MASS2  
*Maintenance and Set-up Software*

User friendly interface for setup, configuration, surveillance, maintenance and network display of RAMSYS monitors.

**FEATURES**
- User friendly and ergonomic Microsoft Windows® based interface
- Display network of connected RAMSYS monitors
- Right-click instant access to the monitor configuration screens
- Communication through standard RS232 or RS485 serial link
- Integration on the site Ethernet network
- Password protection (multi level)
- Display of up to 4 spectra curves with associated data simultaneously (for liquid, iodine, N-13, N-16, particulate and gas monitors)
- Detector adjustment and spectrum energy calibration
- Treatment functions as smoothing and subtraction

**DESCRIPTION**

The MASS2 software is a powerful tool to set-up, configure and verify monitors belonging to the RAMSYS product line. It capitalizes each feature of the system and offers many functionalities to aid exploitation of the full capabilities of each monitor.

The MASS2 functionalities were developed based on ten years experience with the RAMSYS system. Moreover it extends the RAMSYS family spectroscopy features by adding powerful spectrum acquisition and manipulation functions of the SAMS software. It allows acquisition and analysis of the monitor (with LPU/SAS/Nal, LPU/SAS/Nal/Beta or LPU/SPIPS) in true or live time, total counting, region of interest counting or statistical evolutions.
MASS2 | MAINTENANCE AND SET-UP SOFTWARE

MAINTENANCE AND SET-UP FUNCTIONS

• Display graphically the network of monitors using one of the selectable modes:
  - Topology
  - Associations between display and processing monitors
  - List
• Display measurements and statuses with dedicated colors for each state
• Display event summary of the monitor
• Display measurement historical trends
• Set network management (local host or site network)
• Log file management

• Through pull-down menus and a variety of pre-designed dedicated screens:
  - Set operational parameters (alarm thresholds, analog outputs, analog input...)
  - Set system parameters (network address, algorithm configuration...)
  - Easy upgrade of the monitor firmware and set of parameters

• For each configuration screen:
  - Verify parameter validities automatically before writing on the monitor
  - Secure access and reload the parameters
  - Compare visually saved parameters with the monitor current ones

SECURITY

MASS2 manages four user access levels and allows to create user accounts. High level users may define the visibility access level of each functionality. High level users may also personalize configuration screens by defining read and write access levels for each set of parameters.

SPECTRUM ACQUISITION AND MANIPULATION FUNCTIONS

For each monitor with spectroscopy features, MASS2 allows to launch the SAMS dedicated software to acquire, visualize and manipulate spectra.

The spectrum display window gathers on the same screen all the information the user needs to drive the acquisition. Frequently used functions can be accessed directly through buttons like:
  • Select a spectrum’s curve to handle and/or to display
  • Enter preset value of acquisition time
  • Start/stop acquisition
  • Clear spectrum
  • Zoom in, zoom out, zoom between cursors or display entire spectrum
  • Manual/automatic vertical scale
  • Lock/free cursor interval (region’s width)
  • Select, define or clear a region of interest

This software can be used as an operational tool for spectrum acquisition and for detector calibration. It gives extended spectrum diagnosis information as well as rough isotopic discrimination. It is directly connected to the LPU/SAS/NaI, LPU/SAS/NaI/Beta or LPU/SPIPS. SAMS can be used simultaneously with MASS2.

COMPLEMENTARY FUNCTIONS

MASS2 is multilingual and facilitates addition of new languages by managing easily translatable ASCII text files.