



## ***Cross-Hole Analyzer Specifications (CHAMP-Q)***

April 2018

### **Main Unit**

#### **Physical:**

Size: 320 X 250 X 68 mm (12.6 x 9.8 x 2.7 inches)

Weight: 5 Kg (11 lbs.)

Temperature range: 0 to 40°C (32 to 104° F) operating; -20 to 65°C (-4 to 149° F) storage

Display: 26.4cm (10.4"), sunlight readable, resolution 1024 X 768

Built in capacitive touch screen

Video Outputs: HDMI, VGA

Power: 4 hour continuous data collection with internal 12V battery, or 100 – 240 VAC power supply

Charging Time: 6 Hours max.

#### **Electronic:**

Microsoft Windows® 10 Operating System

60 GB SSD internal drive

Ethernet port

4 USB ports

12 bit analog to digital (A/D) converter

Sampling rate: 500 kHz, 1 MHz and 2 MHz, user selectable (equivalent measuring accuracy 2µs, 1µs and 0.5µs)

Scan rate: 32 scans/seconds

Record size: 250, 500 and 1000 points, user selectable

User adjustable gain, trigger level and transmit power level

#### **Other:**

Operates in English or SI Units

Furnished with CHA-W software

Full one year warranty

Technical manual included

### **Probes**

#### **Physical:**

Size: 215 mm length x 25 mm diameter

Element: ceramic

Housing: nickel plated brass

Independent depth encoder for each probe

Maximum measuring distance (probe separation): 3m

#### **Electronic:**

Receiver: tuned to 45 KHz nominal

Transmitter frequency (nominal): 45 KHz

Transmitter voltage: 200, 400, 600 or 800 Volts (user selectable)

### **Cables**

Cable material: heavy duty polyurethane outer jacket



*Pile Dynamics, Inc.*

**Quality Assurance for Deep Foundations**

Cable length: 60, 100 or 150 m

Cables spooled over tripod (standard) or with optional Motorized Probe Deployment System (60 m only)

## **Motorized Probe Deployment System**

### **Main Unit**

Size: Two 380mm X 480mm X 405mm spools

Weight: 11.3Kg each

Includes 60 m cable, detachable from spool

Includes depth encoder for each probe, attached to frame

### **Motor Control Unit**

Size: 240mm X 160mm X 90mm

Weight: 1.6 Kg

Powered by either external battery (8 hours duration), 12VDC car battery, or 100 – 240 VAC with 12VDC converter

Fast charger to recharge the external battery in 4 hours

Variable probe pull rate: 0.150 to 0.915 m/sec (low, medium, high speed selection)

Resettable circuit breaker motor protection

Operating temperature range: 0° to 40°C

Storage temperature range: -10° to 65°C

### **Other**

Includes pulley for placement at the tube

Includes roller guide for routing cable through re-enforcement rebar cage or over casing