Environmental Monitoring System

Communication Rooms

Operational Manual
Dated 22/03/12

Software OS Version 2.0.4
1. Document Management

This document is stored in the FM team share.

Document History

<table>
<thead>
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<th>Date Issued</th>
<th>Author</th>
<th>Reason for Update &amp; Changes Made</th>
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<td>June 2011</td>
<td>Tom Farnan</td>
<td>Written</td>
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<td>1.2.1</td>
<td>July 2011</td>
<td>Tom Farnan</td>
<td>Major software Update</td>
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<td>March</td>
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Table 1: Document History

To be read in conjunction with the following documents:

<table>
<thead>
<tr>
<th>Document Name</th>
<th>Version No.</th>
</tr>
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<tbody>
<tr>
<td>Environmental panel drawings</td>
<td>DWG114739 version P1</td>
</tr>
<tr>
<td>Environmental fault escalation plan</td>
<td>To be added</td>
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Table 2: Supporting Documents
2. Introduction

2.1 Purpose

Data centres have become increasingly dependent upon the IT systems that support it. These IT systems are hosted within a computer room with sometimes little or no access from day to day.

The Comms room equipment is monitored by the battery backed 5.7” TFT colour 320x240 256 colour touch screen via the digital inputs from all of the equipment.

The items monitored for faults include:

- UPS 1 Fault
- UPS 2 Fault
- Airedale 1 Fault (A/C 1)
- Airedale 2 Fault (A/C 2)
- Airedale 3 Fault (A/C 3)
- Water Leak Detection
- High/Low Temperature
- High/Low Humidity
- Gaseous fire suppression panel (fault/alarm)
- HSSD system (high sensitive smoke detection)
- Power Failure To Environmental Panel
- External Zone Cabinet UPS's
- Standby battery charger
- Complete Room mains failure.
- Emergency power shutdown operated.
- Monitors the Comms room door operation.
- Ethernet communications from the panel
- Modem connected (phone line fault)

This document explains the use of the Environmental panel and how to check and acknowledge different alarm conditions to maintain a healthy room.

The panel is also equipped with a modem to send instant text messages to enable a fast response and avoid any down time. These texts will be sent to the designated contacts, i.e. onsite engineer/manager to inform them of the occurring fault.

Each panel across a network can be monitored centrally to record any faults that occur and sent via email to the Facilities Management help desk to also alert them of the active fault.

Each panel has its own in built battery backup system and Battery charger, the panel standby Batteries will cover over 6 hours duration after a power failure, to monitor any over fault that may occur after a power failure. I.e. high temperature fault.
3. Overview of home screen

The home screen has been designed for easy recognition of a fault or temperature/humidity problem. The display gauges also show the configured high/low level limits and the pointer shows how close the room is to these set limits.

- Temperature trend - Refer to Section 4
- Humidity trend - Refer to Section 5
- Alarm mute button – mutes an active alarm and stops any further alarms being activated - Refer to Section 6
- Menu screen - Refer to Section 7
- Wave symbol – When this symbol is displayed there are No active alarms.
- Flashing Bell – Any active alarm will change the normal status wave symbol to a flashing red/yellow bell. Pressing this button when in an active alarm state opens up the active alarms screen - Refer to Section 11
- Warning Symbol - Any muted or un-acknowledged alarm will change the status to a warning triangle. Pressing this button when an alarm is in a muted state opens up the active alarms screen - Refer to Section 11

NOTE: Every touch of the screen is accompanied by a bleep and a green light that illuminates with the eye symbol at the top left of the screen, this is normal.

NOTE: The screen will revert back to the normal home screen if left longer than 5 minutes on any other screen.
4. Temperature Trend

- On opening this screen the graph will display the current temperature on the right of the screen.
- The touch screen is used to navigate through the data recorded as below.

You can scroll back though the recorded Temperature graphs to look at any past fluctuations by touch navigation of the screen as above.

- Returns the screen back to the menu screen - Refer to Section 7
- Zoom function - Zoom out, selection of 1day, 4hr or 1hr options.
- Zoom function - Zoom in selection of 1day, 4hr or 1hr options.
- Scroll feature – Move the cursor left – press and hold for repeat.
- Turns on/off the curser (red line) (*** in the data means this is turned off)
- Scroll feature – Move the cursor right – press and hold for repeat.
5. Humidity Trend

- On opening this screen the graph will display the current temperature on the right of the screen.

- The touch screen is used to navigate through the data recorded as below.

- You can scroll back though the recorded Humidity graphs to look at any past fluctuations by touch navigation of the screen as above.

- Pressing on the highlighted screen here steps back in

- Pressing on the highlighted middle of the screen reverts back to the present

- Pressing on the highlighted screen here steps forward

- Curser line- Time indicates the data the curser line is tracing over.

- Curser line- Humidity Indicates the Data the curser line is tracing over.

- Returns the screen back to the menu screen - Refer to Section 7

- Zoom function - Zoom out, selection of 1day, 4hr or 1hr options.

- Zoom function - Zoom in selection of 1day, 4hr or 1hr options.

- Scroll feature – Move the cursor left – press and hold for repeat.

- Turns on/off the curser (red line) (*** in the data means this is turned off)

- Scroll feature – Move the cursor right – press and hold for repeat.
6. Alarm Mute Button

- When an alarm occurs, an audio and visual alert is given; this is indicated via the externally mounted sounder and strobe light indicator.

- This button when pressed during an active alarm will silence the external sounder and strobe and stop any text alerts that are to be sent.

- Warning Symbol, when an active alarm is muted this symbol will then be displayed. This indicates that the alarm still needs to be acknowledged.

You can also mute an alert remotely when your number is logged in the text alert list - Refer to Section 13.8 & 13.9

- This will not clear the active alarm; only silence it so the alarm can be investigated. Once the alarm is cleared it will need to be acknowledged as detailed in Section 11.3.

NOTE: If the alarm clears automatically the alarm will reset after a set time limit, this means if the same alarm occurs again after the time limit it will again sound the sounder and flash the strobe so the alarm is again alerted.

Temperature/ humidity Alarms

- If a high/low temperature fault or high/low humidity fault occurs then an alert will be sent, a 1 hour & 8 hour timer will start simultaneously. The timers are present to stop alarms being resent if the temperature or humidity returns within set points, then drifts again outside of the set points.

- 1 hour timer – This is the reset interval timer. On activation this timer monitors if the variant drifts outside the set limits. If this occurs within an hour then the timer is reset and starts again. If the set points are exceeded after the hour then both 1 hour and 8 hour timers are reset.

- 8 hour timer – This is the Duration timer. On activation this timer will count for the set time and if the variant drifts out of the set points within the 1 hour reset interval hour timer it will continue to count, if this continues for the eight hour period then another alert will be sent.

- This configuration is displayed on a graph representation on the next page.
Temperature/Humidity Alarm Initiation Timers

- Alarm Cleared
- Alarm Triggered - Different Alarm
- Alarm Triggered - 8hr Alarm Re-initialise
- Alarm not Retriggered - Less than 1hr between alarms
- Alarm Cleared
- Alarm Triggered - Timers Started
- Alarm Cleared
- Alarm Triggered - Timers Started
- Alarm Cleared
- Alarm Triggered - Timers Started
- Alarm Cleared
- Alarm Triggered - Timers Started
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- Alarm Triggered - Timers Started
- Alarm Cleared
7. Menu Screen

- This screen is accessed from the main home screen by touching the menu button or any other area that does not have an access button.

NOTE: The current Time and date information is displayed at the top of this screen; these are updated automatically from the server, if this is incorrect then an engineer will need to access the panel to rectify this error.
8. Event List

- This screen displays the history of all the alarms that have occurred, each one has the time and date stamp along with the alarm detail.

<table>
<thead>
<tr>
<th>Event ID</th>
<th>Time</th>
<th>Alarm Type</th>
</tr>
</thead>
<tbody>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>Under Temperature</td>
</tr>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>Over Temperature</td>
</tr>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>Humidity Low</td>
</tr>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>Humidity High</td>
</tr>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>UPS 1 Failure</td>
</tr>
<tr>
<td>0096</td>
<td>14:40:12</td>
<td>UPS 2 Failure</td>
</tr>
</tbody>
</table>

- Returns back to the menu screen - Refer to Section 7
- Moves the cursor up the list.
- Moves the cursor up the list.
- Moves the cursor down the list.
- Moves the cursor down the list.
- This button will clear the event history only if you are logged in.

To scroll to the alarm that you want, use the keys as described above.

- Pressing the event list button will open the full alarm history event list; here you can see any generated alarm that is automatically added to the bottom of the list.
- Each new alarm is date & time stamped for log purposes; if the alarm is active it will be flashing with a RED background.

NOTE: The alarm event list is never deleted and will only overwrite the oldest entry after 1000 alarms are recorded.
9. Input Status Menu

- Pressing the input status button will open up the input status menu as below.

![Input State Menu](image)

- All of the monitored equipment shows within the 5 input pages.
  - Returns back to the menu screen - Refer to Section 7
  - Returns back to the main home screen - Refer to Section 3
  - Shows Temperature, Humidity, Mains failure or EPO button status.
  - Shows Air Con units, A/C standby panel and UPS status.
  - Shows Gas suppression, water detection and door open status.
  - Shows all external LAN zone UPS status.
  - Shows screen power and communication connections.
  - Opens the Alarm state menu screen - Refer to Section 9.2.
  - Alarm history – Refer to Section 11.
9.1 Input Status Pages

- Pressing the input status page 1 button will open up the input state page as below.

There are 5 input pages in total displaying all of the inputs.

- Returns back to the menu screen - Refer to Section 7
- Returns back to the previous input status screen.
- Continues to the next input state screen.
- Alarm history – Refer to Section 11

- Each input is monitored for a FAULT/OK status.
- Any input that is not used states NOT USED in the information box.

氰 Shortcut - If any input is in an alarm status, pressing on the FAULT box will bring up the acknowledgement screen. Refer to Section 11.2
9.2 Alarm State Menu

- This section is to allow direct access into the information screens as in Section 11.1

![Alarm State Menu Diagram]

NOTE: Each button will open up the information screens for each individual alarm status input and show the last alarm that occurred.

- Returns back to the menu screen - Refer to Section 7
- Returns back to the main home screen - Refer to Section 3
- Alarm history – Refer to Section 11

The Information screens contain the details:

- **Alarm occurred** – This displays the date/ time stamp when the alarm fault became active.
- **Alarm cleared** – This displays the date/ time stamp from when the fault cleared.
- **Alarm acknowledged** - This displays the date/ time stamp from when the fault was acknowledged.
- **Muted by** - This displays the date/ time stamp from when the fault was muted.
10. Engineer

- This section is to allow concurrent maintenance or testing to be carried out in the room, here you can select different modes or test the modem.

- Engineering mode – stops any alarms being activated or sent - Refer to Section 10.2

- Test mode - Testing of the panel inputs etc - Refer to Section 10.3

- To revert the panel back into NORMAL mode - Refer to Section 10.4

- Returns back to the menu screen - Refer to Section 7

- Displays the queued texts to be sent - Refer to Section 10.5

- Displays the hardware inputs/outputs status - Refer to Section 13.13

- Displays the modem check screen - Refer to Section 10.6

- Access through to the active alarms screen - Refer to Section 11
10.1 Fault Repair Flow Diagram

Fault Repair Flow Diagram

Environmental Panel
Status: Fault muted
Mute has been carried out and the Warning Triangle is being shown.

Select the time duration and start Engineering mode before work begins!

Fix/ Repair the current Fault

Environmental Panel
Status all ok

Cancel Test mode

Panel all clear?

Select Test mode before cancelling engineering mode. This will indicate if any other alarms are still active.
10.2 Engineering Mode – *No faults are alerted or sent*

- The engineer mode allows concurrent maintenance work to be carried out in the room without generating any active alarms. Engineering mode flashes on the home screen when active and reverts back to a normal status after the set time has elapsed.

- The timer will start to count down from the set time once initiated; this is so the remaining time is known until the panel reverts back to normal operation automatically.

10.3 Test Mode – *Faults are alerted, but not sent*

- The Test mode allows testing of any input to be checked in the room, this will cause a fault to be alerted on the environmental panel but these will not be sent via text or email.

- The timer will start to count down from the set time once initiated; this is so the remaining time is known until the panel reverts back to normal operation automatically.

10.4 Cancelling an Active Engineering/Test mode

- If the panel is in the engineering or test mode status and the user requires returning to normal operation, pressing the cancel button will deactivate the active mode. The current mode display will then revert back to normal operation.
10.5 Queued Text Messages

- This screen lists all of the texts that are waiting to be sent; after multiple alarms are activated all alarms will be entered onto this list.

- Press refresh to get the current list. When the alarm has been successfully sent you must press refresh for it to disappear from the list. The list will move up by one line and the new alarm sitting at the top of the list will tried to be sent.

- Returns back to the menu screen - Refer to Section 7

- Returns back to Engineer mode - Refer to Section 10

- Scrolls up the page of texts.

- Scrolls down the page of texts

- Refreshes the current texted queued list.
10.6 Modem Check

- This screen is for testing and resetting of the modem.

- Returns back to the menu screen - Refer to Section 7

- This deletes any stored messages waiting to be sent.

- This resets the Modem of any faults and also deletes any awaiting messages.

- This button acknowledges any alarms waiting to be acknowledged.

- Access through to the active alarms screen - Refer to Section 11

- This system is used to make sure the modem is operating correctly and that an alert will be sent on without delay. To test this operation - Refer to section 10.7
10.7 Modem Test

Weekly test update

- Every Friday at 10am a "Environmental panel weekly SMS test" is sent from each panel to the designated personnel on site to test the modem is operating correctly.

If this text is not received on a Friday to ensure the system is operational for the weekend. Then a manual test must be carried out as below:

To test the modem is working correctly take these steps:

1) Press on the test number box; this will flash black/yellow when selected.
2) Enter the required number using the number pad.
3) Press the green tick box to confirm. (Number box stops flashing)
4) Press the TEST button, "51 - SMS test – waiting for modem response.
5) A text will then be sent to the desired number."52- SMS test - waiting for acknowledgement" is displayed during this action.
6) When the text has been sent “53- SMS test - waiting for acknowledgement" is displayed.
7) When the text is received, call the panel back and let it ring a minimum of 2 times. “54 – Acknowledgement received” is displayed and the number box displays “DONE”
8) A second text will be queued to be sent stating “55 – SMS test – acknowledgement queued.
9) A second text will then be sent stating “56 – SMS test – acknowledgement queued” the text will state “Comms room 1 or 2: Call acknowledged. Thank you.”
10) “10 – Idle state – Waiting for event” is shown and the test is completed.

- There may be other items that appear on the screen during the test, these do scroll through very fast but they are normal. This list is detailed below:
On the Modem check screen a status indication is displayed during its operation just above the row of buttons on the bottom of the screen. This is to let the user know the status of the modem.

**Codes displayed on the modem check screen**

<table>
<thead>
<tr>
<th>Displayed number</th>
<th>Top line of status text</th>
<th>Top line of status text</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>Please wait -</td>
<td>Initialising Serial Port</td>
</tr>
<tr>
<td>1</td>
<td>Please wait -</td>
<td>Sending Initialisation Data</td>
</tr>
<tr>
<td>2</td>
<td>Initialisation:</td>
<td>Waiting for Modem response</td>
</tr>
<tr>
<td>10</td>
<td>Idle State</td>
<td>Waiting for event</td>
</tr>
<tr>
<td>11</td>
<td>Modem Check</td>
<td>Checking Line Status</td>
</tr>
<tr>
<td>12</td>
<td>Modem Check</td>
<td>Waiting status response</td>
</tr>
<tr>
<td>15</td>
<td>Remote SMS Check</td>
<td>Queuing SMS Recipient</td>
</tr>
<tr>
<td>16</td>
<td>Remote SMS Check</td>
<td>Sending Check SMS</td>
</tr>
<tr>
<td>20</td>
<td>Sending SMS to:</td>
<td>Always Alert no's</td>
</tr>
<tr>
<td>21</td>
<td>Please wait -</td>
<td>Sending SMS alert</td>
</tr>
<tr>
<td>22</td>
<td>Sending SMS alert</td>
<td>Waiting for modem response</td>
</tr>
<tr>
<td>30</td>
<td>SMS Alert Queued</td>
<td>Local acknowledge delay</td>
</tr>
<tr>
<td>31</td>
<td>SMS Alert Queued</td>
<td>Check Message</td>
</tr>
<tr>
<td>32</td>
<td>Sending SMS alert</td>
<td>Waiting for modem response</td>
</tr>
<tr>
<td>33</td>
<td>SMS Alert</td>
<td>Checking for new messages</td>
</tr>
<tr>
<td>35</td>
<td>Please wait -</td>
<td>Sending Acknowledgement</td>
</tr>
<tr>
<td>36</td>
<td>Sending SMS Acknowledgement</td>
<td>Waiting for modem response</td>
</tr>
<tr>
<td>40</td>
<td>Sending SMS alert</td>
<td>Waiting for Acknowledgement</td>
</tr>
<tr>
<td>41</td>
<td>Sending SMS alert</td>
<td>Waiting for Acknowledgement</td>
</tr>
<tr>
<td>42</td>
<td>Please wait -</td>
<td>Acknowledgement Queued</td>
</tr>
<tr>
<td>50</td>
<td>SMS Test Queued</td>
<td>Checking Number</td>
</tr>
<tr>
<td>51</td>
<td>SMS Test</td>
<td>Waiting for Modem response</td>
</tr>
<tr>
<td>52</td>
<td>SMS Test</td>
<td>Waiting for Acknowledgement</td>
</tr>
<tr>
<td>53</td>
<td>SMS Test</td>
<td>Waiting for Acknowledgement</td>
</tr>
<tr>
<td>54</td>
<td>SMS Test</td>
<td>Acknowledgement Received</td>
</tr>
<tr>
<td>55</td>
<td>SMS Test</td>
<td>Acknowledgement Queued</td>
</tr>
<tr>
<td>56</td>
<td>SMS Test</td>
<td>Waiting for modem response</td>
</tr>
<tr>
<td>60</td>
<td>Weekly SMS Test</td>
<td>Queuing SMS Recipient</td>
</tr>
<tr>
<td>61</td>
<td>Weekly SMS Test</td>
<td>Sending Weekly Test SMS</td>
</tr>
<tr>
<td>99</td>
<td>Warning</td>
<td>Modem Error detected</td>
</tr>
<tr>
<td>100</td>
<td>Warning</td>
<td>Resetting Modem</td>
</tr>
<tr>
<td>101</td>
<td>Warning</td>
<td>Modem Reset</td>
</tr>
<tr>
<td>102</td>
<td>Warning</td>
<td>Modem Reset</td>
</tr>
</tbody>
</table>
11. Alarms

- Any active alarms are displayed in this section; the page lists all active alarms.

These alarms are displayed as:

- Active alarm – **Red text on a yellow background**
- Acknowledged alarm but un-cleared (still in fault) – **Black text on a white background**
- Cleared alarm but not acknowledged – **Yellow text on a blue background**

- Returns back to the menu screen - Refer to Section 7
- Moves the cursor up the list.
- Moves the cursor down the list.
- Opens the information page for the active alarm you have selected. – Refer to Section 11.2

To scroll to the alarm that you want, use the keys as described above.

**NOTE:** If no alarms are active, the alarms button won’t open the active alarms page.
11.1 Alarm Process Flow Diagram

Alarm Process flow Diagram

Environmental Panel
Status all ok

Active alarm
Flashing bell symbol shown.

Text Alerts and Email Alerts sent.

Remote mute carried out via call back.
Warning Triangle now shown.

Acknowledge Alarm

Only When the Fault is Fixed/Cleared, Continue.

Local mute carried out at the Panel.
Warning Triangle now shown.

OR

Environmental Panel
Status all ok
11.2 Information Button

- When you have selected the active alarm you want to acknowledge/clear, pressing the button, the alarm information screen will open, this will display the details of the active alarm.

- Alarm occurred – This displays the date/time stamp when the alarm fault became active.

- Alarm cleared – This displays the date/time stamp from when the fault cleared.

- Alarm acknowledged - This displays the date/time stamp from when the fault was acknowledged.

- Muted by - This displays the date/time stamp from when the fault was muted.

Section 11.4 explains on how to mute an alarm remotely after you have received a text.

- Status - Returns straight back to home screen – Refer to Section 3

- Input State - Returns to the input status screens – Refer to Section 9

- Cancel Alert - Stops any active alert from being sent out.
- Press this button to acknowledge the alarm when it has been cleared – Refer to Section 11.3

- Press this button to receive help text on the current alarm – Refer to Section 11.5

- Returns back to the active alarms list – Refer to Section 11

11.3 Acknowledgement of an alarm

- This button will acknowledge the cleared alarm and date/time stamp the entry.

- On pressing this button you are acknowledging a fault that should have been fixed/cleared first.

- If the alarm has been cleared it will show a date and time stamp in the "alarm cleared" section.

NOTE: An alarm must be cleared (showing a date/time stamp) before the alarm can be acknowledged, an alarm cannot be acknowledged before it is cleared.

Please see the flow diagram for the correct procedure of rectifying an alarm - Refer to Section 3.1
11.4 Emergency Power Off button

- The Emergency power off button (EPO) is fitted next to the exit door as a minimum.

NOTE: Pressing this button will shut down all of the Hardware fed from both UPS’s only via the PDU shutdown contactor.

This should only be used for emergency purposes i.e.

- Electrocution of personnel
- Hardware on fire
11.5 Help button

- These help screens provide information to assist the user to trace a fault. They inform the user of any checks to be made; they should assist in the rectification of the fault and details can be passed on to an engineer.

- Press this button to open up the help screen for the active alarm you are investigating.

The screen will open up an additional green window over the fault screen as shown below.

- Go through the checks as listed to see if the fault can be corrected or identified.

- Press this button to close the help window.
11.6 Remote Alarm confirmation – Ring back to Mute

- Once an alert has been sent to a recipient on the contact list, a text or a text to voice will be received on the allocated phone number.

1) When an alarm is generated in the Comms room, the environmental panel will automatically call (or send a text) to the allocated phone contact. (Always alerted numbers cannot mute an alarm)

2) Read text, or Answer the call as normal and make a note of what the environmental problem is, and which Comms room the problem resides. Replace the handset.

3) To confirm that you have taken the call, and you will pursue the issue, you need to call the specific unit back on the number that called you or received the text.

4) When you call the unit back to mute, allow the phone to ring a minimum of twice, and then hang up. By doing this, the audio alarm and light outside the room will be silenced and extinguished.

5) After a couple of minutes, the unit will call you again (or text you back) to confirm that you have silenced the alarm and that you are escalating the problem.

6) Call the onsite FM engineer, or if out of hours, escalate to the FM engineering helpdesk to get the issue resolved.

7) If you do not confirm that you have taken the call, the unit will call the next colleague on dedicated list, and will continue until a successful confirmation has been received.

Example of alert list:

- Gatehouse phone
- Onsite FM landline
- Shift Manager mobile
- Systems Manager mobile
- FM Manager mobile
- FM 24x7 helpdesk

FM Engineering process

1. Get the highlighted problem fixed as per normal processes.

2. Once the fault has been fixed within the room, the alert must be acknowledged on the Environmental Panel – Refer to Section 11.2 Only acknowledge the alert, once the specific issue has been fixed by an engineer.

NOTE: A return text to the panel does not mute any alarms, this must be a phone call from one of the configured contact numbers.
12. Clean Screen

- Pressing this button places the screen into a cleaning mode for 10 seconds.

- This screen is for the cleaning of the screen without pressing any buttons by accident, the screen will display the Clover symbol and a countdown timer will be displayed.

**NOTE:** Please only use a soft cloth and a mild detergent if necessary, DO NOT press too hard on the screen.
13. Configuration

- This section is for the configuration of the Environmental panel and explains the settings that are used within the software.

- On pressing this button the warning “system configuration” screen opens, this is to inform the user of where they are, and the implications that could occur with changing any parameters.

```
System Configuration

You are about to enter screens that allow configuration of the Monitoring System.
Incorrect Setting of parameters within these screens CAN and WILL prevent correct operation of the system. Only qualified competent engineers should access these screens.

Proceed               Cancel
```

- Continues to the log in password screen to gain entry to the parameters – Refer to Section 13.1

- Returns back to the Menu screen – Refer to Section 7

NOTE: Changing these parameters could cause the panel to continually alarm and prevent the system from protecting the room against a genuine fault.
13.1 Password Entry

- Enter your password to gain entry into the panel configuration parameters.

- Follow the directions on the screen to enter the password.

- This button will return you to the system configuration screen – Refer to Section 13

- Press this button after you enter the correct password.

NOTE: If you open up the yellow parameter screen using a password and leave the screen untouched for 5 minutes, the screen will lockout from editing. You will need to return to the password screen and re-enter the password to enable any editing to be done.
13.2 Configuration menu

- This menu is only accessible with a useable password.

- Pressing on any of these buttons will open up the requested parameter screen.

- To calibrate the temp and humidity probes as well as set the alarm set points – Refer to Section 13.3

- To set up the used inputs – Refer to Section 13.4

- To set up the used “External LAN zone inputs” – Refer to Section 13.5

- To set up the fault delay times of an input – Refer to Section 13.6

- Modem and configuration password set up – Refer to Section 13.7

- To set the SMS acknowledgement contact numbers 1 to 5 – Refer to Section 13.8

- To set the SMS acknowledgement contact numbers 6 to 10 – Refer to Section 13.8

- To set the SMS acknowledgement contact names 1 to 5 – Refer to Section 13.9

- To set the SMS acknowledgement contact names 6 to 10 – Refer to Section 13.9
- To set the SMS always alerted contact numbers 1 to 5 – Refer to Section 13.10

- To view the PLC I/O physical inputs/outputs – Refer to Section 13.11

- To view the full event list of alarms in the log – Refer to Section 8

- To exit back to the menu screen – Refer to Section 7

- To set up panel time & date – Refer to Section 13.12

- To set up the PLC panel configurations – Refer to Section 15

- This screen is to set up the default settings for the panel on the site it’s installed at – Refer to Section 14
### 13.3 Sensor Scaling - Config Page 1 & 2

- These screens are to calibrate and set the humidity alarm limits of the temperature and humidity probes.

- The standard settings are listed in **Section 14.2**

<table>
<thead>
<tr>
<th>Temperature</th>
<th>Min 9999999</th>
<th>Max 9999999</th>
</tr>
</thead>
<tbody>
<tr>
<td>Probe 1 Scale</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Temperature</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Probe 2 Scale</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Temp. Limits (°C)</td>
<td>Min 999999.9</td>
<td>Max 999999.9</td>
</tr>
<tr>
<td>Sample Cnt / Interval</td>
<td>9999999</td>
<td>9999.99s</td>
</tr>
</tbody>
</table>

| Enable Probe 2 | MMMMM |
| Probe 1/Probe 2 Ratio | 9999999% / 9999999% |

<table>
<thead>
<tr>
<th>Humidity</th>
<th>Min 9999999</th>
<th>Max 9999999</th>
</tr>
</thead>
<tbody>
<tr>
<td>Probe 1 Scale</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Humidity</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Probe 2 Scale</td>
<td>Min 9999999</td>
<td>Max 9999999</td>
</tr>
<tr>
<td>Humidity Limits (%)</td>
<td>Min 999999,9</td>
<td>Max 999999,9</td>
</tr>
<tr>
<td>Sample Cnt / Interval</td>
<td>9999999</td>
<td>9999,99s</td>
</tr>
</tbody>
</table>

| Enable Humidity | MMMMM |
| Enable Probe 2 | MMMMM |
| Probe 1/Probe 2 Ratio | 9999999% / 9999999% |

- Returns the screen back to the menu screen – Refer to **Section 7**
- Reduces the brightness of the panel back light.
- Increases the brightness of the panel back light.
- Steps forward to next page.

#### Editing the set parameters

- Press on the desired number value to be changed on the screen, a number keypad will open.

- Enter the new value.

- Press the tick key ☑️ to accept the new settings

- When two probes are used in a room the average temperature is displayed on the home screen, this can also be adjusted via the ratio setting to accommodate a percentage split.

**Note:** Not pressing any buttons for longer than 30 seconds will revert back to the configuration page.
13.4 Input Enables - Config Page 3 & 4

- These screens are to enable/ disable the monitored inputs.
- The standard settings are listed in Section 14.2

<table>
<thead>
<tr>
<th>Config - Page 3</th>
<th>12:00:00 DD/MM/YY</th>
</tr>
</thead>
<tbody>
<tr>
<td>Eaton Powerware UPS 1</td>
<td>Enabled</td>
</tr>
<tr>
<td>Eaton Powerware UPS 2</td>
<td>MMMM</td>
</tr>
<tr>
<td>Air Con Unit 1</td>
<td>MMMM</td>
</tr>
<tr>
<td>Air Con Unit 2</td>
<td>MMMM</td>
</tr>
<tr>
<td>Air Con Unit 3</td>
<td>MMMM</td>
</tr>
<tr>
<td>Air Con Standby Panel</td>
<td>MMMM</td>
</tr>
<tr>
<td>Gas Suppression Panel</td>
<td>MMMM</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Config - Page 4</th>
<th>12:00:00 DD/MM/YY</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water Leak Detection</td>
<td>Enabled</td>
</tr>
<tr>
<td>External Water Detection</td>
<td>MMMM</td>
</tr>
<tr>
<td>Emergency Power Off</td>
<td>MMMM</td>
</tr>
<tr>
<td>Comms Room Door</td>
<td>MMMM</td>
</tr>
<tr>
<td>Ethernet Comms Check</td>
<td>MMMM</td>
</tr>
</tbody>
</table>

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- **Enabled** – Highlights the current status of the input – Yes = on/ No = off
- **Polarity** – Highlights the current switching status – High = open to fault/ low = closed to fault.

- Press on the status value to be changed on the screen, a number keypad will open.
- Cycle up or down to change the status.
- Press the tick key to accept the new settings.
### 13.5 Zone Enables - Config Page 5

- These screens are to enable/disable the monitored LAN Zone inputs.

<table>
<thead>
<tr>
<th>Zone</th>
<th>Enabled</th>
<th>Polarity</th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>'A'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'B'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'C'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'D'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'E'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'F'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
<tr>
<td>'G'</td>
<td>MM MM</td>
<td>9999, 99</td>
<td>s</td>
<td>99999, 9 m</td>
</tr>
</tbody>
</table>

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

**Enabled** – Highlights the current status of the input – yes = On/ No = off

**Polarity** – Highlights the current switching status – High = open to fault/ low = closed to fault.

- Press on the status value to be changed on the screen, a number keypad will open.
- Cycle up or down to change the status.
- Press the tick key to accept the new settings
13.6 Check/Reset Times - Config Page 6 & 7

- A fault must be present for longer than the set times for an alert to become active and clear for longer than the reset times.

<table>
<thead>
<tr>
<th>Check Times</th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Humidity</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Eaton UPS 1</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Eaton UPS 2</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Air Con Unit 1</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Air Con Unit 2</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Air Con Unit 3</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Air Con Standby</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Ethernet Comms Check</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Check Times</th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gas Suppression</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Water Detection</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Ext. Water Detection</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Emergency Power Off</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Panel Supply</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Panel Batteries</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Comms Room Door</td>
<td>9999.99 s</td>
<td>99999.99 m</td>
</tr>
<tr>
<td>Door Open Time</td>
<td>9999.99 s</td>
<td>Count</td>
</tr>
<tr>
<td>Door Wedged Alert</td>
<td>Time</td>
<td>9999999</td>
</tr>
</tbody>
</table>

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- Press on the desired number value to be changed on the screen, a number keypad will open.
- Enter the new value.
- Press the tick key to accept the new settings.
**Default Check/ Reset times**

- These settings are the tested and agreed alarm check times that are set into the panel.
- A full list of the settings are available in Section 14.2

<table>
<thead>
<tr>
<th>Check times</th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature</td>
<td>60secs</td>
<td>60mins</td>
</tr>
<tr>
<td>Humidity</td>
<td>60sec</td>
<td>60mins</td>
</tr>
<tr>
<td>Eaton power UPS</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning standby panel</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Ethernet Comms check</td>
<td>480mins</td>
<td>60mins</td>
</tr>
<tr>
<td>Gas suppression</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Water detection</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>External water detection</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Emergency power off button</td>
<td>1secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Monitoring panel supply</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Monitoring panel batteries</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Comms room door</td>
<td>15mins</td>
<td>5mins</td>
</tr>
<tr>
<td>Door open</td>
<td>600secs</td>
<td>10 times</td>
</tr>
<tr>
<td>Door wedged alert</td>
<td>900secs</td>
<td>N/A</td>
</tr>
<tr>
<td>LAN zone UPS (config page 5)</td>
<td>60sec</td>
<td>10mins</td>
</tr>
</tbody>
</table>

- These settings should not be changed as this could make the panel unstable in sending the texts alerts in the correct order/urgency.
13.7 Modem Configuration & password editing - Config Page 8

**Config - Page 8**  
**12:00:00 DD/MM/YY**

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>SMS Alert Delay</td>
<td>9999, 99 sec</td>
</tr>
<tr>
<td>SMS Alert Interval</td>
<td>9999, 99 sec</td>
</tr>
<tr>
<td>Max Sensor Reset Time</td>
<td>99999, 9 min</td>
</tr>
<tr>
<td>Message Centre No</td>
<td>..........................</td>
</tr>
<tr>
<td>Site Name - Sent with SMS</td>
<td>..........................</td>
</tr>
<tr>
<td>Config Password</td>
<td>CCCCC</td>
</tr>
</tbody>
</table>

- **Back** – Returns the screen back to the menu screen – Refer to Section 7
- **Prev** – Steps back to previous page.
- **Next** – Steps forward to next page.

**Editing the set parameters**

- Press on the desired number value to be changed on the screen, a number keypad will open.
- Enter the new value.
- Press the tick key [✓] to accept the new settings

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>SMS Alert delay (delay from alarm to first sent text)</td>
<td>60sec</td>
</tr>
<tr>
<td>SMS Alert interval (delay before texting the next contact on the acknowledgement list)</td>
<td>300secs</td>
</tr>
<tr>
<td>Max Sensor reset time (Duration timer set point)</td>
<td>480mins</td>
</tr>
<tr>
<td>Message centre number</td>
<td>17094009</td>
</tr>
</tbody>
</table>

**NOTE:** Please do not edit the site name or configuration password!
13.8 SMS NO’S 1-5 - Config Page 9

- The contact numbers set in this section are sent texts that allow them to mute an active alarm remotely.

![Config - Page 9 (Alert No’s) 12:00:00 DD/MM/YY]

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- Press on the desired number value to be changed on the screen, a number keypad will open.
- Enter the new value.
- Press the tick key \(\checkmark\) to accept the new settings
  - You can turn on/off any number by pressing on the box to the right of the number, this will display
    - Green tick – Number Active
    - Red Cross – Number Deactivated
- These numbers are set during panel commissioning and shouldn't be changed unless agreed with Management.
13.9 SMS NO’S 6-10 - Config Page 10

- The contact numbers set in this section are sent texts that allow them to mute an active alarm remotely.

- Returns the screen back to the menu screen – Refer to Section 7

- Steps back to previous page.

- Steps forward to next page.

**Editing the set parameters**

- Press on the desired number value to be changed on the screen, a number keypad will open.

- Enter the new value.

- Press the tick key to accept the new settings

  - You can turn on/off any number by pressing on the box to the right of the number, this will display
    
    Green tick – Number Active
    Red Cross – Number Deactivated

- These numbers are set during panel commissioning and shouldn't be changed unless agreed with Management.
13.10 SMS Labels 1 - Config Page 11

- The contact names in this list need to correspond in the correct order of the numbers entered in sections 13.8 & 13.9.

<table>
<thead>
<tr>
<th>Config - Page 11 (Labels)</th>
<th>12:00:00 DD/MM/YY</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>AAAAAAAAAAAAAAAAA</td>
</tr>
<tr>
<td>2</td>
<td>AAAAAAAAAAAAAAAAA</td>
</tr>
<tr>
<td>3</td>
<td>AAAAAAAAAAAAAAAAA</td>
</tr>
<tr>
<td>4</td>
<td>AAAAAAAAAAAAAAAAA</td>
</tr>
<tr>
<td>5</td>
<td>AAAAAAAAAAAAAAAAA</td>
</tr>
</tbody>
</table>

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- Press on the desired label box to be edited on the screen, a keyboard will open.
- Enter the desired name.
- Press the tick key  to accept the new settings
13.11 SMS Labels 2 - Config Page 12

- The contact names in this list need to correspond in the correct order of the numbers entered in sections 13.8 & 13.9.

| 6 |
| 7 |
| 8 |
| 9 |
| 10 |

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- Press on the desired label box to be edited on the screen, a keyboard will open.
- Enter the desired name.
- Press the tick key to accept the new settings.
13.12 Always alerted numbers - Config Page 13

- The contact numbers set in this section are sent texts for information purposes only; these numbers do not allow them to mute an active alarm remotely.

![Config - Page 13 (Alert No's) - 12:00:00 DD/MM/YY](image)

- Returns the screen back to the menu screen – Refer to Section 7
- Steps back to previous page.
- Steps forward to next page.

**Editing the set parameters**

- Press on the desired number value to be changed on the screen, a number keypad will open.
- Enter the new value.
- Press the tick key to accept the new settings
  - You can turn on/off any number by pressing on the box to the right of the number, this will display
    - Green tick – Number Active
    - Red Cross – Number Deactivated
- These numbers are set during panel commissioning and shouldn’t be changed unless agreed with Management.
13.13 I/O Status

- This section is to view the PLC I/O physical inputs/outputs.

- This screen lists all of the monitored inputs and outputs for the PLC and lists the status.
- The temperature analogue input reading is displayed on this screen for monitoring.
- The Humidity analogue input reading is displayed on this screen for monitoring.
### 13.14 Set Clock

- The panel clock is synchronised with the main server.

Use the arrow keys below to change the time and date. Press \( \square \) to move to the next value.

Press \( \square \) when done to return to normal operation.

**NOTE:** If this is not updated then an engineer will need to log in and update this section, this problem should also be sent to Clover for further action to be taken.
14. Defaults
- This section stores the default values for every site as shown on the list; these are to enable the software to contain all of the necessary values as set up at each site. This will enable the panel to be configured if a replacement screen is required.

14.1 Defaults – List Page
- This section is to only be accessed and used by the software engineer. Changes in this area will cause instant alarms if the incorrect recipe is loaded.

- Scrolls up through the site saved names.
- Scrolls up through 1 page of the site saved names.
- Scrolls down through the site saved names.
- Scrolls down through 1 page of the site saved names.
- Enters the set values previously saved on the screen to the panel.
- Saves the set values entered on the screen to the selected site name.
### 14.2 Defaults – Standard settings

<table>
<thead>
<tr>
<th>Configuration page 1 – Sensor scaling</th>
<th>Input</th>
<th>Output</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature probe 1 Scale</td>
<td>MIN</td>
<td>100000</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>138500</td>
</tr>
<tr>
<td>Temperature probe 2 Scale</td>
<td>MIN</td>
<td>100000</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>138500</td>
</tr>
<tr>
<td>Temperature limits</td>
<td>MIN</td>
<td>16°C</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>26°C</td>
</tr>
<tr>
<td>Sample count / Interval</td>
<td>5</td>
<td>10</td>
</tr>
<tr>
<td>Enable probe 2</td>
<td>Yes / No</td>
<td></td>
</tr>
<tr>
<td>Probe 1 / Probe 2 Ratio</td>
<td>100%</td>
<td>0%</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Configuration page 2 – Sensor scaling</th>
<th>Input</th>
<th>Output</th>
</tr>
</thead>
<tbody>
<tr>
<td>Humidity probe 1 Scale</td>
<td>MIN</td>
<td>100000</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>138500</td>
</tr>
<tr>
<td>Humidity probe 2 Scale</td>
<td>MIN</td>
<td>100000</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>138500</td>
</tr>
<tr>
<td>Humidity limits</td>
<td>MIN</td>
<td>20%</td>
</tr>
<tr>
<td></td>
<td>MAX</td>
<td>60%</td>
</tr>
<tr>
<td>Sample count / Interval</td>
<td>5</td>
<td>10</td>
</tr>
<tr>
<td>Enable Humidity</td>
<td>Yes / No</td>
<td></td>
</tr>
<tr>
<td>Enable probe 2</td>
<td>Yes / No</td>
<td></td>
</tr>
<tr>
<td>Probe 1 / Probe 2 Ratio</td>
<td>100%</td>
<td>0%</td>
</tr>
</tbody>
</table>

- These are the standard settings; some panels may differ depending on the setup.
These are the standard settings; some panels may differ depending on the setup.

<table>
<thead>
<tr>
<th>Configuration page 3 – Input Enables</th>
<th>Enabled</th>
<th>Polarity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Eaton Powerware UPS 1</td>
<td>Always on</td>
<td>HIGH</td>
</tr>
<tr>
<td>Eaton Powerware UPS 2</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Air conditioning Unit 1</td>
<td>Always on</td>
<td>HIGH</td>
</tr>
<tr>
<td>Air conditioning Unit 2</td>
<td>Always on</td>
<td>HIGH</td>
</tr>
<tr>
<td>Air conditioning Unit 3</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Air conditioning standby panel</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Gas Suppression Panel</td>
<td>Always on</td>
<td>HIGH</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Configuration page 4 – Input Enables</th>
<th>Enabled</th>
<th>Polarity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Water Leak Detection</td>
<td>Always on</td>
<td>HIGH</td>
</tr>
<tr>
<td>External Water Leak Detection</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Emergency Power off Button</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Comms Room Door</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
<tr>
<td>Ethernet Comms Check</td>
<td>Yes / No</td>
<td>HIGH</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Configuration page 5 – LAN Zones</th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>LAN Zone A</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone B</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone C</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone D</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone E</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone F</td>
<td>60secs</td>
<td>10mins</td>
</tr>
<tr>
<td>LAN Zone G</td>
<td>60secs</td>
<td>10mins</td>
</tr>
</tbody>
</table>
### Configuration page 6 - Check times

<table>
<thead>
<tr>
<th></th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>Temperature</td>
<td>60secs</td>
<td>60mins</td>
</tr>
<tr>
<td>Humidity</td>
<td>60sec</td>
<td>60mins</td>
</tr>
<tr>
<td>Eaton power UPS 1</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Eaton power UPS 2</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning 1</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning 2</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning 3</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Air conditioning standby panel</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Ethernet Comms check</td>
<td>480mins</td>
<td>60mins</td>
</tr>
</tbody>
</table>

### Configuration page 7 - Check times

<table>
<thead>
<tr>
<th></th>
<th>Check</th>
<th>Reset</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gas suppression</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Water detection</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>External water detection</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Emergency power off button</td>
<td>1sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Monitoring panel supply</td>
<td>10secs</td>
<td>10mins</td>
</tr>
<tr>
<td>Monitoring panel batteries</td>
<td>60sec</td>
<td>10mins</td>
</tr>
<tr>
<td>Comms room door</td>
<td>15mins</td>
<td>5mins</td>
</tr>
<tr>
<td>Door open</td>
<td>600secs</td>
<td>10 times</td>
</tr>
<tr>
<td>Door wedged alert</td>
<td>900secs</td>
<td>N/A</td>
</tr>
</tbody>
</table>

### Configuration page 7 - Check times

<table>
<thead>
<tr>
<th></th>
<th>Check</th>
</tr>
</thead>
<tbody>
<tr>
<td>SMS Alert delay (delay from alarm to first sent text)</td>
<td>60sec</td>
</tr>
<tr>
<td>SMS Alert interval (delay before texting the next contact on the acknowledgement list)</td>
<td>300secs</td>
</tr>
<tr>
<td>Max Sensor reset time (Duration timer set point)</td>
<td>480mins</td>
</tr>
<tr>
<td>Message centre number</td>
<td>17094009</td>
</tr>
</tbody>
</table>