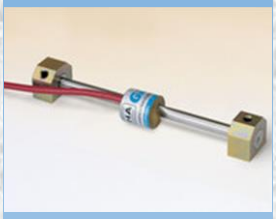
OEM

VIBRATING WIRE LOGGER

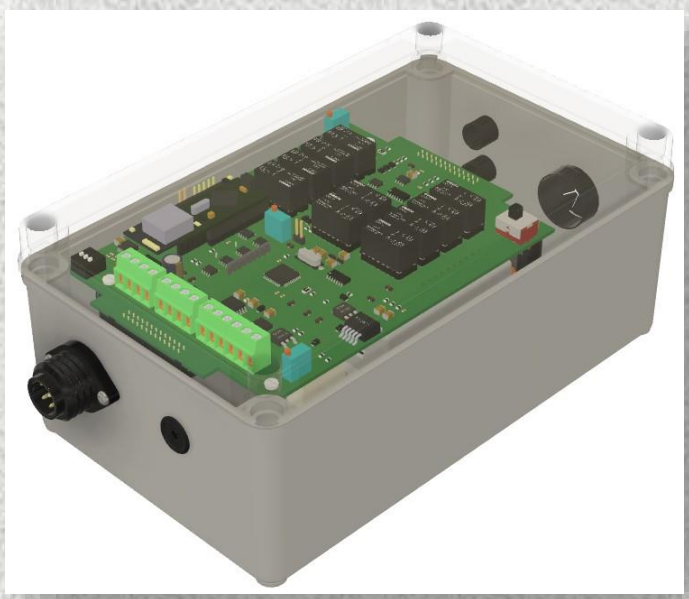
Water Pressure

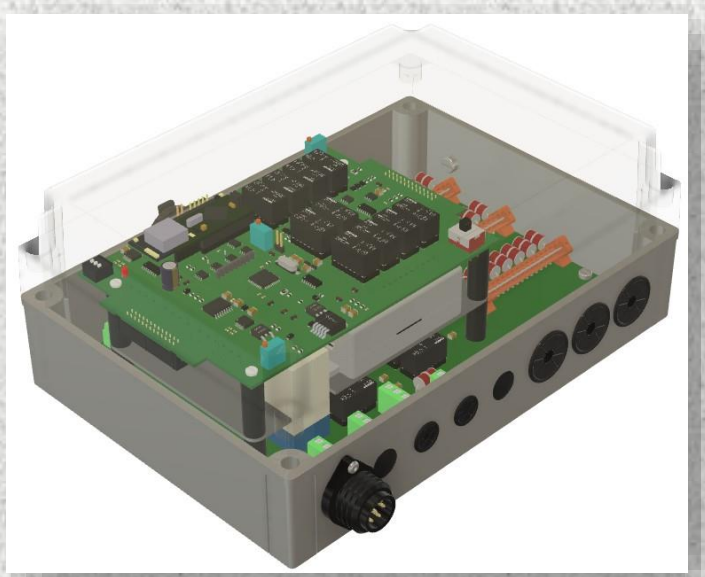
Strain



Barometric Pressure

Tilt





OEM VIBRATING WIRE DATA LOGGER FEATURES

For use with Vibrating Wire Transducers

Measure up to 24 independent devices using Vibrating Wire technology

Data logging of attached instruments with time and date stamp

Temperature compensation for all 24 channels (thermistor inputs, supporting vibrating wire sensors with integral temperature compensation)

In built transient suppression on all channels (lightning protection)

Integrated alarm outputs. Two normally open or normally closed relay contacts capable of switching maximum 2A current

Intuitive GUI software for configuring inputs, scheduling alarms and uploading stored data

Glass filled polycarbonate enclosure with smoke tint lid

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VIBRATING WIRE LOGGER

OPTIONS

10W Solar panel /charger kit for charging of internal sealed lead acid battery

RS232 and USB access port options for local administration and data recovery

GSM and FTP modem for remote administration, data retrieval and SMS notification of alarm conditions

LoRa WAN Long range wireless communications

Custom powder coated / stainless steel IP66 rated enclosure available on request

OEM VW LOGGER APPLICATIONS

The Vibrating Wire Logger is an 8/24 channel data acquistion sytem designed specifically for long term field deployment. The cost effective glass filled polycarbonate enclosure offers dust and moisture ingresss protection and is able to be mounted within a steel enclosure should additional environment protection be required.

The VW Logger is compatible with industry standard vibrating wire transducers for the measurement of the following parameters:-

- Strain
- Tilt
- Load
- Pressure
- Barometric pressure
- Displacement
- Extension
- Temperature

COMPATIBLE INSTRUMENTS

The following types of instruments are supported by the OEM VW Logger :-

- VW Strain gauges
- VW Tilt meter
- VW Piezometers
- VW Load Cells
- VW Barometric pressure piezometer
- VW Displacement
- VW Extension
- VW Crack meter
- VW Convergence meter
- Thermistors

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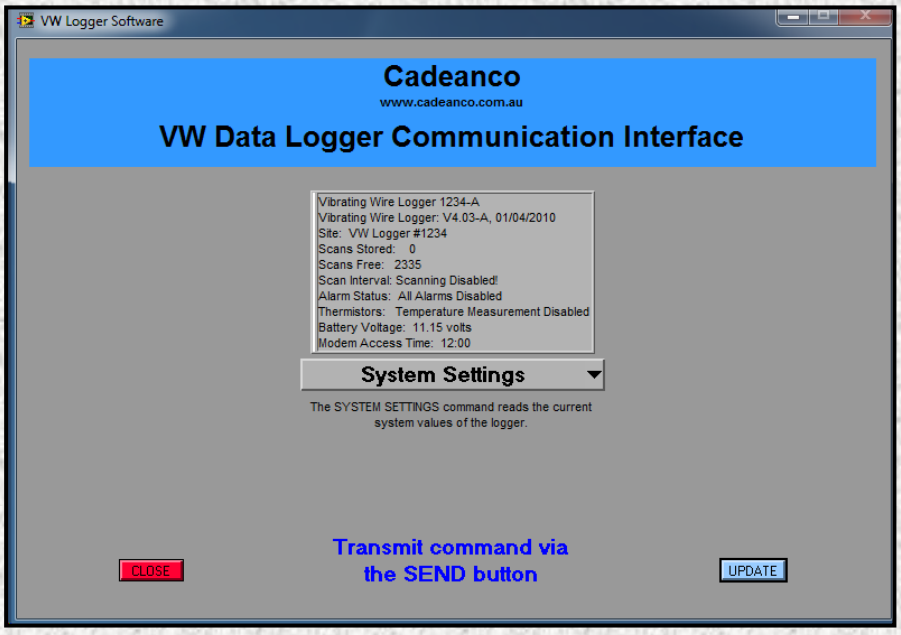
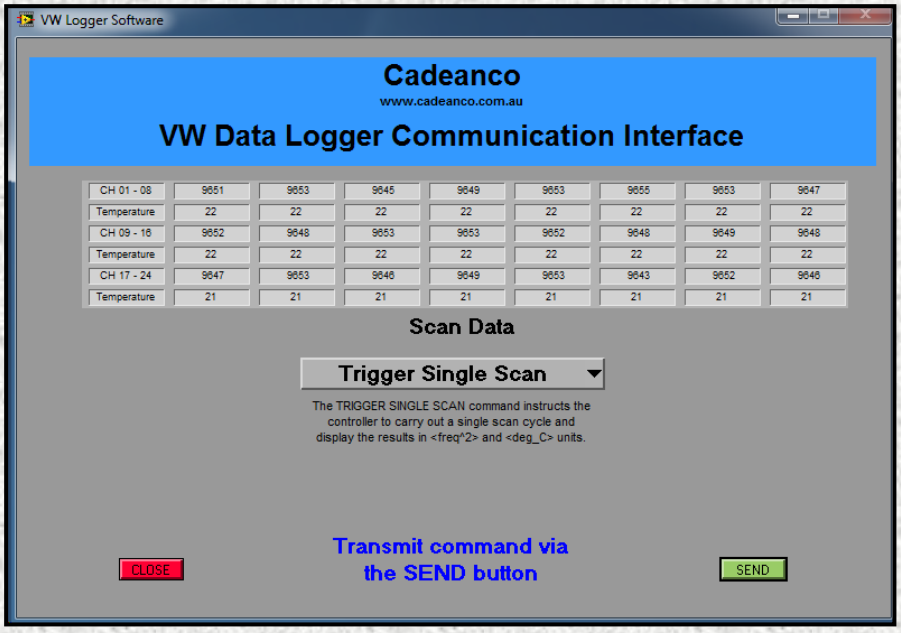
VIBRATING WIRE LOGGER

WINDOWS BASED GUI FOR SYSTEM CONFIGURATION AND DATA STORAGE / RETRIEVAL





OEM

VIBRATING WIRE LOGGER

PROUDLY AUSTRALIAN DESIGNED AND BUILT

VWL8 SPECIFICATIONS

PHYSICAL SPECIFICATIONS:

Size:	140mm high x 230mm wide x 100mm deep	
Weight:	1.2Kg	
Material:	Grey polycarbonate case with clear lid	
Sealing:	Dependant on supplied external case	
Temperature:	Operating Temperature	-20°C to +55°C
	Storage Temperature	-25°C to +70°C

ELECTRICAL SPECIFICATIONS

Power:	External Battery required Suggested minimum: Sealed Lead Acid, 12V, 1.3Ah 240V Plug-pack Charger Module supplied
Options:	10W Solar Charger
Data Logging:	
Input Channels:	1 x 8-ch input
Storage Capacity:	
8 Channels:	21834 scans of vibrating wire data 16376 scans including temperature
Data Backup:	150 years without primary power
Logger Timing:	Real-time clock, non-volatile operation
Scanning Intervals:	1-min, 10-min, 1- hour, 6-hour, 12- hour, 24-hour Manual trigger mode via computer interface
Sweep Ranges:	
1800Hz – 3600Hz:	Standard piezometer
1500Hz – 2500Hz:	Roctest piezometer
1000Hz – 3500Hz:	Geovan piezometer, Spot welded strain gages
450Hz – 1000Hz:	Geovan arc-welded & Embedded strain gages
2500Hz – 6000Hz:	Geovan stress meter

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VIBRATING WIRE LOGGER

PROUDLY AUSTRALIAN DESIGNED AND BUILT

Alarm Logging (not available for LoRaWAN):

Logging Control:	Global enable/disable of all alarm functions
Scan Rate:	Synchronous with data or 1-minute intervals
Trigger Level:	Individual channel threshold value set by operator
Trigger Sensing:	Threshold crossed in either [+ve] or [-ve] direction
Signal Mode:	Set by operator to either Latched or Self-clear mode
Signal Outputs:	Integrated alarm with 2 isolated relay terminals Maximum relay current of 2A SMS alert option when a modem is fitted

Communications:

Baud Rate:	9600 baud, 8 data, 1 start, 1 stop, no parity
Data Format:	VW Data (f^2 units), Temperature (°C), Time, Date
Data Separator:	Tab/CSV separated columns, ASCII text format
Data Recovery:	Custom WINDOWS Interface software USB Memory Device GSM Modem FTP Modem LoRa WAN (data pushed with scan)

Modem Options:

Type:	Intellimax+4G (GSM or FTP Modes available)
GSM Comms Rate:	9600 Baud, Non-transparent mode
FTP Mode:	Includes a default time window for remote bidirectional communication with logger
SIM Card:	Micro-SIM

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VIBRATING WIRE LOGGER

PROUDLY AUSTRALIAN DESIGNED AND BUILT

VWL24 SPECIFICATIONS

PHYSICAL SPECIFICATIONS:

Size:	180mm high x 255mm wide x 100mm deep	
Weight:	1.3Kg	
Material:	Grey polycarbonate case with clear/smoke lid	
Sealing:	Dependant on supplied external case	
Temperature:	Operating Temperature	-20°C to +55°C
	Storage Temperature	-25°C to +70°C

ELECTRICAL SPECIFICATIONS

Power:	External Battery required Suggested minimum: Sealed Lead Acid, 12V, 1.3Ah 240V Plug-pack Charger Module supplied
Options:	10W Solar Charger

Data Logging:

Input Channels:	Up to a maximum of 24 via 3 x 8-ch inputs

Storage Capacity:

8 Channels:	21833 scans of vibrating wire data 16376 scans including temperature
16 Channels:	13098 scans of vibrating wire data 9356 scans including temperature
24 Channels:	9356 scans of vibrating wire data 6549 scans including temperature
Data Backup:	150 years without primary power
Logger Timing:	Real-time clock, non-volatile operation
Scanning Intervals:	1-min, 10-min, 1- hour, 6-hour, 12- hour, 24-hour Manual trigger mode via computer interface

Sweep Ranges:

1800Hz – 3600Hz:	Standard piezometer
1500Hz – 2500Hz:	Roctest piezometer
1000Hz – 3500Hz:	Geovan piezometer, Spot welded strain gages
450Hz – 1000Hz:	Geovan arc-welded & Embedded strain gages
2500Hz – 6000Hz:	Geovan stress meter

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VIBRATING WIRE LOGGER

PROUDLY AUSTRALIAN DESIGNED AND BUILT

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Logging Control:	Global enable/disable of all alarm functions
Scan Rate:	Synchronous with data or 1-minute intervals
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Trigger Sensing:	Threshold crossed in either [+ve] or [-ve] direction
Signal Mode:	Set by operator to either Latched or Self-clear mode
Signal Outputs:	Integrated alarm with 2 isolated relay terminals Maximum relay current of 2A SMS alert option when a modem is fitted

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Baud Rate:	9600 baud, 8 data, 1 start, 1 stop, no parity
Data Format:	VW Data (f^2 units), Temperature (°C), Time, Date
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