

GX Cellular Interrogators

GSM Cellular Interrogator Systems 850/1900 and 900/1800 MHz

Cellular monitoring systems are U.S. export controlled and sold to U.S. Government and authorized foreign government agencies only.

GX Series 200

Fully functional 20w Base Transceiver Station (BTS)



GX Series 100 "Micro"

Applications

The GX line of GSM interrogators enables operators to conduct network surveys and interrogations thus providing a detailed collection of what handsets are within the GX range. Through the GX functionality the operator can then conduct denial of service, direction finding or other surgical attacks on target phones.

Features

- Compact device integrated into custom 1620 PELICASE, capable of operation in vehicle or a static location
- Contains three fully functional "commercial grade" BTS transceivers (2x20W GSM, 1x5W UMTS)
- Supports high speed acquisition of handsets (up to 800 per minute), across up to two simultaneous networks
- Available in 900/1800/2100, 850/1900/2100, or any custom combination
- Full identification of IMSI, IMEI and TMSI information and dynamic control capabilities, including comprehensive denial of service
- Optional SMS and "Man-in-the-Middle" voice decode/record and forward (GSM only)
- Optional "In Network Calling" allowing calls to be made within the GX system (GSM only)
- Excellent RF performance in high multi-path environments
- Built-in "environment monitor" to assess the number of GSM networks in an area, the respective configurations, and provide information to optimally configure the BTS module

Proprietary "TrueStealth" technology supports repatriation of original TMSI and GCI on most handsets. This allows for rapid information gathering to later use on a complimentary passive system, and also virtually eliminates the possibilities of being detected due to switch activity on the network.

Each GSM transceiver is independently configurable for all network parameters, and can transmit between 130mW and 20W in 2dB steps. Uses BCCH CRO manipulation to give a "virtual power" effect of up to several hundred watts.

Specifications

Uplink port for connection to a LAN facilitating remote diagnostics and simple software upgrading.

- Frequency Operation Range: 850/900/1800/1900 MHz
- Powered by battery, 9-36 VDC or mains via an AC adapter
- Comprehensive MySQL database featuring handsets cross referenced against IMEIs, and networks against PLMNs. In many cases, a picture of the model of handset is presented to the operator when querying an IMEI
- Built-in 802.11 wireless access point supporting full remote control. The communications protocol is proprietary and self-optimizes to accommodate the bandwidth available
- Uplink port for connection to LAN facilitating remote diagnostics and simple software upgrading
- Operates in:
 - Fixed and mobile environments; and
 - Frequency-hopping environments

GX Series has four primary modes of operation:

Interrogate Mode: Designed to force all handsets in the coverage area of the GX system to identify their IMSIs and IMEIs, store them in a system database, and release the handsets back to the commercial network in a non-destructive manner.

Targeted Mode (GSM only): Designed to force all handsets in the coverage area of the GX system to identify their IMSIs and IMEIs, store them into a system database, and release the handsets back to the commercial network in a non-destructive manner with the exception of those handsets designed as “targets”. They will be locked to the system until they either go out of range or the systems allows them to be released.

Firewall Mode (GSM only): Designed to force all handsets in the coverage area of the GX system to identify their IMSIs and IMEIs, store them into a system database, and lock them, thus, controlling the capability to make or receive calls, SMSs, etc. The exceptions are handsets designed as “operatives”; they will be released back to the commercial network in a non-destructive manner.

DF Mode (GSM only): Designed to force all handsets in the coverage area of the GX system to identify their IMSIs and IMEIs, store them into a system database, and release the handsets back to the commercial network in a non-destructive manner with the exception of those handsets designed as “DF”. They will be locked to the system until they either go out of range or placed into a “covert call” mode that facilitates their location with a DF unit.

