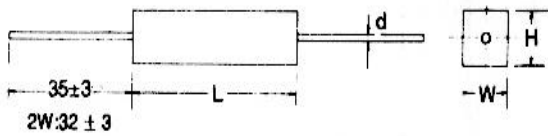


# FIXED WIRE WOUND RESISTORS (CEMENT TYPE)

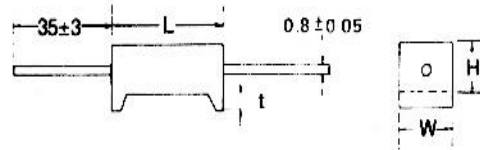
## Features:

- 1 Materials used are all non-inflammable. So that even if overcurrent flows, no self-ignition occurs, thus giving high safety.
- 2 Hermetically sealed. Sealed in a highly insulated box type cased with special cement.
- 3 Highly heat resistant and moisture resistant. High mechanical strength.
- 4 Can be mounted with high degree of safety. High heat radiation effect. Box type closely bonded to the chassis. Most suitable for printed wiring.
- 5 Use TH-SQZ , TH-SQH type according to the condition of the place where it is mounted and the way it is mounted.
- 6 Can be used as complying with safety standards, such as UL Standard. Electric Apparatus Control Law, etc ...

**SQP**



**SQT**



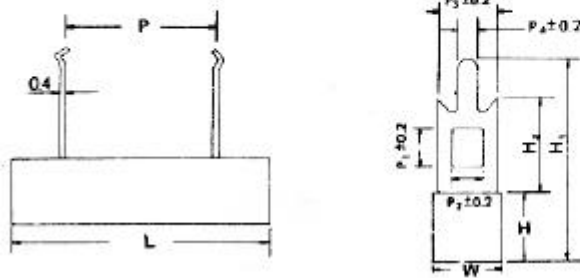
Type	Dimension (mm)				Resistance Range (Ω)			Max Working Voltage
	W±1	H±1	L±1.5	d±0.05	SQP	RS + SQP		
2W	7	7	18	0.65	0.1~82		15V	
3W	8	8	22	0.8	0.1~180	181~33K	350V	
5W	10	9	22	0.8	0.1~180	181~50K	350V	
7W	10	9	35	0.8	0.1~430	431~50K	500V	
10W	10	9	48	0.8	0.1~470	471~50K	750V	
15W	12.5	11.5	48	0.8	0.5~600	601~150K	1000V	
20W	14	13.5	60	0.8	0.5~1K	1.1K~150K	1000V	
25W	14	13.5	60	0.8	0.5~1K	1.1K~150K	1000V	

Type	Dimension (mm)				Resistance Range (Ω)
	W±1	H±1	L±1.5	t±0.5	
SQT					
5W	10	9	22	1.5	0.1~50K
7W	10	9	35	3.0	0.1~50K
10W	10	9	48	3.0	0.1~50K

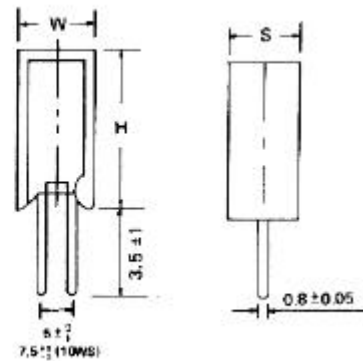
Note: Wirewound (SQT) & Metal Oxide Film (RS+ SQT) resistance-range detail same as SQP type

- Notes:
1. Max Overload Voltage is 2 times of Max Working Voltage.
  2. Too low or too high ohmic value can be supplied only case by case.
  3. Resistance Value under 0.5Ω, the tolerance shall be ±10%
  4. Max Working Voltage is fit for all SQ types

**SQZ**



**SQM**

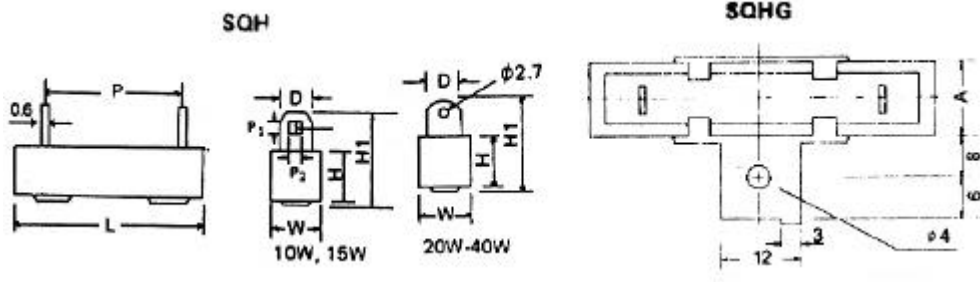


Type	Dimension (mm)										Resistance Range(Ω)	
	L±1.5	W±1	H±1	P±1.5	P1	P2	P3	P4	H1±1	H2±1	SQZ	RS + SQZ
5W	28(25)	10	10	15(9.5)	4.2	2	7	1.5	25	10.5	0.1~130	131~50K
7W	36	10	10	20	4.2	2	7	1.5	25	10.5	0.1~430	431~50K
10W	48	10	10	32	4.2	2	7	1.5	25	10.5	0.2~470	471~50K
15W	48	12.5	12	32	4.2	2	7	1.5	26	10.5	1~600	601~150K
20W	60	15	13	42	7	4	10	3	36	15.0	1~1K	1.1K~150K
25W	60	15	13	42	7	4	10	3	36	15.0	1~1K	1.1K~150K
30W	75	19	19	50	7	4	10	3	36	15.0	1~1K	
40W	75	19	19	50	7	4	10	3	36	15.0	1~1K	
50W	90	19	19	65	7	4	10	3	60	30	1~1K	

Type	Dimension (mm)			Resistance Range(Ω)	
	H±1.5	W±1	S±1	SQM	RS + SQM
2W	20	11	7	0.1~82	83Ω~10K
3W	25	12	8	0.1~180	181Ω~50K
5W	25	13	9	0.1~180	181Ω~50K
7W	39	13	9	0.1~430	431Ω~50K
10W	51	13	9	0.1~470	471Ω~75K
10WS	35	16	12	0.1~360	361Ω~100K

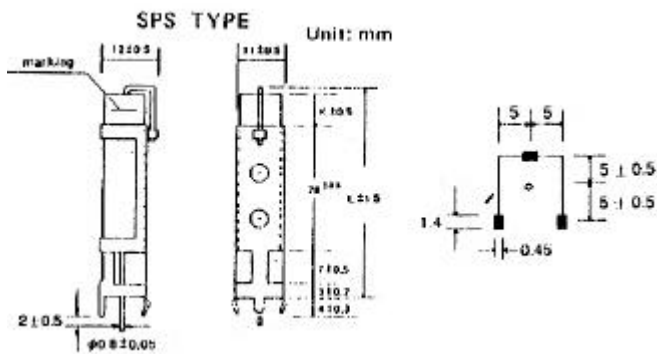
# FIXED WIRE WOUND RESISTORS

## (CEMENT TYPE)

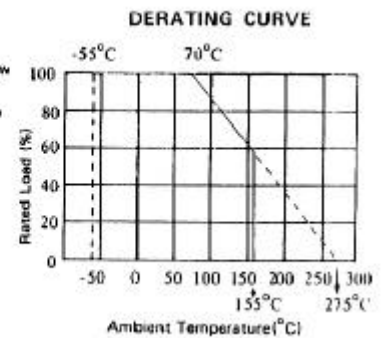
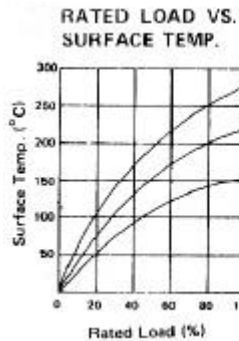


Type	Dimension (mm)									Resistance Range ( $\Omega$ )	
SQH	W $\pm$ 1	H $\pm$ 1	L $\pm$ 1.5	P	H1 $\pm$ 1	D $\pm$ 0.5	P1 $\pm$ 0.2	P2 $\pm$ 0.2	SQH	RS + SQH	
10W	10	10	48	32 $\pm$ 1	21	5	2.5	1.7	0.5~600	601~50K	
15W	12.5	12	48	32 $\pm$ 1	21	5	2.5	1.7	1~600	601~150K	
20W	14.5	13.5	60	42 $\pm$ 1	24	6	3.0	2.5	1~1K	1.1K~150K	
30W	19	19	75	55 $\pm$ 2	31	7.5			1~2K		
40W	19	19	90	67 $\pm$ 2	31	7.5			1~2K		

- Notes: 1. Max Overload Voltage is 2 times of Max Working Voltage.  
2. Too low or too high ohmic value can be supplied only case by case.



Type	Dimension (mm)		Resistance Range	
SPS	L $\pm$ 1.5	K $\pm$ 0.5	SPS	RS + SPS
7W	48	8.5	0.1~430	431~50K
10W	60	20	0.1~470	471~50K



## ELECTRICAL PERFORMANCE

Test Items	Condition	Spec.
Resistance Temp. Coeff.	-55°C ~ 155°C	$\pm$ 300ppm/°C
Short Time Over Load	10 times of rated wattage for 5 sec.	$\pm$ 2%
Rated Load	Rated wattage for 30 min.	$\pm$ 1%
Voltage Withstanding	1000V AC 1 min.	no change
Insulation Resistance	500V megger	1000M $\Omega$
Temp. Cycle	-30°C ~ 85°C for 5 cycles	$\pm$ 1%
Load Life	70°C on-off cycle 1000 hrs.	$\pm$ 5%
Moisture-proof Load Life	40°C 95% RH on-off cycle 1000 hrs.	$\pm$ 5%
Incombustibility	16 times of rated wattage for 5 min.	not flamed

- Notes: 1. Max Overload Voltage is 2 times of Max Working Voltage.  
2. Too low or too high ohmic value can be supplied only case by case  
3. "RS + SQ" short time over load is 5 times of rated wattage for 5 sec.