

Zero up programmable power supplies

Features

- ◆ Constant Voltage / Constant Current
- ◆ Last Setting Memory
- ◆ Digital Meters
- ◆ Built-in RS232 & RS485 Interface w/ GPIB optional
- ◆ Bench or Rack Mount
- ◆ Embedded Microprocessor Controller
- ◆ Voltage up to 120V, Current up to 132A



Key Market Segments & Applications



Specifications								
Model		ZUP6	ZUP10	ZUP20	ZUP36	ZUP60	ZUP80	ZUP120
Load Regulation	-	2mV + 0.005% over 0 - 100% load change						
Line Regulation	-	1mV + 0.005% over 85 - 132 or 170 - 265VAC line change						
Recovery Time (1)	ms	1ms	0.5ms	0.2ms				
Temperature Coefficient	-	30ppm/°C following 30 minute warm up						
Temperature Drift(2)	-	0.01% + 2mV change in output						
Up programming response time	ms	50 - 60ms					80ms	120ms
Down prog. resp. time (CV)	ms	50ms (70ms ZUP60-14)						
Down prog. resp. time (CV)	ms	250ms	350ms	400ms	500ms	750ms	600ms	800ms
Load Regulation	-	0.01% + 5mA on 200W and 400W models, 0.07% + 10mA on 800W models						
Line Regulation	-	0.01% + 2mA on 200W and 400W models, 0.01% + 5mA on 800W models						
Temperature Coefficient	-	100ppm/°C from rated current after 30 minute warm up time						
Temperature Drift(2)	-	0.02% + 5mA, 200W and 400W models, 0.05% + 10mA 800W models						
Prog Voltage resolution	-	Better than 0.028% of rated voltage						
Prog Voltage accuracy	mV	.02%+5mV	.02%+8mV	.02%+12mV	.02%+20mV	.02%+35mV	.02%+50mV	.02%+70mV
Prog Current resolution	-	Better than 0.03% of rated voltage						
Prog Current accuracy	-	0.4% + 40mA						
Overvoltage Shutdown	V	0 - 7.5	0 - 13	0 - 24	0 - 40	0 - 66	0 - 88	0 - 132
Thermal Protection	-	Over temperature protected						
Display - Voltage	-	3 digits (6, 20, 36, 60, 80V models), 3.5 digits (10, 120V models). Accuracy 0.2% ± 2 digits						
Display - Current	-	3 digits, (3.5 digits 132A model). Accuracy 0.5% ± 3 digits						
Display - Status	-	CV / CC, Alarm, Foldback, Local/Remote, On/Off						
Remote On/Off	-	TTL signal or dry contact relay						
Output Good	-	Open Collector						
Voltage & Current Programming	-	By either Voltage (0-4V) or Resistance (0-4k)						
Remote Sense	-	Up to 0.5V compensation per output cable						
Communication Interface	-	RS232 & RS485 standard, IEEE488 optional						
Series & Parallel Operation	-	Series: Up to two units; Parallel: Up to five units in master-slave configuration						
AC Input Voltage range	VAC	85-265VAC (47-63Hz)						
Inrush Current (100/200VAC)(3)	A	15/30A, 200W models, 15A, 400W models, 30A, 800W models						
Hold Up Time (Typ) at 100VAC	ms	20						
Power Factor Correction	-	Complies with EN61000-3 Class A (0.99 typ)						
Temperature Range	-	Operating: 0 - 50°C; Storage: -20 to +70°C						
Humidity (non condensing)	-	Operating: 30 - 90% RH, Storage 10 - 95%RH						
Cooling	-	Internal fan						
Withstand Voltage	-	Input to Ground 2kVAC, Input to Output 3kVAC, Output to Ground 500VAC for 1 min.						
Isolation Resistance	-	>100M at 25°C & 70%RH						
Vibration & Shock (non-op.)	-	Vibration:10-55Hz(1 min.) 2G constant X, Y, Z, when correctly mounted; Shock: <20G						
Safety Agency Approvals	-	UL3111-1, EN61010-1, CE Mark						
Conducted & Radiated EMI	-	EN55022-B conducted, A radiated, FCC Class B conducted, A radiated, VCCI-2 conducted, -1 radiated						
Warranty	yrs	Three Years						

Notes: (1) Recovery to within +/-50mV after load change of 50-100% (2) Over 8 hour period following 30 minute warm up time
 (3) 25°C ambient (cold start)

