accsense
Simple and Reliable

VersaLog™

Model:
RTD-1

- 16-bit analog-to-digital converter meets most high-resolution requirements
- 8-megabyte memory stores up to 4 million measurements
- One on-board thermistor channel monitors ambient temperature
- Four RTD input channels cover wide measurement requirements
- Can be accessed via USB, MODEM, or Ethernet connections with auto baud rate of up to 115 kbps
- 10-year battery life
- Fast sampling mode
- Alarm and excitation output

The VersaLog RTD-1 is a 4-channel, battery powered, stand-alone RTD data logger. It records the ambient temperature and four external RTD probes. Data is stored in non-volatile flash memory for later retrieval.

It accepts standard 2 or 3 wire PT-100 RTD probes that have the resistance value of 100 ohms at 25°C.

Featuring an aluminum enclosure the VersaLog logger has excellent performance in the harshest industrial environment.

Powered by a16-bit ADC, the VersaLog logger is well suited to science and laboratory applications where precise and accurate measurement is critical.

SiteView Software

SiteView is a Windows-based application which works with the VersaLog Series data loggers for downloading, configuration, data analyzing and plotting. Its user-friendly graphic interface plus powerful functionalities fit both novice and advanced users.

The versatility of custom equation and custom-line equation handles complicated measurement requirements.

- Supports USB, Serial port and Ethernet connections for easy local and remote access
- Fast communication speed up to 115200 bps makes downloading fast
- Real-time viewing and graphs replace obsolete paper chart recorders
- Custom equation and custom-line equation solves scientific and laboratory algorithm difficulties
- Zoom in/zoom out, annotation/label of graph functions provide detailed view of data
- Multiple file loading allows easy data comparison
- Dynamic statistics provide detailed information of current zoomed view

Technical specifications (subject to change without notice)

Inputs

Connections	Pluggable terminal block for four external channels, excitation controls and alarm outputs
Channels	On-board ambient thermistor temperature sensor (-40°C ~ 70°C). Four external RTD channels for 2 or 3 wire PT100, 100 ohm RTD's, measurement range 20 ~ 400 ohms (-200°C ~ 850°C) Alpha .00385 & .00392 curves.
Resolution	0.0018%, 0.02°C
Accuracy	Internal thermistor channel: +/- 0.2°C (0°C ~ 70°C) External RTD channels: +/- 0.015% FSR @ 25°C, +/-0.16°C @ 25°C

Alarms

Channel Alarms	Two editable alarm thresholds per channel
Alarm Outputs	ALARM1 & A2/EXT terminal strips can be configured as alarm outputs
	Alarm-On: MOSFET (N-Channel) switch on Alarm-Off: MOSFET (N-Channel) switch off
	Max Power: 200mA @ 24VDC
	Can report alarm status to host PC via USB, Modem or Ethernet Device Server with SiteView software[2]
Alarm-On Delay	Programmable 0 - 10 minutes delay with 1-minute increments
Alarm Indicator	On-board LED lights in red when in alarm condition

On-Board Memory

Capacity	8 **megabyte** (~4 million measurements)
Data Retention	Over 20 years

Sampling & Logging

Sampling Interval	20 milliseconds[1] to 12 hours user selectable
Logging Mode	Stop recording or FIFO when memory is full
Logging Activation	Programmable instant, start delay or field push-button activation

Communications

Interface	USB (USB cable included), AUX (RJ11) for direct TTL level communications
	Can be connected to Ethernet for remote access with DeviceServer Kit[2]
Baud Rate	Auto-detect baud rate from 2400 to 115200 bps on both USB and AUX ports

Battery

Power	Built-in 3.6V Lithium Battery
Life Cycle	10 years based on 1 minute sampling interval

Software

SiteView[2]	Configuration, downloading, plotting, real-time view, custom calibration and custom equation
Software Requirements	Computer with 1.0 GHz or faster processor, 256 MB Memory or higher & 1.0 GB of available hard-drive space or higher
	Windows XP with SP2 or later, Vista, Windows 7, 8, 10
	At least one USB port or one COM port

Other

LED Indicator	Normal Sampling: green when sampling Alarm: red when sampling Low Battery: amber when sampling
Excitation Control	A2/EXT terminal strip can be configured as excitation control output for powering connected devices
	Warm-up delay Interval settings: 10 to 240 seconds with 10-second increments
Operating Environment	-40 ~ +70°C (-40°F ~ 158°F), 0~95%RH non-condensing
Clock Accuracy	+/- 1 minute per month
Approvals	CE, FCC

[1]: Maximum enabled channel: 1 for 20ms interval, 2 for 30ms, 5 for 40ms or bigger interval.

[2]: Sold separately.

8437 Mayfield Rd.
Chesterland, OH 44026
T: 800.956.4437
F: 440.729.2586

accsense.com