

Product Factsheet

# scisys

## UNIT

The Complete Solution to  
Advanced Automated Control

UNIT is a component based suite of graphical products that can automate any legacy or new control system. UNIT was developed by SciSys in response to customer demands for a low cost COTS product to automate spacecraft operations and testing.

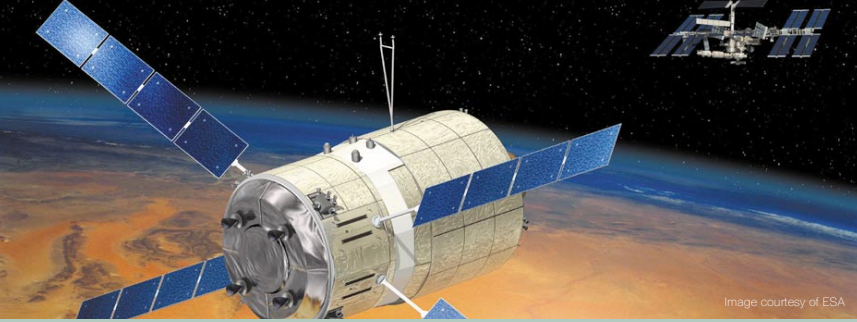


Image courtesy of ESA

## Automated Operations with UNiT

UNiT provides an attractive alternative to traditional high cost control systems which are based on the manual execution of repetitive pre-set tasks. With the increasing complexity of systems being controlled, operators require an intelligent system which combines state-of-the art software with an efficient operating environment.

### Key Features

#### Automated Procedures

- Created using a graphical editor
- Testing and debugging environment
- Configuration management
- Real-time graphical display of executing procedures
- Client Server supporting multiple clients
- Supports multiple procedures executing in parallel
- Remote access over web
- Log viewer and final state display
- Configurable procedure importer

#### Automated Monitoring

- Trend analysis
- Identification of anomalies

#### Event Handling

- Automatic execution of recovery actions
- Failover to warm/cold start
- Alarm handling and pager interface

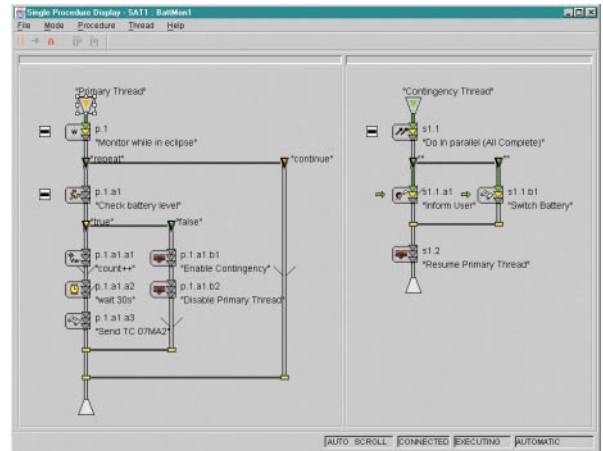
#### Automated Schedules Extension

- Created using a Gantt representation
- On-line execution
- Schedule storage in plain text.

### Intelligent Real-Time Control

#### UNiT Integration

With its fully functional API, portability and ease of integration, UNiT has already been proven for systems hosted on Windows and UNIX platforms.



#### UNiT Clients

UNiT was developed under a partnership programme for the European Space Agency (ESA). Using knowledge from satellite operations experts at ESA, SciSys has created this easy-to-use graphical based system to provide operations staff with the tools they need to completely automate operations.

#### UNiT clients include:

- EUMETSAT for the Meteosat Second Generation system - all MSG operations are automated with UNiT
- EUTELSAT for legacy and SCOS-2000 systems
- UK Ministry of Defence for the SKYNET satellite
- ESA, SCOS 2000 proof of concept demonstrator

### Benefits

#### Cost Efficient Operations

Cost reduction, improved efficiency and consistency is achieved through UNiT's advanced automation features enabling autonomous operations.

#### Anomaly Detection

UNiT's timely response to anomalies and faults reduces data loss through its automated alerting procedures and visual display of system problems.

#### Advanced Technologies and Portability

Incorporating advanced software tools such as Gensym's G2 real-time intelligent system and Java, UNiT provides an advanced user interface with Web access capabilities and portability through the platform independence supported by these software tools. The Schedule Extension is built on ILOG Views.

#### Increased Functionality

UNiT adds additional automated functionality through its ability to schedule, configure, edit and execute procedures in addition to status monitoring and event handling.

#### Visual Knowledge Representation

UNiT allows non-software specialists to automate operations using an intuitive graphical language and Gantt Schedules. UNiT provides operators with a high level view of operations enabling operators to view scheduled events.

For further information simply email: [marketing@scisys.co.uk](mailto:marketing@scisys.co.uk) or call +44 (0) 1249 466466.