

# CG-6 AutoGrav Data Sheet

The new CG-6 is the latest generation micro gravity meter from Scintrex ltd. Utilising the same patented quartz sensor technology as its predecessor (the <u>CG-5</u>) the CG-6 offers fast, reliable and precise gravity measurements. Designed with the end user in mind the CG-6 interface is intuitive and simple to operate. With 4GB internal flash memory and the option to transfer data in real time to a recording tablet data is constantly backed up.

The all new Lynx LG application provides additional in-field data quality control and analyses at the operator's finger tips. With real time tide, tilt and ocean load corrections being displayed on screen during data acquisition it is possible to isolate sources of noise and rectify them quickly.



### Features:

- Integral GPS (I.e. not an add-on stuck out the side)
- Bluetooth and USB connectivity for easier and faster data download
- Choice of Berger, ETSTAB or user defined tide corrections
- In-field simple Gravity profiles and Bouguer anomaly maps
- Lynx LX software, for mapping real-time positioning, previous survey/station recall, station /route import capability and post processing,
- · Simplified tilt and drift calibration interface via Lynx software
- User selectable filters Blackman-Harris (FIR) or moving average
- Data acquisition software permits user to upload predefined station coordinates for improved survey management
- Addition of Ocean Load Correction choice of Schwiderski (default), FES2004 or CSR3.0.
- Graphical display of instrument metadata for improved data QC. Including; level, tide, load, temperature, drift. Toggled view between raw measurement values and gravity correction in ?Gal.
- More intuitive user interface, faster levelling
- · Can operate via rugged tablet PC
- Greater data storage
- 35% lighter
- · Reduced profile means better performance in windy conditions





### **Product Dimensions**

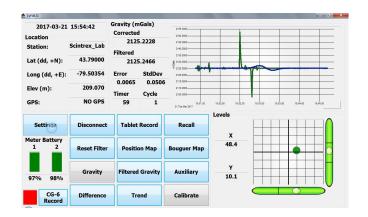
| Physical          | Dimensions (L x W x H)  | Weight                      |
|-------------------|-------------------------|-----------------------------|
| (instrument only) | 24 cm x 21 cm x 21.5 cm | 5.2kg (including batteries) |

# **Technical Specifications**

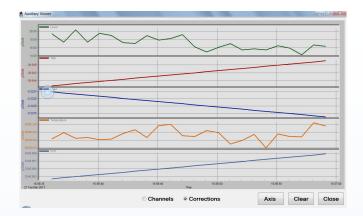
| Sensor Type:                          | Fused quartz using electrostatic nulling  |
|---------------------------------------|---|
| Reading Resolution:                   | 1 microGal  |
| Reading Standard Deviation:           | < 5 microGal  |
| Operating Range:                      | World-wide (8,000 mGal without resetting)   |
| Residual Drift:                       | < 20 microGal/day   |
| Uncompensated Drift:                  | < 200 microGal/day  |
| Range of Automatic Tilt Compensation: | ±200 arcseconds   |
| Tares:                                | Typically < 5 microGal for shocks up to 20 g  |
| <b>Automated Corrections:</b>         | Tide, instrument tilt, temperature, noisy sample filter, seismic noise filter, drift  |
| Data Output Rate:                     | Up to 10 Hz, user defined.  |
| GPS Accuracy:                         | Standard < 15 m; DGPS (WAAS) < 3 m  |
| Touch-Free Operation:                 | Handheld Tablet with Bluetooth  |
| Battery Capacity:                     | 2 X 6.8 Ah (10.8 V) rechargeable lithium smart batteries. Full day operation at 25 $^{\circ}\text{C}$ (77 $^{\circ}\text{F})$ |
| Power Consumption:                    | 5.2 Watts at 25 °C (77 °F)  |
| Operating Temperature:                | -40 °C to + 45 °C (-40 °F to 113 °F); Optional high temperature version to +55 °C (131 °F)                                    |
| Memory:                               | 4GB internal flash memory. External memory, courtesy of the tablet, of over 50GB.   |
| Digital Data Output:                  | USB and Bluetooth   |

# Gallery

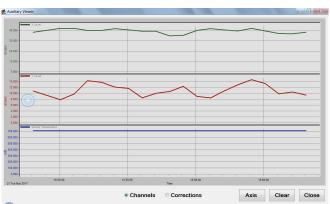




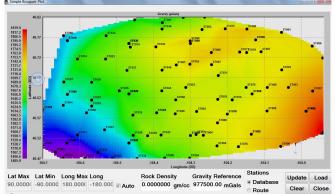




Profiles showing the real time corrections applied to the measurements during a measurement cycle.



during a measurement cycle.



Example Bouguer anomaly map

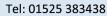






Image showing the CG-6 data acquisition screen. All metadata required for accurate data QC is clearly visible and accessible for the operator.



CG-6 with all field accessories.

### **Videos**

Scintrex CG 6 Autograv<sup>™</sup> Video <a href="https://www.youtube.com/watch?v=oNjCK65-2e0">https://www.youtube.com/watch?v=oNjCK65-2e0</a>