2W TO 25 WATT VERTICAL MOUNT RESISTORS

PV SERIES - 2 Terminal **PVH SERIES** - 4 Terminal **PWV SERIES - Bracket Mount**





- \square Industry's widest range! 1m Ω -1M, to ±.05% 10ppm!
- ☐ Built-in standoffs minimize heat transfer to P.C.B.
- ☐ Available on exclusive **SWIFT**TM delivery program!

OPTIONS

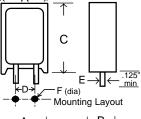
- ☐ Option X Non-Inductive
- ☐ Option WW or M (wirewound or film element)
- ☐ Option P Increased pulse capability
- ☐ Option FF- Fuse within 10S @50x rated W (custom avail)
- ☐ Option E Low thermal EMF design
- ☐ Option B Increased power (refer to chart below)
- □ Numerous modifications avail: custom marking, TC's to +6000ppm, various lead wire sizes, burn-in, etc.

Significant space savings compared to axial-lead types!

PV, PVH, and PWV resistors are designed for power applications where space is at a premium. The PV series offers lowest cost for medium power applications. PVH series are similar except in 4-terminal Kelvin design (to cancel lead wire effect). PWV bracketed resistors enable higher power levels and superior performance in applications involving shock and vibration. The ceramic construction is fireproof and resistant to moisture & solvents. The internal element is wirewound on lower values. power film on higher values (depending on options, e.g. opt. P parts are always WW). If a specific construction is preferred, specify opt.'WW' for wirewound, opt.'M' for power film (not available in all values).

SERIES	Wattage Std	Max.	Max.	Std Resis	Α	В	С	D	E	F
PV	(Opt.B)	Voltage*	Current*	Range	±.04 [1.0]	±.04 [1.0]	±.062 [1.6]	±.04 [1]	±.005[.12]	(Nom)
PV2	2W (3W)	80V	14A	$.005\Omega$ to 1M	.450 [11.4]	.300 [7.6]	.800 [20.3]	.197 [5]	.028 [.7]	.036 [.9]
PV3	3W (4W)	150V	17A	$.005\Omega$ to 1M	.475 [12.1]	.350 [8.9]	.980 [24.9]	.197 [5]	.031 [.8]	.040 [1]
PV5	5W (6W)	250V	22A	$.005\Omega$ to 1M	.500 [12.7]	.360 [9.2]	1.00 [25.4]	.197 [5]	.031 [.8]	.040 [1]
PV7	7W (10W)	350V	26A	$.005\Omega$ to 1M	.500 [12.7]	.400 [10]	1.52 [38.6]	.197 [5]	.031 [.8]	.040 [1]
PV10	10W (12W)	500V	32A	$.005\Omega$ to 1M	.500 [12.7]	.400 [10]	2.02 [51.3]	.197 [5]	.031 [.8]	.040 [1]
PV10S	10W (12W)	400V	32A	$.005\Omega$ to 1M	.625 [15.9]	.500 [12.7]	1.38 [38.6]	.290 [7.4	.036 [.9]	.048 [1.2]
PV10A	10W (12W)	400V	32A	$.005\Omega$ to 1M	.625 [15.9]	.500 [12.7]	1.38 [38.6]	.197 [5]	.036 [.9]	.048 [1.2]

F	Г.
(Nom)	
.036 [.9]	
.040 [1]	
.040 [1]	
.040 [1]	1 1
.040 [1]	
.048 [1.2]	
.048 [1.2]	-



В

SERIES PVH	Wattage Std (Opt.B)		Max Current* Std (Opt.B)		A ±.04 [1.0]	B ±.04 [1.0]	C ±.062 [1.6]	D ±.04 [1]	E ±.024[.6]	F ± .003" Std (Opt.B)
PVH2	2W (3W)	80V	14A (17A)	.001 Ω to 10K	.450 [11.4]	.300 [7.6]	.800 [20.3]	.197 [5]	.075 [1.91]	.032 (.040)
PVH3	3W (5W)	150V	17A (22A)	.001 Ω to 25K	.475 [12.1]	.350 [8.9]	.980 [24.9]	.197 [5]	.100 [2.54]	.032 (.040)
PVH5	5W (7W)	250V	22A (26A)	.001 Ω to 30K	.500 [12.7]	.400 [10]	1.00 [25.4]	.197 [5]	.100 [2.54]	.032 (.040)
PVH7	7W (10W)	350V	26A (32A)	.001 Ω to 50K	.500 [12.7]	.400 [10]	1.52 [38.6]	.197 [5]	.100 [2.54]	.032 (.040)
PVH10	10W (12W)	500V	32A (40A)	$.001\Omega$ to $250K$.500 [12.7]	.400 [10]	2.02 [51.3]	.197 [5]	.100 [2.54]	.032 (.040)
PVH10S	10W (12W)	400V	32A (40A)	.001 Ω to 250K	.625 [15.9]	.500 [12.7]	1.38 [38.6]	.290 [7.4]	.125 [3.18]	.032 (.040)
PVH10A	10W (12W)	400V	32A (40A)	$.001\Omega$ to $250K$.625 [15.9]	.500 [12.7]	1.38 [38.6]	.197 [5]	.125 [3.18]	.032 (.040)

\leftarrow A \rightarrow	ļ I	В	
	↑		
	С		
	 F		.125" _min_
E	040" (.048 opt.B) Mounting		t

SERIES PWV	Wattage	Max. Voltage*	Max Current*	Std Resis Range	A Max	B ±.04 [1.0]	C ±.04 [1.0]	D ±.02 [0.5]	E ±.06 [1.5]	F ±.06 [1.5]
PWV5	5	200V	22A	.01 Ω to 1M	1.40 [35.6]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV7	7	350V	26A	.01 Ω to 1M	1.86 [47.3]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV10	10	500V	32A	.01 Ω to 1M	2.46 [62.5]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV15	15	540V	32A	.01 Ω to 150K	2.46 [62.5]	.500 [12.7]	.530 [13.5]	.100 [2.5]	.265 [6.7]	.265 [6.7]
PWV20	20	600V	32A	.01 Ω to 150K	3.02 [76.7]	.500 [12.7]	.580 [14.7]	.100 [2.5]	.275 [7.0]	.295 [7.5]
PWV25	25	600V	32A	.01 Ω to 150K	3.02 [76.7]	.500 [12.7]	.580 [14.7]	.100 [2.5]	.275 [7.0]	.295 [7.5]

SERIES	Mottogo	iviax.	IVIAX	Sta Resis	A	В	_ C	ע ן		F
PWV	vvallage	Voltage*	Current*	Range	Max	±.04 [1.0]	±.04 [1.0]	±.02 [0.5]	±.06 [1.5]	±.06 [1.5]
PWV5	5	200V	22A	.01Ω to 1M	1.40 [35.6]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV7	7	350V	26A	.01Ω to 1M	1.86 [47.3]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV10	10	500V	32A	.01 Ω to 1M	2.46 [62.5]	.400 [10]	.400 [10]	.060 [1.5]	.200 [5]	.200 [5]
PWV15	15	540V	32A	.01 Ω to 150K	2.46 [62.5]	.500 [12.7]	.530 [13.5]	.100 [2.5]	.265 [6.7]	.265 [6.7]
PWV20	20	600V	32A	$.01\Omega$ to $150K$	3.02 [76.7]	.500 [12.7]	.580 [14.7]	.100 [2.5]	.275 [7.0]	.295 [7.5]
PWV25	25	600V	32A	.01 Ω to 150K	3.02 [76.7]	.500 [12.7]	.580 [14.7]	.100 [2.5]	.275 [7.0]	.295 [7.5]
* Unite no	* Units not to exceed watergo voltage or current rating whichever is less Voltage determined by E									

^{*} Units not to exceed wattage, voltage, or current rating, whichever is less. Voltage determined by E= YPR, E not to exvoltage rating. Multiply voltage rating by 0.7 for Opt. X. Increased voltage & current ratings available (up to 1KV, 100A).

Y Y 1VII	builting Layout
te to	05 .022"→ 125" min. ← B → ← D(3)
	dia. x.08" 5-15W, .05x.12" 20-25W (3)
*	ounting Layout

- <u>100</u>-J B

TYPICAL PERFORMANCE CHARACTERISTICS

THIOALI LIN ONMANOL CHARACTERIOTICS									
	Res. Range	PV & PW V Std (Best)	PVH Std (Best)						
	.0010049Ω	N/A	1200ppm (50ppm)						
_	$.0050099\Omega$	800ppm (50ppm)	600ppm (25ppm)						
Temp. Coef.	.01024Ω	600ppm (50ppm)	200ppm (25ppm)						
PPM/°C	$.025049\Omega$	500ppm (30ppm)	150ppm (25ppm)						
(25 ~100/°C)	$.05099\Omega$	400ppm (20ppm)	90ppm (10ppm)						
	.199Ω	350ppm (20ppm)	50ppm (10ppm)						
	1Ω & above	200ppm (10ppm)	20ppm (5ppm)						
Operating Temp	•	-55° to +220° C (275° C avail)							
Dielectric Streng	gth	1000V							
5 Sec. overload	(≤1.5x max V)	3X rated wattage (Opt. WW = 5X)							
Moisture Resista	ance	3.0%							
High Temp. Exp	osure	1.0%							
Load Life (1000	hours)	3.0%							
Opt X Inductanc	e (reduced	Opt.X ≤5W: ≤50Ω=.2uH max, >50Ω=.37uH max							
inductance level	s avail. to 67nH)	Opt. X ≥7W: ≤50Ω =.3uH max, >50Ω = .6umax							
Temperature Ris	se	125 to 220°C typ at full rated power							
Derating (W, V,	A)	Derate by .513%/°C above 25° C							

P/N DESIGNATION:

RCD Type

Options: X, WW, P, M, FF, E, B

(Leave blank if standard)

Resis.Code .05%-1%: 3 signif. figures & multiplier, e.g. R001=.001 Ω , R010=.01Ω, R100=.1Ω, 1R00=1Ω, 10R0=10Ω, 1000=100Ω, 1001=1K. Resis.Code 2%-10%: 2 signif. figures & multiplier, e.g. R001=.001Ω, R01=0.01Ω, R10=0.1Ω, 1R0=1Ω, 100=10Ω, 101=100Ω, 102=1K.

Tolerance: A=0.05%, B=0.1%, C=0.25%, D=0.5%,

F=1%, G=2%, J=5%(std), K=10% Packaging: B=bulk (standard)

Optional TC: 10=10ppm, 20=20ppm, 50=50ppm, 101=100ppm,

201=200ppm, etc. (leave blank if standard)

Termination: W= Lead-free, Q= Tin/Lead (leave blank if either is acceptable, in which case RCD will select based on lowest price and quickest delivery