



#### **Pundit Ultrasonic**

# Pundit Lab (+)

## A flexible UPV test instrument designed for laboratory operations



### Reliability

Lab adaptations include an oscilloscope output, power supplied via a battery, mains, or via a USB connection to a PC. Full PC control of all functionality



#### **Open Interface**

Removes the need to use the proprietary software. The open interface allows the instrument to be seamlessly integrated into the laboratory environment.



#### Ease of use

Increased receiver amplification allows optimum performance with exponential transducers which can be used on rough or curved surfaces, with or without coupling gel.













| Technology  Ultrasonic pulse velocity  Measuring Resolution  Pulse Voltage  ±125 to ±500 V (UPV)  Receiver Gain  1x, 10x, 100x, AUTO, Pundit Lab+ up to 1000x  Nominal Transducer Frequency  Pulse Shape  Square Wave  Pulse Delay  - Number of Channels  1  PC Software  Pundit Link unlocks the full Pundit Lab+ capabilities  Display  79 x 21 mm passive matrix OLED  Memory  > 500 measured values  Connections  USB connection to PC  Pulse velocity Surface velocity Surface velocity Data logging E-modulus Compressive strength correlation Crack depth  Measuring Range  Up to 15 m depending on concrete quality  Open interface Integrated amplifier gain stage Real time stamp  Available Proceq transducers: 54 kHz, 150 kHz, 250 kHz, 54 kHz exponential, 500 kHz, and 40 kHz shear wave dry point contact. Connect third party transducers with a standard BNC connector up to 500 kHz.   | Bandwidth                          | 20 to 500 kHz  |  |  |
|---|------------------------------------|--|--|--|
| Measuring Resolution  Pulse Voltage  \$\frac{\pmath{\text{to}} \pmath{\text{to}} \pma |                                    | 20 to 500 kHz  |  |  |
| Pulse Voltage ±125 to ±500 V (UPV)  Receiver Gain 1x, 10x, 100x, AUTO, Pundit Lab+ up to 1000x  Nominal Transducer Frequency 24 – 500 kHz  Pulse Shape Square Wave  Pulse Delay -  Number of Channels 1  PC Software Pundit Link unlocks the full Pundit Lab+ capabilities  Display 79 x 21 mm passive matrix OLED  Memory > 500 measured values  Connections USB connection to PC  Pulse velocity Surface velocity Data logging E-modulus Compressive strength correlation Crack depth  Measuring Range Up to 15 m depending on concrete quality  Special Features Open interface Integrated amplifier gain stage Real time stamp  Available Proceq transducers: 54 kHz, 150 kHz, 250 kHz, 54 kHz exponential, 500 kHz and 40 kHz shear wave dry point contact. Connect third party transducers with a   |                                    | Ultrasonic pulse velocity  |  |  |
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| Pulse Delay       -         Number of Channels       1         PC Software       Pundit Link unlocks the full Pundit Lab+capabilities         Display       79 x 21 mm passive matrix OLED         Memory       > 500 measured values         Connections       USB connection to PC         Weasurement Modes       Pulse velocity Surface velocity Surface velocity Data logging E-modulus Compressive strength correlation Crack depth         Measuring Range       Up to 15 m depending on concrete quality         Special Features       Open interface Integrated amplifier gain stage Real time stamp         Available Proceq transducers: 54 kHz, 150 kHz, 250 kHz, 54 kHz exponential, 500 kHz and 40 kHz shear wave dry point contact. Connect third party transducers with a  |                                    | 24 – 500 kHz   |  |  |
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| KHz, 250 kHz, 54 kHz exponential, 500 kHz  Transducers and 40 kHz shear wave dry point contact.  Connect third party transducers with a   | Measurement Modes                  | USB connection to PC  Pulse velocity Surface velocity Data logging E-modulus Compressive strength correlation Crack depth  |  |  |
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#### **Our Accessories**

| Image | PartNumber     | Description   |
|-------|----------------|---|
| d d   | Pundit Lab (+) | 2 Exponential transducer 54 kHz, including calibration rod (325 40 176)<br>Transducer 150 kHz (Two required for operation) (325 40 141) |

| Standards & Guidelines | Description |
|------------------------|-------------|
| ГОСТ 17624             |             |
| ASTM C 597-02          |             |
| CECS 21                |             |
| EN 12504-4             |             |
| IS 13311               |             |
| ISO 1920-7:2004        |             |





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