# The TRAX+G family

Programmable Terminals with integrated Ethernet interface for Data Collection, Time & Attendance and Access Control Recording

Also with GSM/GPRS and WLAN 802.11B versions

## Description

TRAX+G is a family of **data collection terminals** designed to satisfy your need to monitor the activity of production personnel and operating machinery, as well as provide you with full **attendance recording and access control** capabilities in offices, factories, hospitals and work sites.
All **main communication and Auto ID technologies** are offered incorporated in different versions.


### *Overview*

- **Easy to use**

TRAX+G terminals meet the growing demand for **easy interfacing to existing LAN's or WAN's**, which are nowdays considered standard both in the industrial sector and in all office applications.

- **Best price/performance ratio**

Easy to be mounted, TRAX+G is without doubts **the most cost-effective and practical solution**.

### *Main features*

- ➡ **Integrated Ethernet/IP** Interface with P.O.E (Power over Ethernet) support. Allows the simplest wired type installations.
- ➡ **GSM/GPRS** versions allow communications via GSM data sessions, or in/out sms or GPRS with TCP/IP pocket data transmissions.
- ➡ **WLAN 802.11b** version allows using TRAX+G in environments with WiFi Internet coverage.
- **Internal magnetic, barcode or proximity** (RFID) **card readers**. Wide range of technologies:
  - 125 KHz 64 bit read only
  - ISO 14443A & Mifare®
  - LEGIC®advant and ISO 15693
- **Time & Attendance and Access Control firmware included**.
- Script interpreter for **customized data collection procedures.**
- **Compact and elegant design**, appreciated when space saving is important such as on a work bench or in a reception area.
- **Wall/pole or table mounting**, thanks to reversible casing top. Optional floor mounting "pole".
- Robust, splash/dust proof casing, IP65 (except for barcode version). Not inflammable casing, **ABS-VO.** Connector cover and wall support are in aluminium.
- Mounting, maintaining and moving the terminal is made easy thanks to the **special bracket** supplied with the terminal and thanks to its **extractable connector block**.

- **Wide configurability with 99 parameters** both from the keyboard and communication channels.

- **File system based memory allocation.**

- **Off-line**, autonomous mode using its standard FW or internal procedures (supplied by your Systems Integrator) or **on-line real time operation** under the control of the host computer. If the host does not reply within a user-defined time limit, the terminal automatically goes into off-line mode.

- Automatic programmable shut-down in the event of a **power supply failure**. The terminal can retain its data for two months. The battery ensures up to 6 hours functioning time (magnetic reader versions). It is programmable to turn off after a number of minutes.

## ***Functionalities***

- TRAX+G terminals **contain the standard Attendance Recording/Access Control firmware found in PROX+F/G terminals**, which allows you to:
  - validate transactions by user group and time zones,
  - allocate description codes for different transactions,
  - record the attendance of a non card-holder under the authorisation of another person who is a card-holder,
  - review all the transactions of a single user,
  - display messages and data prepared by the controlling computer.

- You can define a **vast variety of interactive, events driven data collection transactions**: the correctness of data can be checked by means of prompts to the user and data validation tables. The user can make choices from an interactive menu, the terminal will make a print-out or activate a relay on the basis of the data introduced. You can include the value of the counter on the optoinsulated input line.

- **Each transaction can be controlled by a procedure previously loaded onto the terminal** and activated using the function keys. You can move from one procedure to another on the basis of the data collected from the keypad, or from the barcode, magnetic or proximity card readers. The procedures can also be activated at a set time on a set day of the week.

- The management of data, procedures, and configuration parameters, either from a remote computer or via the keypad, is extremely flexible thanks to the **memory based on a file system and its powerful set of shell commands**, accessible via RS485/NET92, serial, Ethernet or wireless connections.

- **Customers specific applications** can also be written in "C" and downloaded into Flash Memory, extending or replacing the standard functions.

## ***Software Support for TRAX+G***

**Can be downdoaded from the Partners Area on our web site_at any time (apply for a password if you don't have one): www.tmc-srl.it**

- **Ethertest and TMCDLL Demo**
  For immediate remote configuration of TRAX+G parameters and terminal testing.
- **OCX** (Etherctrl.ocx / EtherCtlTest.exe )
  For developing your on-line/off-line applications. Demo program in VB6 for evaluation and testing.
- **DLL's** (Proxc.dll / TMCDLLdemo.exe)
- **TraxIT** (TraxIT32.exe)
  Complete application for remote configuration of TMC terminals in different installation types and for batch communication sessions.

## ***New: Functional upgrades features***

- Versions with **RS485/RS232 interfaces** only available.
- Ethernet option **can be activated later on buying SW keys**.
- Normal Ethernet versions without NET92 mastering capability can be activated.
- Other **FW options** (i.e. Wiegand compatibility) will be **offered with the same SW keys activation mode.**

## Hardware Specifications

| | |
|---|---|
| **Display** | 128x64 graphic, superTwist white led backlit, up to 4 fonts on the screen at the same time. Up to 25x6 text rows, icons bitmaps support. |
| **Keypad** | membrane type, dust and splash proof, 20 keys with tactile action, guaranteed for 2 million operations. |
| **Internal reader** | Magnetic ISO track 2, I.R.barcode, or proximity: 125KHz 64 bit read only; ISO 14443A Mifare®, LEGIC® advant and ISO 15693. Available without reader on request. |
| **Auxiliary reader** | RJ11 connector for external barcode reader (pens,CCD,laser,barcode slot readers). Alternatively for optional secondary Magstripe or RFID reader. |
| **Barcode decoder** | EAN, I2/5, C39, C128, EAN128. |
| **Beeper** | Single tone buzzer. |
| **Battery** | **Backup battery capacity:** : 550mAH<br>**Average consumption with magnetic reader:** 90mA<br>**Average consumption proximity readers:** 170mA |
| **Communication ports** | **Ethernet:** RJ45 connector 10BaseT - UDP/IP. **PoE (Power Over Ethernet)** compatibility.<br><br>**RS232:** optoisolated 1200, 2400, 4800 or 9600 Baud. On extractable screw-connector block.<br><br>**RS485 (NET92):** can be used for master or slave RS485 applications. On extractable screw-connector block.<br><br>**GSM/GPRS versions:** features GSM data, SMS, GPRS TCP/IP communications. (RS485 and Ethernet still available, but not RS232). Internal, not visible antenna.<br><br>**WLAN 802.11b version:** internally connected via RS485. EtherLite/UDP compatible. |
| **Input/output ports** | **Input:** 1 digital (optocoupled)<br>**Output:** 1 relay 2A 60V - **option up to 4 Telerelays** |
| **Memory** | 128 KB RAM for file system and variables<br>256 KB flash for O.S. and reloadable firmware<br>32 KB bootloader |
| **Power supply** | 10 to 40 Vdc, 100-400 mA at 12 Vdc (depending on versions) |
| **Working temperature** | -10° C to + 50° C |
| **Storage temperature** | -20° C to +70°C |
| **Humidity** | 0 to 95% non condensing (barcode version) |
| **Casing** | ABS-VO. IP65 (except for barcode version) |
| **Dimensions** | 120 x 200 x 100 mm (WxHxD) |
| **Weight** | 740 g - 950 g (depending on versions) |