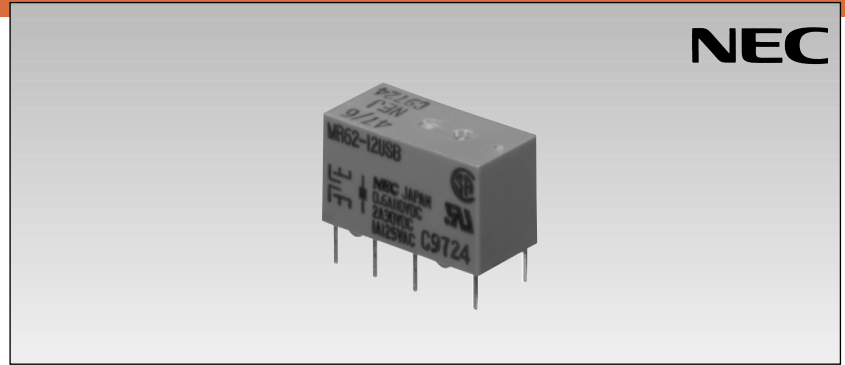# IMO

DPDT Signal Relay

MR62/47

NEC

- DIL package
- BT type 47 approved
- 1500V FCC surge between coil and contacts and adjacent contacts
- Fully sealed for immersion cleaning
- Bifurcated crossbar contacts for high reliability
- UL/CSA approved

Part Numbers

Part Number	B.T. Type	Nominal Voltage (VDC) Range 80% - 125% at 20°c	Coil Resistance (Ω) ±10% at 20°c	Test Operate Current (mA) at 20°c	Limit Circuit Current (mA) at 20°c
MR62-4.5USB	47/5	4.5	36	80	112
MR62-9USB	47/9	9	200	32.5	45.5
MR62-12USB	47/6	12	280	27	38
MR62-24USB	47/7	24	1,050	14	20
MR62-48USB	47/8	48	4,000	7	10

Specifications

| Contact form		2 Form C	
Contact rating	Maximum switching power	60W	125 VA
	Maximum switching voltage	220 VDC	250 VAC
	Maximum switching current	2A	2A
	Maximum carrying current	3A	3A
Initial contact resistance		50m Ω Max.	
Contact material		Silver alloy with gold overlay	
Nominal operating power		Approx. 550mW (at 25˚C, 77˚F)	
Operate time (excluding bounce)		Approx. 3ms	
Release time (excluding bounce)		Approx. 2ms	
Insulation resistance		1,000 MΩ at 500 VDC	
Breakdown voltage	Between open contacts	500 VAC (for 1 minute)	
	Between adjacent contacts	1000 VAC (for 1 minute)	
	Between coil and contacts	1000 VAC (for 1 minute)	
Coil temperature rise		40˚C (at nominal coil voltage)	
Shock resistance – ½ sine 11mS – MIL 202E-213B		30 G (misoperating)	
Vibration resistance – 10-500Hz Amp. 1.5mm – MIL 202E-204C		100 G (misoperating)	
Electrostatic capacitance	Between open contacts	Approx. 2pF	
	Between adjacent contacts	Approx. 2pF	
	Between coil and contacts	Approx. 3pF	
Ambient temperature		-40˚C to +70˚C	
Life expectancy	Mechanical	1 x 10^7 operations	
	Electrical	1 x 10^6 operations (at 24 VDC, 1A resistive)	
		3 x 10^6 operations (at 24 VDC, 0.5A resistive)	
Weight		Approx. 5 grams	

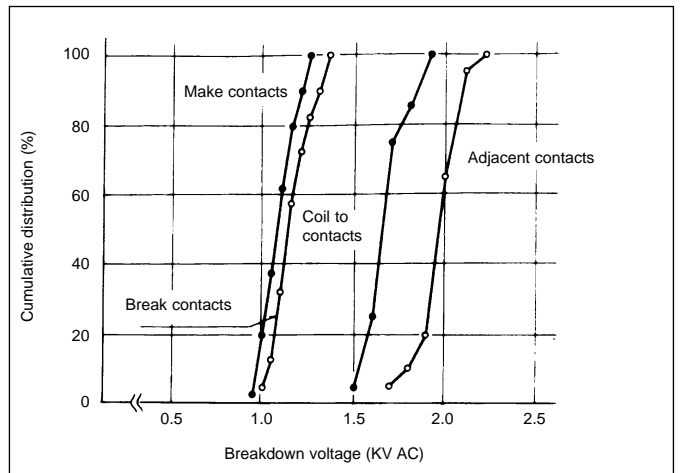## Dimensions mm (inch)
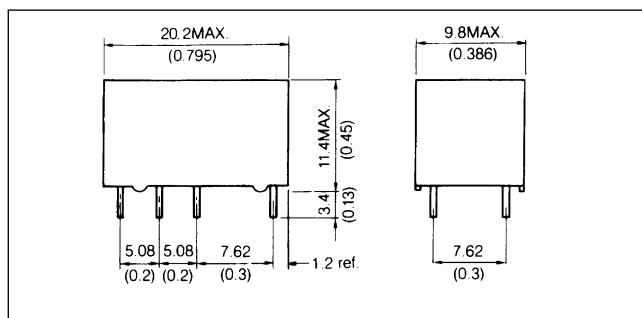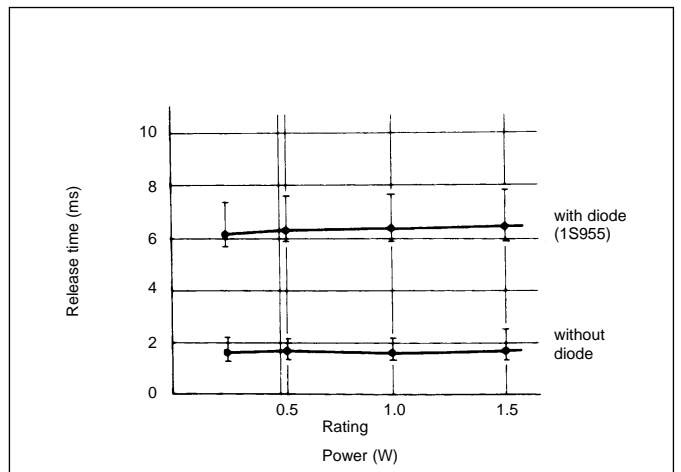

PCB Layout and Schematics
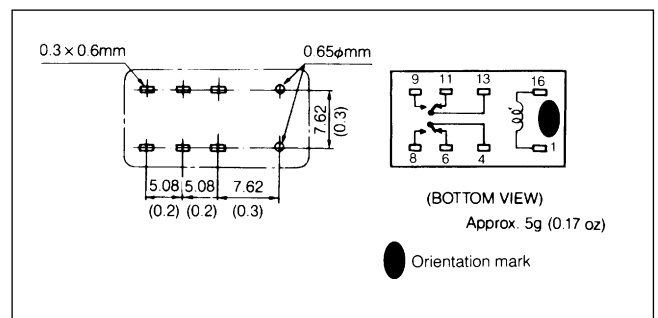
Data

Coil Temperature Rise
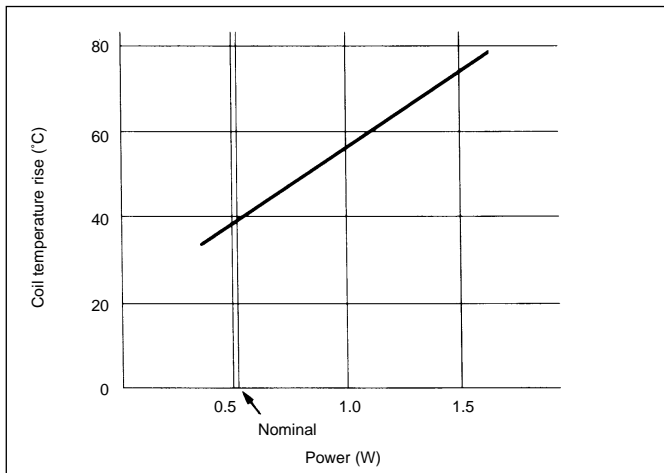
Breakdown Voltage

Operate Time
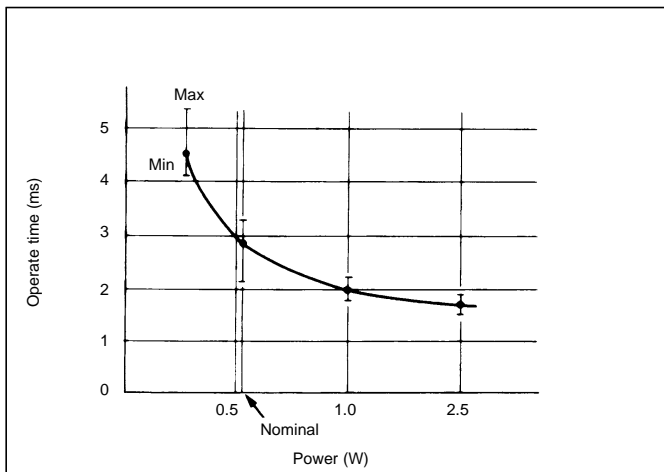
Release Time

Electrical Life Test

24 VDC, 0.5A Resistive at 25˚C

Electrical Life Test

24 VDC, 1A Resistive at 25˚C