



PRL Manual or Programmable High Power Resistance Decade Unit

2-2

Electrical Measurement

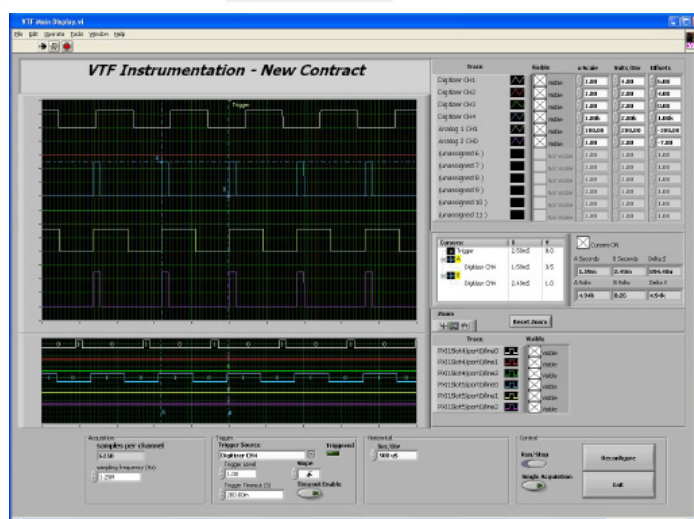
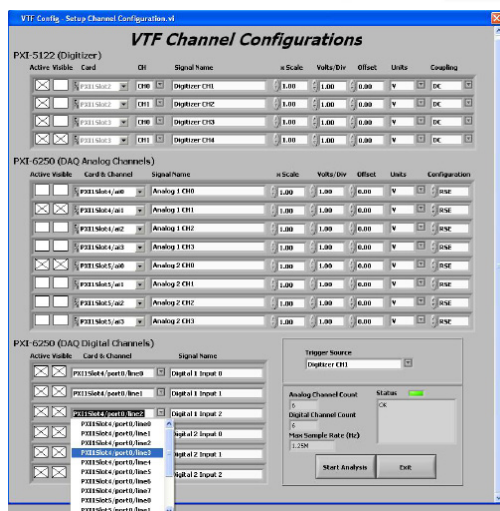
PRL is a precision high power resistance source with excellent characteristics of stability, temperature coefficient, and power coefficient. High dynamic ranges are available, starting as low as 0.5 Ω , and extending to as many as 3 decades.

Operation is both local using convenient direct-reading front panel thumbwheel switches, or remote with RS-232, or IEEE-488 or RS-485 interfaces.

AI's produces various kinds of Power Resistor unit which can be used for any AC or DC resistor load application. Those units are most commonly used for all laboratory, test, calibration, load banks, precision burn-in load and functional test applications.

Product Characteristics :

- Resistance Range 0.5 Ω to 20 k Ω
- Resistance Resolution 50 m Ω to 1 k Ω
- Wide choice: 2~3 decade units
- Accuracy: 0.25 or 0.5% or 1% or 5%
- Power Rating: 5 kw to 100 kw
- Voltage Rating: 1000V or higher
- Allowable temp rise: up to 375°C
- Dielectric Strength: AC1500V / 1 min
(3500V, 4500V, 6000V is available)
- Insulation Resistance : 20 M Ω min
- Special and custom configurations available





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Model:

Type	25°C Rated Power	Resistance Tolerance (± %)	Max Resistance	Resistance Setting Rate	Resistance Resolution Rate	Temperature Coefficient (±mΩ / °C) / Ω
PRL-20	20 kw	0.25	50-10k	1:25	1:1000	25
		0.5	5-10k	1:25	1:1000	50
		1	1-20k	1:50	1:100	100
		5	0.5-20k	1:50	1:20	100
PRL-40	40 kw	0.25	50-10k	1:25	1:1000	25
		0.5	5-10k	1:25	1:1000	50
		1	1-20k	1:50	1:100	100
		5	0.5-20k	1:50	1:20	100
PRL-60	60 kw	0.25	50-10k	1:25	1:1000	25
		0.5	5-10k	1:25	1:1000	50
		1	1-20k	1:50	1:100	100
		5	0.5-20k	1:50	1:20	100
PRL-80	80 kw	0.25	50-10k	1:25	1:1000	25
		0.5	5-10k	1:25	1:1000	50
		1	1-20k	1:50	1:100	100
		5	0.5-20k	1:50	1:20	100
PRL-100	100 kw	0.25	50-10k	1:25	1:1000	25
		0.5	5-10k	1:25	1:1000	50
		1	1-20k	1:50	1:100	100
		5	0.5-20k	1:50	1:20	100

Example:

Model: PRL-20, ± 0.5%, Max Resistance 200 Ω at 20kw

Resistance Setting Min $200/25 = 8 \Omega$ at 20kw

Resistance Setting Resolution $200/1000 = 0.2 \Omega$

