Resource
Data Management

Mercury 3 & Intuitive Mercury 5 Channel Thermostat

Commissioning/User Guide

Revision 3.2

PR0740-5ISTA

PR0750-5ISTA

Contents

The Mercury 3 & Intuitive Mercury Range

From Resource Data Management

Description

The Mercury 3 & Intuitive Mercury 5 Channel Thermostat has 5 thermostat channels available for use. Each channel can be configured for independent use, where each channel is controlled by an individual probe or the controller can be configured to operate selected thermostats from one common temperature probe. Each channel can be individually configured for heating or cooling applications with a selection of parameters. There is a 7-day timer with two on and off time settings per day. Included in the controller is a frost detect parameter which over-rides the timer function forcing a heating channel on when the timer is off and begin heating should the channel probe reach the frost detect value. The controller has the ability to use any of the channels to operate as a timer.

The Mercury 3 & Intuitive Mercury 5 Independent Channel Thermostat can operate stand-alone or it can be networked through one of the supported network interfaces.

The Stat supports the following temperature probes:- PT1000, NTC2k, NTC2k25, NTC470R, NTC700R, NTC3k, NTC5k, NTC6k, NTC10K and NTC10K(2) USA

NOTE:

All thermostats are controlled by a single time clock, this same timeclock operates on all channels whether they are set to heating, cooling or timer.

Variants

Inputs/ Outputs	Display	Comms
Mercury Mk3 5 Independent Channel Thermostat	Integral/ Remote Display	Serial/ Ethernet
Intuitive Mercury 5 Independent Channel Thermostat	Integral/ Remote Display	Serial/ Ethernet

Compatible Network Interfaces

Mercury controllers are capable of connecting to either a TCP/IP local area network, an RS485 Genus compatible network or they can be used in standalone mode with no network output. To connect to a network you must add the correct communications module. Connecting to any of these communication modules will automatically be detected on power up and will affect the set up screens available to you.

Description	Part Number
IP Futura (Single Mercury to IP Interface)	PR0016
RS485 Interface (Single Mercury to RS485 Interface)	PR0026
Mercury IP Switch (IP support for 10 controllers)	PR0018
Mercury IP Switch with Pressure/Humidity Inputs	PR0018-PHI
Intuitive IP Switch	PR0758
Intuitive IP Switch with Pressure/Humidity Inputs	PR0758-PHI
Bluetooth RS232 Network Module	PR0630

Compatible Displays

The following displays are compatible with the Mercury Remote Display Controllers:

Description	Part Number
Mercury Remote Display with 5m cable	PR0325
Mercury Keyswitch Remote Display with 5m cable	PR0326
Mercury DIN Remote Display with 5m cable	PR0327
Mercury DIN Keyswitch Remote Display with 5m cable	PR0328
Mercury mk2 Remote Display with 5m cable	PR0725

Ordering Information

When ordering a Mercury Mk 3 controller the following ordering scheme can be used to purchase the desired hardware configuration.

PR0740 X 5ISTA

X	Description
IP	Ethernet Comms
232	RS232 Comms

Example:

To order a Mercury MK3 5 Channel Stat with IP comms:

PR0740 – IP – 5ISTA

When ordering an Intuitive Mercury controller, the following ordering scheme can be used to purchase the desired hardware configuration.

PR07X0 Y 5ISTA Z

X	Description
5	Internal Display
6	Remote Display

Y	Description
Blank	Fused
NF	Non-Fused

Z	Description
Blank	RS232 Comms
IP	IP Comms
485	RS485 Comms

Example

To order an Intuitive Mercury fused, with an internal display and IP Comms:

PR0750 5ISTA IP

Configuration

There is only one type of configuration in the Mercury 5 Independent Channel Thermostat. (Type 1)

Front Display Features

LED's: -

Valve **(Not Used)**

Fans **(Not Used)**

Lights **(On With Timer)**

Defrost **(Not Used)**

On-Line

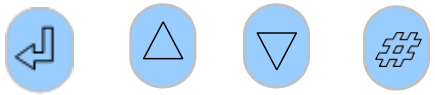
- Off — No network attached
- Flashing — Attempting to Log on to network
- Steady — On-line

Service

Alarm

HACCP

Keys



Enter Up Down Defrost

Note: Function keys illuminate when pressed, illumination is turned off 20 seconds after the key is used. Press and hold the defrost button to force a manual defrost

Main Display

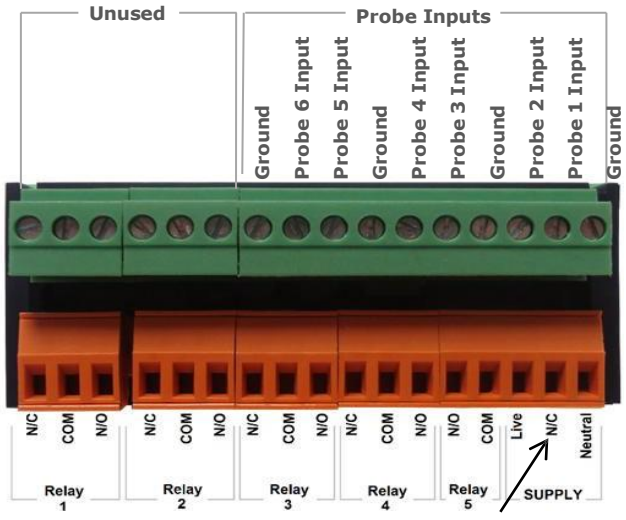
4 character LED display, used to display time and status messages.

Note the Intuitive Mercury display is Green in colour when lit.

Connections

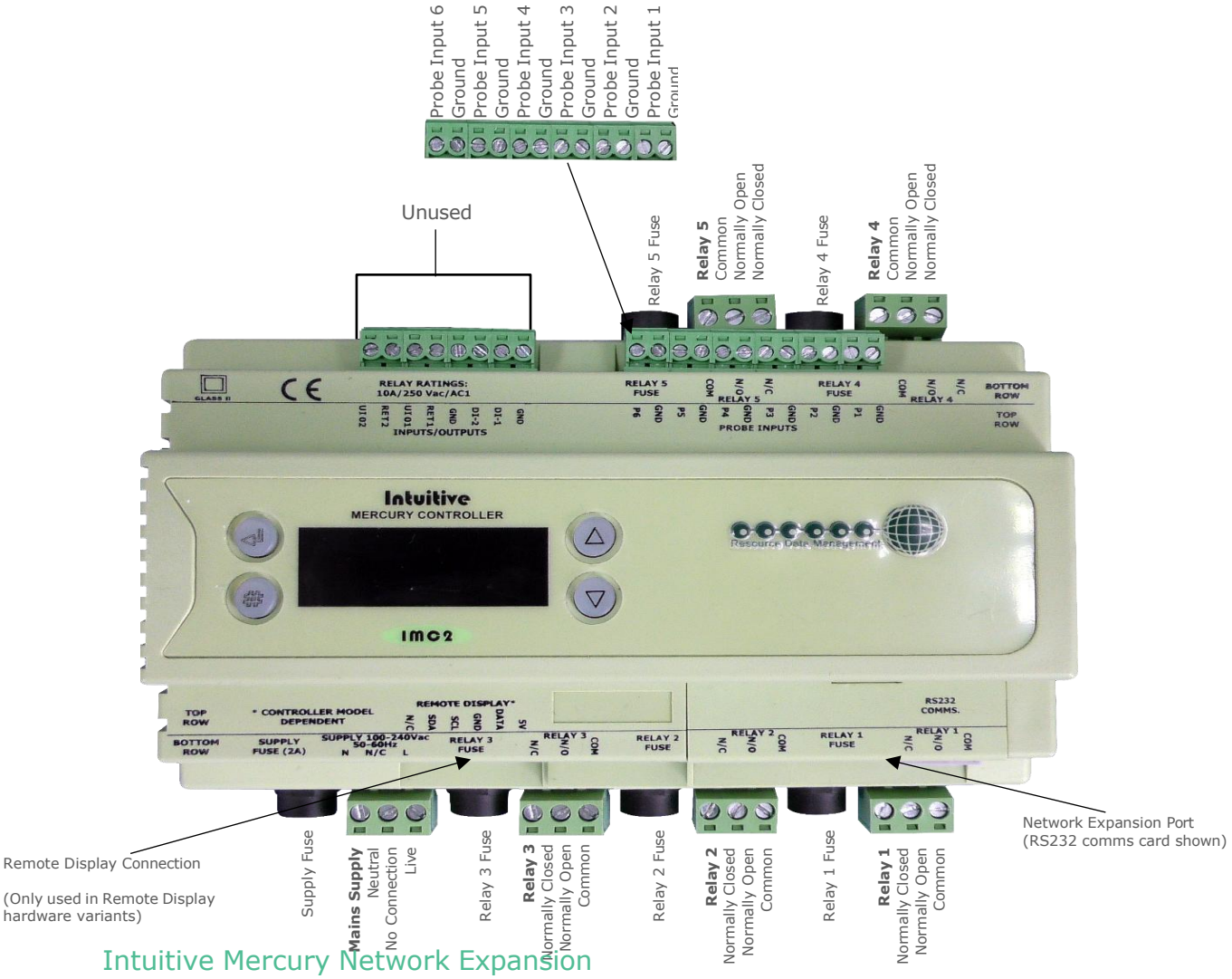
Mercury Mk3

Input and Output connections are made to the back of the controller, the RS232 communication port is on the side. The diagram shows the connection detail. Inputs and outputs are assigned according to the chosen configuration. See Input/Output tables for further details on connections.



Note: On the supply, N/C equates to 'No Connection'

Intuitive Mercury I/O Connections

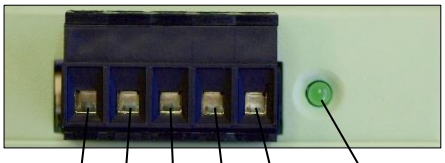


Intuitive Mercury Network Expansion

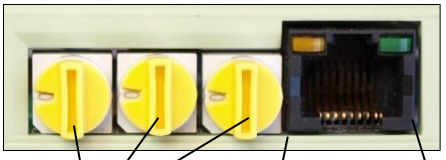
RS232 Network Card (Default)

The Intuitive Mercury is supplied with an RS232 Network Card fitted as standard.

RS485 Network Card (PR0771)



IP Network Card (PR0770)



Input and Output Allocation Tables

I/O	Description	Alarm Action
Probe 1	Probe 1	Yes
Probe 2	Probe 2	Yes
Probe 3	Probe 3	Yes
Probe 4	Probe 4	Yes
Probe 5	Probe 5	Yes
Probe 6	Probe 6	Yes
Relay 1	Channel 1, Wire to N/O contact unless Invert feature is enabled	N/A
Relay 2	Channel 2, Wire to N/O contact unless Invert feature is enabled	N/A
Relay 3	Channel 3, Wire to N/O contact unless Invert feature is enabled	N/A
Relay 4	Channel 4, Wire to N/O contact unless Invert feature is enabled	N/A
Relay 5	Channel 5, Wire to N/O contact unless Invert feature is enabled	N/A

Setting up the controller

Access to the controller can be achieved several ways

- Through the front mounted buttons
- Direct access by PC or palm top into the rear comms port. This requires a software package available on the RDM website
- Through the RDM Data Manager.
- Across an IP network. (Current controller IP address required)

Setup through front buttons

ENTER

UP

DOWN

To enter setup mode, hold the Enter and Down buttons together for approximately 3 seconds until the message "Ent" appears on the display. Now press the Enter button again to enter the function menu. IO will be displayed. Scroll up or down to go through the list.

Setup Function Menu

Display	Option	Explained in Paragraph		Display	Option	Explained in Paragraph
IO	View Inputs / Outputs and States	Input / output table		nEt	Set/view network configuration	Network Configuration
PArA	Set/View Parameters	Set view parameters		SoFt	View software version	
Unit	Probe type and Celsius/Fahrenheit option	Set View Unit		OFSt	Probe Offset	Probe Offset
tyPE	Set/View Controller Type	Set/view controller type		tESt*	Test Mode	See Note Below
Rtc	Set/view Clock (rtc = Real Time Clock)	Real Time Clock		ESC	Exit Setup mode	

***Note**: When first powered up the controller will have the 'tESt' option in the menu setup. This allows the user to toggle the relays for testing purposes. Upon entering the menu, the display will show r-01 (relay 1) to r-05 (relay 5), select the desired output and toggle the value from 0 to 1 (confirm by pressing enter) to switch the selected relay.

This option is only available for 30 seconds after power up. After this time, the menu setup will return to its standard options.

Recommended set-up method

If you are not connecting to a network and want to set up the controller through the buttons we recommend you use the following order from the function menu.

rtc. Real time clock (This will automatically synchronise on network systems)

a. Use the up or down buttons to scroll through the display until the display reads "rtc"
b. Press enter. The display will show "t-1". press enter again
c. Scroll hours up or down (0 – 23) press enter
d. Use up button to select "t-2", press enter
e. Scroll minutes up or down (0 – 59) press enter
f. Repeat for t-3 (seconds 0 – 59)
g. Repeat for t -4 (days up to 31)
h. Repeat for t -5 (months up to 12)
i. Repeat for t -6 (year up to 99)
j. Use up button to display "ESC", press enter to display "rtc"

Time clock is now set

type. Set/view controller type

The controller Type is preset at the factory and cannot be changed.

PArA. Set/view parameters (This can be achieved at the network front end)

a. From the function menu scroll to select PArA
b. Pressing Enter while PArA is displayed will enter the parameter menu. The first parameter option will be displayed as P-01. Pressing the Up or Down button will present the other parameter options P-02, P-03 etc. See the parameter list below to find what parameter number corresponds to which actual parameter. Pressing the Enter button will show the current value of the selected parameter. Press Up or Down to modify the value and press Enter again to save the value. The parameter list number will be displayed again. Two other options are present in the parameter menu – dFLt and ESC. Selecting ESC will exit setup mode. Selecting dFLt will reset all parameters back to the default values for the current type of controller.

Unit. Set/view temperature unit and Probe type

From the function menu scroll to select Unit

Press enter and the value will be displayed: -

Probe Types

0 - PT1000 Celsius	5 - 470R Fahrenheit	10 - NTC2K25 Celsius	15 - 6K Fahrenheit
1 - PT1000 Fahrenheit	6 - 700R Celsius	11 - NTC2K25 Fahrenheit	16 - NTC10K T1 Celsius
2 - NTC2K Celsius	7 - 700R Fahrenheit	12 - 5K Celsius	17 - NTC10K T1 Fahrenheit
3 - NTC2K Fahrenheit	8 - 3K Celsius	13 - 5K Fahrenheit	18 - NTC10K T2 Celsius (USA NTC10K)
4 - 470R Celsius	9 - 3K Fahrenheit	14 - 6K Celsius	19 - NTC10K T2 Fahrenheit (USA NTC10K)

Use the up or down keys to select the units and press enter. This function is now complete

Parameter Table

Number	Parameter	Range °C (°F)	Step	Units	Default
P-01	Stat 1 Cut In	-49 to 120°C (-56.2 to 248)	0.1	°C	15.0
P-02	Stat 1 Diff	0 to 10°C (-56.2 to 86)	0.1	°C	5.0
P-03	Stat 1 Select	0 = Off, 1 = Timer, 2 = Probe 1, 3 = Probe 2, 4 = Probe 3 5 = Probe 4, 6 = Probe 5, 7 = Probe 6	1		0
P-04	Stat 1 Type	0 = Cooling 1 = Heating	1		0
P-06	Stat 1 Frost Detect	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-07	Stat 1 High Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	25.0
P-08	Stat 1 Low Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-09	Stat 1 Alarm Delay	00:00 to 99:00	01:00	mm:ss	20:00
P-10	Stat 1 Relay Invert	0 = Off 1 = On	1		0
P-11	Stat 2 Cut In	-49 to 120°C (-56.2 to 248)	0.1	°C	15.0
P-12	Stat 2 Diff	0 to 10°C (-56.2 to 86)	0.1	°C	5.0
P-13	Stat 2 Select	0 = Off, 1 = Timer, 2 = Probe 1, 3 = Probe 2, 4 = Probe 3 5 = Probe 4, 6 = Probe 5, 7 = Probe 6	1		0
P-14	Stat 2 Type	0 = Cooling 1 = Heating	1		0
P-16	Stat 2 Frost Detect	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-17	Stat 2 High Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	25.0
P-18	Stat 2 Low Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-19	Stat 2 Alarm Delay	00:00 to 99:00	01:00	mm:ss	20:00
P-20	Stat 2 Relay Invert	0 = Off 1 = On	1		0
P-21	Stat 3 Cut In	-49 to 120°C (-56.2 to 248)	0.1	°C	15.0
P-22	Stat 3 Diff	0 to 10°C (-56.2 to 86)	0.1	°C	5.0
P-23	Stat 3 Select	0 = Off, 1 = Timer, 2 = Probe 1, 3 = Probe 2, 4 = Probe 3 5 = Probe 4, 6 = Probe 5, 7 = Probe 6	1		0
P-24	Stat 3 Type	0 = Cooling 1 = Heating	1		0
P-26	Stat 3 Frost Detect	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-27	Stat 3 High Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	25.0
P-28	Stat 3 Low Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-29	Stat 3 Alarm Delay	00:00 to 99:00	01:00	mm:ss	20:00
P-30	Stat 3 Relay Invert	0 = Off 1 = On	1		0
P-31	Stat 4 Cut In	-49 to 120°C (-56.2 to 248)	0.1	°C	15.0
P-32	Stat 4 Diff	0 to 10°C (-56.2 to 86)	0.1	°C	5.0
P-33	Stat 4 Select	0 = Off, 1 = Timer, 2 = Probe 1, 3 = Probe 2, 4 = Probe 3 5 = Probe 4, 6 = Probe 5, 7 = Probe 6	1		0
P-34	Stat 4 Type	0 = Cooling 1 = Heating	1		0
P-36	Stat 4 Frost Detect	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-37	Stat 4 High Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	25.0
P-38	Stat 4 Low Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-39	Stat 4 Alarm Delay	00:00 to 99:00	01:00	mm:ss	20:00
P-40	Stat 4 Relay Invert	0 = Off 1 = On	1		0
P-41	Stat 5 Cut In	-49 to 120°C (-56.2 to 248)	0.1	°C	15.0
P-42	Stat 5 Diff	0 to 10°C (-56.2 to 86)	0.1	°C	5.0

Number	Parameter	Range °C (°F)	Step	Units	Default
P-43	Stat 5 Select	0 = Off, 1 = Timer, 2 = Probe 1, 3 = Probe 2, 4 = Probe 3 5 = Probe 4, 6 = Probe 5, 7 = Probe 6	1		0
P-44	Stat 5 Type	0 = Cooling 1 = Heating	1		0
P-46	Stat 5 Frost Detect	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-47	Stat 5 High Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	25.0
P-48	Stat 5 Low Temp Alarm	-98 to 128°C (-144 to 262)	0.1	°C	0.0
P-49	Stat 5 Alarm Delay	00:00 to 99:00	01:00	mm:ss	20:00
P-50	Stat 5 Relay Invert	0 = Off 1 = On	1		0
P-70	Timer Mode	0 = Local, 1 = Remote, 2 = Man Off, 3 = Man On	1		1
P-71	Sunday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-72	Sunday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-73	Sunday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-74	Sunday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-75	Monday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-76	Monday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-77	Monday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-78	Monday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-79	Tuesday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-80	Tuesday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-81	Tuesday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-82	Tuesday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-83	Wednesday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-84	Wednesday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-85	Wednesday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-86	Wednesday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-87	Thursday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-88	Thursday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-89	Thursday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-90	Thursday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-91	Friday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-92	Friday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-93	Friday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-94	Friday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
P-95	Saturday On Time 1	00:00 to 23:59	00:01	hh:mm	08:00
P-96	Saturday Off Time 1	00:00 to 23:59	00:01	hh:mm	20:00
P-97	Saturday On Time 2	00:00 to 23:59	00:01	hh:mm	08:00
P-98	Saturday Off Time 2	00:00 to 23:59	00:01	hh:mm	20:00
dFLt	Reset to default values				

Relay State and functional operation

Relay State	Function State	Wired Contact
Relay 1 Off	Heating / Cooling / Timer Off	N/O
Relay 1 On	Heating / Cooling / Timer On	N/O
Relay 2 Off	Heating / Cooling / Timer Off	N/O
Relay 2 On	Heating / Cooling / Timer On	N/O
Relay 3 Off	Heating / Cooling / Timer Off	N/O
Relay 3 On	Heating / Cooling / Timer On	N/O
Relay 4 Off	Heating / Cooling / Timer Off	N/O
Relay 4 On	Heating / Cooling / Timer On	N/O
Relay 5 Off	Heating / Cooling / Timer Off	N/O
Relay 5 On	Heating / Cooling / Timer On	N/O

Parameter Description

Number	Parameter	Description
P-01	Stat 1 Cut In	Thermostat target for Stat 1 temperature. Point at which Heating or Cooling will switch on/off Relay 1. (Depending on what is selected at P-04)
P-02	Stat 1 Diff	Diff above that Heating Relay 1 will turn Off Diff below that Cooling Relay 1 will turn Off
P-03	Stat 1 Select	Selects which probe is used for temperature control with Stat 1 or allows the channel to be configured as a timer. If set as a timer then Relay 1 would turn on and off according to the current timer status. See P-70
P-04	Stat 1 Type	Selects Heating or Cooling for Relay 1
P-06	Stat 1 Frost Detect	Setpoint at which the Frost Detect feature is enabled.
P-07	Stat 1 High Temp Alarm	Over temperature alarm set point
P-08	Stat 1 Low Temp Alarm	Under Temperature alarm set point
P-09	Stat 1 Alarm Delay	Delay applied before an alarm is signalled for over/under temperature alarm
P-10	Stat 1 Relay Invert	Inverts the output operation of Relay 1.
P-11	Stat 2 Cut In	Thermostat target for Stat 2 temperature. Point at which Heating or Cooling will switch on/off Relay 2. (Depending on what is selected at P-14)
P-12	Stat 2 Diff	Diff above that Heating Relay 2 will turn Off Diff below that Cooling Relay 2 will turn Off
P-13	Stat 2 select	Selects which probe is used for temperature control with Stat 2 or allows the channel to be configured as a timer. If set as a timer then Relay 2 would turn on and off according to the current timer status. See P-70
P-14	Stat 2 Type	Selects Heating or Cooling for Relay 2
P-16	Stat 2 Frost Detect	Setpoint at which the Frost Detect feature is enabled.
P-17	Stat 2 High Temp Alarm	Over temperature alarm set point
P-18	Stat 2 Low Temp Alarm	Under Temperature alarm set point
P-19	Stat 2 Alarm Delay	Delay applied before an alarm is signalled for over/under temperature alarm
P-20	Stat 2 Relay Invert	Inverts the output operation of Relay 2.
P-21	Stat 3 Cut In	Thermostat target for Stat 3 temperature. Point at which Heating or Cooling will switch on/off Relay 3. (Depending on what is selected at P-24)
P-22	Stat 3 Diff	Diff above that Heating Relay 3 will turn Off Diff below that Cooling Relay 3 will turn Off
P-23	Stat 3 select	Selects which probe is used for temperature control with Stat 3 or allows the channel to be configured as a timer. If set as a timer then Relay 3 would turn on and off according to the current timer status. See P-70
P-24	Stat 3 Type	Selects Heating or Cooling for Relay 3
P-26	Stat 3 Frost Detect	Setpoint at which the Frost Detect feature is enabled.

Number	Parameter	Description
P-27	Stat 3 High Temp Alarm	Over temperature alarm set point
P-28	Stat 3 Low Temp Alarm	Under Temperature alarm set point
P-29	Stat 3 Alarm Delay	Delay applied before an alarm is signalled for over/under temperature alarm
P-30	Stat 3 Relay Invert	Inverts the output operation of Relay 3.
P-31	Stat 4 Cut In	Thermostat target for Stat 4 temperature. Point at which Heating or Cooling will switch on/off Relay 4. (Depending on what is selected at P-34)
P-32	Stat 4 Diff	Diff above that Heating Relay 4 will turn Off Diff below that Cooling Relay 4 will turn Off
P-33	Stat 4 select	Selects which probe is used for temperature control with Stat 4 or allows the channel to be configured as a timer. If set as a timer then Relay 4 would turn on and off according to the current timer status. See P-70
P-34	Stat 4 Type	Selects Heating or Cooling for Relay 4
P-36	Stat 4 Frost Detect	Setpoint at which the Frost Detect feature is enabled.
P-37	Stat 4 High Temp Alarm	Over temperature alarm set point
P-38	Stat 4 Low Temp Alarm	Under Temperature alarm set point
P-39	Stat 4 Alarm Delay	Delay applied before an alarm is signalled for over/under temperature alarm
P-40	Stat 4 Relay Invert	Inverts the output operation of Relay 4.
P-41	Stat 5 Cut In	Thermostat target for Stat 5 temperature. Point at which Heating or Cooling will switch on/off Relay 5. (Depending on what is selected at P-44)
P-42	Stat 5 Diff	Diff above that Heating Relay 5 will turn Off Diff below that Cooling Relay 5 will turn Off
P-43	Stat 5 select	Selects which probe is used for temperature control with Stat 5 or allows the channel to be configured as a timer. If set as a timer then Relay 5 would turn on and off according to the current timer status. See P-70
P-44	Stat 5 Type	Selects Heating or Cooling for Relay 5
P-46	Stat 5 Frost Detect	Setpoint at which the Frost Detect feature is enabled.
P-47	Stat 5 High Temp Alarm	Over temperature alarm set point
P-48	Stat 5 Low Temp Alarm	Under Temperature alarm set point
P-49	Stat 5 Alarm Delay	Delay applied before an alarm is signalled for over/under temperature alarm
P-50	Stat 5 Relay Invert	Inverts the output operation of Relay 5.
P-70	Timer Mode	➢ Use a local schedule following the controller RTC (P-71 to P-98) ➢ Use a remote schedule (Set up in the system front end) ➢ Manually Off ➢ Manually On When the timer is On period the Light LED will be lit.
P-71	Sunday On Time 1	When P-70 is set to Local, Sunday on time 1
P-72	Sunday Off Time 1	When P-70 is set to Local, Sunday off time 1
P-73	Sunday On Time 2	When P-70 is set to Local, Sunday on time 2
P-74	Sunday Off Time 2	When P-70 is set to Local, Sunday off time 2
P-75	Monday On Time 1	When P-70 is set to Local, Monday on time 1
P-76	Monday Off Time 1	When P-70 is set to Local, Monday off time 1
P-77	Monday On Time 2	When P-70 is set to Local, Monday on time 2
P-78	Monday Off Time 2	When P-70 is set to Local, Monday off time 2
P-79	Tuesday On Time 1	When P-70 is set to Local, Tuesday on time 1
P-80	Tuesday Off Time 1	When P-70 is set to Local, Tuesday off time 1
P-81	Tuesday On Time 2	When P-70 is set to Local, Tuesday on time 2
P-82	Tuesday Off Time 2	When P-70 is set to Local, Tuesday off time 2
P-83	Wednesday On Time 1	When P-70 is set to Local, Wednesday on time 1
P-84	Wednesday Off Time 1	When P-70 is set to Local, Wednesday off time 1
P-85	Wednesday On Time 2	When P-70 is set to Local, Wednesday on time 2
P-86	Wednesday Off Time 2	When P-70 is set to Local, Wednesday off time 2
P-87	Thursday On Time 1	When P-70 is set to Local, Thursday on time 1
P-88	Thursday Off Time 1	When P-70 is set to Local, Thursday off time 1
P-89	Thursday On Time 2	When P-70 is set to Local, Thursday on time 2
P-90	Thursday Off Time 2	When P-70 is set to Local, Thursday off time 2
P-91	Friday On Time 1	When P-70 is set to Local, Friday on time 1
P-92	Friday Off Time 1	When P-70 is set to Local, Friday off time 1

Number	Parameter	Description
P-93	Friday On Time 2	When P-70 is set to Local, Friday on time 2
P-94	Friday Off Time 2	When P-70 is set to Local, Friday off time 2
P-95	Saturday On Time 1	When P-70 is set to Local, Saturday on time 1
P-96	Saturday Off Time 1	When P-70 is set to Local, Saturday off time 1
P-97	Saturday On Time 2	When P-70 is set to Local, Saturday on time 2
P-98	Saturday Off Time 2	When P-70 is set to Local, Saturday off time 2
dFLt		

Network Configuration – RS232 comms

The final section to setup is the network address. In all instances, this must be done before the controller is connected to the site network.

When logging a Mercury 3 or Intuitive Mercury with an RS232 interface onto a network you must first connect the controller to a communications module, this is either a 485 Legacy, IP Futura, Mercury Switch. For Mercury 3's with the IP interface please refer to the Network Configuration – IP comms section for details of networking.

RS485 Legacy module / Intuitive Internal RS485 Network card

Using RS485, the controllers have an auto-initialise function, which will automatically log the device onto the site network. If the wrong address has been entered onto the network, you will have to reset the controller address by setting the address to 00-0, and then re-enter the correct address (you may have to deregister the wrong address from the home system as well).

Connecting an RS485 legacy Module to the controller or an Intuitive Internal RS485 network card, will govern which set-up screens are made available in the '**Net**' menu. The module will support the "Genus" protocol only. Using RS485 will show the below;

Display	Option
485t	485 Network Type
485A	485 Address/ Name
gAdd	Show underlying network address assigned to controller
rLog	Re-log the controller back onto the network
ClrA	Clear the address/name from the controller
ESC	Exit network menu. **N.B.** this option **must** be selected to save any changes made in this menu

The **485t** option shows a value representing the network type. This can only be set to '1':

Value	Network Type
1	Genus compatible (all versions)

Ensure option '1' is selected (for RS485).

The **485A** option shows a value representing the name of the controller in a Genus compatible network. For example, if the value shown in 485A is shown as "05-6". The controller would try to log onto a Genus compatible network using the name 'RC05-6'.

The **gAdd** option displays (in hexadecimal format) the underlying network address assigned to the controller when it was logged onto the network. Note: this is automatically assigned by the Data Manager.

The **rLog** option allows the controller to be logged back onto the network with its current name. The 'rLog' message will flash, waiting for confirmation. To confirm, press the Enter button to execute the command, Up or Down buttons to cancel.

The **CLrA** option will clear out the network address and name in the controller. The 'ClrA' message will flash for confirmation. Press the Enter button to execute the command, Up or Down buttons to cancel.

Fast Network Address Reset

To enter this mode, hold the Enter, Up and Down buttons together for approximately 3 seconds until the message CLrA appears on the display. CLrA is the first option in the menu consisting of the following options:

Display	Option
CLrA	Clear the address/name from the controller
ESC	Exit Setup mode

Pressing the Enter button to select the CLrA option will cause the 'CLrA' message to flash for confirmation, if the network type is set to Genus compatible. Press the Enter button to execute the command, Up or Down buttons to cancel. If the network type is not set to Genus compatible then the ClrA message will not flash and the ESC option can be used to exit the menu.

Bluetooth Network module

Connecting a Bluetooth Network Module to the controller will update the screens available under the 'Net' menu. They are detailed below;

Display	Option
485t	1: 485 Genus Network 2: Bluetooth
485A	Bluetooth device name. As it will appear on DMTouch's device list (RC00-0 – RC99-9)
nI d	Select Bluetooth Network ID (0 – 4)
gAdd	Shows underlying network address assigned to controller
rLog	Re-log the controller back onto the network
CLrA	Clear the address/ name from the controller
ESC	Exit network menu. **Note:** this option **must** be selected to save any changes made in this menu.

- Ensure the 485t is set to '2' (Bluetooth)
- Provide a unique device alias under the 485A menu (e.g. 01-5)
- Select the Network ID. Please see the Bluetooth wireless mesh setup guide for more details.
- Press the 'ESC' to save

The green network LED will flash to show it is attempting to log on and go solid when connected.

IP Futura module / Intuitive Internal IP Network card

In an IP system there are two options;

- IP-L
- IP-r

IP-L allows you to fix a static IP address into the controller, which you would use when you are connecting the controllers onto a customer's local area network. This would allow the customer to view each controller using a generic Internet browser.

IP-r allows you to give each controller on the system a unique number (using the rotary switches). This number is then allocated a dynamic IP address by the system's DHCP server (such as the RDM Data Manager).

IP-L

To configure the communication module or network card for IP-L, set all three rotary switches to zero. The module should then be connected to the controller. In the case of an Intuitive Mercury controller where the network card is already fitted, the controller should be powered off, all three rotary switches set to zero and the controller powered on.

- From the function menu you can now select '**nEt**'.
- Press enter and the display will show "IP-L", press enter once more.
- You can now set the IP network settings by using the table below

Display	Option
IP-1	IP Address byte 1
IP-2	IP Address byte 2
IP-3	IP Address byte 3
IP-4	IP Address byte 4
nL	Network Mask Length
gt-1	Gateway Address byte 1
gt-2	Gateway Address byte 2
gt-3	Gateway Address byte 3
gt-4	Gateway Address byte 4
ESC	Exit network menu. **N.B.** this option **must** be selected to save any changes made in this menu

IP-r

To configure the communication module for IP-r, set the three rotary switches to give each controller a unique identifier. The module should then be connected to the controller and the network. The controller should then be powered on to connect to the network. In the case of an Intuitive Mercury controller where the network card is already fitted, the three rotary switches must be set when the controller is powered off, then power up before connecting to the network.

- From the function menu you can now select 'nEt'
- Press enter and the display will show "IP-r", press enter once more.
- You can now view (only) the address given by the DHCP server

Network Mask Length

To ease setup, a single network mask length value is used. If the address has been specified with a network mask value in dotted IP format e.g. 255.255.255.0 then the table below gives the conversion:

Mask	Length	Mask	Length	Mask	Length
		255.255.254.0	23	255.254.0.0	15
255.255.255.252	30	255.255.252.0	22	255.252.0.0	14
255.255.255.248	29	255.255.248.0	21	255.248.0.0	13
255.255.255.240	28	255.255.240.0	20	255.240.0.0	12
255.255.255.224	27	255.255.224.0	19	255.224.0.0	11
255.255.255.192	26	255.255.192.0	18	255.192.0.0	10
255.255.255.128	25	255.255.128.0	17	255.128.0.0	09
255.255.255.0	24	255.255.0.0	16	255.0.0.0	08

Mercury Switch

The method of logging on the Mercury 3 and Intuitive Mercury (RS232 comms) will be similar to that of the IP Futura however please refer to the Mercury Switch user guide, which can be obtained from the RDM website, for information regarding connecting a controller to a network.

Network Configuration – IP comms

Mercury 3 controllers with the IP interface as standard does not require any communications module and will already communicate on the IP network protocol.

When networking the Ethernet variant, the 'Net' menu will have the following menus;

Display	Option
IP-L / IP-r	Read/ Write Static IP address / Read Only DHCP IP address
Id	The 3 digit network address
AtyP	IP-r / IP-L selection
ESC	Exit Menu

Similar to the IP Futura / switch setup IP-L allows you to fix a static IP address into the controller and IP-r allows you to give each controller on the system a unique network number (using the Id).

- To firstly select between IP-L and IP-r navigate to 'AtyP'.

IP-r

Once IP-r is selected the controller must be given a unique 3 digit 'network address' that no other device on the network has (note if logging on to a Data Manager, this will be the device ID). Once the ID has been set connect the controller to the IP network for it then to be given an IP address by the DHCP server. To view the IP address given, within the Net menu, navigate to 'IP-r'.

IP-L

If IP-L has been selected from the 'AtyP' menu the IP address must be given to the controller by navigating to 'IP-L' within 'Net'. The following menu's will be available;

Display	Option
IP-1	IP Address byte 1
IP-2	IP Address byte 2
IP-3	IP Address byte 3
IP-4	IP Address byte 4
nL	Network Mask Length (see the network mask length table above)
gt-1	Gateway Address byte 1
gt-2	Gateway Address byte 2
gt-3	Gateway Address byte 3
gt-4	Gateway Address byte 4
ESC	Exit network menu. **N.B.** this option **must** be selected to save any changes made in this menu

Once the IP address has been entered, the controller can be connected to the IP network.

Normal Operation

During normal operation, the controller will show the time, if there are no alarms. If there is a current alarm then an alarm message will be shown on the display and the alarm LED will come on. If the Control Stat is on a network and on-line, the green network LED will be on.

Faults

If a fault is detected, the Control Stat will indicate the fault on the display and the red alarm LED will come on

Network

The Network green LED flashes if the controller goes off-line or loses its given address.

Probe Offset

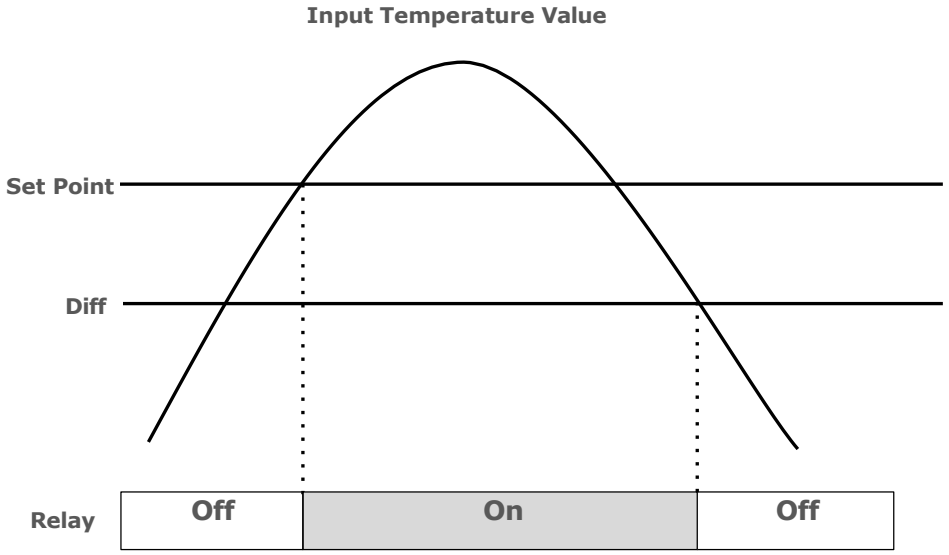
Each probe can be offset by up to ±10 °C to compensate for long cable runs.

HACCP

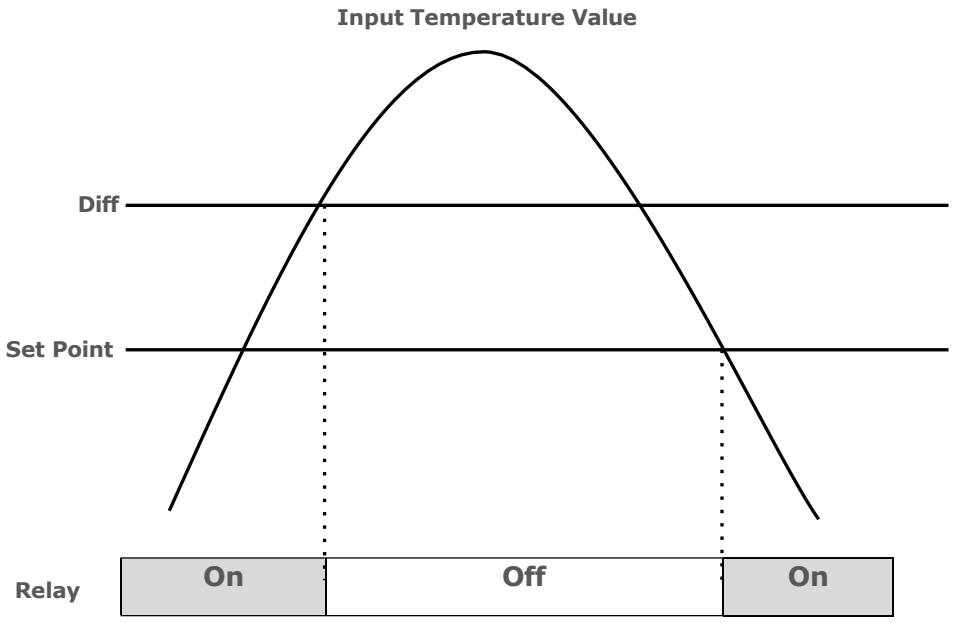
Remote Commands can be used to turn off/on the HACCP LED.

Operation

Cooling Thermostat Graph



Heating Thermostat Graph



A given thermostat will operate, as detailed in the above graphs, during the on periods of the timer (either local or remote). It is possible to turn the timer permanently on, therefore allowing a thermostat channel to be operate continuously. With the timer configured for local operation, set both on times 1 & 2 to 00:00 and both off times 1 & 2 to 23:59 on the desired days. Alternatively, to keep the timer permanently on across all 7 days set P-70 to Man On (3)

Frost Detect

The frost detect parameter is used to provide heating in an instance where the timer status is off. Each thermostat channel has its own frost detect value that can be configured. Once the temperature drops below the frost detect value the controller channel will heat to the frost detect value plus the channels diff parameter. For example, the 5 Channel Thermostat is used to heat a room, the channel configured has a diff of 5ºC, a frost detect value of 0ºC and the timer is off. The channel will switch its associated relay on when the temperature drops below 0ºC. The room will begin to heat and the relay is on, it will stay on until the temperature rises above 5ºC. At this point the relay will be turned off. The relay will be turned on again if the room temperature drops below 0ºC.

Viewing

Apart from setting up the controller, you can also view the status of the inputs and outputs and controller states.
From the function menu, select "I/O", press enter. You can now scroll through the IO table as set out below.

Input / Output Table

Number	IO	Range	Step	Units
I-01	Probe 1	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-02	Probe 2	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-03	Probe 3	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-04	Probe 4	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-05	Probe 5	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-06	Probe 6	-98 to 128ºC (-144 to 262)	0.1	ºC (ºF)
I-10	Stat 1 Probe	0 (Off), 1 (On)		
I-11	Stat 2 Probe	0 (Off), 1 (On)		
I-12	Stat 3 Probe	0 (Off), 1 (On)		
I-13	Stat 4 Probe	0 (Off), 1 (On)		
I-14	Stat 5 Probe	0 (Off), 1 (On)		
O-01	Relay 1	0 (Off), 1 (On)		
O-02	Relay 2	0 (Off), 1 (On)		
O-03	Relay 3	0 (Off), 1 (On)		
O-04	Relay 4	0 (Off), 1 (On)		
O-05	Relay 5	0 (Off), 1 (On)		
O-06	Timer	0 (Off), 1 (On)		
O-10	SP Offset 1	-18 to 18 ºC (-18 to 18)	0.1	ºC (ºF)
O-11	SP Offset 2	-18 to 18 ºC (-18 to 18)	0.1	ºC (ºF)
O-12	SP Offset 3	-18 to 18 ºC (-18 to 18)	0.1	ºC (ºF)
O-13	SP Offset 4	-18 to 18 ºC (-18 to 18)	0.1	ºC (ºF)
O-14	SP Offset 5	-18 to 18 ºC (-18 to 18)	0.1	ºC (ºF)
S-01	Section 1 Control State	0 (Off), 1 (Stabilise), 2 (Normal), 3 (Probe Fail), 4 (OT Alarm), 5 (UT Alarm)		
S-02	Section 2 Control State	As per S-01		
S-03	Section 3 Control State	As per S-01		
S-04	Section 4 Control State	As per S-01		
S-05	Section 5 Control State	As per S-01		

Display Messages

The following alarms and messages can appear on the Mercury display.

Display Message	System status		Display Message	System status
OT 1 OT 2 OT 3 OT 4 OT 5	Channel 1 Over Temperature Alarm Channel 2 Over Temperature Alarm Channel 3 Over Temperature Alarm Channel 4 Over Temperature Alarm Channel 5 Over Temperature Alarm		Prb 1 Prb 2 Prb 3 Prb 4 Prb 5	Channel 1 Probe Fault Channel 2 Probe Fault Channel 3 Probe Fault Channel 4 Probe Fault Channel 5 Probe Fault
UT 1 UT 2 UT 3 UT 4 UT 5	Channel 1 Under Temperature Alarm Channel 2 Under Temperature Alarm Channel 3 Under Temperature Alarm Channel 4 Under Temperature Alarm Channel 5 Under Temperature Alarm			

Network Alarms

The table below shows the text and associated type number that is sent to the system "front end". The type number is normally used to provide different alarm actions.

Alarm text	Type # (index)
Channel # Over Temperature	4
Channel # Under Temperature	5
Channel # Probe Fault	6

GP Timer Set-up

It is possible to set the Control Stat timer for remote operation (P70 = 1). A GP Timer must be set up to control the timer on/off period. For GP Timer set up please refer to the Data Manager user guide found on the RDM website. The following settings should be followed: -

Output Type – This should be set to "General".

Output Mask – This should match the "Controller Name".

Output Channel timer. – Set this to "5". This will allow the GP Timer to control the state of the controller

Remote Commands

The following commands can be used by a Data Builder program: -

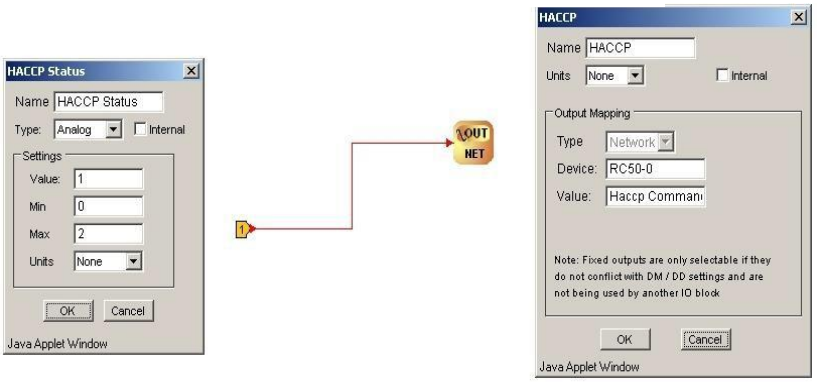
Command	Value to send	Description
Haccp Command	0 1 2	HACCP LED OFF HACCP LED On HACCP LED Flashes
Button Command	0 1 2	Buttons backlights Off Buttons backlights On Buttons Backlights Flash
Setpoint Cmd 1 (1 to 5)	Value	Value to offset set point

See Example to the right,

which turns on the HACCP LED.

Use an "Analogue Out" block configured to the controller name and in the value field type in the command you require.

Use a "Setting block" as the input to the "Analogue Out" block to send the Value.



Specification

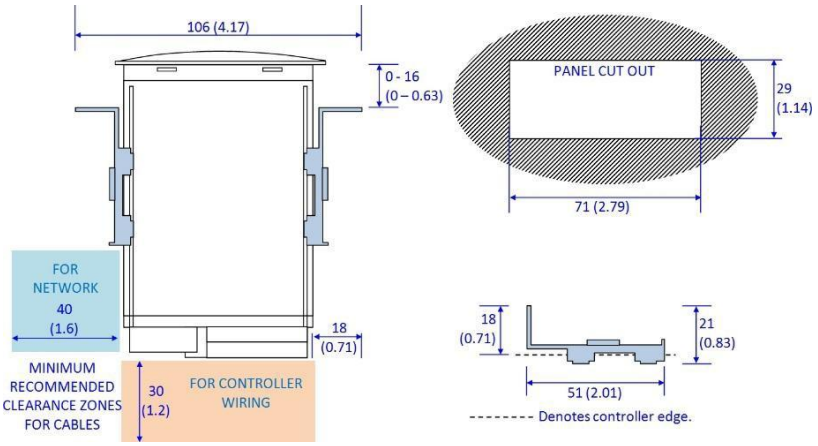
Mercury Mk3 Controller PR0740-5ISTA		Intuitive Mercury Controller PR0750-5ISTA PR0760-5ISTA
Power Requirements		
Supply Voltage Range	100 - 240 Vac ±10%	100 – 240 Vac ±10%
Supply Frequency	50 - 60 Hz	50 – 60 Hz
Maximum supply current	5.2 Amps (when relay 5 is fully loaded)	2 Amps
Typical supply current	<1 Amp	<1 Amp
General		
Operating temperature range	-10^{0}C to 60^{0}C (14°F to 140°F)	-10^{0}C to +60^{0}C
Storage temperature range	-20^{0}C to 65^{0}C (-4°F to 149°F)	20^{0}C to +65^{0}C
Environmental	Indoor use at altitudes up to 2000m, pollution degree 1, installation category II. Voltage fluctuations not to exceed ±10% of nominal voltage.	Indoor use at altitudes up to 2000m, pollution degree 1, installation category II. Voltage fluctuations not to exceed ±10% of nominal voltage.
Size	78mm (W) x 36mm (H) x 110mm (D)	157mm (W) x 67mm (H) x 120 (D)
Approx Weight	177 grams	500 grams
Safety	EN61010	EN61010
EMC	EN61326; 2013	EN61326; 1997 +Amdt. A1; 1998
Ventilation	There is no requirement for forced cooling ventilation	There is no requirement for forced cooling ventilation
Class 2 Insulation	**No** protective Earth is required and **none** should be fitted	**No** protective Earth is required and **none** should be fitted
Supply Fuse	The host equipment must provide a suitable external over-current protection device such as: - Fuse: 6.3A 240 Vac Antisurge (T) HRC conforming to IEC 60127	Built in fuse holder, fuse 2A 240Vac Anti-surge (T) HRC conforming to IEC60127, 32 x 6.3mm
Or MCB	6A, 240 VAC Type C conforming to BS EN 60898	2A, 240 VAC Type C conforming to BS EN 60898. Note: device has integral 2A fuse
Relay Fuse	Not Fitted	10A 240Vac Anti-surge (T) HRC conforming to IEC60127, 32 x 6.3mm
Relay Specification		
Relays 1 - 4 Exclusive common		Relays 1 -5
Max current	6A Resistive (CosØ = 1) / 2A Inductive (CosØ = 0.4)	10A Resistive (CosØ = 1) 3A Inductive (CosØ = 0.4)
Max voltage	250Vac, 30V dc	250Vac. 30V dc
Relay Fuse	N/A	10A 240Vac Anti-surge (T) HRC conforming to IEC60127, 32 x 6.3mm
Relay 5 Common		
Max current	3A (non inductive), COSϕ=0.4 2A (inductive load) 200,000 operations	
Max voltage	250Vac (Internal supply)	
For compliance with the LVD, relays 3, 4 and 5 commons must be at the same potential as the supply voltage		
Safety	Conforms to EN60730-1 based on UL 60950-1; UL 62368-1 as referenced to IEC60730-1	
Inputs		
Probe Input resistance	3.01K Ohms (for PTC or NTC type probes)	3.01K Ohms (for PTC or NTC type probes)
Probe Input type	Selectable. See: Units	Selectable. See: Units
Comms		
Serial Variant	RS232 with flow control	RS232 with flow control
Ethernet Variant	IP comms	IP comms

Please ensure all power is switched off before installing or maintaining this product.

Installation

Panel Cut-out and Clearances

Mercury Mk3 (Flush mount controller)

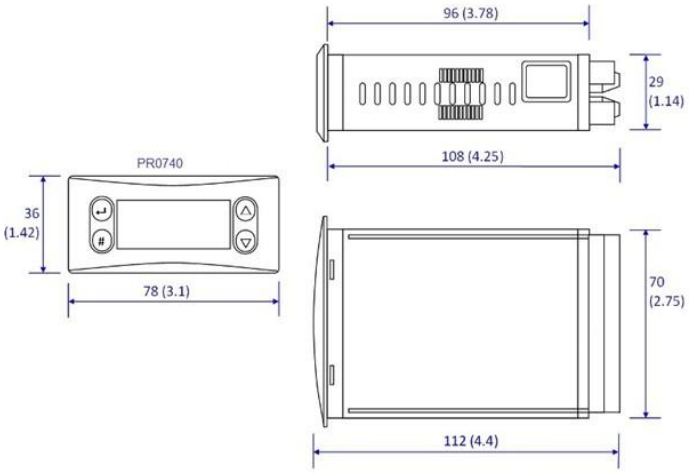


Fixing

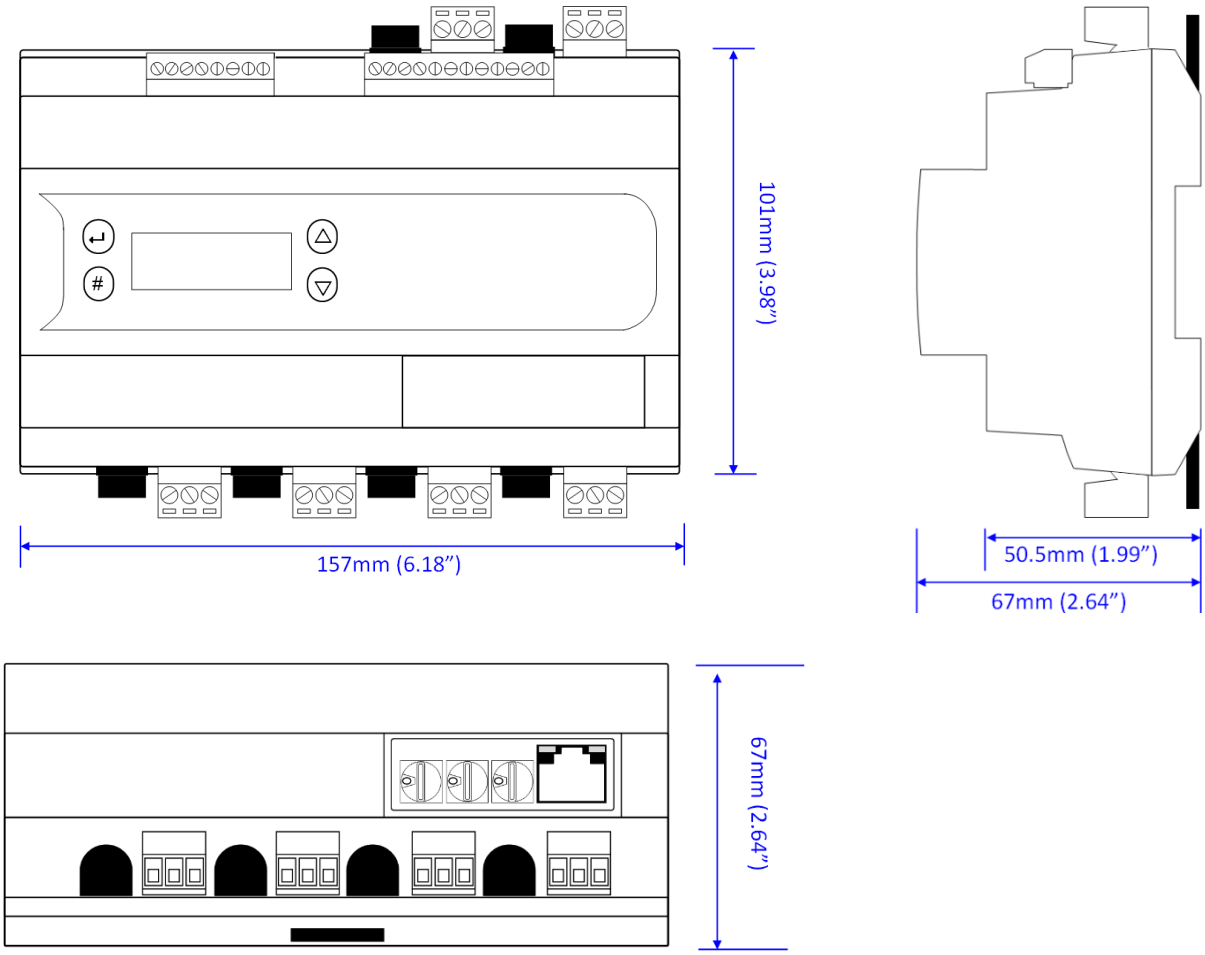
The controller is fixed by sliding the 2 plastic retaining clips up to rear of the panel. These clips have a ratchet action and can be removed by holding in the clip sides and sliding back.

There is no requirement for forced cooling ventilation

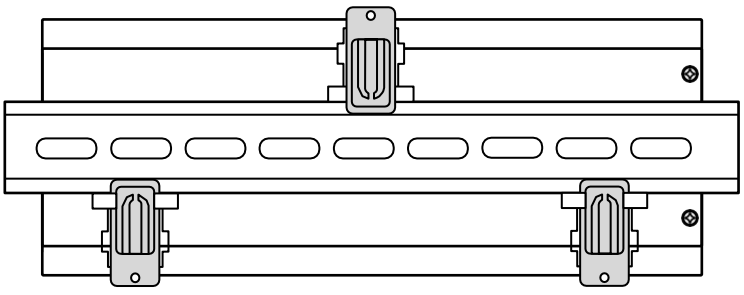
Dimensions – Mercury Mk3



Dimensions – Intuitive Mercury Controller



Intuitive Mercury Mounting Instructions



Three clips fix the Intuitive Mercury securely to DIN rail. Pull each clip until it "clicks" to remove the controller. Each clip has a mounting hole to provide an alternative fixing mechanism to DIN mounting.

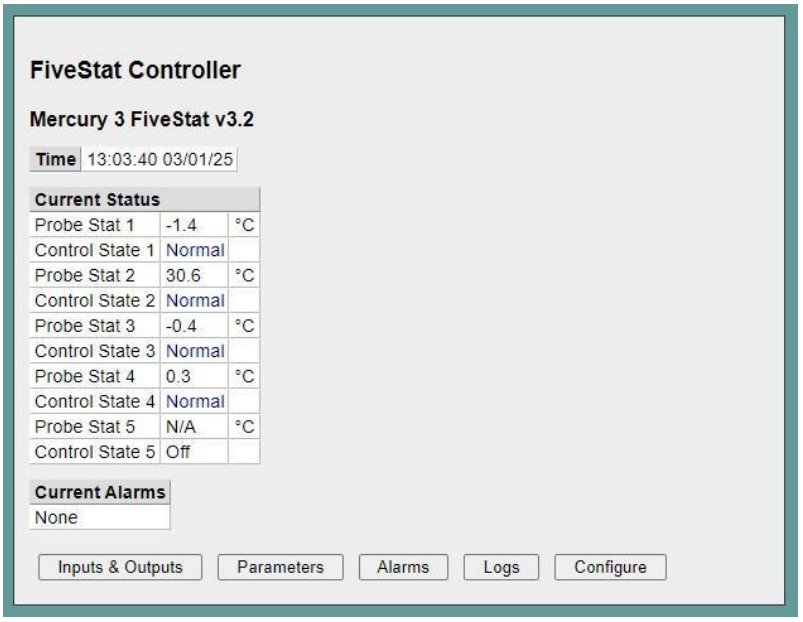
Cleaning

Do not wet the controller when cleaning. Clean the front by wiping with slightly damped lint free cloth.

Appendix 2: Webpage Appearance

It is possible to view the controller across an IP connection using one of the methods outlined in the Network Configuration section

The following screens are samples of how values and settings appear when viewed through a PC/Laptop connection.



FiveStat Controller

Mercury 3 FiveStat v3.2

Time	13:03:40 03/01/25

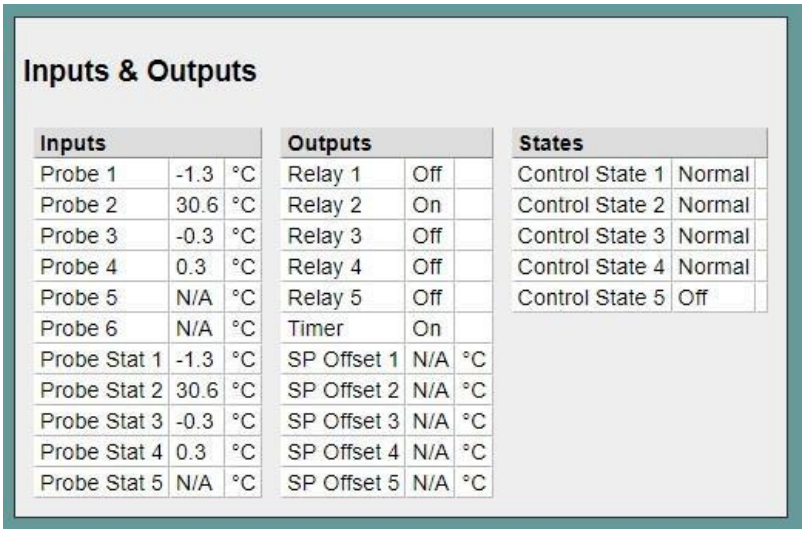
Current Status		
Probe Stat 1	-1.4	°C
Control State 1	Normal	
Probe Stat 2	30.6	°C
Control State 2	Normal	
Probe Stat 3	-0.4	°C
Control State 3	Normal	
Probe Stat 4	0.3	°C
Control State 4	Normal	
Probe Stat 5	N/A	°C
Control State 5	Off	

Current Alarms
None

Inputs & Outputs | Parameters | Alarms | Logs | Configure

The user has a choice of entering the following pages: - **Inputs & Outputs, Parameters, Alarms, Logs & Configure.**

Inputs & Outputs



Inputs & Outputs

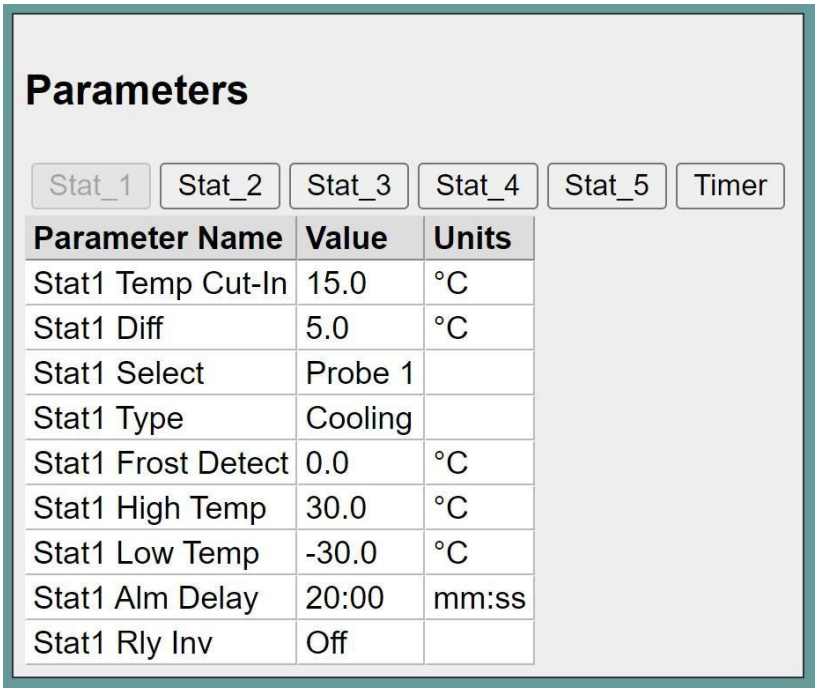
Inputs		
Probe 1	-1.3	°C
Probe 2	30.6	°C
Probe 3	-0.3	°C
Probe 4	0.3	°C
Probe 5	N/A	°C
Probe 6	N/A	°C
Probe Stat 1	-1.3	°C
Probe Stat 2	30.6	°C
Probe Stat 3	-0.3	°C
Probe Stat 4	0.3	°C
Probe Stat 5	N/A	°C

Outputs		
Relay 1	Off	
Relay 2	On	
Relay 3	Off	
Relay 4	Off	
Relay 5	Off	
Timer	On	
SP Offset 1	N/A	°C
SP Offset 2	N/A	°C
SP Offset 3	N/A	°C
SP Offset 4	N/A	°C
SP Offset 5	N/A	°C

States	
Control State 1	Normal
Control State 2	Normal
Control State 3	Normal
Control State 4	Normal
Control State 5	Off

This is view only screen and shows the states of the inputs and outputs.

Parameters



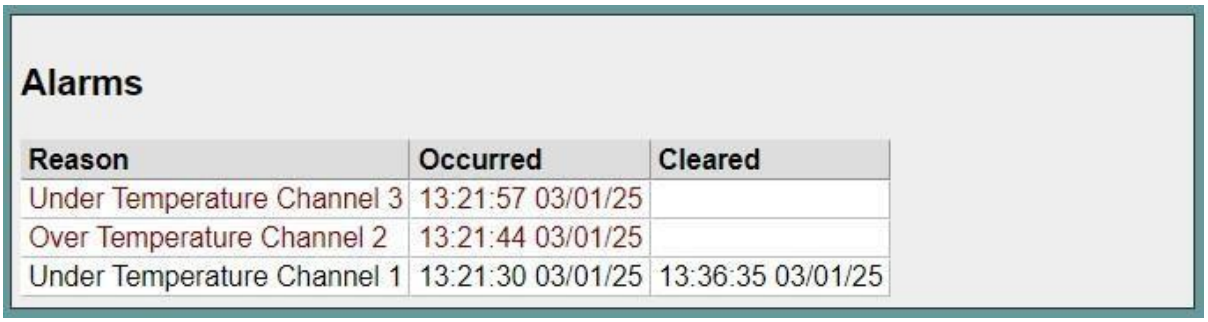
Parameters

Stat_1 | Stat_2 | Stat_3 | Stat_4 | Stat_5 | Timer

Parameter Name	Value	Units
Stat1 Temp Cut-In	15.0	°C
Stat1 Diff	5.0	°C
Stat1 Select	Probe 1	
Stat1 Type	Cooling	
Stat1 Frost Detect	0.0	°C
Stat1 High Temp	30.0	°C
Stat1 Low Temp	-30.0	°C
Stat1 Alm Delay	20:00	mm:ss
Stat1 Rly Inv	Off	

This is a view only screen and shows the parameter settings

Alarms

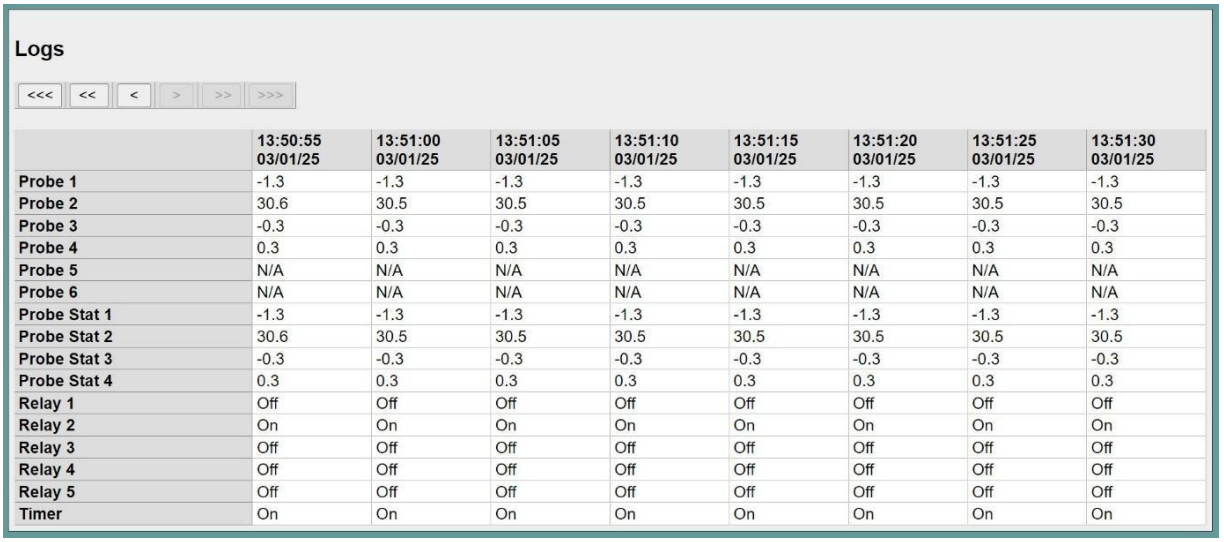


Alarms

Reason	Occurred	Cleared
Under Temperature Channel 3	13:21:57 03/01/25	
Over Temperature Channel 2	13:21:44 03/01/25	
Under Temperature Channel 1	13:21:30 03/01/25	13:36:35 03/01/25

This is a view only screen showing the alarm log.

Logs



Logs

<<< << < > >> >>>

	13:50:55 03/01/25	13:51:00 03/01/25	13:51:05 03/01/25	13:51:10 03/01/25	13:51:15 03/01/25	13:51:20 03/01/25	13:51:25 03/01/25	13:51:30 03/01/25
Probe 1	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3
Probe 2	30.6	30.5	30.5	30.5	30.5	30.5	30.5	30.5
Probe 3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3
Probe 4	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Probe 5	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Probe 6	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Probe Stat 1	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3	-1.3
Probe Stat 2	30.6	30.5	30.5	30.5	30.5	30.5	30.5	30.5
Probe Stat 3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3	-0.3
Probe Stat 4	0.3	0.3	0.3	0.3	0.3	0.3	0.3	0.3
Relay 1	Off	Off	Off	Off	Off	Off	Off	Off
Relay 2	On	On	On	On	On	On	On	On
Relay 3	Off	Off	Off	Off	Off	Off	Off	Off
Relay 4	Off	Off	Off	Off	Off	Off	Off	Off
Relay 5	Off	Off	Off	Off	Off	Off	Off	Off
Timer	On	On	On	On	On	On	On	On

This is a view only screen showing the device's log.

Configure

Alternatively, click on the **Configure** button to access the setup menu.

Note: login credentials required to access Configure menu are as follows;

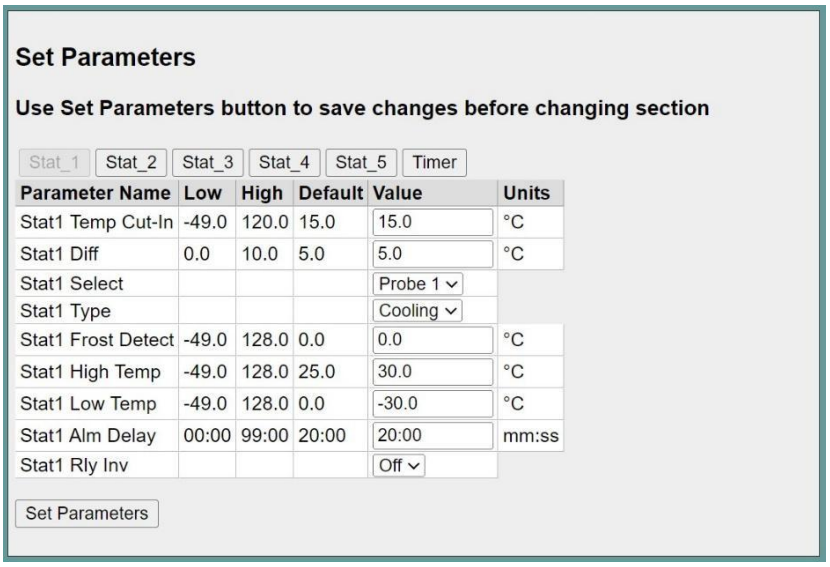
Username: 'service'
Password: '1234'

This screen allows the user to configure the controller and set-up the following: - Time, Parameters, Controller Type, Name, Logging, Asset Information and Probe Offsets.

Time Screen

Enter the time and date in the format displayed and press "Set Time" to update the controller. A screen showing the set time will be displayed, and then revert to the initial (Home) screen.

Parameter Screen



This screen allows the parameters to be changed. Once the values are changed, the "Set Parameter" button must be clicked to set the parameters into the controller. There are 6 separate settings pages for stats 1 – 5 and the timer.
A screen will show the number of parameters and the number changed, then revert back to the Home screen.

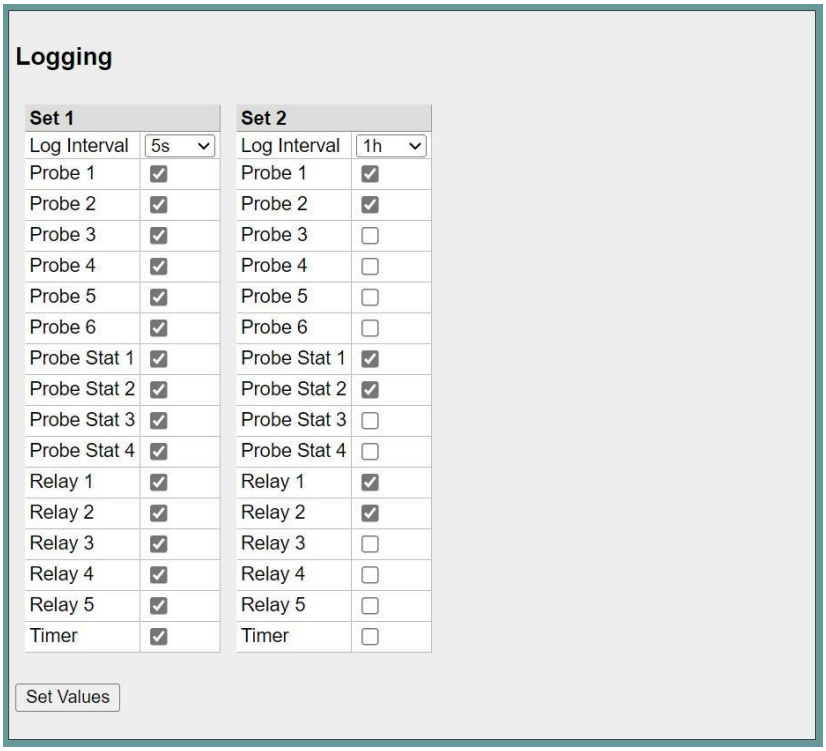
Temperature Units

This screen allows the user to set the probe type for the controller and if it's in degrees Celsius or Fahrenheit.

Name

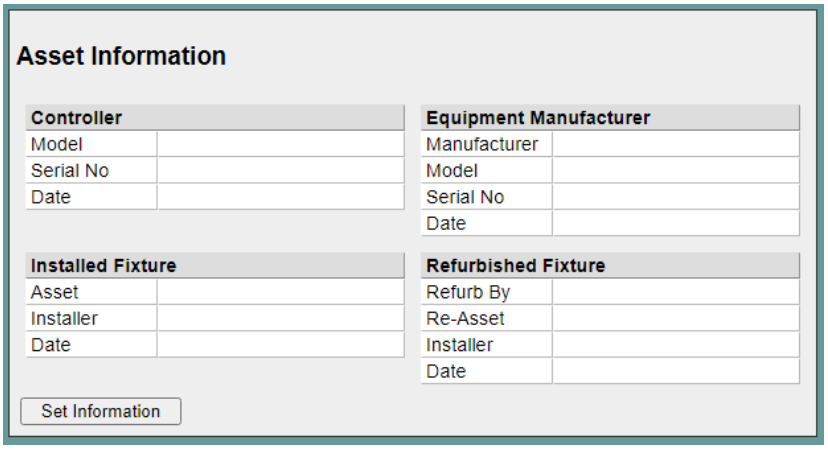
This screen allows the user to give the controller a name. Type in a name of your choice (upper or lower case alpha-numeric) up to 32 characters. Click "Set Name" to load into the controller. A screen will show the name has been set and then revert back to the Home screen. (The Home screen will also now show the controller name.)

Logging



This screen allows the user to set the logging features. There are two sets so that values can have different log intervals. Set the interval required on set1 and set 2, tick the required values to be logged, then click "Set Values" to load into the controller. A screen will display "Log configuration set" then revert back to the Home page.

Asset Information

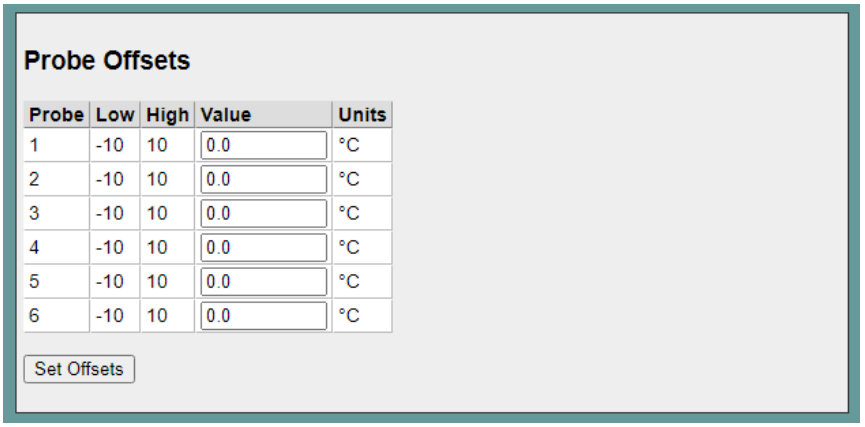


This screen allows the user to set asset information into the controller.

Caution: This is a once only operation.

Click "Set Information" and follow the on screen instructions to set up your asset information.

Probe Offsets



This screen allows the user to set a probe offset between -10 – +10 degrees to any of the six probes connected to the controller.

Warranty Information

www.resourcedm.com/terms-and-conditions/

Disclaimer

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Revision History

Revision	Date	Changes
3.0	18/04/2016	Introduction of Mercury 3 range.
3.0a	23/02/2017	New documentation format.
3.0b	17/05/2017	Operating temperature amended.
3.1	03/01/2018	Control states for sections 1-5 added to IO.
3.1a	12/04/2018	Offset range amended.
3.1b	31/05/2019	I/O table updated, Contact details updated.
3.1c	25/03/2020	Intuitive Mercury Controller added to documentation. Update to specification.
3.1d	23/12/2020	Warranty information added.
3.1e	10/02/2022	Bluetooth network support added.
3.2	03/01/2025	PC Screens Added, added note regarding timeclock operating on all channels regardless of their function.

Group Offices

RDM Group Head Office

80 Johnstone Avenue
Hillington Industrial Estate
Glasgow
G52 4NZ
United Kingdom

+44 (0)141 810 2828
support@resourcedm.com

RDM USA

9441 Science Center Drive
New Hope
Minneapolis, MN
55428
United States

+1 612 354 3923
usasupport@resourcedm.com

RDM Asia

Sky Park at One City
Jalan USJ 25/1
47650 Subang Jaya
Selangor
Malaysia

+60 3 5022 3188
asiatech@resourcedm.com

Visit www.resourcedm.com/support for more information on RDM solutions, additional product documentation and software downloads.

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