

Small Instrumentation Modules

SIM900 — Mainframe



SIM900 Mainframe

- **Rugged, compact design**
- **8 module slots**
- **9th port for remote module**
- **10 MHz reference with ext. sync**
- **Cascade multiple mainframes**
- **GPIO and RS-232 interfaces**
- **Start-up script memory**

- **GPIO interface ... Free** (introductory offer)

SIM (Small Instrumentation Modules) is a robust, flexible platform in which up to eight high-performance instruments share the same compact mainframe and computer interface. Unlike other modular systems, both front-panel and computer operation are possible. With SIM you get the functionality you need while avoiding the cost of unnecessary features. You configure your own system from a broad and growing selection of modules.

The SIM900 Mainframe is the platform on which a SIM system is assembled. The mainframe provides power, computer interfaces, clock synchronization, and individual module status. Eight internal module slots accommodate single-width and double-width modules. For the occasional application needing a module right next to an experiment, a rear-panel connector and an interconnect cable permit operation of a 9th module outside the mainframe.

Communications

The mainframe comes with a standard RS-232 host interface and GPIO (IEEE-488.2) as an option. All commands and queries to individual modules are routed through the mainframe host interface. Messages are routed based on their port number, with the mainframe seamlessly relaying data to and from the appropriate destination. This messaging system is also used to communicate through the two auxiliary RS-232 ports. Using these ports, any number of SIM900 mainframes and other RS-232 instruments may be controlled through one host interface in the master mainframe.