

KEYSIGHT TECHNOLOGIES (AGILENT HP)

6030A

The Keysight Agilent HP 6030A is a 1200 W, single-output, autoranging programmable DC power supply designed for automatic test systems. It provides high efficiency, GPIB programmability, analog control of output voltage and current, and extensive built-in measurements in a compact 3U rack-mount form factor.

SPECIFICATIONS

General

Interfaces	GPIB (HP-IB), Analog Programming/Monitoring
Display	Dual 4-digit LED displays (voltage and current)
Recommended Calibration Interval	1 year

Physical

Power Supply	120 VAC nominal (standard); 100 / 220 / 240 VAC options, 47-63 Hz, 2800 VA max
Operating Temperature	0 to 55 °C °C
Dimensions (W×H×D)	425.5 mm × 132.6 mm × 503.7 mm mm
Weight	16.3 kg

Output Ratings and Capabilities

Number of Channels	1
Rated Output Voltage	0 to 200 V
Rated Output Current	0 to 17 A
Rated Output Power	1000 W

Load and Line Regulation

Voltage Load Regulation	0.01% + 15 mV
Current Load Regulation	0.01% + 10 mA
Voltage Line Regulation	0.01% + 10 mV
Current Line Regulation	0.01% + 10 mA

Ripple and Noise

Constant Voltage Ripple and Noise (Vrms)	22 mV
Constant Voltage Ripple and Noise (Vp-p)	50 mV
Constant Current Ripple and Noise (Irms)	15 mA

Programming Accuracy and Resolution

Voltage Programming Accuracy	0.035% + 145 mV
Current Programming Accuracy	0.2% + 25 mA
Voltage Programming Resolution	50 mV
Current Programming Resolution	4.25 mA
OVP Programming Accuracy	1.6% + 1.2 V
OVP Programming Resolution	1.2 V

Readback Accuracy and Resolution

Voltage Readback Accuracy	0.08% + 80 mV
Current Readback Accuracy	0.36% + 15 mA
Voltage Readback Resolution	50 mV
Current Readback Resolution	5 mA

Protection Features

Over-Voltage Protection (OVP) Range	2.4 to 230 V
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System Connectivity and Interfaces

GPIO (IEEE-488) Interface	Standard (HP-IB)
Analog Programming and Monitoring	0 to 5 V, 0 to 10 V, 0 to 5 kΩ, or 0 to 10 kΩ control options
Remote Sensing Compensation Voltage	Up to 2 V drop per load lead

AC Input Specifications

AC Input Voltage Options	100 VAC / 120 VAC / 220 VAC / 240 VAC (factory-configured options)
AC Input Frequency Range	47 to 63 Hz

Physical and Mechanical

Form Factor	3U rack-mount
Cooling System Design	Forced air cooling with internal fan, side/bottom intake and rear exhaust
Shipping Weight	21.8 kg

Environmental and Standards

Storage Temperature Range	-40 to +75 °C
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Power Specifications

AC Input Power (VA)	2800 VA
AC Input Current	24 A @ 120 VAC, 14 A @ 200 VAC, 13 A @ 220 VAC, 12 A @ 240 VAC

Performance

Temperature Coefficient (Voltage)	0.01% + 3 mV per °C
Temperature Coefficient (Current)	0.02% + 0.5 mA per °C
Command Processing Time	15 ms (average time for output to change after receipt of GPIB command)
Output Rise Time (Full Load)	100 ms
Output Rise Time (No Load)	100 ms
Output Fall Time (Full Load)	250 ms
Output Fall Time (No Load)	6 s
Transient Recovery Time	1 ms to recover within 150 mV of nominal output voltage following a load change

Safety & Isolation

Maximum Isolation Voltage	±550 VDC
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Environmental

Operating Altitude	Up to 2000 m
Operating Humidity	Up to 80% RH (non-condensing)

Stability

Output Voltage Drift	0.03% + 5 mV (over 8 hours)
Output Current Drift	0.03% + 3 mA (over 8 hours)

Capability

Series Connection Limit	Up to 2 units
Parallel Connection Limit	Up to 3 units

Inputs & Outputs

Analog Control Input Ranges	0 to 5 V (voltage control) or 0 to 4 kΩ (resistance control)
Rear Panel Connections	GPIB (IEEE-488) connector, 15-pin analog control terminal block (J1), output bus bars

TECHNOLOGY

Switch-mode / Autoranging

APPLICATIONS

Automated test equipment (ATE), system power, industrial testing

Generated by SpecAtlasHub (specatlashub.com). Specifications are compiled from available sources and are subject to change — verify critical values against the manufacturer before purchase.