

GENERAL CONTROL RELAY

ETR RWH SERIES

■ FEATURES

- High switching current up to 15A in small size.
- Sugar-Cube relay suitable for various applications.
- UL, C-UL & TÜV safety standard approved.
- UL Class F insulation available.
- Highly adapt to harsh conditions with high temperature and vibration.
- Halogen Free series available.
- Comply with RoHS and REACH regulations.
- In accordance with IEC 60335-1 Glow Wire requirements for home appliances

■ SAFETY STANDARD

UL&CUL E141060 UL 508

Model	Load	Cycles
RWH	NO/NC (AgSnO ₂ contact) :	
	12A, 250Vac, 40°C, General Use	6K
	15A, 120Vac, 40°C, General Use	6K
	15A, 24Vdc, 40°C, L/R=0	6K
RWH**-1**DMF	NO (AgSnO ₂ contact) :	
	10A, 250Vac, 85°C, General Use	50K
	15A, 127Vac, 85°C, General Use	50K

TUV R09854380 IEC 61810-1

Model	Load	Cycles
RWH	NO/NC (AgSnO ₂ contact) :	
	10A, 277Vac, 70°C, cosφ=1	30K
	15A, 24Vdc, 55°C, L/R=0	10K
	12A, 250Vac, 70°C, cosφ=1	30K
	7A, 250Vac, 85°C, cosφ=1	100K
	7A, 28Vdc, 85°C, L/R=0	100K
RWH**-1**DM	NO (AgSnO ₂ contact) :	
	12A, 250Vac, 70°C, cosφ=1	30K
	10A, 277Vac, 70°C, cosφ=1	30K
	15A, 24Vdc, 55°C, L/R=0	50K
RWH**-1**DB	NC (AgSnO ₂ contact) :	
	10A, 277Vac, 70°C, cosφ=1	30K
	12A, 250Vac, 70°C, cosφ=1	30K
RWH**-1**DMI	NO (AgSnO ₂ In contact)	
	15A, 250Vac, 85°C, cosφ=0.75	20K

TUV R09854380 IEC 62368-1

Model	Load	Cycles
RWH**-1**DMI	NO (AgSnO ₂ In contact) :	
	15A, 250Vac, 85°C, cosφ=0.75	10K

TUV R09854380 IEC 60730-1

Model	Load	Cycles
RWH**-1**DMI	NO (AgSnO ₂ In contact) :	
	15A, 250Vac, 85°C, cosφ=0.75	10K



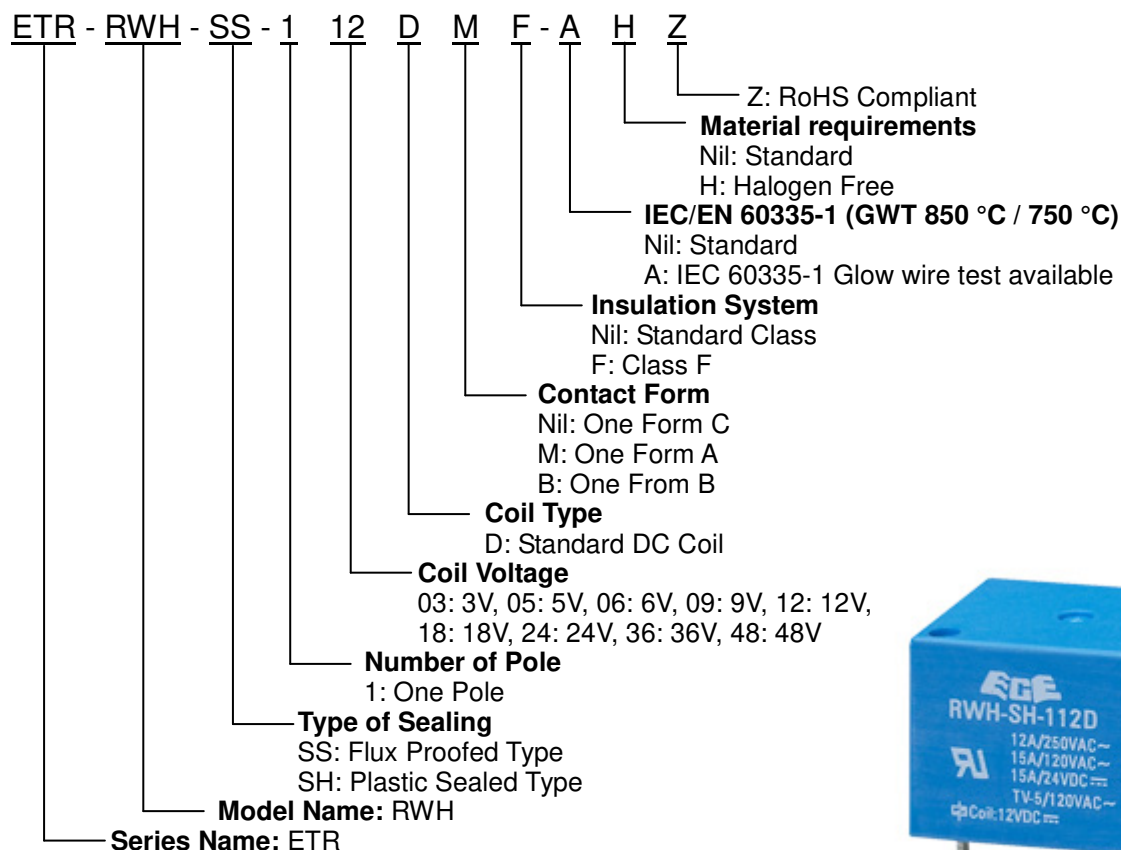
■ SPECIFICATIONS(AT INITIAL VALUE)

Contact Resistance	100 mΩ Max. @1A,6VDC
Operate Time	10 mSec. Max.
Release Time	5 mSec. Max.
Dielectric Strength	Between Coil & Contact: 1000VAC at 50/60Hz for one minute Between Contacts: 500VAC at 50/60Hz for one minute
Surge Strength	3,000V (between coil & contact 1.2x50μSec.)
Insulation Resistance	100MΩ Min. at 500VDC
Max. On/OFF Switching	Electrical: 6 Cycles per Minute Mechanical: 300 Cycles per Minute
Temperature Range	-30°C~+85°C
Humidity Range	45~85%RH
Coil Temperature Range	35°C Max.
Vibration	Destruction: 10 to 55 to 10 Hz, 0.75 mm single amplitude(1.5mm double amplitude) Malfunction: 10 to 55 to 10 Hz, 0.75 mm single amplitude(1.5mm double amplitude)
Shock	Destruction: 1,000 m/s ² Malfunction: 100 m/s ²
Mechanical Life	10 ⁷ operations at no load condition.
Weight	About 9g

■ COIL SPECIFICATION AT 20°C

Coil Sensitivity	Nominal Voltage (VDC)	Nominal Current (mA)	Coil Resistance (Ω±10%)	Power Consumption (W)	Pull-In Voltage (VDC)	Drop-Out Voltage (VDC)	Max. Allowable Voltage (VDC)
RWH	3	120	25	Abt. 0.36	75% Max.	5% Min.	130%
	5	71.4	70				
	6	60	100				
	9	40	225				
	12	30	400				
	18	20	900				
	24	15	1,600				
	36	10	3,600				
	48	7.5	6,400				

■ PART NUMBER SYSTEM



*Marking without: "ETR" & "Z".

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

