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Data Sheet

August 15, 2026

AMETEK/ELGAR

Ametek / Elgar PIP9023-3 Digital / Analog Programmable Plug-In Oscillator

California Instruments Elgar PIP9023-3 Programmable Plug-In Oscillator The California PIP9023-3 is a three-phase programmable plug-in oscillator/programmer for Elgar AC power sources with independent voltage and phase-angle control per Elgar PIP Series specifications. Three-phase gyro and avionics AC stimulus, unbalanced phase testing, and GPIB-controlled AC source programming. Instrument Type: Programmable plug-in oscillator The California PIP9023-3 is a three-phase programmable plug-in oscillator/programmer for Elgar AC power sources with independent voltage and phase-angle control per Elgar PIP Series specifications. Three-phase gyro and avionics AC stimulus, unbalanced phase testing, and GPIB-controlled AC source programming. Instrument Type: Programmable plug-in oscillator Voltage Programming Accuracy: plus or minus 0.2 percent of full scale



MODEL

**Ametek/Elgar
PIP9023-3**

CALIBRATION

**Available on
request**

CONDITION

Used

STATUS

In stock

RFQ / SKU

PIP9023-3

LISTING

<https://aumictechlabs.com/products/pip9023-3-3/>

NIST-traceable cal

SAM registered

30-day returns

NAICS 423690 • 811210 • 541380

This unit

The Ametek/Elgar PIP9023-3 is a digital/analog programmable plug-in oscillator module that generates precise, stable waveforms for automated test systems integrated with Elgar AC Power Sources. This unit has independent voltage and phase angle control across three programmable

ranges, supporting complex multi-phase stimulus applications with exceptional regulation and frequency accuracy. Technical Specifications Voltage Programming: 0-67.5 VAC, 0-135 VAC, and 0-270 VAC ranges with 0.1 VAC resolution and $\pm 0.2\%$ full-scale accuracy Frequency Programming: 45-5000 Hz with $\pm 0.001\%$ accuracy and auto-frequency ranging Phase Angle Programming: 0-360° range with 0.5° resolution (PIP9023 models only) Load Regulation: $\pm 0.015\%$ from no load to full load Line Regulation: $\pm 0.015\%$ over $\pm 10\%$ line variation Weight: 8 lbs shipping weight Key Features Three-phase stimulus output with independent phase control per channel Manual and GPIB (IEEE-488) interface via ABLE language remote control Front-panel keypad with multi-function entry and LED display for local programming Built-in test (BIT) diagnostics with optional "T" option for true RMS measurement of voltage, current, frequency, and wattage Multi-system phase lock synchronization between multiple PIP9023 units External synchronization pulse output; "ES" models accept $\sim 10\text{V}$ peak-to-peak sine or square wave signals Programmable dropout control (1-9 cycle intervals) Remote sensing capability for programming accuracy Automatic AC power source range and disconnect relay control Output disconnect relay Compatibility & Integration Designed as a plug-in module for Elgar SL, SX, and DMAC II series AC power supplies. Compatible with Elgar AC power source platforms supporting automated test system integration.

PIP9023 Characteristics / Specifications

PARAMETER	VALUE
Instrument Type	Programmable plug-in oscillator
Phases	3
Voltage Range Low	0 to 67.5 VAC
Voltage Range Mid	0 to 135 VAC
Voltage Range High	0 to 270 VAC
Voltage Resolution	0.1 VAC
Voltage Programming Accuracy	plus or minus 0.2 percent of full scale
Load Regulation	plus or minus 0.015 percent no load to full load
Line Regulation	plus or minus 0.015 percent for 10 percent line change
Frequency Range Auto Ranging	45 to 999.9 Hz and 1000 to 5000 Hz
Frequency Resolution	0.1 or 1.0 Hz
Frequency Accuracy	0.001 percent of set value
Phase Angle Range	0 to 360 degrees
Phase Angle Resolution	0.5 degree
Phase Angle Accuracy 45 To 2 Khz	plus or minus 1 degree
Phase Angle Accuracy Above 2 Khz	add 0.5 degree per kHz
Current Limit Range With Test Option	5 to 100 percent independently by phase
Line Cycle Dropout	not applicable on 9023
External Frequency Phase Sync	yes to another 9023 or 704
Readback Frequency Range	45 Hz to 5 kHz
Readback Frequency Resolution	1 Hz
Readback True Rms Voltage Range	0 to 300 VAC
Readback Voltage Resolution	0.1 VRMS
Readback Voltage Accuracy	0.1 percent FS plus or minus 0.1 percent reading
Readback Current Ranges	0 to 5 10 20 40 ARMS amplifier dependent

PARAMETER	VALUE
Readback Current Resolution	0.01 ARMS
Readback Power Ranges	0 to 500 W 1 kW 2 kW 4 kW amplifier dependent
Readback Phase Angle Range	0 to 359 degrees
Readback Phase Resolution	0.5 degree
Remote Interface	IEEE 488 GPIB

Full OEM specifications

Complete technical content extracted from the manufacturer datasheet. Sparse OEM tables are reconstructed as tables below; other text is preserved as paragraphs.

specifications.	
Applications	
Three-phase gyro and avionics AC stimulus, unbalanced phase testing, and GPIB-controlled AC source programming.	
Key Features	
Independent three phase programming	
Phase angle control to 0.5 degree	
Auto ranging frequency	
Built in test diagnostics	
GPIB and front panel control	
Technical Specifications	
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Remote Interface	IEEE 488 GPIB

Notes

Numeric rows from Elgar Plug-In Programmers PIP 9012A/9023/704 specifications tables. PIP9023-3 denotes the three-phase configuration.

Available from Aumictech

Used and refurbished unit evaluated in-house. Calibration: Available on request. Used · In stock.

Request a quote: sales@aumictech.com · +1 (484) 841-9341

Aumictech

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NIST-traceable calibration · SAM registered ·
30-day returns
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Technical content from manufacturer specifications. Unit photo/stock from Aumictech listing when available. Specifications subject to OEM documentation and unit condition.