

ACONS2 – Motorised Automatic CRS Consolidation

Related Standards: ASTM D4186-06

Our new ACONS2 CRS System makes things easier for Constant Rate of Strain (CRS) Automated Consolidation testing by using a stepper motor to generate Force.

It also comes with an RS232, Wi-Fi or USB Interface for computer control using our renowned Clisp Studio software (RS232 or USB recommended), and an optional 7" Touchscreen Colour Display with Wi-Fi or USB Connection for remote control.

The ACONS2 can be used with a standard 75.7 mm CRS cell for CRS strain testing or a 63.5 or 75.7 mm CRS cell with an Internal Submersible Load Cell for CRS strain and stress testing. Back Pressure is provided by an Automatic Pressure Controller and Pore Water Pressure is measured with a Pressure transducer. It can also be used with normal Consolidation cells for Consolidation tests.

Features

- Compact design (small footprint)
- Longer Strain Rods for Constant Rate of Strain (CRS) testing
- RS232 or USB Interface recommended for PC control
- Optional 7" Remote Touchscreen Display with Wi-Fi or USB connection
- Capable of load as well as displacement control
- Motorised actuation of load
- Includes 15kN Load cell (which is removed when a CRS cell with an ISLC is used)
- Adaptable to accept consolidation cells 50mm to 100mm (supplied separately)
- Built-in high accuracy Digital Dial Gauge interface for displacement sensor
- Built-in DIN socket for Pore Water Pressure sensor
- Built-in Mitutoyo Digital Dial Gauge interface
- Over range protection
- Multiple ACONS2 can be daisy chained and controlled from single PC (RS232 only)
- Microprocessor based design
- High Resolution 24 bit A/D converter
- Built-in battery backed real time clock
- Transducer calibration from/to Clisp Studio
- Non-volatile storage of calibration



VJT9106 - ACONS2 Motorised Automatic CRS Consolidation System Setup

Ordering Information

VJT9106 ACONS2 Motorised Automatic CRS Consolidation Testing System

Accessories

VJT0650M2	ACONS2 Motorised Automatic Consolidation Frame
VJT2260	Hydraulic Automatic Pressure Controller
VJT0250	10 bar Pressure Transducer
VJT0280	De-Airing block with valve for pressure transducer
VJT0110-MIT	Digital Dial Gauge, 25mm X 0.001 mm with 2 metre cable
VJT0680	CRS Cell (75.7 mm diameter)
VJT0680A	CRS Cell (75.7 mm diameter) for use with Internal Submersible Load Cell (supplied separately)
VJT0680A-63.5	CRS Cell (63.5 mm diameter) for use with Internal Submersible Load Cell (supplied separately)
VJT0353B/DYN	25kN Internal Submersible Load Cell with 25mm diameter Ram
VJT1010	Wi-Fi enabled Remote Display with pre-installed application
VJT-csCRS	Clisp Studio CRS Software

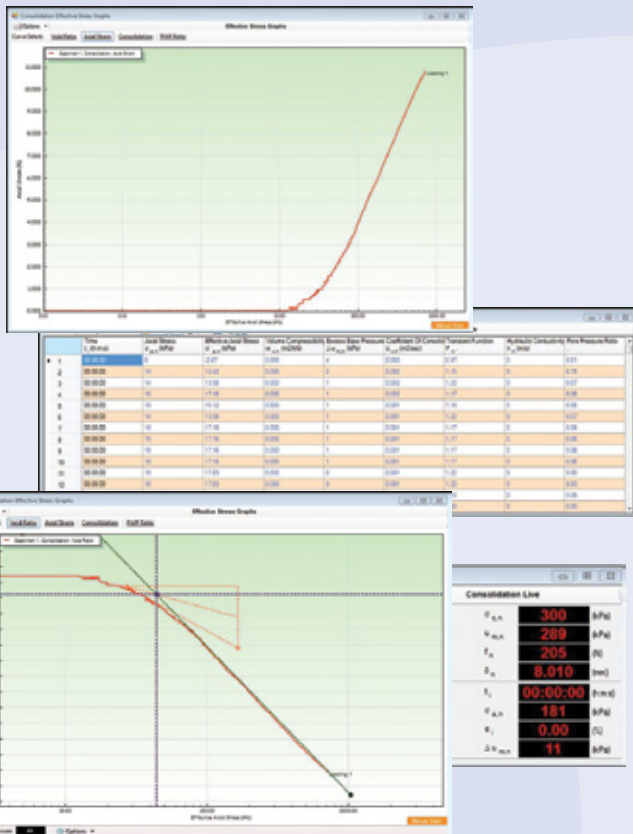
Specifications

Maximum Frame Capacity	15kN
Resolution	1N
Accuracy	0.15% FRO
Adjustable Displacement Rate	0-10.0000 mm/min
Connectivity	RS232, Wi-Fi or USB Interface
Power Supply	DC Adaptor (Output 24V DC, Input 90-240V, 50/60Hz, 1ph.)
Dimensions (W x D x H)	280 mm x 400 mm x 860 mm
Weight	32 kg

VJT-csCRS: Clisp Studio Constant Rate of Strain Software

The VJ Tech Clisp Studio CRS (Constant Rate of Strain) Software module enables the User to perform one-dimensional consolidation tests using controlled strain loading. The software conforms to ASTM D4186-06

- User defined Saturation cycles (ramp and check)
- User defined Consolidation cycles (Loading, Holding and Unloading phases)
- Easy instrument and equipment setup and calibration
- Easy test setup using wizard style Assistant
- Automated Test Control
- User configurable data logging
- Live view of sensor readings, status and calculated data
- Live graphical and tabular display of logged and calculated data
- Data export to Excel and test script export & import
- User configurable views, graphs and tables
- Customised presentation reports on request



CRS Consolidation Cell

VJ Tech's Constant Rate of Strain (CRS) Consolidation Cells are precision made specifically for soil testing laboratories. They are capable of withstanding confining pressures up to 1400 kPa and are designed with hard anodised aluminium top and base plates and a stainless steel chamber to minimise corrosion.

They are fitted with 2 Pore pressure base connections valves, 1 Back pressure top connection valve and are supplied with upper and lower porous discs and a perforated loading cap.

The Internal submersible load cell is supplied separately.



VJT0680 - Constant Rate of Strain Cell (75.7 mm) diameter



VJT0680A - Constant Rate of Strain Cell (75.7 mm) diameter with ISLC