	10 ±0.6	6.1 - 8.1	35
MPV25D821KNK			9.4				5 - 7	

### Diagram



### Specification

Model	Max. Continuous Operating Voltage		Varistor Voltage @1 mA DC		Clamping Voltage (Max.)		Max. Discharge Current (8/20 μs)		Max. Energy (10/1000 μs)	Typical Capacitance (For reference only) @1 kHz	Agency Approvals			
	Vac	Vdc	Min.	Max.	VC	IP	I <sub>n</sub>	I <sub>max</sub>	(J)	(pF)				
	(V)	(V)	(V)	(V)	(V)	(V)	(kA)				UL	cUL	TUV	CQC
MPV25D102KNK	625	825	900	1100	1650	150	10	20	690	660	•	•	•	•
MPV25D821KNK	510	670	738	902	1355				520	830	•	•	•	•

● : Approved    ○ : Unauthorized

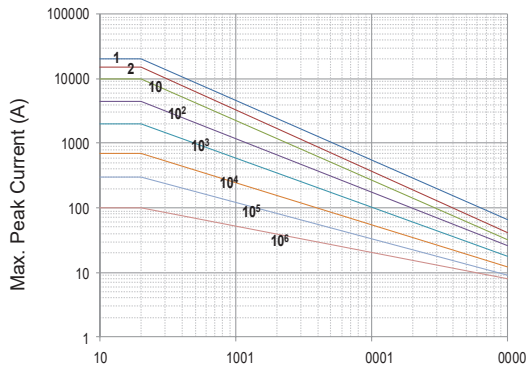
# Standard MOV Varistor

## Round, 25mm

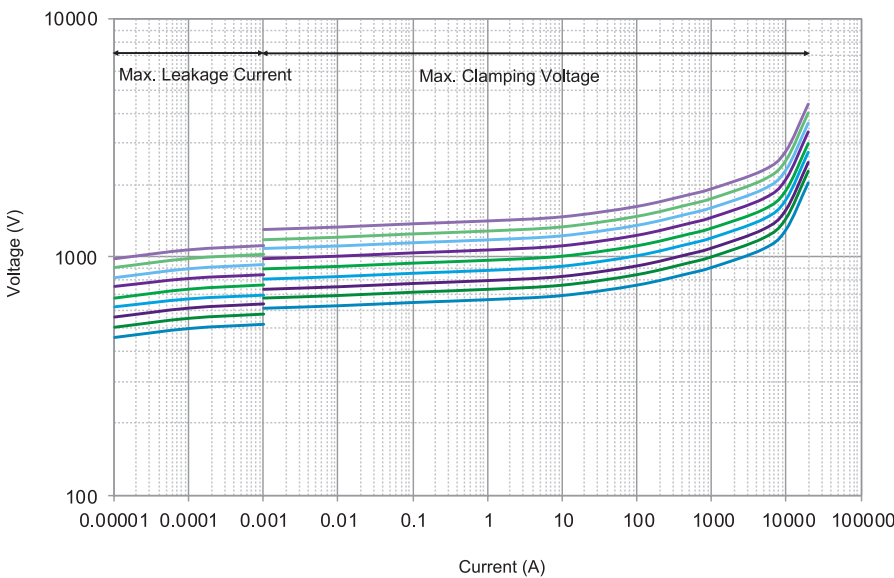


### Performance Curve

Max. Peak Current Derating Curves



Impulse Duration (µs)



### Part Number Table

Description	Part Number
Varistor, 1000V	MPV25D102KNK
Varistor, 820V	MPV25D821KNK

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