



Low-consumption technology ●

Smart data communication ●

Instant-off measure on coupons ●

Interference analyses ●

Long-life battery ●

Designed for Kettner Pole ●

**G4D**

## Remote monitoring of cathodic protection



# G4D

## Remote monitoring of cathodic protection, wherever you are

The G4D is the device of the G4C family specifically designed for remote monitoring of measuring points and designed to be installed on a Kettner pole or similar. It has 5 galvanically isolated measurement channels with which to make all typical measurements: ON potential, AC interference, shunt current on shunt, instant-off potential on coupon, polarisation current. Measurements are taken by the device on a continuous basis and then processed in the daily report which provides comprehensive information on the evolution of measurements and of out-of-threshold over 24 hours.



## An integrated solution for greater efficiency

### COMPACT DESIGN

All the elements that contribute to the functionality of the device (measurement section, modem, memory, battery, cyclic switch) are integrated in a single compact housing that makes it suitable for any application context.

### MAINTENANCE & DIAGNOSTICS

To optimise maintenance work in the field, the device also transmits diagnostic parameters (communication, rectifiers, faults, etc.). The firmware update can be carried out both locally and remotely.

### WEBPROCAT

Platform for managing data collected from cathodic protection monitoring devices: analysis, time trends, graphical representation, cartography, regulatory compliance, reporting, device configuration, rectifiers remote control, synchronisation of manual measurements, export, integration with third-party applications (SCADA, SAP, CARTOGRAPHY, etc.).

### FIDO UNIVERSAL

The activities carried out by the operator in the field, both in terms of manual measurements and in terms of installation/maintenance of the devices, are managed in the field with the **Fido Universal** application via local communication in Bluetooth Low-Energy and automatically synchronised with **WebProCat**.

## A tailor-made solution for the protection of your network

### AC/DC MEASURES ON THE SAME CHANNEL

5 galvanically isolated measuring channels on which both DC and AC measurements can be made on the same physical channel, with full scale selectable according to the type of signal measured.

### INSTANT-OFF ON COUPONS PER SECOND

Integrated solid-state switch for instant-off measurement on the coupon with frequency per second and measurement cycle parameters configurable on a millisecond basis, also for overprotection verification. Complies with the specifications of ISO 22426.

### MEASURES PER SECOND ON REQUEST

Frequency measurement per second on all channels. Storage of the daily log of 86,400 samples in a cyclic queue for a duration of 7 to 62 days, depending on the enabled channels, and possibility of full transmission on demand.

### DAILY REPORT OF 86,400 SAMPLES

Daily summary report of measurements per second with local storage in a cyclic queue with a depth of 1 year: average, minimum and maximum value with date and time of detection; mean square deviation, trend and variability; number and total time of out of threshold.

### CONFIGURABLE MEASURE TRANSMISSION

Sending of daily report or instantaneous value with a defined frequency. When communicating with a SCADA system, polling is possible every minute/hour/day.

### REAL TIME ALARMS

User-configurable alarm thresholds for each channel and for external power supply failure; possibility of alarm notification (SMS/EMAIL) in real time.



### COMMUNICATION PORTS

- Local: BLE with Fido Universal management software
- Remote: 4G with WebProCat/other platforms

### CATHODIC PROTECTION MEASURE

- 5 galvanically isolated channels
- Simultaneous AC/DC measurement on the same physical channel
- Selectable scales  $\pm 500$  mV,  $\pm 20$  V,  $\pm 50$  V,  $\pm 100$  V – DC
- Measurement accuracy: 0,02% FS
- OFF measurement on coupons (instant-OFF), parameterisation to the millisecond
- Protection against impulsive transients 10/350 uS > 5 KV

### POWER SUPPLY

- Integrated long-life lithium battery (+5 years)

### MECHANICAL DATA

- Dimensions: L 7 x H 38.5 x P 6.5 cm
- IP68/IK07
- Weight: 0.95 kg
- Operating temperature: - 20 °C ÷ + 85 °C
- Installation: Kettner Pole

### COMPLIANCE WITH STANDARDS

- ISO 15589-1, ISO 22426, ISO 18086, ISO 21857, ISO 22426
- EN 12954, EN 13509
- UNI 11094, UNI 10950, APCE guidelines
- NACE SP0169, TM0497, RP0104



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Contact us



**AUTOMA s.r.l.**

Via Casine di Paterno, 122/a - 60131  
Ancona (An) - Italy  
Tel.: +39.071.8028042  
Fax: +39.071.802374

**[www.byautoma.com](http://www.byautoma.com)**  
e-mail: [info@byautoma.com](mailto:info@byautoma.com)