

- Double pole heavy duty power relay
- Up to 30A switching capacity
- Fast-on 6.35 x 0.8mm Terminals
- Optional PCB mounting
- 8mm creepage distance
- 4kV dielectric strength between coil and contacts
- UL Class F insulation system

ROHS  
Compliant ✓

## Contacts

Contact arrangement	DPST-NO, DPDT
Contact material	Ag alloy
Rated load	AC1, DC1 NO:30A 277VAC, 30VDC/ NC:3A 277VAC, 30VDC
Max. switching voltage	AC 277V
Max. switching current	30A
Max. switching power	AC 8,310VA
Initial contact resistance	50mΩ max (24VDC, 1A)

## Coil

Nominal voltage	5V ... 110VDC / 24V ... 277VAC
Must operate voltage	max. DC: 75% of nominal / AC: 80% of nominal
Must release voltage	DC: 10% of nominal / AC: 20% of nominal
Rated power consumption	DC: 1.7W / AC: 4VA

## Insulation

Insulation resistance	min.	1000MΩ (at 500VDC)
Dielectric strength	coil to contact	4000VAC (50/60Hz for 1 min)
	between open contacts	1500VAC (50/60Hz for 1 min)
	between contact poles	2000VAC (50/60Hz for 1 min)

## General Data

Operating time	max.	25ms
Release time	max.	25ms
Electrical life (resistive 6 cycles/min.)	ops.	1 x 10 <sup>5</sup> (NO: 30A, 250VAC / NC: 3A, 250VAC)
Mechanical life	ops.	5 x 10 <sup>6</sup> (no load)
Enclosure	UL 94V-0	Sealed: RT111 / Vented: RT11
Terminals		PCB or Fast-on quick connect terminals

## Environmental

Ambient temperature		DC: -40 to 85°C / AC: -40 to 65°C
Shock resistance	functional	100m/s <sup>2</sup> (100G)
	destructive	1000m/s <sup>2</sup> (1000G)
Vibration resistance	functional	10 to 55Hz., 1.65mm DA
	destructive	10 to 55Hz., 1.65mm DA
Ambient humidity	operating	5% to 85% RH
Dimensions	L x W x H	See Fig. 1
Weight	approx.	86g

## Ordering Code

D G 3 6 - 3 0 1 2 - S 6 - 1 0 2 4

### Series

### Contact Material

30: Ag alloy

### Contact arrangement

12: DPDT (2C/O)

22: DPST-NO (2N/O)

### Enclosure

3: Fully sealed (RT111) PCB

8: Vented cover (RT11)

S: Fully sealed (Panel mount)

### Terminations

2: Fast-on style 6.35 x 0.8mm for contacts, 4.75 x 0.8mm for coil

5: PCB pins

6: Fast-on style 6.35 x 0.8mm for contacts and coil

\*NB: Terminal codes 2 & 6 are panel mount only

Coil codes  
See tables 1,  
2 & 3

**DC Coil Data**
**Table 1**

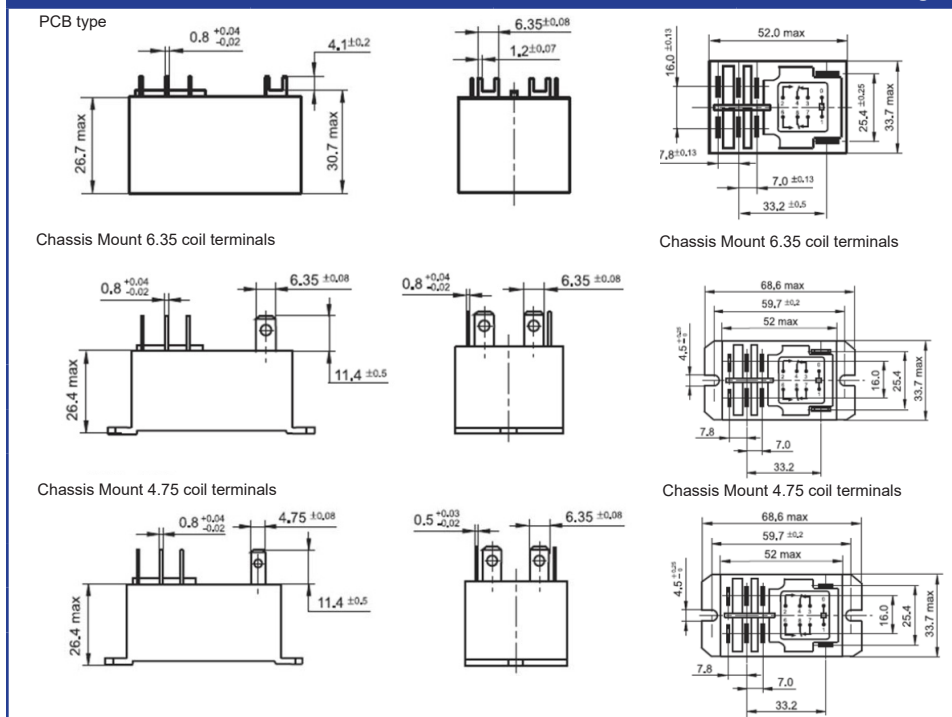
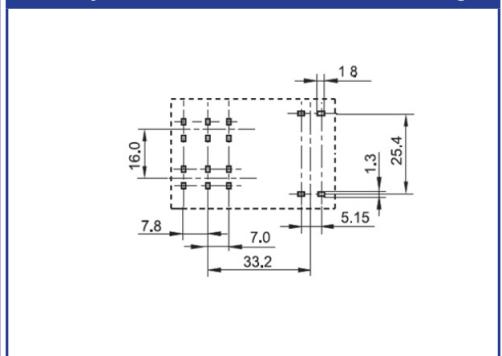
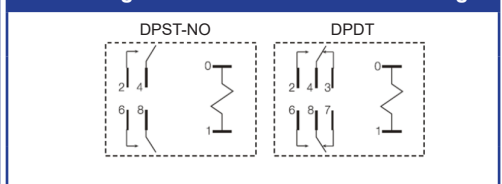
Coil code	Nominal voltage (VDC)	Coil resistance (Ω) ±10%	Must operate voltage Max. (VDC)	Max. allowable voltage (VDC)	Must release voltage min. (VDC)
1005	5	15.3	3.8	8.0	0.5
1006	6	22.0	4.5	9.6	0.6
1012	12	86.0	9.0	19.2	1.2
1024	24	350.0	18.0	38.4	2.4
1048	48	1390.0	36.0	76.8	4.8
1110	110	7255.0	82.5	176.0	11.0

**AC Coil Data 50Hz**
**Table 2**

Coil code	Nominal voltage (VAC)	Coil resistance (Ω) ±10%	Must operate voltage Max. (VAC)	Max. allowable voltage (VAC)	Must release voltage min. (VAC)
3024	24	45	19.2	26.4	4.8
3120	120	1125	96.0	132.0	24.0
3208	208	3278	166.4	229.0	41.6
3220	220	3800	176.0	242.0	44.0
3240	240	4500	192.0	264.0	48.0
3277	277	5960	221.6	305.0	55.4

**AC Coil Data 60Hz**
**Table 3**

Coil code	Nominal voltage (VAC)	Coil resistance (Ω) ±10%	Must operate voltage Max. (VAC)	Max allowable voltage (VAC)	Must release voltage min. (VAC)
6024	24	35.7	19.2	26.4	4.8
6120	120	830	96.0	132.	24.0
6208	208	2600	166.4	229.0	41.6
6220	220	2870	176.0	242.0	44.0
6240	240	3800	192.0	264.0	48.0
6277	277	4700	221.6	305.0	55.4

**Dimensions**
**Fig. 1**

**PCB Layout**
**Fig. 2**

**Circuit Diagram**
**Fig. 3**

**Dimensions in mm**

≤1mm tolerance = ± 0.2mm  
 >1mm and ≥5mm tolerance = ± 0.3mm  
 >5mm, tolerance = ± 0.5mm