

Rugged solutions for real-time monitoring and control

EDAC voice autodiallers provide a cost-effective solution for remote monitoring, controlling and interrogating applications.

The autodiallers can report via telephone, cellphone, or pager networks. Analogue or Digital state or alarm can be monitored. Equipment can be remotely controlled.

Autodiallers are used in applications in just about every industry. Wastewater, manufacturing, horticulture, agriculture, irrigation, hospitality, telecommunication, petroleum and many more industries have realised the cost-effective solution that can be provided by the EDAC voice autodialler.

The EDAC 700 Remote Terminal Unit (RTU) has 20 channels configurable as digital output, digital input or analogue input.

The inputs/outputs can be grouped together to initiate an appropriate response for each group with the aid of the call list and roster rotation function. This allows the end user to map specific contact groups to a malfunction, or alarm condition for a specific time of day.

Service personnel can remotely interrogate the EDAC 700 RTU to confirm the status before embarking on a lengthy journey. Access to the unit is controlled by pin numbers so that the system or plant is not vulnerable to unauthorised personnel.

The EDAC 700 RTU utilises standard telephones, cellphones, alphanumeric paging and SMS messaging to communicate its status. User recorded text and voice messages can be stored in non-volatile flash.

The EDAC 700 RTU is a cost-effective platform for essential monitoring and control in a variety of applications. It eliminates the expense of third parties and enables contact to be made directly with those that need to be informed.

The EDAC 700 RTU has onboard Power Supply and Battery Backup. This provides for up to 24 hours of normal operation without mains power.



Case Study

EDAC 700 - Server Room Monitoring and Control

Background

An EDAC 700 RTU was installed by a District Council in Australia. The EDAC 700 was set up to monitor the main server room, which maintained mission critical data and applications for the council.

Challenge

The council needs to monitor all critical situations in the server room.

This included UPS (uninterruptible power supply), mains fail, battery fail and fault conditions, water and humidity alarm sensors, temperature sensors and server watchdog timers.

Solution

Should an alarm condition occur, the EDAC 700 was configured to automatically switch on sirens and strobe lights locally.

The EDAC 700 RTU provides peace of mind, ensuring that important alarm events are dealt with before they become critical problems.

Developed and Manufactured by:

EDAC Electronics LTD, 11 Birmingham Drive, Christchurch, New Zealand
Ph: +64 3 341 5166 www.edacelectronics.com © EDAC Electronics LTD 2006

EDAC 700



Technical Specifications

Configurable Input/Output - Alarm, Monitor and Control

20 Programmable I/O in total (Digital Input, Analog Input & Digital Output).

- Configurable as 'report only' or 'alarm notification'
- Digital Inputs
 - Up to twenty digital inputs
 - Normally Open Contact
 - Normally Closed Contact
- Analogue Inputs
 - Up to twenty 12 bit analogue inputs configurable for either
 - 0V to 1V
 - 0V to 10V
 - 4 mA to 20mA
- Outputs
 - Up to twenty digital outputs
 - Open collector
 - 150mA maximum current
- Zener diode protected inputs up to 24VDC
- Inputs also reverse polarity and over Voltage protected by crowbar diode

Voice and Pager Messages

- Up to 300 seconds of System and User Recordable Voice Messages
- 20 second voice messages per input and group (default 20 seconds can be extended)
- 40 digit alpha-numeric or numeric pager message per input or group

I/O Messages, Groups, Call Lists, Time Frames and Rosters

The relationship between I/O Messages, Groups, Call Lists, Time Frames and Rosters enables the user to configure the EDAC 700 to call appropriately skilled personnel to specific alarm conditions allowing for changes in shifts. The correct person will be notified at the correct time with a suitable report indicating the reason for being called.

- Groups
 - 1 to 20 inputs per input group
 - 1 to 9 outputs per output group
 - 1 group name message per group
 - Groups can be either input or output but not both

- Call Lists
 - 1 to 20 telephone numbers per call list
- Time Frames
 - choice of timeframe (day/night)
- Rosters
 - unlimited rosters
 - only one active roster at a time

Programmable Parameters

- Up to 20 telephone or pager numbers per call list
- One voice, alphanumeric pager and SMS/text message per physical input and I/O group
- Up to 40 digits for telephone or pager number
- Reporting and System Messages
- 4 digit security PIN numbers
- Groups, Call Lists, Rosters, Time Frames

All functions are programmed using the keypad and LCD display, the RS232 port or via the modem with HyperTerminal™ and/or 700 Link software.

Communication

- PSTN Line Interface - standard RJ45 connectors
- Internal 14k4 modem
- 2 line 20 digit LCD display
- 18 key splash-proof keypad

Microprocessor and Memory

- Motorola HC11 microprocessor
- RAM: 64KB program and database memory
- Flash RAM: 4MB for OS and voice messages

Electrical

- Input Voltage: 10VDC to 30VDC
- Input Current: 300mA normal operation
- Battery Backup: 12V 7A/Hour battery capable of over 24 hours normal operation

Mechanical

- Weight: 10 kg
- Height: 303 mm
- Width: 343 mm
- Depth: 120 mm