

Programmable Linear D.C. Power Supply



PSS-2005/3203



FEATURES

- * Digitized Programmable Interface
- * High Resolution 10mV, 1mA
- * High Stability, Low Drift
- * Over-Voltage, Over-Current, Over Temperature Protection
- * Intelligent Fan Control (Change by Output Power)
- * Built-in Buzzer Alarm
- * LabVIEW Driver
- * Standard Interface : RS-232C
- * Optional Interface : GPIB (IEEE-488.2)
- * Optional European Jack Type Terminal

Rear Panel



The PSS-Series are single output, 96 or 100W, programmable linear DC power supplies. OVP, OCP, and OTP protect the PSS series and their load from unexpected conditions. The LCD panel simultaneously displays output and other parameters and the regulated cooling fan ensures low noise for comfortable operation. RS232C and GPIB interfaces, SCPI command sets and LABVIEW drivers make remote control and ATE software development easier. (Note: only RS-232C or GPIB can be installed at one time)

The compact PSS series are suitable for any high resolution bench-top or rack mount application.

| SPECIFICATIONS | | |
|--|---|----------|
| OUTPUT | PSS-2005 | PSS-3203 |
| Voltage | 0~20V | 0~32V |
| Current | 0~5A | 0~3A |
| OVP | 0~21V | 0~33V |
| LOAD REGULATION | | |
| Voltage | ≤ 3mV (≤ 5mV, rating current >3.0A) | |
| Current | ≤ 3mA (≤ 5mA, rating current >3.0A) | |
| LINE REGULATION | | |
| Voltage | ≤ 3mV | |
| Current | ≤ 3mA | |
| RESOLUTION | | |
| Voltage | 10mV | |
| Current | 1mA (2mA, rating current >3.0A) | |
| OVP | 10mV | |
| PROGRAM ACCURACY(25 ± 5°C) | | |
| Voltage | ≤ 0.05%+20mV | |
| Current | ≤ 0.1%+5mA (+10mA, rating current>3.0A) | |
| OVP | ≤ 0.05%+20mV | |
| RIPPLE & NOISE(20Hz~20MHz) | | |
| Voltage | Ripple ≤ 1mVrms/3mVp-p Noise ≤ 2mVrms/30mVp-p | |
| Current | ≤ 3mArms (≤ 5mArms, rating current >3.0A) | |
| TEMPERATURE COEFFICIENT (0 ~ 40°C) | | |
| Voltage | ≤ 100ppm+3mV | |
| Current | ≤ 100ppm+3mA | |
| READBACK RESOLUTION | | |
| Voltage | 10mV | |
| Current | 1mA (2mA, rating current >3.0A) | |
| READBACK ACCURACY(25 ± 5°C) | | |
| Voltage | ≤ 0.05%+10mV | |
| Current | ≤ 0.1%+5mA (10mA rating current >3.0A) | |
| READBACK TEMPERATURE COEFFICIENT | | |
| Voltage | ≤ 100ppm+10mV | |
| Current | ≤ 100ppm+5mA (10mA rating current >3.0A) | |
| RESPONSE TIME | | |
| Voltage Up (10%~90%) | ≤ 100mS | |
| Voltage Down (90%~10%) | ≤ 100mS (≥10% rating load) | |
| DRIFT | | |
| Voltage | ≤ 100ppm+10mV | |
| Current | ≤ 150ppm+10mA | |
| INTERFACE | | |
| Standard : RS-232C; Option: GPIB | | |
| POWER SOURCE | | |
| AC 100V/120V/ 220V±10%, 230V (+10%/-6%), 50/60Hz | | |
| DIMENSIONS & WEIGHT | | |
| 108(W) x 142(H) x 318(D) mm, Approx. 4.8kg | | |

| ORDERING INFORMATION | |
|--|---|
| PSS-2005 | 100W Single Output Programmable D.C. Power Supply |
| PSS-3203 | 96W Single Output Programmable D.C. Power Supply |
| ACCESSORIES : | |
| User manual x 1, Power cord x 1 Test lead GTL-104A x 1 (PSS-2005) or GTL-105A x 1 (PSS-3203) | |
| European Test Lead GTL-204A x 1 (PSS-2005) or GTL-203A x 1 (PSS-3203) | |
| OPTION | |
| Opt.01 : GPIB Interface (factory installed) | |
| OPTIONAL ACCESSORIES | |
| GTL-232 | RS232C Cable, 9-pin Female to 9-pin, null Modem for Computer |
| GRA-408 | Rack Adapter Panel |
| FREE DOWNLOAD | |
| PC Software Driver | PC Software including Data Log ; Remote Control Software LabView Driver |

Note : When Opt.01 GPIB interface is ordered, the standard interface RS-232C will be deleted.

Programmable Dual-range D.C. Power Supply



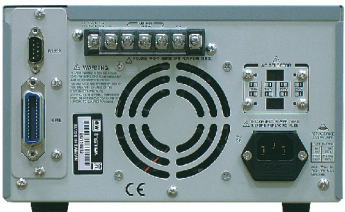
PSM-2010/3004/6003



FEATURES

- * Single Output Dual Range Max. 200W
- * High Resolution: 1mV/1mA
- * Stable & Clear Power: 0.01% Load/Line Regulation, 350µVrms Ripple
- * 100 Sets Memory
- * Auto Step Running With Timer Setting
- * Safety Design: OVP, OCP & OTP ; Output ON/OFF Control(OCP Provides Delay Setting to Prevent Trip of High Start-Up Current)
- * Self-Test and Software Calibration
- * Highly Visible Vacuum-Fluorescent Display
- * Front and Rear Output Terminal
- * Standard Interface : RS-232C, GPIB
- * Option : European Jack Type Terminal

Rear Panel



The PSM-Series are single output / dual range, 120 or 200W, programmable linear DC power supplies. OVP, OCP, OTP, and output On/Off control protect the PSM-Series and their load from unexpected conditions. High resolution, high regulation, and low ripple are maintained at 1mV/1mA, 0.01%, and <350µVrms, respectively. Operation and configuration is simplified with a digital interface and a clear LCD display. Standard features include; store/recall output memories, automatic stepping with timers for continuous testing and self-testing and software calibration features to reduce maintenance overhead. SCPI programming, LabVIEW drivers, RS-232C and GPIB interfaces enable easy automated test system integration and remote control. The PSM-Series are an ideal choice for high precision applications such as QA verification and product development.

| SPECIFICATIONS | | PSM-2010 | PSM-3004 | PSM-6003 |
|--|-----------|---|------------------------|---|
| DC OUTPUT | | | | |
| Low Range | | 0 ~ 8V/20A | 0 ~ 15V/7A | 0 ~ 30V/6A |
| High Range | | 0 ~ 20V/10A | 0 ~ 30V/4A | 0 ~ 60V/3.3A |
| CONSTANT VOLTAGE OPERATION | | | | |
| Regulation (% of output + offset) | | Load regulation $\leq 0.01\% + 2mV$ Line regulation $\leq 0.01\% + 2mV$ | | |
| Ripple & Noise | | < 350 μ Vrms/3mVpp | < 350 μ Vrms/2mVpp | $\leq 50V$: <500 μ Vrms/3mVpp >50V: <1mVrms/3mVpp |
| CONSTANT CURRENT OPERATION | | | | |
| Regulation (% of output + offset) | | Load regulation $\leq 0.01\% + 250\mu A$ Line regulation $\leq 0.01\% + 250\mu A$ | | |
| Ripple & Noise | | < 2mArms | | |
| RESOLUTION | | | | |
| Programming | Voltage | 1mV | 1mV | 2mV |
| | Current | 1mA | 0.5mA | 0.5mA |
| Readback | Voltage | 0.5mV | 0.5mV | 1mV |
| | Current | 1mA | 0.1mA | 0.5mA |
| Front Panel | Voltage | 1mV | | |
| | Current | 1mA(<10A), 10mA($\geq 10A$) | | |
| OVP/OCP | Voltage | 10mV | | |
| | Current | 10mA | | |
| ACCURACY | | | | |
| Programming | Voltage | 0.05% + 10mV | | |
| | Current | 0.2% + 10mA | | |
| Readback | Voltage | 0.05% + 5mV | | |
| | Current | 0.15% + 5mA | | |
| OVP/OCP | Voltage | 0.1% + 10mV | | |
| | Current | 0.4% + 10mA | | |
| TRANSIENT RESPONSE | | | | |
| | | < 50 μ sec (for outputto recover within 15mV following a change in output current from full load to half load) | | |
| COMMAND PROCESSING TIME | | | | |
| | | 100 ms | | |
| VOLTAGE PROGRAMMING RESPONSE TIME (for resistive load) | | | | |
| Voltage Up | Full Load | 95 ms | 50 ms | 80 ms |
| | No Load | 45 ms | 20 ms | 100 ms |
| Voltage Down | Full Load | 30 ms | 45 ms | 30 ms |
| | No Load | 450 ms | 400 ms | 450 ms |
| STABILITY (% of output + offset) | | | | |
| Voltage | | 0.02% + 1mV | | |
| Current | | 0.1% + 1mA | | |
| MEMORY | | | | |
| Store/Recall | | 100 sets | | |
| TEMPERATURE COEFFICIENT PER $^{\circ}C \pm$ (% of Output + Offset) | | | | |
| Voltage | | 0.01% + 3mV | | |
| Current | | 0.02% + 3mA | | |
| POWER SOURCE | | | | |
| AC 100V/120V/220V $\pm 10\%$, 230V : - 6% ~ + 10%, 50/60Hz | | | | |
| INTERFACE | | | | |
| Standard RS-232C , GPIB | | | | |
| DIMENSIONS & WEIGHT | | | | |
| 230(W) x 140(H) x 380(D) ; Approx. 10kg | | | | |

| ORDERING INFORMATION | |
|---|---|
| PSM-2010 | 200W Single Output, Programmable Power Supply |
| PSM-6003 | 200W Single Output, Programmable Power Supply |
| PSM-3004 | 120W Single Output, Programmable Power Supply |
| ACCESSORIES : | |
| User manual x 1, Power cord x 1, Test lead GTL-104A x 1 , European test lead GTL-204A x 1, Ground lead GTL-201A x 1 (European terminal), Sense lead GTL-202 x 1 (European terminal) | |
| OPTION | |
| Opt. 01: GRA-407 Rack Mounting (19" , 4U) | |
| OPTIONAL ACCESSORIES | |
| GTL-232 | RS-232C Cable, 9-pin Female to 9-pin , Null Modem for PC Computer |
| FREE DOWNLOAD | |
| PC Software Driver | PC Software including Data Log ; Remote Control Software Labview Driver ; PSM VB Example ; PSM VC++ Example |

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Surrey GU1 4UG
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Tel: +44 (0) 1483 302 700

Fax: +44 (0) 1483 300 562

sales@caltest.co.uk

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