



Main Feature

1. 10A slim type relay for various applications.
2. 6mm insulation distance with Surge Strength 7,000V.
3. Double Insulation construction for high reliability.
4. UL Class F insulation available.
5. TV-5 120VAC certified.
6. Halogen Free series available.
7. Comply with RoHS and REACH regulations



Contact Rating

Load Type	SMIT (DMR/LMR)
Rated Load (Resistive)	10A 250 VAC
	10A 30VDC
Contact Capacity	TV-5 120VAC
Rated Carrying Current	10A
Max. Allowable Voltage	AC 250V
	DC 110V
Max. Allowable Current	10A
Max. Allowable Power Force	1250VA
	300W
Contact Material	Ag Alloy
Contact Form	SPST

Application

Industrial Control Units, Air Conditioners and Consumer Equipment use...etc.

Performance (at Initial Value)

- Contact Resistance 100mΩ Max. @1A,6VDC
- Operate Time..... 15 mSec. Max.
- Release Time 10 mSec. Max.
- Dielectric Strength:
 - Between Coil & Contact..... 4,000VAC at 50/60 Hz for one minute
 - Between Contacts 900VAC at 50/60 Hz for one minute
- Surge Strength..... 7,000 V (between Coil & Contact 1.2x50μSec.)
- Insulation Resistance 100 MegaΩ Min. at 500VDC
- Max. On/Off Switching:
 - Electrical 20 Cycles per Minute
 - Mechanical 300 Cycles per Minute
- Temperature Range..... -40~+70°C
- Humidity Range 45~85% RH.
- Coil Temperature Rise..... 40°C Max.

- Vibration:
 - Endurance.....10 to 55 Hz dual amplitude width 1.5mm
 - Error Operation 10 to 55 Hz dual amplitude width 1.5mm
- Shock:
 - Endurance1,000 m/S²
 - Error Operation100 m/S²
- Life Expectancy:
 - Mechanical10⁷ Operations at No Load condition
 - Electrical10⁵ Operations at Rated Resistive Load
 - TV Rated Load
- Weight.....About 10.2 g

Safety Standard & File Number

- UL & C-UL.....E141060
- TÜV.....R09854437
- CQC.....09002037101

Coil Specification (at 20°C)

Coil Sensitivity	Nominal Voltage (VDC)	Nominal Current (mA)	Coil Resistance ($\Omega \pm 10\%$)	Power Consumption (W)	Pull-In Voltage (VDC)	Drop-Out Voltage (VDC)	Maximum Allowable Voltage (VDC)
SMIT-DMR	3	176.5	17	Abt. 0.54	80% Maximum	5% Minimum	120%
	5	106.4	47				
	6	88	68				
	9	58	155				
	12	44.4	270				
	24	21.8	1,100				
SMIT-LMR	3	83	36	Abt. 0.25	80% Maximum	5% Minimum	120%
	5	50	100				
	6	42	144				
	9	28	325				
	12	21	580				
	24	10.4	2,300				

Ordering Information

SMIT - SS - 1 12 D M R F

Insulation System:

Nil: Standard Class
F: Class F

Contact Rating:

R: 10A/250VAC

Contact Form:

M: One Form A

Coil Type:

D: Standard DC Coil
L: High DC Coil

Coil Voltage: 03: 3V, 05: 5V, 06: 6V, 09: 9V, 12: 12V, 24: 24V, 48: 48V

Number of Pole:

1: One Pole

Type of Sealing:

SS: RT II Flux Proofed

SH: RT III Wash Tight

Type:

SMIT

Classification

Model	SMIT	
Coil Sensitivity	Standard DC Coil	High DC Coil
Contact Form	DMR	LMR
Flux Proofed	SMIT-SS-1□□DMR	SMIT-SS-1□□LMR
Wash Tight	SMIT-SH-1□□DMR	SMIT-SH-1□□LMR

Dimension ($\leq 5\text{mm} \pm 0.2\text{mm}$, $> 5\text{mm} \pm 0.3\text{mm}$, the tolerance of PCB thru hole: $+0.1\text{mm}$)

