



ParklandGEO has invested in a range of specialized foundation monitoring and testing equipment; and highly qualified geotechnical engineers to provide advanced pile monitoring and QA/QC testing services to the piling industry in Western Canada. A partial list of our pile testing and monitoring equipment is provided below. This equipment is available as part of a full service testing package or on a rental basis for select clients.

#### **PILE LOAD TESTING:**

ParklandGEO has equipment for both dynamic and static pile load testing. Our PDA equipment is set up for wireless and remote use. For static pile load testing, ParklandGEO can provide all of the equipment necessary to test piles up to loads of 4450 kN (100 kips) with either manual or digital data collection. Our digital data acquisition system can plot load versus deflections in real time. The only equipment that we do not provide are the reaction beams and calibrated jacks which are available for rent and/or are often supplied by local piling contractors. Our load testing equipment includes:

- PDI Pile Driving Analyzers (PDA) - PAX Models (8 sets)
- RST 4500 kN (1000 kip) Strain Gauge Solid Load Cell
- RST 69 MPa (10,000 psi) Hydraulic Pressure Transducer
- FlexDAQ Datalogger capable of monitoring 10 sensors, 40 strain gauges and 5 in-place inclinometers using compatible 20 m Cables with Military Connections
- Eight (8) Piece Set of 150 mm Linear Potentiometers with Magnetic Bases
- Six (6) Piece Set of 100 mm Mechanical Dial Gauges with Magnetic Bases
- Sectional In-Place Vertical MEMS Inclinometers for Lateral Load Testing (Up to 40 m)

#### **PILE MONITORING:**

In addition to conventional visual pile monitoring, ParklandGEO has equipment to: produce digital pile driving records and to undertake down hole inspection of small shaft bored or driven pipe piles; vibration and noise monitoring during pile driving; and non-destructive integrity tests on concrete piles (pre-stressed concrete, drilled shafts, auger cast and concrete filled pipe piles). Our pile monitoring equipment includes:

- PDI E-Saximeter Pile Monitoring Units (10 sets)
- PDI Pile Integrity Tester (PIT) - Model PIT-FV
- Image Inspection Services Model 2CX Down-Hole 2.5" Camera with 200' Cable
- InstanTel Blastmate III Eight Channel Seismographs with Microphones and 30 m Cables (7 sets)

All of our equipment is supplied and serviced by RST Instruments Ltd. of Vancouver or by PDI Inc. of Cleveland, Ohio. ParklandGEO also has experience using PDI Thermal Imaging Profile (TIP) equipment; and have project managed and designed Osterberg Cell Static Load Test programs subcontracted to LOADTEST Inc.