Engine Room Control OS Release Notes
(Latest to Earliest)

Release Notes Q5 11.11 / Q6 12.11

Software Upgrade – MD5 Fire Validation

- Added a validation process to the software upgrade process to ensure a software upgrade package has not been corrupted or altered

Notifications – Mobile Phone

- Implemented a toggle on the Security page to allow a user to optionally receive mobile notifications in addition to the standard email notifications for events and alarms

Notifications – Improved Failure Feedback

- Added Event feedback notifying the user if and why a Notification Email failed to send

Security Improvements

- Removed debug features

Release Notes Q5 11.10 [November 2022]

Unity Network – Initialization Error

- Fixed an issue where the product does not load properly when initializing the Unity Network without an internet connection

Release Notes Q6 12.10 [August 2022]

Touchscreen Driver

- Added a Q6 processor board (640D0198H02) touchscreen driver.

Release Notes Q5 11.02 / Q6 12.02

King Valve Control

- Added control and digital I/O for Liquid and Hot Gas king valves.

Ethernet IP

- Fixed an issue that was causing the Ethernet IP process to not function correctly.

System Data Download

- Fixed an issue that could cause the panel to crash when downloading System Data.

Refrigerant Sensors/Warnings

- Removed a Refrigerant Warning 2 notification that could not be cleared on the alarms page if a Refrigerant Warning 1 notification was active.
- Changed the Refrigeration Warning 1 digital output control logic to no longer require the General Alarm Output to be energized before turning off the Refrigeration Warning 1 digital output.
- Fixed an issue where the text for certain Refrigeration Warnings were displaying incorrectly.
- Changed the High Range Refrigeration sensor logic to trigger a digital output similar to the Low Range Refrigeration sensors.
- Fixed an issue where the custom names for the Refrigeration Sensors were not displayed correctly on the Trending page

Emergency Pressure Control – Board Selection

- Fixed an issue where the Board selection for the Emergency Pressure Control output could not be configured.

Floor Warming – Home Page

- Fixed an issue where the Floor Warming section on the Home page could run off the screen if too many options were selected.
- Changed the buttons to activate Floor Warming to no longer be accessible if a user is not logged in.

Application Crash – Digital Aux

- Fixed an issue where attempting to input a custom name for the Digital Aux F through J caused the HMI application to crash.

Ventilation Step Order

- Fixed an issue where Ventilation Steps that were assigned the same order numeral were not correctly turning on and off together.

Digital Aux Outputs

- Fixed an issue where the logic for the Digital Aux Outputs was not functioning as intended.

Unity Network

- Added a Service level option to remove all remote Unity Network Panels from a product.
- Added a feature that preserves the local network settings when performing a Setpoint Restore.
- Changed the logic associated with resetting default setpoints via the dip switch/jumper to correctly restore the Port setpoint to the default.

User Actions – Language Data

- Added several missing phrases to the User Action logging and added support for translation.

Freeze Screen Changes

- Fixed several instances where custom names were not displayed correctly on the Freeze Screen generated by alarms and warnings.
- Improved the way Freeze Screen selection items are ordered so they are consistent with how they are displayed in the Freeze Screen output window.

Keyboard Input Characters

- Removed problematic symbols and characters from the software keyboard associated with naming and saving a Setpoint file.
- Added the "&" symbol to the list of illegal characters when naming a custom field.

AcuAir Support

- Added support for the AcuAir HD Unity product to function as part of the Unity Network system.

Remote Software Update

- Fixed an issue with multi-product Unity System panels where updating a remote panel caused the screen to continue displaying a "Panel will reboot in 1 second" message instead of redirecting to the Overview screen.

RELEASE NOTES FOR 11.01

Emergency Pressure Control

- Added an emergency pressure control system based on the IIAR standards which allows a user to configure up to two separate systems. In a high pressure condition, the EPC system will equalize the high side of the system to the low side to reduce pressure quickly.
- Each system can be activated by a digital or analog trigger or a combination of both

Underfloor Heating

- The underfloor heating system has been expanded to include two separate systems that can each be configured as either electric or glycol heating
- Added an additional 8 underfloor sensors for a total of 12 that can be assigned to either Heating System A or B
- Added an "Always On" option for the Glycol Pump Systems and auxiliary pump control

Ammonia Detection

- Added a new feature to include 4 additional ammonia detection sensors as well as update existing ones. The 4 new ammonia sensors have much wider ranges so they can be used for 1% or 2% sensors.

Login Numerical Keypad

- Changed the login numerical keypad to be more consistent with other Quantum HD products

System Overview View

- Changed the logic of what is shown in the Engine Room box on the System Overview page to hide values that do not have an IO board or channel set

<u>Pop-Up Modal Selection Lists</u>

- Fixed an issue where modals used for trending, user defined, and control inputs were missing values

<u>Email Notifications</u>

- Enhanced the notifications email server to reliably send new events and alarms on a one-minute cycle as new events and alarms occur
- Combined the email notifications and group pages into one page to simplify managing notification configurations

<u>Analog Output – Added 0-10 Vdc option</u>

- Added 0-10 Vdc as an additional sensor type for analog outputs

<u>System/Trending Data Download</u>

- Changed the tabs on a downloaded System Data excel file so that the trending data tab appears first
- Provided the same System Data excel file to the user when Download Trending Data is selected on the Trending screen as when Download System Data is selected on the Service screen
- Included the data units in the column headings in a downloaded trending file
- Saved the trending data in a number format instead of a text format so that calculations can be performed on the data and the numbers can be easily graphed.

<u>Pressure Resolution and Atmospheric Pressure</u>

- Moved the Pressure Resolution and Atmospheric Pressure selections to be part of the System Overview pages allowing the value to be shared between products
- Fixed an issue where the Atmospheric Pressure setpoint was being truncated to a whole number

<u>500 Error Page</u>

- Updated the 500 Error page to allow a user to return to the Menu in the rare case of an internal server error. Previously when this occurred, the user would have to reboot the panel.
- Fixed an issue where navigating to the Home page immediately after changing a setpoint value resulted in a 500 Error being displayed

<u>Auxiliary Analog Input</u>

- Fixed an issue where the panel would sometimes reboot if there is a space embedded in the unit fields of an Auxiliary Analog Input when the unit type is set to "Other"
- Adjusted the range of the High Limit and Low Limit setpoints of an Auxiliary Analog Input when the inputs' units are changed
- Fixed an issue where a user could type in custom units that were too long to display on the screen. The Units field is now limited to 8 characters.

<u>Updated Product List</u>

- Enhanced the Product List section under the Networking settings to separate the local panel from other connected panels

<u>Trending</u>

- Enhanced Trending to support up to 10 trending selections at one time
- Fixed an issue where the Reset Zoom button would appear in the middle of the trending graph

<u>Freeze Screen Update</u>

- Updated the Alarms page to now have a "Freeze Data" button that will display a modal with the data values captured when the alarm occurred
- Enhanced the Freeze Screen modal to show more data and corrected instances where the wrong text index was being displayed

<u>Select Data Pages – Trending, User Defined and Control Input</u>

- Updated the select data pages to be sorted and displayed consistently throughout the application

<u>Panel Time</u>

- Removed an automatic service that was causing the panel time to be reverted after rebooting while connected to a network with internet access
- Added a dropdown for the user to select a time zone
- Changing the date format from US to European format will now update the date fields on the screen to be shown in the correct order

Communication Log

- Fixed the communication log located in the "Status" section of the application to no longer ignore the most recent item in the log

Touchscreen Calibration

- Added a modal to be displayed after the user performs a touchscreen calibration indicating the result of the calibration. If calibration fails for any reason, the user will be prompted to retry

User Actions – Clearing Alarms

- Changed the description of the user action that is generated when a user clears an alarm to be more informative about the action that took place

Restoring Setpoints Files

- Changed the restore setpoint process to no longer consider zipped setpoint folders in the list of recognized files

IO Conflicts

- Fixed an issue where generating an IO conflict would cause the new channel information to revert to the previous value

Temperature Units - Spelling

- Corrected the spelling of the word "Celsius" in the Temperature Units selection on the Panel page

Deleted Saved Setpoints

- Enhanced the "Delete Setpoints" operation to no longer require the server to be restarted

Software Upgrade - Reboot

- Changed the software update process to require a reboot due to significant system level changes

Remote Trending - Time

- Changed the date and time displayed on the trending graph when viewed remotely to now align with the system time on the panel

Analog Output Modal

- Fixed an issue where the modal for Analog Outputs was not consistent with other modals throughout the application

User Email Validation

- Added standard email validation when a user enters an email address which will detect invalid entries

Contacts Page

- Changed the Contacts Page to be distributed between all connected products

Panel Disconnect Indication

- Added a message to be displayed to the user after losing connection with a panel that is being viewed remotely. This process will alert the user if the connection is lost to a remote panel, but in this version, it is not able to detect if the remote panel is powered down.

Remote Users Page

- Fixed an issue on the Remote Users page where expired sessions were not being removed from the Sessions List

RELEASE NOTES FOR 11.00

User Defined Screen

- Added the User Defined feature to Engine Room Control

System Operating Values

- Added the Recip analog values to be selectable on the System Operating Values page

Discharge Motor Amps

- Removed Recip Compressor discharge and motor amps from the "Status" page unless those features are enabled or configured

Alarm Output

- Changed the general alarm output on the Engine room control to be energized when any warning or shutdown occurs with a Recip Compressor

Email - SMTP Factory Settings #2

- Fixed an authorization mismatch that caused emails and notifications using the Factory Settings #2 option to fail to send

Add Factory Card Page

- Fixed an issue preventing a user from opening the System Overview menu modal while accessing the Add Factory Card page

Panel Temperature Selection

- Fixed an issue where changing the temperature units form F to C or C to F was not distributed to all products within the Quantum HD Unity Network

Panel Pressure Units

- Added kpaG as an option to the pressure units dropdown on the panel page

Setpoint Maintenance

- Established the length of a Saved Setpoints filename, preventing the Submit button on the Restore Setpoint page from being pushed off the page
- Added a check to prevent the entering of invalid characters while saving a setpoints file that caused the save function to fail

 Clean Screen Timeout

- Changed the default timer for the Clean Screen feature from 1 minute to 30 seconds
- Changed the units for the Clean Screen timer to be seconds rather than minutes

URL Field

- The URL field has been removed from the Edit page in the product list

About Screen

- Added additional fields to the "About" page that shows the board type, distinguishing between Q5 and Q6 processors
- Added range checking to the Sales Order Number and Item Number fields on the "About" page to ensure the numbers entered are valid
- Changed the card field to now display the storage architecture being used in the system

Network Restore

- Fixed an issue where the network settings were not changed to default values after performing a network restore via the DIP switch

Security - Restore Default Users

- Added a feature that automatically Logs Out a User if they choose to restore default users while not logged in as one of those groups

Security Users

- Fixed an issue where a default user level (Basic, Operator or Service) could be deleted if it was first moved to another user level
- Added code that requires a new Security User to have a PIN code before they can be added to the list of users
- Added code preventing the loss of the PIN code when editing a Security User

Remote Users Page

- Added a "Session List" to the Security page that allows a user (local or remote) to see other users who are or have been remotely logged in to the panel

Number Entry

- Added code to make the displayed keypad consistent when clicking on a setpoint field in an unexpected way

On Screen Keyboard

- Corrected the Shift and Caps Lock functions on the on-screen keyboard

Network Configuration

- Added a check that prevents the entering of invalid network configurations which cause the controller to malfunction.

IP Address Range

- Added a check that prevents the entering an invalid IP address and port number which causes the controller to lose connectivity with other Quantum HD Unity products

Compressor Overview

- Fixed an issue on the System Overview page where a Unity product in "Shutdown" was incorrectly shown as being in a "Warning" state

Remote Auto Login

- Fixed an issue where Auto Login failed when the Quantum HD Unity network contained more than one compressor controller

Networked Product O.S. Version Message

- Changed the Network List page updating the message requiring all Unity products to be O.S. version 10.40 or later

RELEASE NOTES FOR 10.50

Saved Setpoints, Next Button

- Fixed issue where going to page 2 or higher of setpoints wouldn't work.

Restoring Setpoints

- Fixed issue where setpoints with a different IP Address cause issues on the panel.

E-Mail Service after Reboot

- Fixed issue where email service wouldn't work after the panel was rebooted.

Touchscreen Calibration

- Added Screen Calibration button to "System Configuration" menu.

Watchdog Jumper Update

- When the watchdog jumper process is initiated to clear setpoints, all settings are returned to factory defaults.

No Comms Message

- Fixed issue where if a loss of comms occurs, the wrong error message would display on Compressor Overview page.

Product Scroll (System Networking)

- Allow page to scroll if there are more products than can be displayed on the screen.

Software Upgrade Limitation

- Only allow upgrades to a newer version. Changing the program to a previous version is no longer allowed.

Enhance Saved Setpoints

- When setpoints are saved, folder now includes product and software version name in name.

Security/Users Scroll

- Added ability to scroll through users when there are more users than can be displayed on the page.

Product Selection Banner

- Updated look and feel of product selection banner. Lowered product selection dropdown, updated dropdown text to "Product Selection" and made product name text display.

Portuguese (Brazilian) & Spanish Language

- Added Portuguese & Spanish languages to the product.

Language change on all products

- Fixed issue where language would not update on all connected products.

RELEASE NOTES FOR 10.40

Add Fan Run Aux to Step Ventilation Control

- Added "Fan Run Aux" to the Step Ventilation Control

Ventilation Fan Aux. Control

- Fixed issue where the Ventilation Fan Aux. Inputs were not working.

Cross Product Communication

Pressure Calibration – Pressure Resolution and Atmospheric Pressure

- Added Atmospheric Pressure setting to all products
- The Pressure Display Resolution was added to handle special compressor applications. This was removed from other applications.

Sub-Navigation (Tabs)

- Sub-Navigation options are now a tab rather than just text.

Alarms – Clear Safety History

- Added confirmation of "Are you sure you want to clear the Safety History?" when clicking the Clear Safety History button.

<u>Networking</u>

- Added a "Add Factory Card" feature that allows you to commission a card on the Unity System where the Unity System's Gateway has been altered from the original settings.
- You can now successfully restore Setpoints on a panel where the Unity System's Gateway has been altered from the original settings.
- You can now successfully perform a system upgrade on a panel where the Unity System's Gateway has been altered from the original settings.

RELEASE NOTES FOR 10.30

Engine Room

- implemented the ability to control up to six reciprocating compressors with local safeties

- Corrected an issue dealing with the conversion of Hg (negative) pressures when the Atmospheric Pressure was set to something other than 14.7 PSI

- Corrected an issue to make the "Refrigerant Warning 1" output "Safe/Energized" when the Alarm Silence button is pressed.

- Allow any refrigerant detector alarm to be cleared if the sensor is disabled by user.

- Corrected code to ensure that all Alarm Data is being generated on the "Alarms"   tab of the spreadsheet created when a System Data Download is executed.
- Corrected an issue where upon power up the IP address would reset to 192.168.0.173 and the processor would reboot if a jumper is detected on JP1 pins 7 & 8 of the Communications Interface board.

- Corrected an issue where the IO integrity Check logic did no catch certain conflicts in I/O configuration

- increase the high end sensor range for the 4 Refrigerant Detectors channels to 25,000ppm

- Corrected an issue whereas the Engine Room controller would boot directly to the Home screen rather than the System Overview screen when not connected to any other controller (Ethernet) - Enabled text entry with physical keyboard