What you can achieve using Heat-Timer Internet Control Management System (ICMS).

The Internet Control Management System website service has been designed to allow user access to a Heat-Timer Platinum control panel. The following is a brief list of additional benefits that will be available to Platinum Internet panels:

View and Edit Panel Settings

- In addition, the user will have access to viewing, setting, and printing performance analysis graphs.
- The site will provide you with viewable and editable live data.
- Have instant access to multiple buildings and multiple Platinum panels.
- Create multiple users with different security rights. All are capable of viewing the same data at the same time.

Configure a variety of sensors

- Platinum Panels will add the capability of using a variety of Network and wireless space sensors, including Oil Tank Level and Water Meter.
- When using network and wireless sensors, Panel can use space sensors to fine tune performance for even better fuel savings.
- With the capability of using network and wireless sensors, a world of opportunities is available. You can monitor fuel levels, water meter consumptions, lights and doors, temperature, pressure, vacuum, humidity, and feedback from other equipment.
- You can configure individual alarms for each sensor. For example, an Email Alarm for Fuel Level sensors can go to your oil supplier when oil reaches a low level.

Configure Alarms

- Alarm feature can be activated and set to either be viewed on the web or sent to multiple emails. In addition, by allowing cell phone text messaging, Email alarms can be forwarded to a cell phone.
- Multiple Alarm deliveries can be configured for one alarm or panel status.

History

- Have access to many predefined history charts. Additional history charts can be configured for any sensor and many panel variables.
- Download history reports of panel parameters and sensors to a spreadsheet or a database. You can have your history reports emailed to you at specified intervals.

Make sure the Platinum panels purchased have Internet capability built-in.

Contents

Computer and Browser Requirements

Before starting you will need to have:

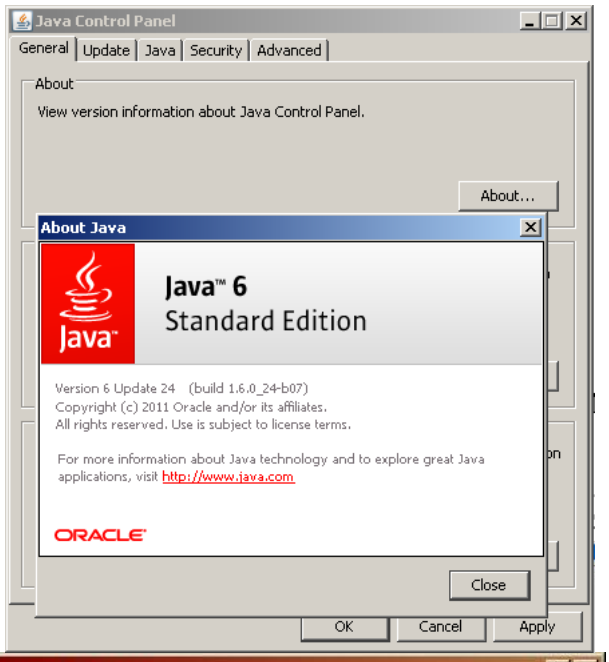
Compatible Browsers

The ICMS is compatible with the following browsers:

- Internet Explorer 6.0 or higher,
- Mozilla Firefox 5.0 or higher on both Windows and MAC,
- and finally Safari 5.0 or higher.

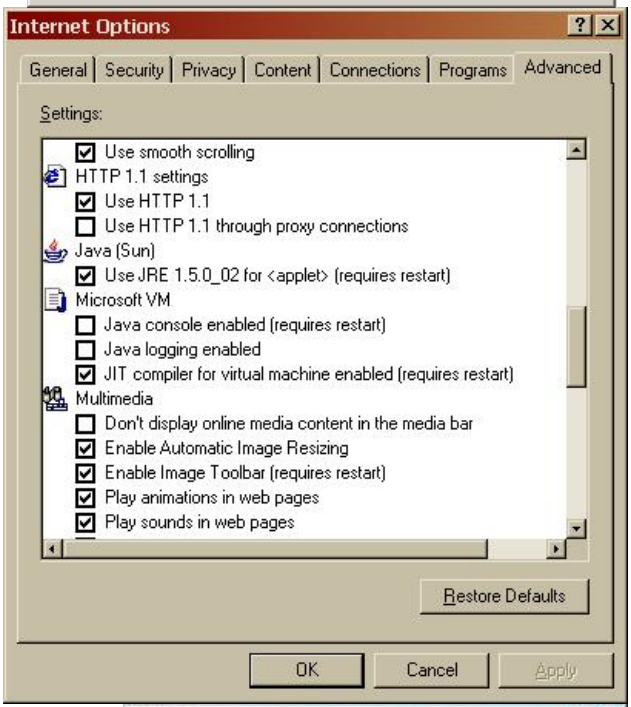
Sun Java Virtual Machine

For the ICMS site information to properly work, **Java** is required. **Java** can be downloaded from ***http://www.java.com/*** for free. The earliest version of Java that the ICMS web support is 1.6. To find out if you have Java or to find which version of Java you have installed, you will need to go to the ***"Control Panel"*** on your computer. Find the **Java Plug-in.** By clicking on it and selecting the ***"About"*** tab you will be able to see the version. If you could not find **Java** on you machine, follow the above link to download. You need to have computer administrative rights to be able to install **Java.**



Browser Settings

Make sure that running ActiveX and Script ActiveX marked Safe for scripting on Internet Explorer are ***ENABLED***. In addition, Temporary Internet Files cache must be set to refresh every visit to the page. All can be set by going to Internet Explorer ***Tools (menu)/Internet Options (menu option)*.**



a) **Java (Sun) enabled.** To make sure that Java is enabled for Internet Explorer, you need to check by going to Internet Explorer ***Tools (menu)/Internet Options (menu option)/Advanced (tab)*** then scroll to ***Java (Sun***) and make sure the ***Use JRE*** is marked.

b) **Run ActiveX controls and plug-ins.** Can be set by going to Internet Explorer ***Tools (menu)/Internet Options (menu option)/Security (tab)/Custom Level (Button)*.** You will need to scroll down to **Run ActiveX controls and plug-ins** and select ***ENABLE*.**

c) **Script ActiveX controls marked safe for scripting.** Can be set by going to Internet Explorer ***Tools (menu)/Internet Options (menu option)/Security (tab)/Custom Level (Button)*.** You will need to scroll down to **Script ActiveX controls marked safe for scripting** and select ***ENABLE*.**

d) **Temporary Internet Files Cache**. On Internet Explorer go to Explorer ***Tools (menu)/Internet Options (menu option)/General (tab)/Settings (Button)***. ***SELECT* Every visit to the page** to refresh page information when new data arrives.

e) **Do NOT use the Browser BACK and FORWARD navigation buttons**. Some pages might not update its information properly. Use the Web page navigation buttons instead.

Setup

The process of setup to use the Heat-Timer Control panel on the web requires several steps in the following order. No later step should precede any previous step. Each step's data can be edited later.

1. ***Creating an Owner account***. (Can only be performed by an owner)
2. Receiveing Account Activation Email.
3. ***Creating a Building*** within the Account (Can only be performed by an owner)
4. ***Installing a Control Panel*** in the Building Boiler Room (Can only be performed by an owner)
5. ***Configuring Sensors.***
6. ***Setup additional Users*** (Can only be performed by an owner)
7. ***Setup Panel and Sensor Alarms***

ACCOUNT

Creating an Account

This will be the Company/Individual information that will own and pay the monthly account fee. You will need to have a User Name and Password. Go to ***www.htcontrols.com*** where you will be introduced to a welcome screen. A *"Click to Login or Create an Account"* button must be clicked to get you to the next screen. Click the *"New Account"* button to be directed to the Owner Account Setup screen. After clicking the *"Submit"* button, you will be directed to login again. ***Account number and user name fields will be filled for you. You must record your account number, user name, and the password for later logging on.*** The initial User account will be created based on the information provided. This user information can be modified at any time. This user is considered as the owner of the account and can never be deleted for as long as the account exist. When filling all Owner Account information, you will need to provide Account credit information by clicking on *"Credit References"* button. ***No building creation or panel creation will be available until account credit has been verified and approved*** (process may take up to 2 weeks.) Account credit references can be filled on the web form or faxed to the Credit Department at (973) 575-4052. After creating an Account, you will need to ***Create a Building***. Multiple buildings can be created under one account.

View/Edit Account Settings

(Available only when logged in as an ***Owner***.) Account Information, Credit References and User (Owner) can be reached and edited after logging in by clicking on the *"Owner Account"* button on the left screen bar.

BUILDINGS

Creating a Building

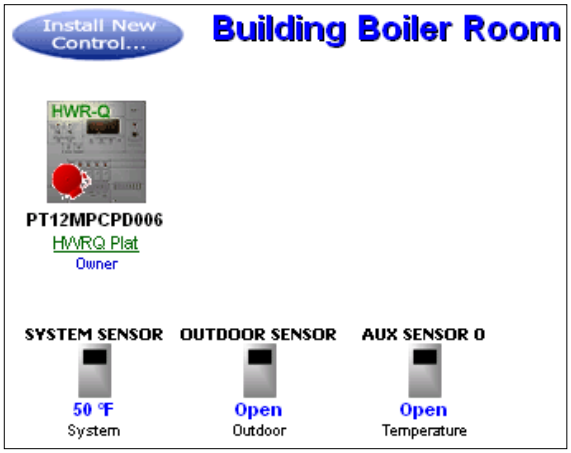
After ***Creating an Account***, creating a building to host the Heat-Timer control is the next step. ***Buildings CANNOT be created unless the account has been verified and approved.*** Building Physical Address, Attributes, Superintendent, Floor Setup, Arial View, and Attributes information can be entered after logging in by clicking on the *"Buildings"* button on the left screen bar. Clicking the *"Next"* button on each screen and the *"Submit"* button on the final screen are a ***MUST*** for building information to be retained.

View/Edit Building Settings

(Available only when logged in as an ***Owner***.) Building Physical Address, Attributes, Superintendent, and Arial View information can be reached and edited after logging in by clicking on the *"Buildings"* button on the **left menu bar**. Then clicking on one of the *"Edit Building Info and Floor Setup"* area in the building 3D view.

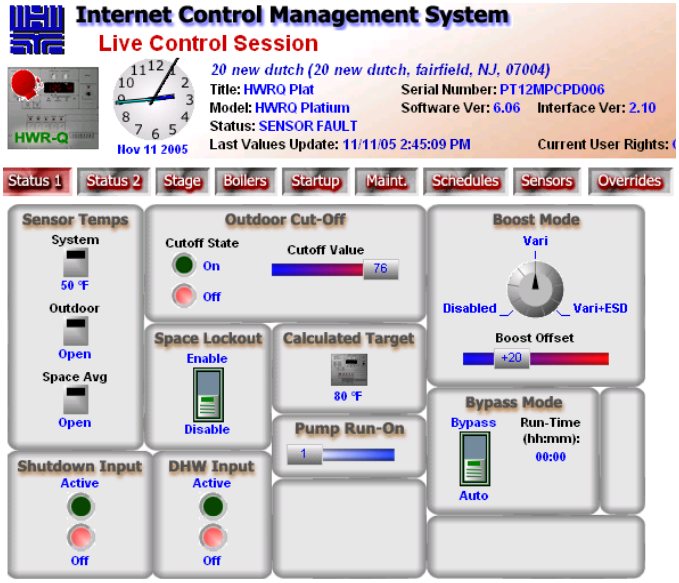
Control Panels

Installing a Control Panel



After *Creating a Building*, installing a Control Panel is the next step it can only be performed by an account owner. A Heat-Timer Control panel must be physically installed, connected to the Internet, and powered up prior to starting this process. **Do NOT** Forget to copy the Control's **SERIAL NUMBER**. The serial number will be used to identify the Control on the web. Panels can only be installed within a building. To install a control panel you will need to select a building by clicking on *"Buildings"* from the **Left Bar** menu. Select a building from the list then click on the *"Boiler Room"* on the bottom of the Building. An *"Install New control"* button will be available to start the process. This button will only be available to the logged in owner. When in the **Install New Control Panel** screen, enter the control's **Serial Number** and a unique name to identify it by. Then click *"Submit"*. After creating the Control panel, you will need to configure the.

View/Edit Control Panel Settings



Any user will have access to view and browse this option and go to **Open Live Session** in which control settings can be viewed. Only Owners and Full Rights users can set and edit Control name, alarms, history graphs and edit **Open Live Session** parameters. In addition, the owner of the account will have access to remove the control from the building. You can view and edit control setting by selecting a building by clicking on *"Buildings"* from the **Left Bar**. Select a building from the list then click on the *"Boiler Room"* on the bottom of the Building. A list of available Control Panels will be displayed.

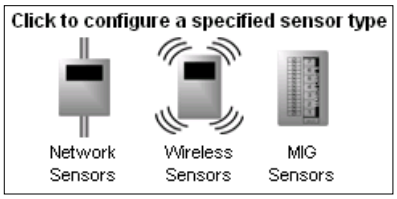
Live Session

This option allows a user to view and edit Platinum Panel settings. Live session can be reached by either clicking on the *"Green name of the panel"* wherever it is displayed or by selecting the *"Panel icon"* from the boiler room followed by clicking the *"Open Live Session"* button. You'll need to click on the *"Buildings"* from the **Left Bar**. Select a building from the list then click on the *"Boiler Room"* to see available panels. By clicking any of the panels, you'll be able to see panel configuration in addition to the *"Open Live Session"* button. This button will take you to the Live Session where Platinum Panel settings and parameters can be set and viewed. Each type of Platinum Panel will have a different set of parameters and tabs.

Sensors

Configure Sensors

After ***Installing a control Panel***, configuring the sensors is the next step. There are three groups of sensors. **Network Sensors**, in which includes Outdoor and System Sensors are preconfigured but Aux Sensors require location and type. **Wireless and MIG sensors** require the knowledge of the specific sensor ID, type, and location. Each configured sensor can have several alarm settings and deliveries. To configure a sensor select a building by clicking on the ***"Buildings"*** button from the **Left Bar** menu then clicking on the ***type of sensor*** you need to configure from the three types on bottom left of the building view. Then select the control panel the sensor will be configured for.



Network Sensors

These are sensors that can be wired direct to the Network terminals on the Platinum Panel: Room Space Temperature Sensor, Pressure Sensor with network Interface, Oil Tank Monitoring Sensor, 4-20mA Transmitter, Meter count, and Stack Sensor.

Wireless Sensors

The wireless system requires at least one Receiver that will be wired to the Network terminals on the Platinum Panel. The wireless sensors will be mounted in a way for the Receiver to have good data reception.

MIG Sensors

A MIG can be connected to the Network terminals on the Platinum Panel. Multiple sensors can be connected to one MIG. A MIG can have the following types of sensors: Room Space temperature, Brass Tube Sensor, Weatherhead, heating System Sensor, Vis-U-Larm (Boiler Smoke Alarm), and Any Dry Contact.

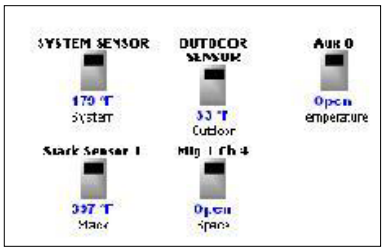
Sensor	Sensor Configuration	Alarms	Type	Description
Room Space Temperature Sensor in Wall Mount Enclosure	MIG, Aux Input	High, Low, Fault with Time Delay	Space	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel. You'll need Building Floor where sensor is mounted. **Note**: Space Sensor reading will be in **Green** when used in Space Average or **Blue** when NOT used in Space average.
Brass Tube Sensor, Immersion Type	MIG, Aux Input	High, Low, Fault with Time Delay	Temperature	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel.
Weatherhead	MIG, Aux Input	High, Low, Fault with Time Delay	Outdoor	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel. **Note:** Do not configure more than one Outdoor Sensor per panel.
Heating System Sensor	MIG, Aux Input	High, Low, Fault with Time Delay	System	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel. **Note:** Do not configure more than one Outdoor Sensor per panel.
Vis-U-Larm	MIG, Aux Input	Open, Short with Time Delay	Switch	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel.
Dry Contact	MIG, Aux Input	Open, Short with Time Delay	Switch	Can be wired to a MIG or directly to any of the Aux temp terminals mounted on the panel.
Wireless Space	Wireless	High, Low, Fault with Time Delay	Space	You'll need the Sensor ID, Building Floor where sensor is mounted. **Note**: Space Sensor reading will be in **Green** when used in Space Average or **Blue** when NOT used in Space average.
Pressure, Vacuum, Humidity	Network	High, Low, Fault with Time Delay	Pressure, Vacuum, Compound	Any signal that is 4-20mA.

Water Meter	Network	none	Count	
Stack Sensor	MIG, Aux Input	High, Low, Fault with Time Delay	Stack	Stack configuration must be selected for proper temperature reading.

Sensors can be any of the following configurations:

Sensor Type	Groups	Space AVG	Alarms	Description
Outdoor	Network, MIG, Wireless	No	High, Low, and Sensor Fault with Adjustable time delay	Installed outdoors for Outdoor Reset Controls **Note:** Do not configure more than one Outdoor Sensor per panel.
System	Network, MIG, Wireless	No	High, Low, and Sensor Fault with Adjustable time delay	Measures System Temperature. **Note:** Do not configure more than one System Sensor per panel.
Space	Network, MIG, Wireless	Yes	High, Low, and Sensor Fault with Adjustable time delay	Mounted within the building to be used in the space average. ***Must Select Space Average.*** **Note**: Space Sensor reading will be in **Green** when used in Space Average or **Blue** when NOT used in Space average.
Switch	Network, MIG, Wireless	No	Open or Short with Adjustable Time delay	To read an ON / OFF or OPEN / CLOSE status.
Temperature	Network, MIG, Wireless	No	High, Low, and Sensor Fault with Adjustable time delay	To read a temperature of different areas of the system.
Stack	Network, MIG, Wireless	No	High, Low, and Sensor Fault with Adjustable time delay	To read boiler stack temperature.
Level	Network, MIG	No	High, Low, and Sensor Fault with Adjustable time delay	To read Oil Tank Level. You need to have Tank Type (Cylindrical or rectangular, oval vertical, or oval horizontal), Diameter, and height of the Tank. Note: This Type of sensor provides a single level alarm.
Pressure, Vacuum, and Compound	Network, MIG	No	High, Low, and Sensor Fault with Adjustable time delay	To read pressure 0-15PSI, 0-30PSI, 0-100PSI, 0-200PSI, 0-300PSI, vacuum 30-0 Hg, compound (Vacuum and Pressure) 30Hg-0-0-30PSI.
Count	Network, MIG	No	None	To read a pulse that can be translated into any measurement. **Note:** *This Type of Sensor does not provide Alarm setting function.*

View/Edit Sensor Settings



Any user will have access to view and browse Sensor Settings. To view or edit sensor configurations you will need to select a building by clicking on the *"Buildings"* button from the **Left Bar** menu then clicking on the building you need to view its sensors. This building view will allow for the view of all sensors on all floors but the boiler room sensors. To view boiler room sensors for all controls (Sensors that has BR as a floor) click the *"Boiler Room"* on the bottom of the Building. Remember that a Full rights user can configure sensors, alarms as well as edit sensor information. Thus, if a full rights user clicked on any sensor in any view they will be directed to that sensor configuration screen. Sensor name and its alarm configuration can be changed at any time when logged in as a full rights user.

NOTE: Sensors that are configured will not allow the change of Type, Floor, water meter gallons per pulse, water meter offset, level sensor tank type, and level sensor tank height unless history tracking will be restarted. Old history will be lost.

Users

Create/Delete Users

Only the account owner can create, delete, and ***assign users*** to control panels. To create a user, login as an owner then click on the *"Owner Account"* button on the **left menu bar** then click on the *"Account Users"* button from the **top menu bar**. An *"Add User"* button will be available. Accepting the user Name and Password by clicking on the *"Submit"* button is required to complete the creation. A user can be deleted by selecting the user from the list then clicking the *"Remove User"*.

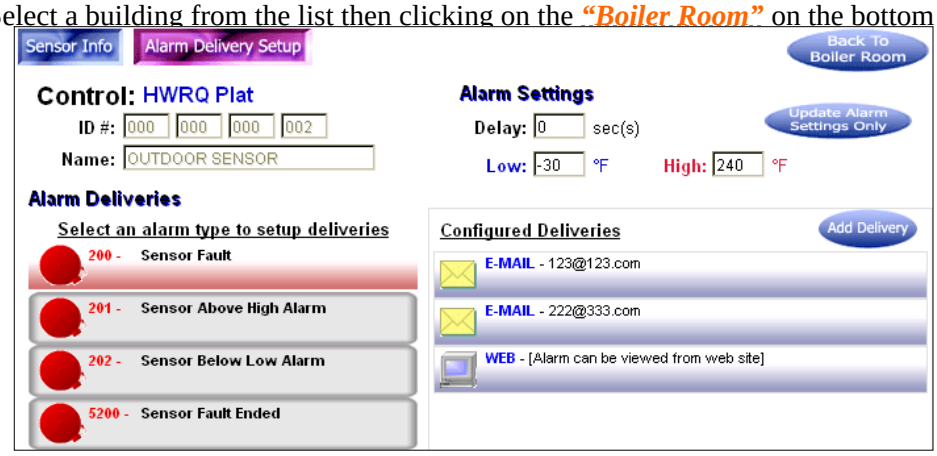
Assign/Remove Users to Panels

After ***creating a user*** he/she can be one of two types, either a **Full rights** user or a **Read Only** user. A **Full Rights** user has access to view, edit, and configure any information except Owner Account, Buildings, and other users information. On the other hand, a **Read Only** user can only view all of the information a Full Rights user views. After ***creating the users***, you will need to assign each to a control panel and assign the appropriate rights to either view or edit that control panel's settings. To assign a user to a control panel, login as the owner then click on the *"Rights"* button on the **left menu bar** then click on the *"Panel"*. By clicking the *"Assign User"* button you will get the option of selecting one of the created account users when *"From My Account"* option is selected. If *"From ANOTHER Account"* is selected, you will be asked to enter that Account ID and User Name. That allows for the assignment of owners from other accounts to your control panel as users. Furthermore, you will be able to select the Rights for that user.

Alarms

Control Panel Alarms

Depending on the type of Control panel, a series of alarms settings will be listed under that Control panel. Each of the alarms can be configured to either show only on the Web or to be emailed to a specific email address and be viewed on the web. You can have only one web alarm per incident. However, you can configure multiple email deliveries per incident. To modify or view the Control Panel alarms, select a building after clicking on *"Buildings"* from the **Left Bar** menu. Select a building from the list then clicking on the *"Boiler Room"* on the bottom of the Building. A list of the installed controls will be available. Select the control you need to view or edit the alarms for. Click on the *"Alarm Delivery Setup"* button to see a list of configurable alarms.



Note: Panel alarms have fixed or no delays based on the type of alarm selected.

Sensor Alarms

Sensor alarms can be reached by either clicking on the *"Sensor"*. All sensors except for Count Sensors can have an alarm configuration. Most sensors will have three parameters to determine an alarm status: An *"Alarm Delay"* determines the amount of time the sensor is above, below, or in fault setting before an alarm goes off. The *"Alarm Low"* is the minimum limit for that sensor before an alarm can go off. The *"Alarm High"* is the maximum limit for that sensor before an alarm can go off. In addition, a series of alarms settings will be listed under the sensor configuration. Each of the alarms can be configured to either show only on the Web or to be emailed to a specific email address in addition to the web. You can have only one web alarm per incident. However, you can configure multiple email deliveries per incident.

Viewing Alarms

To view current and past alarm history, click on the *"Alarm"* button form the **Left Bar** menu. Whenever a panel is in alarm condition the Building and Panel will have a red alarm sign. Whenever a sensor is in alarm condition the Building and Panel will have a red alarm sign. The Sensor will be red in color.

The alarm list will have the active alarms in red and will be listed on top of all the alarms. Alarms that have ended will be listed in blue.

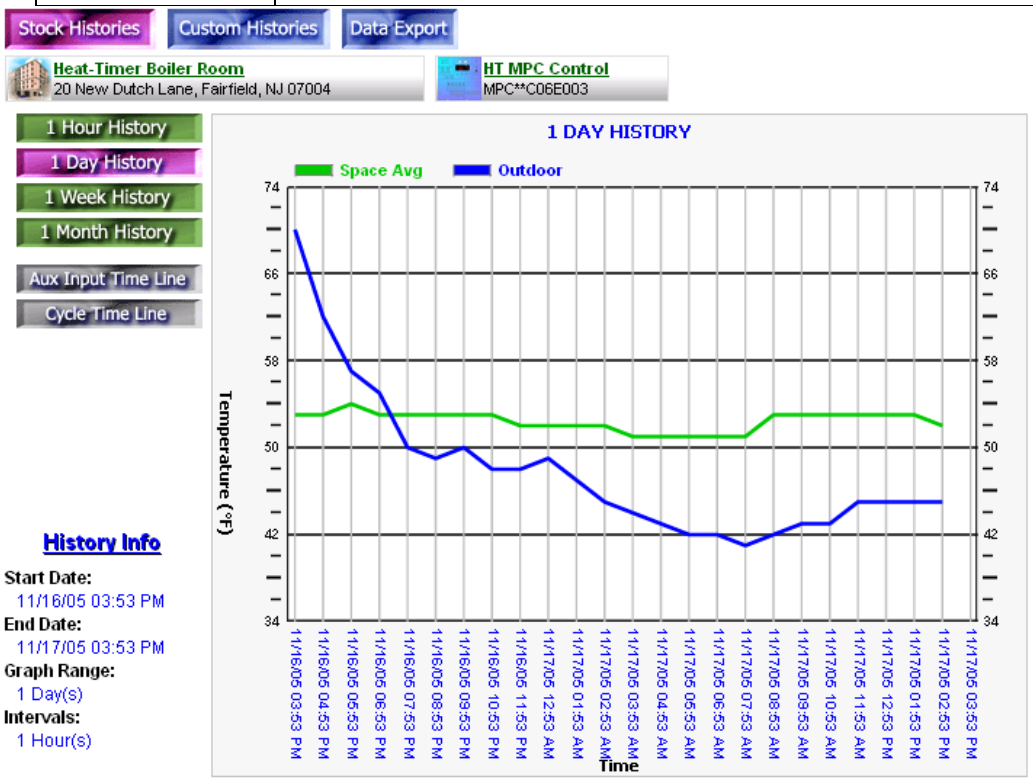
History

When a Platinum Panel has been configured, a set of Preconfigured History Graphs is automatically set. In addition, Custom History and Data Export will be available.

Stock Histories

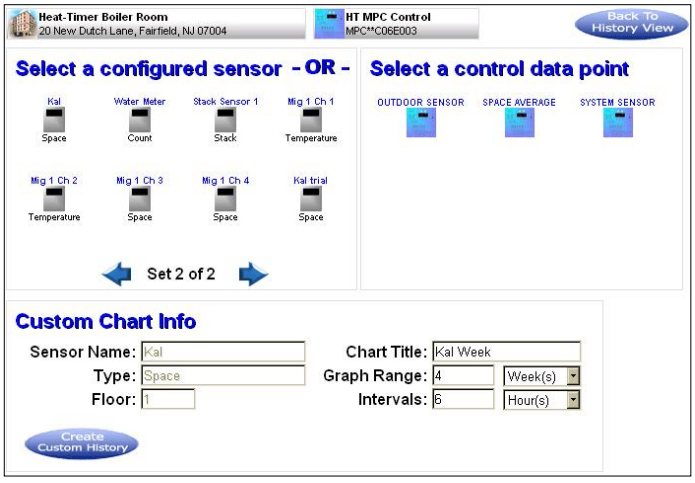
Are a set of history graphs that are preconfigured for the ***Space Average*** (For all Space Sensors that have Space Average Check box selected), System, and Outdoor Sensors.

1 Hour History	Display Space Average and System sensor readings over the past hour.
1 Day History	Display Space Average and Outdoor sensor readings over the past 24 hours.
1 Week History	Display Space Average and Outdoor sensor readings over the past 7 days.
1 Month History	Display Space Average and Outdoor sensor readings over the past 30 days.
Additional Histories	For each type of panels a few additional stock histories will be available.



Custom Histories

You can create several Custom Histories for any sensor or Platinum Panel Data Point that is preconfigured by clicking on the ***"Create Custom History"*** button. A screen listing all available sensors will display. When a specific sensor is selected, its information is automatically filled in the fields: **Sensor Name, Type, and Floor**. All you need to fill is a **Name**, a **Range**, and an **Interval**. The Range should not exceed 35 times the value of the Intervals. That is, if the Range is set to 7 days (168 Hours), your Intervals should not be less than 5 hours (The Range = 168 Hours when divided by the Interval 5 Hours, the result should be 33.6 which is less than 35).



Data Export

This option allows for the export of any sensor and many panel data points to a format that can be imported into a database or a spreadsheet. In this screen you'll be able to export a report in a variety of formats to an email address that you specify. All emailed reports will be zipped to reduce the size of the email. Some free utilities can be downloaded to extract zip files. The amount of data exported cannot exceed a month.

Reports Types

- **On-the-Fly Report.** This report can be run at any point in time without the need of saving the configuration. On the ***Config(s)*** field you'll need to select ***ON-THE-FLY EXPORT (NO SAVE)***. In addition to setting each of the fields, you'll need to select sensors and specify a ***Start Date*** and an ***End Date***. Date can be any format accepted by Microsoft product. A time can be added to the date to specify the hours and minutes. (10/1/05 6:00AM)
- **Saved Configuration Report**. This report allows you to save the configuration for later use. A total of 10 preconfigured reports can be saved per panel. On the *Config(s)* field you'll need to select ***CREATE NEW CONFIGURATION***. For this type of report, leave the ***Occurrence*** field as ***NONE***. After filling all available fields, click the ***"Save Configuration"*** button. This will give you the option of entering *Start Date* and *End Date* to run your configured report.
- **Auto Export Report.** This option allows you to receive an automated configured report based the intervals you specify. You can select any of the preconfigured reports that you have saved to automate its delivery. In this case you'll need to select the frequency of the report from the ***Occurrence*** field.

File Format Types

All exported files will be in a compressed ZIP format. Windows XP can open any compressed file without the addition of external software. However, other operating systems might require a utility to uncompress the file. You can receive the exported data in either one of three file types:

- **Comma Delimited (*.csv).** A format that can be opened by any spreadsheet, database, or text editor program. Note that, if Microsoft Excel was installed on your computer using defaults, double clicking the file when extracted will start Microsoft Excel and opens the exported file.
- **Tab Delimited (*.txt).** A format that can be opened by any spreadsheet, database, or text editor program but requires customized settings for spreadsheets and databases to import data properly.
- **Fixed width (*.txt).** A format that can be opened by any spreadsheet, database, or text editor program but requires customized settings for spreadsheets and databases to import data properly.

Data Format Types

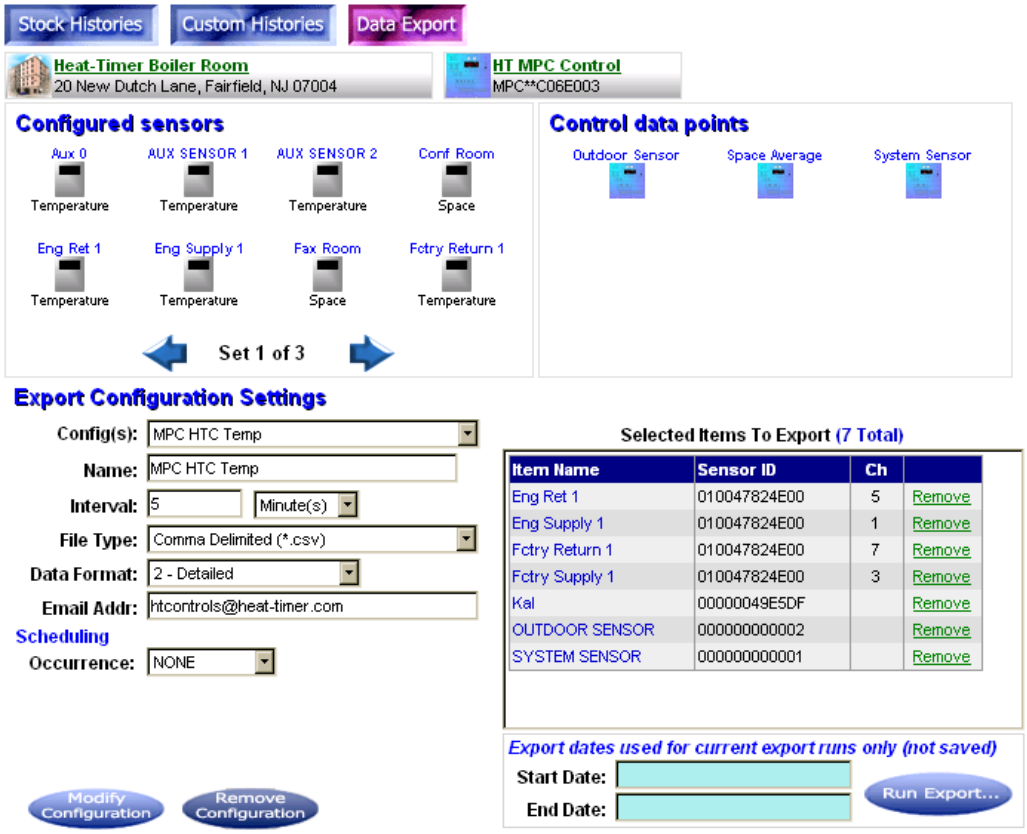
All exported data can be displayed in two choices:

- **Simple.** A format that allows the data to be compared horizontally. All sensor and data points selected must be of the same type. This type of report allows for single point comparison.

Interval	Apt# 14A	Apt# 14F	Aux0/BlrTemp	AUX1/DHW	Blr Rm Temp	OUTDOOR SENSOR	Stack Temp	SYSTEM SENSOR
11/2/2005 9:00	76	73	197	128	98	51	245	163
11/2/2005 10:00	76	74	173	128	96	52	252	120
11/2/2005 11:00	76	74	185	128	97	53	186	102
11/2/2005 12:00	76	74	161	128	95	55	158	95
11/2/2005 13:00	76	75	172	127	95	55	174	93

- **Detailed.** A format that allows multiple sensors and data point, can be different types, that is, you can combine temperature with pressure in one report, to be viewed.

ItemName	SensorID	Channel	Interval	ItemValue	ItemState	Units
Oil Tank Level	'000392330801'		11/2/2005 9:00	7167		Gal
Oil Tank Level	'000392330801'		11/2/2005 10:00	7161		Gal
Oil Tank Level	'000392330801'		11/2/2005 11:00	7158		Gal
Oil Tank Level	'000392330801'		11/2/2005 12:00	7155		Gal



While using the Data Export the following needs to be considered:

- A maximum of 20 sensors and Panel Data Points can be exported in one report.
- Intervals have a minimum of 1 minutes and a maximum of 1 week.
- The maximum date range is one month. The month must be within your plan range.
- A maximum of 10 preconfigured reports can be saved per panel. That means a maximum of 10 automated reports can be saved per panel as well.
- In Simple report format, all sensors and Data points must be of the same type. That is, all sensors can be reading temperature, pressure, or gallons.