

VTScada version 12.1.66 - Released April 23, 2025

New Features

| ID | Description |
|-------|--|
| F1969 | The OCPP Driver can now optionally log a transaction's IdTag if the driver is not linked to an OCPP Users tag. |

Incidents Cleared

| ID | Description |
|--------|--|
| I24073 | A HDV widget linked to a tag could fail to display any tags when Global Tag & Area Filtering is enabled. |
| I24057 | Snapshot reports were failing to display the value of string tags. |
| I23929 | The Droplist widget sometimes caused a memory leak. |
| I23902 | Certain properties were not always set to false when unchecked in the application configuration. |
| I23780 | The REST Interface query example page had outdated instructions. |
| I23716 | Selecting "View Alarms" from the right-click menu for a widget drawing the SubordinateApplication tag didn't initially show any alarms on the popup Alarm Page window for the subordinate application. |
| I23592 | String calculation I/O tags did not have an option to set strings stored as registers. |
| I23511 | The Camera Widget in VTScada did not work properly for MJPEG streams served by ffmpeg. |
| I23458 | Users were not able to acknowledge alarms over a voice call when SkipLogonDialOut and SecuredVoiceCallAck were set. |
| I23083 | The VIC could have crashed while operating on large graphics files on a page in the Idea Studio. |
| I23081 | Twilio would create a log file for application start and stop even if not enabled. |
| I23032 | HDV autoscaling would set the scale range to be too big to view values with small changes. |

VTScada version 12.1.65 - Released April 14, 2025

Incidents Cleared

| ID | Description |
|--------|---|
| I24040 | The Toyopuc Driver GM registers read GX\GY data instead of GM data. |
| I24035 | Recipe's "Cancel Batch" and "Skip Ingredient" operations were not secured by the Run Batch privilege. |
| I24025 | SplitTagSelector displayed the literal text "Left" and "Right" instead of its label parameters, resulting in incorrect labels in the user interface. |
| I24022 | In a Numeric Entry widget with the "Prompt for Date/Time" option selected, if two consecutive values were entered and only the date was changed, the value would be incorrectly logged at 00:00 on the selected date regardless of the selected time. |
| I24020 | The ShowDownloadStandalone, ShowDisplayVIC, ShowDisplayAnywhere, and ShowDisplayMobile properties were not disabling thin client landing page options. |

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| I24002 | Attempting to set the parameters of a page change widget for a parameterized page could fail if the page originally had no parameters. |
| I23952 | The OCPP Driver's Transaction ID was being reset during server changes and restarts. |
| I23940 | When using a custom reporting period on the Reports page, the start and end time would reset every time you visited the Reports page. |
| I23722 | When setting or modifying an application's name, VTScada did not always fully sanitize it to handle illegal characters and extra spaces. |
| I23574 | Disabled widgets were displayed in the Widget Selector and Widget Menu and appeared as blank items when used. |
| I23519 | Sparklines displayed spikes or dips in the plot when the page changed |
| I23085 | The Thin Client Server Setup dialog would not retain the last realm selected when opened. |

VTScada version 12.1.64 - Released March 26, 2025

Incidents Cleared

| ID | Description |
|-----------|---|
| I24005 | The Rockwell Driver could poll more frequently than configured when using a Polling Driver. |
| I23987 | Using the Function Selection tool for PID would miss the LowLimit parameter, resulting in an incorrect expression. |
| I23946 | Exporting tags from an Oil & Gas Solutions application to an Access database would fail. |
| I23906 | Minimal spacing at the bottom of the OAuth 2.0 dialog caused visual misalignment. |
| I23862 | Input and Calculation tags were not able to draw Lock and Token widgets. |
| I23801 | Numeric Entry widgets did not always enable value clearing based on the widget's "Allow value to be cleared" setting. |
| I23791 | SNMP Get Requests could fail after an Inform is received by a V3 SNMP driver. |
| I23732 | Master application startup pages from a subordinate application displayed nothing if the subordinate application had not started yet. |
| I23625 | The Opto22 Mux Driver address assist would not allow an address to be set if only a single board was configured. |
| I23438 | The Excel add-in's dependencies have been updated to incorporate fixes and to address an issue with icons not appearing due to third party infrastructure changes. |
| I23416 | The Add Lock Button, Request Token Button, Release Token Button, and Control Token Toolbox widgets could be linked to Menu Item tags when that should not be permitted. |
| I23196 | The embedded browser on the Anywhere Client could not submit HTML forms. |
| I23175 | The ArrayToDictionary function now has a parameter which controls whether the resulting dictionary's key is case sensitive. |
| I22909 | Rotating control widgets did not work properly when the minimum and maximum angle values were set outside of the 0 to 360 range. |

VTScada version 12.1.63 - Released February 24, 2025

New Features

| ID | Description |
|-----------|--|
| F1948 | It is now possible to reset the Enron Driver history logs to a specific location in the log. |
| F1929 | Users can now choose description to be shown in the HDV data windows. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23907 | Upon upgrading to 12.1.62, rosters could have lost expressions used for setting the Method and Enabled fields. |
| I23892 | When Control Tokens are enabled, attempts to operate a digital IO tag from the Tag Browser were failing even if a token was held. |
| I23888 | Fisher ROC driver could report a false "Invalid Time" error when reading a historical log that was not full. |
| I23875 | A realm user without manager privilege was not able to see their own realm in the UI while a non-realm user without the manager privilege was able to change their realm selection although this change was not recorded. |
| I23868 | Navigating to help (F1) in the Rockwell Driver's address assist dialog led to the welcome page in the Help section. |
| I23850 | The Bristol Driver occasionally timed out prematurely when it performed File or Audit Log reads. |
| I23694 | The security bit selection control failed to display the correct background color when the value was overwritten. |
| I23689 | The Restart Required dialog could be hidden or minimized. A misleading warning about "another user" changing settings appeared after restarting the app. |
| I23632 | The legend could not be closed when displayed on a small map, and it was not shown on the sites page or widget. |
| I23564 | The multi-language dialog was empty when the phrase didn't have the translation for the current displaying language. |
| I23421 | Expression was not able to be added to Report Duration and Report End Time in the Report Tag. |
| I22746 | It was not possible to add an application from outside the VTScada installation directory when accessing the Application Manager over an Anywhere Client. |

VTScada version 12.1.62 - Released February 05, 2025

New Features

| ID | Description |
|-----------|--|
| F1922 | Custom start and end times can be specified for the Report Button widget. |
| F1915 | There is now a DisablePageNotes property to control the display of page notes. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23829 | Switching to a previously configured Report Destination output type would show the previous path but not use the value when it was saved or run. |
| I23828 | When the Custom timespan was selected in the Draw HDV widget's properties dialog, the Time per Record drop list in the panel's Grid tab would not be displayed. |
| I23793 | The Destination tab of a Report tag's properties dialog could fail to respond to external changes and would fail to save parameters when creating new reports without a defined path parameter. |
| I23787 | The sign in dialog could re-appear in the wrong position after a sign in failure. |
| I23782 | Windowed pages could appear over the incorrect display when multiple displays occupy the same monitor. |
| I23649 | Popup windows from the right-click context menu appeared on the incorrect monitor. |
| I23606 | The Modbus Plus interface did not function in 64-bit VTScada. |
| I23429 | Reports using Excel to display screen reports would open without the Excel ribbon or toolbar accessible. |
| I23315 | The Roster Properties dialog could have shown erroneous row entries following a VTScada upgrade which was preceded by a downgrade. |
| I23248 | Servers now can configure an AdditionalAllowedOrigins section to filter all HTTP requests by Host header. |

VTScada version 12.1.61 - Released January 23, 2025

New Features

| ID | Description |
|-----------|---|
| F1779 | The toolbar used in widgets like DrawHDV and DrawAlarmList now allow operators to scroll through tools when the widget becomes too small to show all available tools. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I23824 | Draw Text, Multi-Text and Numeric widgets had unexpected background color displayed. |
| I23819 | The Enron driver was unable to write to the S8 string registers in the OMNI PLCs. |
| I23813 | Some header comments were misplaced in Settings.Dynamic. |
| I23798 | Text on pages could be rendered at the wrong scale. |
| I23769 | Attempting to set a tag's security privilege using a Parameter Expression resulted in no privilege being set. |
| I23683 | VTScada would crash if a bad trigger expression was entered into the MultiWrite tag. |
| I23669 | Oil and Gas Solutions - Some tag scheduling parameters could be changed without the Tag Modify security privilege. |
| I23615 | The Driver Multiplexer's Address Select would sometimes show nothing if the subordinate driver was a Poll Driver. |

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| I23597 | The Driver Multiplexer sometimes caused a crash when there was a circular reference between subordinate drivers from multiple Driver Multiplexers. |
| I23572 | The Modbus Driver in Modbus Plus mode returned bad errors and didn't function. |
| I23158 | The URL shortcut created for the WevView2 offline installer was not suitable for use when installing VTScada or the VIC on an air-gapped system. |
| I23104 | VTScada would not run as a service if the serial number was changed without deactivating the old license with no reason presented until run interactively. |
| I23013 | It was possible to import a tag whose name matched a tag type or variable name. |

VTScada version 12.1.60 - Released January 09, 2025

New Features

| ID | Description |
|-----------|--|
| F1918 | In a multi-monitor environment, it is now possible with the new ShowPage2 API to open a page on a specific display, and to control which display a page opens on when performing a Go To Page action using the GoToPageShowPageHook API. |
| F1908 | Two-stage VoIP dialing is now supported and the delay between stages can be configured. |
| F1903 | VTScada now supports HMAC-SHA-2 with SNMP v3. |
| F1900 | The DrawHDV widget now allows group-like tag queries when linked to a Context tag. |
| F1886 | The ability to restrict the time range has been added to the DrawHDV widget. |
| F1850 | The Source Debugger now has a step-out of subroutine capability. |
| F1824 | The config panel for 6 widgets have been revamped: I/O Multi-Text, Draw Text, Numeric Value, Text Change (2 state), Text Change (4 state), and Multi-line Text. |
| I22770 | VTScada's HTTP server now supports Strict Transport Security. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I23806 | The Rockwell Driver failed to communicate with legacy PLCs using the AN-X2-AB-DHRIO adapter. |
| I23743 | The Draw Alarm Indicator widget would not flash when activated by an alarm. |
| I23742 | The context menu entries for "Manual Data" and "Alarm Settings" for the Pulse Input and the Rate of Change tags did not open the correct tab of the properties dialog. |
| I23730 | VTScada could crash under rare instances if secure VoIP was configured. |
| I23726 | The Call Manager Status widget was indicating that a voice call configuration was working before the configuration was tested. |
| I23719 | Blank page or widget names resulted in empty prompts and version log comments. |
| I23717 | Widgets or pages named Configuration caused tags to fail to open properties and showed glitches when adding new tags of the same type. |
| I23714 | The ABB Totalflow driver could give up early on the initial TCP connection. |

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| I23695 | Option to set the POC Mode in the DV8 pump-off controller to 0 was not available. |
| I23690 | The Widget Selection dialog of the Tag List widget opened in the main monitor rather than the same one where the Properties dialog was open. |
| I23685 | When the sorting checkbox was toggled in the Widget Palette within certain folders, the palette appeared empty. |
| I23663 | In Settings.Dynamic, there were two parameters that would never be used, VOIPCallPrefix and TwilioCallPrefix. |
| I23652 | Tags using a PollDriver or DriverMUX were not checking the proper tag for tag specific output restrictions. |
| I23651 | IO tags failed to write values if connected to a Poll Driver or Driver Multiplexer while a control lock existed in the application. |
| I23650 | When a parent tag with many child tags was modified, VTScada could become unresponsive for many seconds, proportional to the number of child tags. |
| I23638 | The Convert Application Processing dialog showed an invalid title when running a manual test imported from the Test Framework. |
| I23629 | Page button widget Properties were misaligned. |
| I23611 | The Description and Area fields in tag properties dialogs were horizontally misaligned. |
| I23607 | Removing an override from a tag parameter resulted in a Phrase ID being displayed in the edit field. |
| I23598 | Tool Button Group and Drop Tree controls would open in the wrong location when drawn within a scrolled window. |
| I23596 | Copying the "configured Alarms" list from VTScada into Excel caused columns to misalign around the "Trip" column. |
| I23594 | Some arithmetic operations used to fail when extracting value from XML nodes. |
| I23591 | The "Retrieving application" dialog repeatedly took focus from other windows when retrieving an application from another workstation. |
| I23590 | Selecting an existing OAuth 2.0 grant and clicking "add" again led to a duplicate placeholder in the grants list. |
| I23554 | Tag Value selection was displayed as an option for tag object page parameters. |
| I23542 | A GridList would not always sort correctly when the DisableSorting parameter was Invalid. |
| I23541 | Emailing a report as both body content and as an attachment would fail to send the attachment. |
| I23532 | A steady state OkToWrite call would not return the correct result when the TagObj parameter was changed. |
| I23529 | In an application without default VOIP or Twilio settings, workstation specific settings would be displayed as the default settings. |
| I23522 | The DriverMUX could have stopped polling with a Modbus Driver after a connection failure. |
| I23518 | Some BACnet capabilities were not available on devices that didn't support the service ReadPropertyMultiple. |
| I23514 | When adding a new OAuth 2.0 provider or grant through the thin clients, the placeholder was shown many times temporarily in the gridlists. |
| I23509 | Deriv() used to return 0 after Time seconds had elapsed, regardless of the actual rate of change of the variable. |

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| I23462 | Connections between VTScada servers could stop working if the IP address of the server changed while VTScada was running. |
| I23453 | It was possible on failover that data attributes would not get updated for IO tags if a driver failed to communicate with Hold enabled. |
| I23442 | The "Empty Server List" warning dialog would not display the friendly service name if the FriendlyTagServiceNames setting was 0. |
| I23396 | The alarm and event for unknown user login attempts didn't have an informative description. |
| I23394 | A Roster would enter a failed state for 5 minutes after a successful callout if the delay before repeating the roster was set to 0. |
| I23390 | Pages with a high number of IO or custom tag widgets experienced extended load times. |
| I23380 | Some GetPhrase APIs couldn't handle external language translations provided in the form of a dictionary. |
| I23328 | When a DrawHDV widget was upgraded from a version before 12.1.15 to a version after 12.1.36, some new parameters were defaulted incorrectly. |
| I23312 | Selecting "Close Other Tabs" on an Idea Studio tab could cause the items on the page to become temporarily unconfigurable. |
| I23309 | Pressing Delete without selecting graphics in the Idea Studio disabled Undo. |
| I23307 | Error dialogs could appear behind the application in certain tag configuration dialogs. |
| I23255 | VTScada Report tag's Destination tab would freeze when invalid path or email data was applied. |
| I23223 | The DrawHDV legend could become disproportionately tall if the font size was changed with Minimize Legend Height enabled. |
| I23208 | When the Realm field was present, tabbing or clicking Enter would not allow moving to the Username field in the Sign in dialog. |
| I23160 | Selecting the "Default for Workstations" server list in non-English applications would result in loss of servership for the selected service. |
| I23139 | Voice modem calls would fail if the Alarm Notification server and the Modem Manager server were on different machines. |
| I23125 | A steady-state statement watching for a dictionary key that was not yet created would fail to evaluate if there was a difference in the case type of the key. |
| I23113 | When control locks or tokens were in use, loading a page with many control widgets could take a long time. |
| I23060 | XMLGetNode function was accessible in the steady state with a potential of causing a crash. |
| I23036 | When using the Idea Studio, modifying the properties of a graphic that had some custom code around it could cause a compilation error. |
| I23030 | Tokens requested by the Control Token Box widget on a thin client's page were being released during a thin client server switchover. |
| I23017 | When displaying in Chinese, omitting the optional font parameter in WinButton, WinComboCtrl and WinToolTipCtrl could result in garbled Chinese characters. |
| I23014 | Security settings did not always revert to default when they were reverted via version log or altered via settings files. |
| I22953 | Edit and Droplist controls used to appear smaller than their actual given width and height. |
| I22936 | Idle threads could use significant CPU resources, especially on systems with many running applications. |

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| I22914 | The properties dialogs of Context, Network Status and Polling Driver tags were misaligned. |
| I22825 | A tag with an Alarm Point tag as a child could cause high CPU load if its parent tag had multiple child Alarm Point tags. |
| I22791 | Tag parameters that could be set as Constant/Expression/Tag would erroneously allow a Parameter Expression which did not work. |
| I22681 | The MQTT Client Driver may have adjusted the received SparkplugB alias for values above 9007199254740992, leading to tags not receiving data. |
| I22649 | Trip alarms could re-trip when the primary server restarted. |
| I22596 | In rare cases, VTScada could hang when the user drew a hand-coded widget on a page or widget in the Idea Studio. |

VTScada version 12.1.59 - Released December 04, 2024

Incidents Cleared

| ID | Description |
|-----------|---|
| I23711 | The Historian could fail to resynchronize after establishing a storage connection. |
| I23676 | The comments for DispMgrWidth and DispMgrHeight in Settings.Dynamic were misleading. |
| I23640 | Tag changes to an OPC UA Client Driver tag, or one of its parents, were time-consuming. |
| I23631 | The Rockwell Driver became unstable and could stop reading tags when attempting to read an add-on parameter with external access set to 'None'. |
| I23609 | The OPC UA Client driver retried for failed data point monitor requests unnecessarily. |

VTScada version 12.1.58 - Released November 13, 2024

New Features

| ID | Description |
|-----------|---|
| F1884 | VTScada now supports DV8 Energy's Pump Off Controller in the Oil and Gas Solutions layer. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23667 | The "Linked Tag Property" option in a widget wouldn't allow a linked tag to be selected in some circumstances. |
| I23526 | The Folder widget would not display the content of a tab that contained another Folder widget. |
| I23525 | VTScada could leak memory when a thin client disconnected while in the middle of a process such as generating a report. |
| I23404 | Go To Page operations could run slowly in some Master-Subordinate configurations. |
| I23132 | VTScada Camera tag connection limit was not configurable. |

VTScada version 12.1.57 - Released October 30, 2024

New Features

| ID | Description |
|-------|---|
| F1919 | New Page Button and Page Hotbox widgets support right-clicks to open a popup page. |
| F1917 | The "Go to Page (Popup)" option in the Alarm Page and Tag Browser context menus can now be disabled using the DisableGoToPageAsPopup setting. |
| F1913 | Multi-monitor applications can now configure the startup pages for individual monitors using application properties. |
| F1836 | The Note List widget can now limit the display of notes to a specified number of prior days. |

Incidents Cleared

| ID | Description |
|--------|--|
| I23600 | The "Open VTScada Internet Client" link on the thin client landing page would not work in Chrome and Edge. |
| I23539 | The default output folder for created ChangeSet files was the application folder, making it too easy to add the ChangeSet to the application's configuration, increasing the application size significantly. |
| I23533 | The MQTT Client Driver could be slow to report an error connecting to a broker. |
| I23465 | Custom privileges with identical names appeared duplicated and out of sequence when moved in the Manage Privileges dialog. |
| I22979 | The MQTT Client driver did not support some alphanumeric characters within an address, such as hyphens. |
| I22332 | When hitting enter after typing a name filter in the Tag Browser, sometimes the name filter would become blank. |

VTScada version 12.1.56 - Released October 15, 2024

New Features

| ID | Description |
|-------|--|
| F1833 | Watch Expressions in the Source Debugger now support script-only expressions that can be manually refreshed. |
| F1806 | There is now a search bar and an alphabetical sorting option in the Idea Studio's widget and image palettes. |
| F1759 | VTScada now supports Page Shuffling with OpenID connect sign ins. |

Incidents Cleared

| ID | Description |
|--------|--|
| I23528 | The Enron Modbus driver was using function code 6 instead of 16 for writing to addresses with the S8 prefix. |
| I23461 | Improved the wording of "Restore your previous license key and deactivate first" in the activation dialog. |
| I23452 | The OCPP Driver could show that it was still connected when it was not if the device it was connected to did not gracefully shut down. |
| I23422 | VOIP calls used to fail for applications containing Chinese characters in their name. |

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| I23414 | The BACnet Driver failed to record successful communication counts. |
| I23375 | Configuring an SMS appliance tag with an IP address instead of a machine name caused RPC queue congestion. |
| I23339 | Applications with many Notebook tags were very slow to start. |
| I23305 | The recipes in a Recipe Book were cleared after importing recipes with a wrong configuration of Excel file or sheet name. |
| I23276 | The course simulator did not clearly identify itself as a simulator. |
| I23065 | An Overridden value of a parameter expression in a child tag couldn't be removed. |
| I22958 | The VTScada Internet Client (VIC) could crash in rare situations involving the embedded web browser. |
| I22942 | The Security Guidelines Manual has been updated to reflect the importance of securing client machines when the Stay Signed In checkbox is enabled. |

VTScada version 12.1.55 - Released September 24, 2024

New Features

| ID | Description |
|-------|---|
| F1895 | The DNP3 Driver now supports master-initiated time synchronization and has the option to ignore outstation time synchronization requests. |
| F1783 | VTScada now logs error information as text to the new file Errors12.log. |

Incidents Cleared

| ID | Description |
|--------|---|
| I23503 | The Toyopuc Driver would fail command relay attempts with an exchange number mismatch error. |
| I23476 | Files larger than 64KB would take longer than necessary to compress into an archive using the Zip function. |
| I23437 | The OPC Core Components have been updated to the current release (version 108.41). |
| I23412 | Making changes to I/O tags could result in slower communications by the BACnet Driver. |
| I23379 | When retrieving equipment type values over the ODBC, REST, and SOAP interfaces, clients would receive the equipment type's translation key rather than the equipment type in the connected user's language. |
| I23253 | A VTScada application needed to be restarted in order to disable or enable the logging of driver communication statistics. |
| I23153 | MadCap flare custom help files could not be accessed from the Anywhere Client. |
| I23094 | A provider's grant information could remain visible after deleting the provider in the OAuth 2.0 Settings dialog. |
| I22100 | The Excel add-in Tag Selection dropdown list would display Tag Selection names outside of the option's boundaries. |

VTScada version 12.1.54 - Released September 12, 2024

Incidents Cleared

| ID | Description |
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| I23454 | The Enron Modbus driver could not read historical data after encountering a record with a bad timestamp. |
| I23424 | An OPC UA Client Driver experiencing communication problems consumed significantly more CPU than necessary. |
| I23418 | OPC UA Client Driver's Server Timestamp Alarm was not automatically acknowledged even though the auto-acknowledge feature was enabled. |
| I23417 | The Rockwell Driver became unstable when reading local variables in add-on instructions and "Not a Number" values. |
| I23395 | A misleading dialog was displayed when user clicking on a disabled Execute/Cancel button which was associated with a feedback tag. |
| I23389 | The performance of text drawing has been improved significantly. |
| I23388 | Pages with lots of GUI Elements used to consume more drawing time (CPU cycles) than necessary. |
| I23366 | The Camera widget was not resuming on thin clients following connection loss. |
| I23266 | The JSON/XML driver could respond slowly to incoming packets when multiple driver instances had the same URL and configured at a high poll rate. |
| I23236 | The VOIP configuration did not allow setting a lower registration interval. |
| I23051 | Using the help function in the Add Property dialog opened the Copy Property dialog help documentation. |

VTScada version 12.1.53 - Released September 03, 2024

New Features

| ID | Description |
|-----------|--|
| F1897 | The Mitsubishi Driver now can communicate with FX3U series PLCs using 1E frames. |
| F1892 | The DiscreteLabelSet parameter in the StyleSettings tag is now translated when retrieved by SQL queries. |
| F1844 | The Toyopuc Driver now supports the Relay Command function to forward commands to other PLCs on the network. |
| F1822 | VTScada now disables opacity editing within the color selector in contexts where it is inapplicable. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23450 | Drivers with Hold enabled could have reported bad values on server failover if the new server failed to communicate with the PLC. |
| I23425 | Enabling OPC UA Client Driver Diagnostics enabled tracing for all OPC UA Client drivers. |
| I23391 | Several tag types could not handle their "Units" parameter being supplied as valid non-text formats, such as Dictionaries or Phrase Structures. |
| I23382 | The Modbus Driver and Toyopuc Driver could have failed to rewrite values to the PLC even if the AutoRewrite option was enabled. |
| I23343 | Reading thousands of tags with the BACnet Driver resulted in excessive CPU use. |
| I23327 | The Oil and Gas Solutions email template failed to email a report unless the report template was configured to send an alternate report file. |

I23157 A repeating roster was only notifying the first contact of cleared alarms.

VTScada version 12.1.52 - Released August 17, 2024

New Features

| ID | Description |
|-----------|---|
| F1871 | VTScada now supports acquiring Daylight Savings Time information for a given year and time zone name. |
| F1841 | There is now support for placeholders in parameter phrase edit field functions. |
| F1840 | There is now an option to display a user's realm in the application title bar. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I23410 | The opt-out capability for receiving alarm notifications has been withdrawn. |
| I23385 | Updating the content of an image file would not cause button widgets to display the new image on the fly. |
| I23364 | The user was unable to set the description field of the Opto22 Mux Driver Tag. |
| I23331 | A few Mitsubishi Driver phrases ended with extra spaces in Chinese translation. |
| I23319 | Camera streams could buffer too many frames where client connections are slow. |
| I23304 | Incorrect code coverage could be reported for child modules that were not in the same source file. |
| I23286 | The Recipe Book tag would not default its I/O Device to the *Driver context type. |
| I23210 | The "Root Tag Token" terminology pertaining to the Control Tokens subsystem was renamed to "Global Token" for better clarity. |
| I23202 | The name of the client certificate could not be changed on a copy of an existing OPC UA Client Driver tag. |
| I23191 | An Alarm List widget configured to ignore global tag and area filtering would continue to filter alarms from custom Alarm Databases. |
| I23183 | The SNMP driver and agent were using less preferred implementations for generating some values used for encryption. |
| I22941 | The Anywhere Client login page would suggest a username and password even if the user had not selected the "Remember Me" option. |

VTScada version 12.1.51 - Released July 24, 2024

New Features

| ID | Description |
|-----------|--|
| F1869 | VTScada now exposes an API providing access to live MJPEG IP camera frames. |
| F1761 | VTScada now supports opting out of receiving alarm notifications via SMS, Email or Voice for A2P 10DLC requirements. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23326 | Unchecking Show Toolbar in the DrawHDV widget could set the time selection scroll bar back to the earliest possible time. |
| I23314 | Attempting to connect to a Siemens OPC UA server could have failed. |
| I23306 | The Enable VOIP/Twilio checkbox was not dynamically enabling or disabling the settings fields for the Default workstation if other workstation-specific VOIP/Twilio settings had been configured. |
| I23303 | The DriverMUX could stop polling with a Modbus Driver during a failover with a valid Health Check Rate. |
| I23232 | Multiple Write Priority Indicator widgets could have added unnecessary network traffic when monitoring the same BACnet object. |
| I23219 | It was possible on failover that data attributes would not get updated for IO tags if a driver failed to communicate with Hold enabled. |
| I23033 | The Fast Scan widget's name was not displayed correctly. |
| I22916 | The properties dialogs of Pulse Input, Rate of Change, and Realm Display Setup tags were misaligned. |
| I22760 | The Excel Add-in would display certain panel backgrounds in dark mode reducing the visibility of text and other elements. |

VTScada version 12.1.50 - Released July 16, 2024

Incidents Cleared

| ID | Description |
|-----------|--|
| I23344 | PLC Alarm tags were not functional in VTScada 12.1.48 and 12.1.49. |

VTScada version 12.1.49 - Released July 10, 2024

New Features

| ID | Description |
|-----------|---|
| F1854 | A new GetTagConfiguredParameters() function is now available which can be used in combination with OpChange or ModifyTags (with their Merge parameters set to false) to remove parameter overrides. |
| F1835 | The Tag List widget now has an option to hide the scrollbar which can be used to limit the number of widgets displayed. |
| F1819 | A new MakeAlarmRecordSpeechFile() function is now available for generating a .wav file that audibly speaks an alarm. |
| F1810 | The I/O and Calculation tag can now be configured to write values outside of the Scaled Process Min and Max range. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I23310 | The Poll Driver could get stuck if its driver was a DriverMUX and some of the IO tags were using the DriverMUX instead of the Poll Driver. |
| I23300 | If the Secondary driver of a DriverMUX tag failed while the Primary driver was already in a failure state, the DriverMUX would still switch to the Primary driver. |
| I23263 | Clearing the GroupLogin, NameSpaceDelimiter, and/or RootNamespace settings did not take effect until VTScada was restarted. |

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| I23251 | A plot data widget that had been paused could not be resumed without reloading the page. |
| I23243 | VTScada was experiencing delays in receiving inbound messages when using an MTCM2-L4G1D-B03 MultiTech SMS modem. |
| I23194 | Non-ASCII characters were not displayed properly in the body and subject of emails sent from VTScada. |
| I22369 | Clicking a Fast Scan button on the MIC would not enable fast polling. |

VTScada version 12.1.48 - Released June 25, 2024

Incidents Cleared

| ID | Description |
|-----------|---|
| I23297 | The Rockwell Driver's stats dialog could have shown Unknown Error Code for a known error. |
| I23278 | When exporting Realm Display Setup Tags to Excel, the 'Description' header appeared as 'DSQL_PHRASEIDescription'. |
| I23260 | Supplying a manual value to a newly created tag would log an unnecessary event. |
| I23257 | The OCPP Driver could have shown stale values when not actively charging. |
| I23254 | Alarm notifications could stop being sent on a roster if that roster was in the middle of a voice call when the Alarm Notification server role switched to a different machine. |
| I23224 | The option to shelve tokens and locks was needlessly enabled. |
| I23222 | Several tag types could not handle their "Units" parameter being supplied in valid non-text formats, such as Dictionaries or Phrase Structures. |
| I23212 | The thin client's device name was not logged when control tokens or requests were automatically released upon logout. |
| I23199 | In the Adjust Image dialog, you could set saturation values from 0 to 4, but the maximum possible value was 2. |
| I23184 | The SMS Indicator widget was displaying no signal on workstations that were not connected to the SMS modem. |
| I23110 | The comment for the property SlippyMapMaxTileSize in setup.new was misspelled. |
| I22884 | The Rockwell Driver logged address errors inefficiently. |

VTScada version 12.1.47 - Released June 12, 2024

New Features

| ID | Description |
|-----------|--|
| F1870 | The OCPP Driver now supports reporting the Name and TransactionID to IO tags for charging events. |
| F1804 | VTScada now supports flashing the task bar when there are unacknowledged alarms. |
| F1781 | The Workstation Status driver tag now reports current System Total Memory, System Used Memory in bytes, System Used Memory as a percentage, amount of unused RAM on the system in bytes as well as the amount of RAM available for use by applications and processes in bytes. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I23274 | When changing the selected tab of a folder widget between two tabs that were displaying the same page or widget but with different parameters, the page or widget in the folder widget would not restart, potentially leading to display issues. |
| I23238 | Importing a subset of the modified files in the Import File Changes panel did not import any modified files unless all modified files were selected. |
| I23159 | The "Serial number change" warning dialog lacked the installation ID, making it difficult to identify the machine in use. |
| I23117 | The recipe version was reset upon re-entering the Recipe page. |
| I22934 | The BlockWrite function could cause a crash when handling parameters provided in a specific way. |
| I22486 | It could take two attempts to open the Application Configuration dialog when running VTScada as a service and accessing the Application Manager using a thin client session. |

VTScada version 12.1.46 - Released May 29, 2024

New Features

| ID | Description |
|-----------|---|
| F1860 | The Driver Discovery tool now supports finding Delta AH, AS, and DVP series PLCs. |
| F1849 | VTScada now supports sending SMS (text) messages via SIP/VoIP. |
| F1820 | The VTScada OPC UA Client Driver now supports embedded OPC UA servers in a Siemens equipment. |
| F1795 | It's now possible to relinquish command actions from specific priorities in BACnet devices. |
| F1716 | The configuration panels of most control widgets have been redesigned. Control widgets can now be disabled via expressions. |
| F1627 | The ZLib library used by VTScada has been updated to incorporate the latest security fixes. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I23206 | The Control Token Box widget was requesting and releasing tokens when the page was in preview mode. |
| I23193 | Some status information could not be read with the OCPP driver. |
| I23171 | The SNMP Driver could cause a delay in other application processes for some time while receiving a trap in some network configurations. |
| I23144 | It was possible for values to be assigned to the wrong tag when using shared RPC services with the TeleBUS Driver. |
| I23135 | Tracing control token events in detail was not possible due to the absence of dedicated logging. |
| I23126 | VTScada could use high CPU and have reduced responsiveness when a Historical Data Viewer window was minimized. |
| I23120 | In an application with several Poll Drivers that were using the Driver Multiplexer, when one site's primary and secondary drivers were in failure, all the other Poll Drivers took longer to do their polls than when there were no failures. |

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| I23111 | The bottom of the bevel for a set of horizontal radio buttons was positioned inconsistently with that of a set of vertical radio buttons. |
| I23096 | Control tokens could not be released via the user interface if they had been filtered out by Global Tag and Area Filtering. |
| I23079 | It was possible for values to be assigned to the wrong tag when using shared RPC services with the Modbus Driver. |
| I23001 | The "Add Watch Expression" option in the Source Debugger could not access a variable called "Value" in the current debug scope. |
| I22982 | The "Are You Sure" dialog shown when canceling changes in a widget's config folder added unnecessary clicks to the cancel process. |
| I22901 | A single bad read address with good read addresses could cause non-stop polling with the Driver Multiplexer in Primary Preferred or Secondary Preferred modes. |

VTScada version 12.1.45 - Released May 14, 2024

New Features

| ID | Description |
|-------|---|
| F1859 | VTScada now logs changes to a tag's Manual Data as an event. |
| F1855 | The Alarm List widget can now be configured to "Ignore Global Tag & Area Filter" for situations where this filter should not affect the alarm list. |

Incidents Cleared

| ID | Description |
|--------|--|
| I23066 | Page/Widget export from Idea Studio did not include the PhraseIDs for the parameter descriptions or the page/widget title. |
| I23050 | Certain sites were not displayed correctly in the Anywhere Client if the site relied on cross-origin requests. |
| I23012 | Folder widget tabs used to flicker when changing between tabs with pages containing animations. |
| I22611 | If "Automatically acknowledge alarms when they clear" was enabled, whenever an alarm cleared, it was logged as a "Normal Ack" event even if it had already been acked. |

VTScada version 12.1.44 - Released April 30, 2024

New Features

| ID | Description |
|-------|--|
| F1853 | The ancestor tags of any I/O and Calculation tag now keep count of how many child I/O tags are marked as Questionable and/or have Manual Data. |

Incidents Cleared

| ID | Description |
|--------|---|
| I23133 | Types Float, SDWord, and UDWord may not have been written correctly above register D32767 using the Delta Driver with AH series PLCs. |

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| I23124 | Twilio could have hung if the workstation-specific settings file name used a different capitalization scheme than the workstation name. |
| I23122 | Rockwell drivers in CSP mode were unable to prioritize write actions in PLCs with a high tag count. |
| I23092 | IO tags connected to a Modbus driver would not invalidate their values when connection to the communications server was lost. |
| I23073 | TeleBUS driver could hang communications on a port if its Modbus read failed. |
| I23067 | It was possible to clear the output destination of a Report tag resulting in a misconfiguration. |
| I23059 | Recent Notebook entries were sometimes lost when restarting if the connection to the Notebook tag's historian server failed. |
| I23042 | The OPC UA Client Driver failed to invalidate I/O data on connection loss even with the Hold parameter set to FALSE. |
| I22996 | Item palette images would be displayed incorrectly in the Anywhere Client when choosing a Thumbnail for a folder. |
| I22994 | The ABB Totalflow driver would always hold values on comms loss even if its Hold parameter was not set. |
| I22964 | Poll Drivers using a Driver MUX did not poll serially. |
| I22947 | The IO and Calculation tags whose calculated values changed frequently could bog down the network. |
| I22810 | When the application property MakeActiveAlarmUnackedWhenUnshelved or MakeActiveAlarmUnackedWhenEnabled was set to 1, unshelving or enabling an active, acked alarm would create two entries for the alarm in the Current alarms list. |
| I22740 | The OPC UA Client driver did not support multiple writes. |

VTScada version 12.1.43 - Released April 18, 2024

New Features

| ID | Description |
|-------|--|
| F1832 | The SMS indicator widget now features a signal strength indication, giving users a quick way to assess connectivity. |

Incidents Cleared

| ID | Description |
|--------|--|
| I23105 | Tag values could stop updating if two different active rosters tried to call out at the same time using the same VOIP configuration. |
| I23058 | The Spinbox function when used on the Anywhere Client would not set its Trigger parameter when the user clicked the spinbox arrow buttons. |
| I23046 | The Delta Driver would fail to write to D registers exceeding 32767 for AH series PLCs. |
| I23045 | In rare cases, the Idea Studio could become unresponsive after hitting Cancel on the Edit OEM Page dialog. |
| I23034 | Exporting a recipe book with a multiple of 26 ingredients to an Excel spreadsheet would cause bad recipe ingredients to be imported when importing that spreadsheet. |
| I23018 | The Rockwell Driver did not work with the Driver Multiplexer in Automatic Selection mode. |

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| I23016 | OAuth consent could use the incorrect account if an account was already signed in on the browser. |
| I22987 | The CSV Data driver could not correctly parse a file if it started with a byte-order mask and had no headers. |
| I22888 | The SIP information sent to a VOIP server was missing the User-Agent field. |
| I22887 | The Modbus and Toyopuc drivers could switch servers unexpectedly. |
| I22559 | If no editor was associated with VTScada .SRC files, the VTScada installer would associate WordPad, which has been deprecated by Microsoft. |
| I22488 | If the Report Options check boxes on the Reports page were accidentally clicked multiple times in quick succession, they would toggle indefinitely. |
| I22414 | The OAuth system did not have sufficient diagnostic logging for some operations. |

VTScada version 12.1.42 - Released April 07, 2024

New Features

| ID | Description |
|-------|--|
| F1825 | The Color Selector now supports the manual input of a color value in various formats. |
| F1823 | An API to close the current pop up window has been added. |
| F1771 | The Import File Changes panel in the Application Configuration dialog now supports the ability to add new files. This functionality was previously only available with the Application Manager's Import File Changes icon. |

Incidents Cleared

| ID | Description |
|--------|---|
| I23048 | VTScada could hang if an SMS agent unregistered before an attempt was made to send a text message. |
| I23043 | The Honeywell Mercury driver could not be used without special permission. This restriction has been lifted. |
| I23025 | Adding a parameter expression to the Alarm Disable parameter of the Alarm tag applied it to the Trip parameter instead. |
| I22985 | Some redundant phrases in the language files were removed. |
| I22981 | The Service Status and Call Manager Status widgets were not present in the Analytics\Diagnostics menu of the Idea Studio palette. |
| I22977 | The default reporting period was not set correctly, causing the wrong index to be selected in the Report page's droplist. |
| I22948 | Oil and Gas communication drivers did not validate history log timestamps to ensure that history records fell within a reasonable time range. |
| I22946 | Thin clients could fail to connect through some reverse proxies. |
| I22940 | The Anywhere Client Remember Me checkbox has been renamed to "Stay Signed In" to clarify its behavior. |
| I22932 | The Rate of Change tag inefficiently synchronized its value between the server and client when there was no change in the value. |
| I22923 | The selected value in a String Droplist used to get cleared when it was linked to an IO tag under a driver. |
| I22910 | The minimum password length option could be set to zero despite users not being permitted to configure a blank password. |
| I22908 | Bristol flow computer configuration reads in the Oil and Gas Solutions layer were inefficient. |

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| I22861 | Using the Minimum Log Interval on the IO tag could have caused an increase in loading time for historical data. |
| I22837 | When stopping the Application Manager, the "Sign in" dialog for any running applications would appear on the primary monitor instead of the monitor where the Application Manager was running. |
| I22784 | New VOIP log files were being generated every time a call was made, rather than extending an existing log file. |
| I22668 | Moving a custom widget in the Idea Studio could crash VTScada if a page and widget had the same name. |
| I22582 | Digital IO and Calculations tags could be misconfigured by using the same read and write addresses with inverted input or output enabled, resulting in a permanent mismatch color. |
| I22314 | A tag's logging deadband could be set by a user without tag editing privileges. |
| I22243 | VTScada did not detect an interrupted installation, leading to confusing errors about missing OEM layers. |
| I21582 | If you created a ChangeSet with the Idea Studio open, you could get an inaccurate warning saying that the ChangeSet contained undeployed local changes. |

VTScada version 12.1.41 - Released April 06, 2024

Incidents Cleared

| ID | Description |
|-----------|--|
| I23061 | Alarms could fail to activate in versions 12.1.37 to 12.1.40 for IO tags configured as Digital or Discrete. This could happen if the tag was added or modified (in any version of VTScada) via the Export/Sync Tags or Manage Types panel with the IO tag's DigitalAlarmTripOpt parameter left blank or cleared. This is not an issue if IO tags are configured via the Tag Browser. |

VTScada version 12.1.40 - Released March 20, 2024

New Features

| ID | Description |
|-----------|---|
| F1821 | The DateNum function now supports range validation of day and month input parameters. |
| F1817 | VTScada now supports setting Text and Color typed parameters of custom widgets to tag values. |
| F1816 | A new widget has been added for forcing communications logs to be written to disk. The widget is named "Export Comm Log Button", and can be configured for system level logs and/or application level logs. |
| F1778 | It is now possible to use a single Twilio account across multiple applications by allowing users to select one Twilio number per application. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I22980 | The Call Manager Status widget could indicate an incorrect workstation for the voice modem call interface. |

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| I22973 | SMS diagnostic logs weren't saved when the application was shut down. |
| I22965 | The embedded browser might not have started in some rare situations, including when running outside of a visible window. |
| I22922 | Error code 33028 on the Siemens S7 driver was listed as an unknown error and was not in the documentation. |
| I22918 | Text could overlap with other controls on the Thin Client/Server Setup dialog when viewed in a language with longer translations than the English labels. |
| I22911 | Alarm notification logs might have had out-of-order records or record fields in some cases. |
| I22886 | When creating a report, if the Output Type was set to "Screen Display" and the "Use Excel to display screen reports" Option was selected, the Excel report would open behind VTScada. |
| I22875 | When generating a report with output type set to Plain Excel XLS file, ODBC Data Source or Access MDB File, the data for some of the dates was missing. |
| I22826 | The ABB TotalFlow Driver could fail multiple register reads if just one register was unavailable. It also could fail reads when more than 64 registers were being read. |

VTScada version 12.1.39 - Released March 06, 2024

New Features

| ID | Description |
|-------|--|
| F1826 | PDFs generated from browser instances support HTML background colors. |
| F1818 | GetParmPhrase has been enhanced to allow for unlimited replaceable parts in a single Phrase. |
| F1815 | I/O child tags can now be imported for Delta PLCs via a DIADesigner XML export file. |
| F1812 | The Idea Studio now supports rotation of custom widgets that have been manually coded to allow rotation with a "CanRotate" flag. |
| F1811 | VTScada now allows users to set default values for memory IO and Calculations tags. |
| F1797 | We can now use a browser instance to generate PDF documents from HTML documents. |
| F1796 | VTScada now supports creating compressed files for formats including .zip and .xlsx. |
| F1794 | The DNP3 Driver no longer requires addresses to have the :NS suffix to enable event notifications for supporting objects. |
| F1780 | VTScada now provides an Address Assist when IO tags are connected to a driver via a Driver Multiplexer. |

Incidents Cleared

| ID | Description |
|--------|---|
| I22990 | Switching a thin client to a backup server would cause its control tokens to be released after 60 seconds. |
| I22961 | A poll group could hang if a Driver Multiplexer was used by a Poll Driver and tag addresses were modified, added, or removed. |
| I22949 | VTScada could set up voice configurations for workstations that were not configured for voice. These would appear in the Call Manager Status widget, and could cause spurious alarms. |
| I22927 | The GetTagList function was returning more tags than expected. |

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| I22925 | The control tokens system was not checking custom security privileges. |
| I22905 | Control tokens were not released when the VTScada application shut down or experienced a crash. |
| I22877 | Starting, stopping, and making configuration changes in large applications could be slow. |
| I22871 | Advanced features of the BACnet driver, such as Tag Import and automatic protocol compliance, could have been unavailable for some devices. |
| I22842 | The Rockwell Driver did not update all tag values if Hold was enabled and some tags reported address errors. |
| I22762 | Mouse clicks could be handled by the wrong window on the VIC. |
| I22524 | If using an account with insufficient privileges, attempting to browse tags in the Excel Add-in gave an inaccurate connection error message. |

VTScada version 12.1.38 - Released February 21, 2024

Incidents Cleared

| ID | Description |
|--------|--|
| I22915 | A Thin Client session would lose its control token ownership if the session was transferred to a backup server while in session ID ownership mode. |
| I22913 | Spinbox buttons had no effect on the Anywhere Client. |
| I22907 | A Bristol Flow Computer Device could have timed out before reading the configuration of its Meter Run tags with the default read timeout. |
| I22906 | The Source Debugger was required to enable diagnostic logging on MeterConfig tags in the Oil and Gas Solutions layer. |
| I22903 | The status indicator flickered for MQTT driver. |
| I22878 | MQTT Driver used to hold the value when a connection was lost, even when the "Hold" checkbox was disabled. |
| I22876 | The ABB Totalflow driver's default logging level was set too high, creating large log files. |
| I22872 | The IO and Calculations tag could not read strings from registers when the String Length was less than or equal to the number of characters that would fit within a single register. |
| I22863 | MultiWrite tags could not write to IO tags when a control token was required, even if the user had a token. |
| I22853 | The Tool Tip on the Add Note button widget used to display the linked tag's name and description instead of the Tool Tip Label specified for the button. |
| I22851 | In the advanced Edit Properties panel, the Property Name column was too narrow to see the names of the properties without them being shrunk or clipped. The column always had to be manually resized in order to read the names. |
| I22848 | A disabled edit field used to show the prefix section and tooltip (missing translation) for single language applications. |
| I22845 | When a user requested a control token that was already owned, the token administrator was notified via the Token Requests popup even if that administrator did not own the token. |
| I22819 | If Alarm Notifications and Twilio were configured on different servers, sending text messages would fail. |
| I22735 | Renaming a tag name popped up a confirmation/warning dialog. After accepting the same, saving the tag required another redundant OK button to be clicked in the properties dialog. |

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| I22599 | Poll Drivers using a Driver MUX did not poll serially. |
| I22345 | Various controls in the Counter, Selector Switch, Totalizer properties dialogs were misaligned. |

VTScada version 12.1.37 - Released February 07, 2024

New Features

| ID | Description |
|-------|--|
| F1803 | VTScada now supports the override of the default help files for standard VTScada pages with custom help files. |
| F1802 | The DrawHDV widget Plot View can now be configured so that the legend will only be tall enough to display all pens, up to 50% of the plot area, by default. This setting is also applied to all pop-up HDVs. |
| F1787 | It is now possible to use Driver Redirect tags in Standard Applications. |
| F1774 | VTScada now supports a custom hook, PageListForGoToPageHook, which defines the list of pages that the Go To Page dialog should display for a given tag. |
| F1769 | When linking widgets to tags in the Idea Studio, the Tag Browser now opens to the location of the last tag linked by the user. |
| F1768 | Support for WebSockets has been added to VTScada. |
| F1767 | VTScada now supports the Open Charge Point Protocol (OCPP) for communicating with electric vehicle infrastructure via the OCPP Driver and OCPP Users tags. |

Incidents Cleared

| ID | Description |
|--------|---|
| I22892 | When drawing the Pie Chart widget and the last configured tag had an invalid name, high CPU usage would occur and UI components would become unresponsive. |
| I22874 | A voice call could fail before the next one succeeded. |
| I22865 | In an app with a non-functional voice modem, a "Voice call failure alarm" would recommission every 5-10 minutes. |
| I22864 | Page and widget selection dialogs in the Idea Studio and Tag and Widget Configuration folders could have appeared empty. |
| I22847 | Dialing prefixes would have lost a leading "+". |
| I22824 | The Upon Change alarm setting could cause a child IO tag to be flagged as overridden even after performing a "Redefine tag type" operation on a parent tag. |
| I22820 | A Poll Driver poll group could have hung if one of the ports being used was configured incorrectly. |
| I22818 | The Glance meter needle color can now be customized using the image Colorize parameter. |
| I22812 | CFX reports generated in VTScada Oil and Gas applications produced incorrect information for some fields in the report's configuration tab. |
| I22811 | Ratcheting could not be turned off for all HDV pens by default. |
| I22805 | The selected workstation for "VOIP Settings" and "Twilio Account Settings" in the application configuration for Alarms were not retained. |
| I22802 | SQL Data Query Driver Tag experienced longer processing times, particularly when dealing with thousands of rows associated with historical values. |

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| I22800 | Digital Upon Change alarms could turn into regular Trip alarms by clicking Apply or OK in the IO config dialog even if no changes were made. |
| I22795 | The poll driver could have stopped triggering the Modbus Driver to poll after adding a bad read address. |
| I22715 | The alarm notification voice menu could be missing the first few seconds of audio when answering calls made via VOIP. |
| I22705 | The Change Password dialog intermittently appeared only partly visible on the Anywhere Client. |
| I22679 | After renaming a tag that had alarming built-in and changing the alarm priority at the same time, the new alarm priority did not show in the Configured tab of the Alarm page. |
| I22620 | The String Droplist widget had an invalid entry labelled [None] that could not be removed. Now the presence or absence of the invalid entry can be configured via the IO tag. |
| I19241 | Many places where lists of applications were shown were sorted in an unexpected order. |

VTScada version 12.1.36 - Released January 20, 2024

New Features

| ID | Description |
|-------|--|
| F1792 | Modbus, Enron, and Delta driver's communication failures are now reported through the DATA_ATTR_COMMFAIL attribute. |
| F1770 | The Alarm List widget now supports retaining the last selected option for Days of History, Text Size, and Starting List. The background and text colors can also be made transparent to allow the day time/night time color scheme to take effect. |
| F1705 | The text size is now adjustable in the Source Debugger. |

Incidents Cleared

| ID | Description |
|--------|--|
| I22849 | Alarm notifications using voice telephony methods didn't work if the server list used IP addresses instead of computer names. |
| I22817 | Importing language changes via an Excel file could lead to unintended conversions and #NAME? errors if phrases or phase IDs started with the = symbol. |
| I22813 | Momentary button widgets were missing on Mobile Internet Client (MIC) pages. |
| I22809 | Selecting a type other than text when editing page or widget parameters in the Idea Studio resulted in high CPU use. |
| I22804 | Timestamps in the Source Debugger were displayed in hundredths of a second rather than milliseconds. |
| I22786 | Legal email addresses could fail address validation if the address's display name contained a period character. |
| I22785 | A value of zero in the Disconnect Delay field of the TCP Port tag would have caused it to continuously connect/disconnect. |
| I22752 | If a deleted page was pinned to the taskbar, it could cause high CPU load. |
| I22678 | The use of SSL and TLS terminology in user interfaces was inconsistent. |
| I22491 | Attempting to create a second OPC Server Setup tag could temporarily interfere with the running OPC Server. |

I18052 When opening the Idea Studio, the Idea Studio's list of page tabs did not always scroll to show the active page.

VTScada version 12.1.35 - Released January 10, 2024

New Features

| ID | Description |
|-----------|---|
| F1799 | The text size is now adjustable in the Historical Data Viewer. |
| F1793 | Coordinates in the object properties dialog in the Idea Studio can now be adjusted using spin boxes. |
| F1791 | The Idea Studio now positions pasted graphics at the current mouse coordinates. |
| F1789 | The Idea Studio file open dialog now remembers the previous filter option. |
| F1784 | After opening a .profile file in the Profiler, the Profiler now shows the name of the file being viewed. |
| F1782 | VTScada now provides more configuration options to help with more complex network configurations when using VTScada's VOIP interface. |
| F1775 | VTScada OPC UA Client Driver now establishes a secure connection with an OPC UA server that identifies its connection message based on the identifier assigned by the Client. |
| F1681 | Added the ability to use VOIP, Twilio, and voice modem configurations as redundant backups for voice calls initiated by the alarm notification service. |
| F1607 | VTScada VOIP now allows encrypted call setup and encrypted audio for voice-based alarm notification. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22798 | When zooming into the Anywhere Client on Apple iOS and iPadOS, a fault in the Apple device software could cause a crash on the Apple device resulting in the client reloading or logging out. |
| I22794 | The Omron Host Link Driver may not have sent proper checksums. |
| I22790 | Shelving an alarm would not prompt for a note on a thin client. |
| I22779 | In custom ownership mode, control widgets could have been inoperable despite token possession. |
| I22778 | The Enron Modbus driver would produce a false error when attempting to write multiple registers using the Modbus RTU protocol. |
| I22766 | Logos with odd widths appeared compressed in the License Management and About dialogs. |
| I22761 | Custom privileges in the Manage Privileges dialog were appearing as unassigned, regardless of assignment, for users other than the current user. |
| I22754 | Manually unshelving a cleared alarm didn't automatically acknowledge the alarm. |
| I22753 | Camera Viewer widgets in a subordinate application would not display correctly in a master application. |
| I22749 | PieChart widgets with exclusively 0 or less value tags would freeze application GUI elements when their labels were drawn. |
| I22742 | The "Optimize Tag Parameter Expression to only evaluate on Tag Initialization" checkbox on expressions for the Method and Enabled properties of a Roster did not perform any optimization on their expressions, and the checkbox always appeared checked, even if unchecked previously. |

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| I22731 | Upon importing an image a second time, the Idea Studio was showing a broken image link instead of the image. |
| I22727 | Child tags in the tag browser would sometime appear in the incorrect order when sorting by the first indicator column. |
| I22725 | There was no warning for the use of deprecated shared security when configuring subordinate applications. Shared security is not supported in master or subordinate applications. |
| I22720 | When running the Application Manager over a thin client, adding an application using the Quick Add or Create New operations would fail. |
| I22696 | PLC Alarms would record "Active" events on multiple servers, leading to several "Active" records every time the alarm activated. No user would be attributed when acknowledging, shelving, or unshelving a PLC Alarm on a client workstation. |
| I22691 | A parameter with the same name as a child tag could be added to a custom tag type, which could prevent the child tag from showing as an immediate child in the Tag Browser. |
| I22682 | The Tag Browser's Advanced Filtering button had a short delay before it would respond to clicks on the Anywhere Client. |
| I22666 | It was too easy to accidentally delete the last security role that contained the Manager privilege, causing the application security to become locked out. |
| I22635 | Not all digits in the value input field were visible in the relative time range window of the Excel Add-in. |
| I22629 | Application Manager and other built-in layers could propagate changes from current versions of VTScada to workstations running older versions, which could lead to errors. |
| I22627 | A VTScada server would crash when a thin client viewed a page with the deprecated ZPipe graphic. |
| I22613 | The Bristol BSAP/IBP Network tag would limit the maximum number of RTUs on a level 1 IBP network to 1. |
| I22580 | SQL queries would return more records than requested if the LIMIT clause didn't end with an integer. |
| I22490 | On the Anywhere Client, droplists with background colors, such as an edited Area in a tag configuration dialog, were inconsistent with the server. Now, only the editable part of a droplist appears with a background color - the drop-down list is not affected by the background color. |
| I22487 | After changing a source file for a custom tag, breakpoints in the Source Debugger could fail to trigger. |
| I22351 | Some Anywhere Client connection error messages would not display properly. |
| I22289 | The PVR Report Entity tag provided a scaling factor field for PVRTagVariable and PVRExpression value types but did not scale their values. |
| I21793 | Thin client licenses could be shared between servers that did not have full production licenses. |
| I18219 | The Duration column in the Test Framework showed the time elapsed since the subtest began, not the duration since the last assert. |

VTScada version 12.1.34 - Released November 29, 2023

New Features

| ID | Description |
|-----------|---|
| F1777 | VTScada now writes to additional data fields in Oil and Gas CFX reports when reports are run against ROC or RealFlo flow computers. |
| F1765 | Additional fields have been added to the Oil and Gas Solutions layer's CFX reports when run against an ABB Totalflow flow computer. |
| F1745 | The ABB Totalflow driver no longer requires a third-party service and reads historical alarm logs. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22732 | VTScada performance reading the history of many tags at once could go down as more applications were started or restarted. |
| I22726 | The DNP3 driver could have interpreted unflagged data from integrity polls as a change event. |
| I22724 | The driver selection dialog in the Trace Viewer was previously too narrow to show typical tag name sizes. |
| I22714 | There were some spelling mistakes and typos in the security guidelines manual. |
| I22710 | Syncing an exported tag database could incorrectly produce a "Bad tag name - parent tag not found in imported tags" error when renaming a child tag. |
| I22707 | When an HP Analog Bar widget with a non-zero corner radius was displayed vertically with expected ranges equal to or greater than the configured display ranges, the expected range bar would appear with unrounded corners and wouldn't match the corner radius set by the user. |
| I22693 | When deleting a tag that is drawn on a page, clicking the Show Pages button would run the GoToPageHook module (if defined) instead of presenting the list of pages where the tag was drawn. |
| I22692 | Tiled images would produce odd graphics during thin client connections. |
| I22687 | The Presets droplist on the Reports page had all of its entries in sentence case except one that was in title case, "Previous Year" when it should have actually been "Previous year". |
| I22683 | The HP Radial Gauge and HP Analog Bar expected ranges could obscure the alarm ranges. |
| I22590 | The Services pages did not properly display Driver Multiplexer service names. |
| I22577 | When operating a digital memory tag with no value from the Tag Browser, the initial droplist selection was 0 instead of No Data. |
| I21994 | After deleting a child tag of a top level tag in the Tag Browser, the child tag could still be present in the tag tree. |

VTScada version 12.1.33 - Released November 20, 2023

Incidents Cleared

| ID | Description |
|-----------|---|
| I22728 | The tags created automatically for SparkplugB with the MQTT Client Driver were setting the Read Address to the write address value. |
| I22706 | A port tag could have prevented drivers from initiating comms after a loss of connection. |

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| I22684 | In a master and subordinate setup where operator notes were configured for alarm acknowledgement, shelving, or unshelving, when an alarm was acknowledged or manually shelved/unshelved in the master application, the operator wouldn't be prompted to add a note. |
| I22675 | VTScada allowed only one application per realm, which kept multiple applications from using WSI authentication with realm area filtering, as that requires multiple applications using the same realm name. |
| I22672 | A server switchover during an inbound call could have caused the Twilio service to hang indefinitely in rare cases. |
| I22669 | The I/O tab of the Flow Computer tag configuration folder displayed a Barton-specific text entry field for all device types. |
| I22641 | FunctionLib.GetAlarmStat() would sometimes return Invalid rather than 0 for tags that had no alarms. |
| I22631 | After configuring an alarm in the IO tag and then switching tabs, the droplist selection for that alarm would be lost and the droplist would revert back to the first alarm in the list, even if that alarm wasn't configured. |
| I22588 | It was difficult to see the main text in an Edit field if its prefix or suffix were very long. |
| I22583 | The Poll Driver's "Delay After Scan Interval" parameter title and documentation did not accurately match the parameter's function. |
| I22533 | The MQTT Driver would send extra Subscribe messages for SparkplugB data on startup. |
| I22430 | A Discrete-IO tag with an 'Upon Change' alarm may have displayed the Value as 'Upon Change' rather than the label configured for a value of 4 in the Equipment Type. |
| I22321 | Stopping or recompiling an application while it was paused on a breakpoint could cause VTScada to crash. |

VTScada version 12.1.32 - Released November 07, 2023

New Features

| ID | Description |
|-------|---|
| F1734 | It is now possible to select which sign-in methods are shown on the thin client landing page. |

Incidents Cleared

| ID | Description |
|--------|--|
| I22702 | Due to a bug in Chromium-based browsers (Chrome and Edge), graphics could be missing on pages that used color replacement widgets. |
| I22671 | The Set Value Button widget did not support Multi-Write tags. |
| I22664 | Some branded Phrases were missing from the branding Language file. |
| I22657 | A contact's Method and Enabled settings in a Roster tag could lose their expressions if moved within the contact list or if the contact list was scrolled. |
| I22648 | A digital IO tag that had the "Invert Input" option enabled would always log a blank (invalid) entry when the application was restarted. |
| I22608 | Some port related Bristol Network Driver error codes were not documented. |

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| I22597 | When the application property <code>MakeActiveAlarmUnackedWhenUnsuppressed = 1</code> , unsuppressing an active alarm would create two entries for the alarm in the Current alarms list. When <code>RecordSuppressionStatus = 0</code> and <code>MakeActiveAlarmUnackedWhenUnsuppressed = 1</code> , a suppressed active alarm would not become unacknowledged when it got unsuppressed. |
| I22592 | Changing the name of a workstation could result in the wrong workstation name being shown in the alarm history. |
| I22569 | The ROC driver could report incorrect error codes when using a ROC800 or ROC800L. |
| I22563 | The momentary button hotbox did not resize or move to match the button when the widget was resized or moved. |
| I22562 | The default settings for Flow Computer poll groups could lead to delayed process data retrieval while initial history data was being collected. |
| I22537 | The login dialog on a busy graphical display would sometimes miss input. |
| I22534 | The MQTT Client Driver was using more resources than necessary processing some SparkplugB messages. |
| I22495 | The manual RPC Performance test could hang when running the cross-application RPC test. |
| I22359 | If VTScada was stopped manually during installation in response to the installer's warning, you would be forced to restart the installer. |

VTScada version 12.1.31 - Released October 23, 2023

New Features

| ID | Description |
|-------|---|
| F1763 | VTScada now has a Radial gauge using high performance graphical design concepts. |
| F1758 | The Enron Modbus driver now supports reading and writing 8-character strings and reading custom-formatted history log data. |

Incidents Cleared

| ID | Description |
|--------|---|
| I22667 | A VTScada upgrade could cause other servers running older versions of VTScada to require a restart before they could perform any further configuration changes. |
| I22655 | The BACNet Driver would stop working on upgrade if the Device Network Number was greater than 32767 and values larger than that could not be entered. |
| I22640 | The Server List field in the Driver Multiplexer tag's config folder incorrectly displayed a warning message when the tag had valid subordinate drivers. |
| I22625 | The description on the <code>DNP3MaxFileSize</code> property was incorrect. |
| I22619 | The Numeric Entry widget would occasionally stop allowing values to be entered. |
| I22607 | On the VIC, selecting "Go to page" from the Tag Browser with the Idea Studio minimized would open the tab in the Idea Studio but fail to automatically restore the Idea Studio. |
| I22593 | In some circumstances a child window might not appear in a printed copy of its parent window. |

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| I22578 | Under rare circumstances VTScada could crash when a window was closed at the same time as it was being resized. |
| I22552 | Text messages may not have been received by VTScada if the SIM card has no storage for text messages. |
| I22505 | A double-click and quick drag in the Idea Studio on the VIC could display an unusable Properties dialog and no further interaction could be done. |
| I22346 | Switching a port from being a listener (no address) to a client (has an address) could have caused drivers to not attempt to connect. |
| I22297 | Text shown in LCD Meter widgets might be pushed unnecessarily to the left or cut away when the text did not fit the box. |

VTScada version 12.1.30 - Released October 05, 2023

New Features

| ID | Description |
|-----------|---|
| F1757 | VTScada now includes a Recipe Import button for the Recipe Book tag to accompany the Recipe Export button. |
| F1751 | New settings have been added to allow users to disable the auto-addition of notebooks in the same area or group when plotting tag data. |
| F1747 | VTScada now supports tag imports from BACnet MS/TP devices via a BACnet router that is on the same subnet as VTScada. |
| F1737 | The version of Pako (zlib) in use for the Anywhere Client was out-of-date. |
| F1618 | It is now possible to configure address lists for thin client connections in the Thin Client/Server Setup dialog. |
| F1479 | Added support for the latest TLS version, TLS 1.3, on Windows 11 and Server 2022. TLS 1.1 and older are no longer supported. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22617 | There was no way to restore the old behavior where Alarms using Event priority would log "Events" rather than "Active/Normal" events. |
| I22606 | Exporting more than 254 recipe ingredients to Excel would fail, producing a blank spreadsheet. |
| I22595 | The Modbus Driver would poll all reads on application start regardless of whether a parent poll driver or driver MUX had polling disabled. It also ignored the NoInitialDriverDial setting. |
| I22553 | The Rockwell Driver was unable to read the correct values in CSP mode. |
| I22532 | The labels on the Show Stats dialog of the MQTT Client Driver could be interpreted as the driver having failures when it was working correctly. |
| I22461 | The Anywhere Client would display flickering scroll bars in desktop browsers at certain window sizes. |
| I22450 | The Tag Browser's Go to Page tool took longer than necessary. |
| I22433 | The height of the configuration panel for the Folder widget would decrease as the folder's Tab Label Margin increased. |
| I22410 | The Application Manager window could unexpectedly appear in front of the application window. |
| I22399 | Text alignment was not always consistent on the Anywhere Client compared to the server and the VIC. |

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| I22222 | Configuration repository corruption introduced by low disk space conditions could spread to other machines. |
| I22081 | Creating a new IO tag resulted in unnecessary Network Value storage and communication. |

VTScada version 12.1.29 - Released September 20, 2023

New Features

| ID | Description |
|-------|---|
| F1749 | The Dataflow Flow System RTU driver can now read analog values from the Radio Interface Module and read digital points on analog cards. |

Incidents Cleared

| ID | Description |
|--------|--|
| I22601 | It was difficult to see an expression if its evaluated value is very long. |
| I22574 | SQL queries of the alarm list would not show the disabled status. |
| I22551 | SparkplugB data could have been slow to retrieve for display on the HDV. |
| I22547 | The Numeric Entry widget could prompt the user with two confirmation dialogues if the user's input contained more digits after the decimal than the widget's 'Digits After Decimal' parameter. |
| I22538 | Making an unauthenticated SOAP request to VTScada could result in a 401 response that was missing some HTTP headers. |
| I22536 | Some Motorola RTU error descriptions did not have enough detail. |
| I22528 | The MQTT Client Driver could have timed out unexpectedly if the KeepAlive parameter was set low. |
| I22511 | The active roster tag in an area could have changed on a VTScada restart. |
| I22508 | BubbleQueueLength would not trigger on a check for decreasing queue size. |
| I22492 | Tag selection for Header parameters in the JSON/XML driver were filtered to Numeric tags and would not work with String tags. |
| I22476 | Certain numeric values could not be entered as text in the Idea Studio, such as a number followed by a period, or a number preceded by zeroes. |
| I22434 | Moving menu items tags multiple lines in the tag browser previously caused the focus to change to the tag tree. |
| I22432 | It was not possible to setup a roster callout method without pre-configuring it. |
| I22389 | There was no reference for properly securing master-subordinate applications in the security guidelines. |
| I22366 | The Mitsubishi driver failed to set the RPC service for port shared RPC. |
| I22315 | The VOIP package version used in VTScada was using an older release version. |

VTScada version 12.1.28 - Released September 07, 2023

New Features

| ID | Description |
|-------|---|
| F1754 | VTScada now supports the display of a user specified tab in a folder widget. |
| F1753 | VTScada now supports generating X509 certificates with subject alternative names. |
| F1740 | Operators can now shelve tag alarms from the right-click context menu. |

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| F1735 | VTScada now provides a way to disable the control of output tags by using locks. A lock on a tag prevents manual control of that tag and its descendant tags until the lock is removed. |
| F1721 | VTScada now provides better support for receiving high UDP throughput. |
| F1711 | The CIP Protocol compliance of the Rockwell Driver has been improved, resulting in better reliability and more accurate error and general information reporting. |
| F1635 | Alarm suppression via an expression has been separated from the alarm disable checkbox so they can be independently set in the I/O & Calculation tag and the Alarm tag. There are now options to log or not log the alarm status while an alarm is disabled or suppressed. There is now an option to log or not log suppression events. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22542 | When creating a new named group a busy cursor would be displayed for the whole time that the New Widget dialog was open. |
| I22515 | Alarm Notification may not have worked if the System Alarm Historian and the Alarm Notification services were running on different servers. |
| I22497 | JSON files appeared as binary files in the Show Version Log changes view rather than text files, making any changes to the files not viewable. |
| I22483 | The selected tag in a widget was not highlighted when viewed in a tag browser opened via the widgets properties dialog. |
| I22477 | The PageTagRefMgr cache could be permanently damaged after calling GetPageTags with an Invalid page name. |
| I22453 | Selecting 'View Alarms' from a tag context menu could lead to a filter on the incorrect tag when displaying the resulting alarm page. |
| I22367 | DNP addressing with variation 0 would have polled a device for all points as opposed to those with VTScada addresses. Low subset devices being directly polled may be affected. |
| I21946 | The SNMP Agent could stop responding to poll requests and the SNMPDriver could stop accepting notifications, after changes in SNMP credentials. |

VTScada version 12.1.27 - Released August 11, 2023

New Features

| ID | Description |
|-----------|--|
| F1741 | VTScada now supports the referencing of colors and labels of an equipment type contained within a Style tag. |
| F1478 | VTScada now supports the discovery of BACnet drivers on a local subnet or via BBMDs. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22514 | Changing a tag value with a Numeric Entry widget resulted in multiple events in the Operator Log. |
| I22484 | A typo has been corrected in the error dialogue presented by the Numeric Entry widget when an entered value was out of range. |

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| I22475 | GE Ethernet Driver no longer fails on digital reads over a byte boundary. |
| I22473 | The Anywhere Client login page listed Internet Explorer as a supported client when this has been deprecated/discontinued. |
| I22460 | Site Map and Sites pages would not display the beacon on thin client sessions. |
| I22454 | If a custom privilege was removed via a reverse version change, there was no obvious way of removing that privilege from the page. |
| I22445 | The arrow button to navigate to a module did not work for the Return Value in the Source Debugger. |
| I22413 | The wrong information was traced when hiding or showing the application for a running application. |
| I22407 | GE Serial Driver no longer fails reads/writes for %G addressing in bit and byte mode. |
| I22286 | Align Center and Align Middle did not always align objects accurately. |
| I22262 | When an HTTP reverse proxy is used, thin clients would show an "Available servers are running a different version of VTScada" error. |
| I22234 | In the Idea Studio, undoing a GUIText movement while still selected left the selection handles in the wrong place. |

VTScada version 12.1.26 - Released July 26, 2023

New Features

| ID | Description |
|-------|--|
| F1750 | The GetAdaptersInfo() statement now returns the IPv4 subnet broadcast address and mask for IPv4 addresses. |
| F1738 | Motorola ACE RTU Tags now display the RTU ID in the address field of the Tag Browser. |
| F1703 | The Numeric entry widget now supports entry of historic values with older timestamps for numeric memory tags. |
| F1686 | VTScada now supports direct communication with PC3 and PC10 series Toyopuc PLCs with the new Toyopuc Driver. |
| F1655 | VTScada now has more robust and independent security for internet client connections by only allowing one application per realm. |
| F1599 | Non-realm security roles can now be selected when configuring realm user accounts. |

Incidents Cleared

| ID | Description |
|--------|---|
| I22443 | The installer progress bar dialog could generate an unexpected warning during installation. |
| I22439 | The ScanCom Driver's config folder did not disable the ADEPTv3 Logout Delay field when the driver was configured to use ADEPTv4. |
| I22429 | When using a Runtime or Demo license, the RPC Services page/widget/utility didn't show any information about the application's Configuration service. |
| I22427 | The Excel add-in's Tag Browser would hide Alarm Database tags and thus their children could not be included in the query. |
| I22426 | A driver could have failed to perform a failover when used with a Driver Multiplexer. |

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| I22424 | The Recipe Book would not write an ingredient value if it differed only slightly from the value that was already in the PLC. |
| I22421 | Setting both "Minimum Test Rate" and "Maximum Test Rate" of a MUX tag to 0 resulted in high CPU usage. |
| I22417 | VTScada would not run without activation during the grace period if VTScadaLight had been installed prior. |
| I22405 | There were no limits to the size of a phrase for generating an audio file using the SpeakToFile() API. |
| I22400 | The contact information when adding an application to a runtime which was developed under a trial license was incorrect. |
| I22392 | When configured with a priority of 0, alarms did not log a return to normal event. |
| I22391 | Diagnostic Installation ID information was missing leading zeros in the license file. |
| I22390 | When calling the Replace function to replace all occurrences of a blank string, the function returned Invalid instead of returning the original string. |
| I22388 | The scaling section of the Glance widget's panel was not consistent with other widgets. |
| I22373 | The Idea Studio was slow when editing widgets drawn on many pages. |
| I22370 | The Show Stats and Show Comm dialogs remained visible after their buttons were toggled off. |
| I22355 | The VTScada tracing missed when the application had been stopped on the primary server. |
| I22352 | Rockwell driver was wrongfully reading PID values from non-PLC5 equipment. |
| I22325 | The Tesco Driver would fail to communicate when sharing a port with a Modbus Driver. |
| I22301 | Confirmation dialog to delete a user account showed up on wrong thin client session. |
| I22268 | Linking a widget to a tag with a name containing a multi-byte character resulted in a compile error. |
| I22261 | The installer would not prevent installing into Program Files, which would result in VTScada not functioning correctly when run. |
| I22257 | VTScada could crash when editing graphics containing custom expressions. |
| I22196 | High memory usage may have been encountered when using MJPEG video streams. |
| I22190 | Custom privileges were sorted according to the order in which they were created and not the order as defined in the Privileges dialog. |
| I22170 | Unlinked glance widgets would lose their indicator when a user opened the properties panel. |
| I22120 | An authorized user could, under certain conditions, inadvertently invalidate the OAuth 2.0 consent during a consent operation. |
| I22106 | The "Any parameter contains" filter in the Tag Browser did not work when attempting to filter the Menus folder. |
| I21995 | SNMP Drivers did not fail over to secondary driver or recover when used alongside a Driver MUX. |
| I21892 | Utility application that come with VTScada would lose any modified settings after a VTScada upgrade. |

VTScada version 12.1.25 - Released July 05, 2023

New Features

| ID | Description |
|-----------|--|
| F1063 | VTScada can now communicate with Barton Scanners running the NFlo program. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22418 | The "Services" page sometimes showed the UniqueID of a driver service rather than the friendly name of the driver. The "RPC Services" utility sometimes showed only the "VTScada" application and didn't show any customer applications. Also, the "RPC Services" utility sometimes would not show the list of services for an application. |
| I22394 | A site tag's custom map icon would not display properly if it had a Pump-Off Controller tag as a child. |
| I22381 | Certificate requests did not support using SHA256 as a signing algorithm. |
| I22368 | The Anywhere Client could appear restricted to a small box and be unusable if certain warning dialogs were displayed while connecting to a server. |
| I22363 | Rectangles would not line up consistently with other graphics at different scales. |
| I22357 | The camera widget was unable to connect to Uniview brand IP cameras. |
| I22348 | Disabled phrase drop lists would always display a warning about missing translations even if the phrase was not missing translations. |
| I22341 | Using the Operate functionality on a Report tag on an Internet Client would cause screen reports to show up on the server. |
| I22317 | Nomenclature for the VTScada Thin Client privilege was inconsistent in script applications. |
| I22223 | The OPC UA Client driver would frequently drop connection if the server timestamp was out of synchronization by a couple of minutes. |
| I22056 | Requesting consent for OAuth within VTScada multiple times could result in issues with alarm mail handling. |
| I21930 | The CRC function would accept table sizes beyond the supported range and generate incorrect output. |
| I21929 | The OPC UA Client driver Value variable could become invalid. |
| I21683 | Using a local account for service installation but not specifying the full machine name would report an error during installation. |

VTScada version 12.1.24 - Released June 16, 2023

New Features

| ID | Description |
|-----------|--|
| F1739 | The efficiency of tag widget creation for applications with many tags has been improved. |
| F1727 | VTScada now provides an API to configure the RPC network priority for multi-homed systems. |
| F1708 | A new GetAlarmName module has been added to allow for easy access to a tag's alarm name. |

F1684 A Security Guidelines Manual is now shipped with VTScada, providing guidance on how to commission and maintain a secure installation. It is available in the Documents subfolder of the VTScada installation folder.

Incidents Cleared

| ID | Description |
|-----------|--|
| I22374 | In rare cases a read block could have stopped polling if a connection error occurred with the PLC/RTU. |
| I22372 | The DNP3 driver did not record value attributes for Group type 30 (Analog input) variations 5 & 6. |
| I22365 | Alarm Notification calls using Twilio could fail continuously until the application was restarted. |
| I22362 | An incorrect tag address could result in all reads failing under the OPC UA Client Driver. |
| I22350 | Pie chart segments connected incorrectly and failed to display single segment charts with a non-zero hole size. |
| I22344 | Driver updates received over the network are now handled more efficiently. |
| I22343 | The GE Series 90 driver's Address Select dialog now properly handles %S addresses. |
| I22339 | The OAuth-General-200 section was included in the Edit Properties Advanced list of properties, when it is not useful to edit its values from this interface. |
| I22329 | Case-sensitive changes to the name of an active Roster tag caused high CPU usage. |
| I22327 | Pie Chart labels no longer resolve spacing conflicts vertically and will now draw connecting lines between segments and their label when a conflict occurs. |
| I22311 | Secured subordinate pages failed to return to the default page after a sign out when viewed via a master application |
| I22309 | Some HTTP error messages were not translated properly in Simplified Chinese and Traditional Chinese. |
| I22285 | FormatInteger was not able to correctly handle some larger values. |
| I22140 | Closing a profiler without stopping the profile would result in the profile continuing in the background consuming resources. |
| I22086 | The "Thin Client Tools Access" privilege which was no longer in use by VTScada appeared in applications as well as documentation. |

VTScada version 12.1.23 - Released May 31, 2023

New Features

| ID | Description |
|-----------|---|
| F1728 | The GE Series 90 driver has been enhanced to support %G (Global) data addressing. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I22342 | I/O and Calculations tags could be incorrectly placed in a mismatch state in busy systems. |

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| I22299 | Some tag types would not show in the sites page if there were many custom tag types. |
| I22291 | Loading pages with many image-based widgets could take considerable time. |
| I22252 | Alarm history reads from EC350 units using the Honeywell Mercury Driver could result in duplicate trip events in Alarm history. |
| I22179 | Exporting translations from the languages panel to an Excel file took longer than necessary. |
| I22126 | Incorrect quotation marks were used for French phrases. |
| I22110 | The IEC60870-5 Driver could have had communication failures if extra bytes were transmitted between messages. |
| I22104 | The IEC driver extracted a variety of attribute flags from the wrong variable. |

VTScada version 12.1.22 - Released May 18, 2023

Incidents Cleared

| ID | Description |
|--------|--|
| I22308 | The Modbus Compatible Device driver would not log every poll if ModiconPropagateOnlyOnDataChange was set to 0, it would only log data on change. |
| I22296 | The view source button in the Source Debugger did not work in a child bubble. |
| I22293 | Recipe Trigger tag could have failed to trigger after a failed write or if no recipe had ever been run. |
| I22287 | The Omron FINS Driver wasn't able to trigger an alarm when communications were lost. |
| I22273 | VTScada could crash when doing writes on a Poll Driver faster than it could poll its I/O Device. |
| I22266 | A VoIP configuration which did not require server or proxy information (e.g. a VoIP to analog telephone device) still required the server and proxy fields to be populated in Application Configuration. |
| I22248 | Some entries in the Services table were not consistent with VTScada's naming conventions. |
| I22244 | The vertical lines connecting sibling nodes in the tag browser could be missing on reopening the tag browser |
| I22231 | Rosters tag entries configured with parameter expressions were not retained in the contacts list. |
| I22229 | The Driver MUX caused high CPU loading when pointing to a poll driver that isn't pointing to an IO device |
| I22228 | A client-of-a-client using a Driver MUX could miss data updates if Ignore Inactive Subordinate is enabled. |
| I22187 | The Modbus Driver tag could have reported a wrong value (error status) on a backup server. |
| I22146 | The font when editing a phrase looked a bit ugly and the bottom of the multi-line edit field's down arrow was cut off when editing the phrase or the description. |
| I22108 | A new copy of a table merged to the working copy was not used without restarting the TableInterpolation function. |
| I22039 | Pulse Input tags would only register and log data on change. |
| I21924 | Some phrases in category 5 - 7 were misclassified and therefore missing translations in other languages shipped with VTScada. |

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| I17243 | Trigger tags configured to trigger daily or monthly on the missing hour during spring daylight savings could trigger repeatedly following the time change. |
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VTScada version 12.1.21 - Released May 03, 2023

New Features

| ID | Description |
|-----------|---|
| F1732 | FloBoss 103 and FlowBoss 107 flow computer tags in the Oil & Gas Solutions layer are now compatible with recent firmware updates. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22279 | Pressing F1 in the expression editor dialog could open the help system's Welcome page instead of a relevant help page. |
| I22251 | The DNP3 Driver could not read Time objects. |
| I22188 | The MQTT Client Driver would not record historical SparkplugB data if it was not flagged as history explicitly by the end device. |
| I22181 | A query example provided in the REST Interface demo did not yield the intended result. |
| I22180 | Some standard and custom widgets may not have been behaving as expected when drawn on a Sites page. |
| I22123 | The HookPointUnits column in the alarms ODBC table showed Phrase IDs instead of translated phrases. |
| I22084 | Calling Replace with a zero-length string for the Search parameter caused VTScada to crash. |
| I22044 | Clicking the Acknowledge button in the alarm page toolbar did not acknowledge an unacknowledged shelved alarm. |

VTScada version 12.1.20 - Released April 20, 2023

New Features

| ID | Description |
|-----------|--|
| F1680 | You can now configure server-specific VOIP in the VOIP Settings section of the Application Configuration dialog. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I22260 | The Modbus Compatible Device driver could be slow to poll all addresses on startup of a large and/or busy system. |
| I22250 | VTScada would fail to retrieve data from some OPC UA servers that do not accept data filters. |
| I22237 | The Numeric Entry widget was logging changes as "Changed from New value to New value" instead of "Changed from Old value to New value". |
| I22206 | VTScada could leak memory and eventually hang or crash when an OPC DA Client repeatedly polls tag values rather than using an OPC Group to retrieve tag values as they change. |
| I22178 | VTScada could crash while processing some types of X.509 certificates. |

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| I22173 | The user interface for the IO tab of an IO/Calculation tag in string mode did not have all string-related settings grouped visually. |
| I22165 | Specific widgets that had not been linked to a tag caused the window they were drawn on to remain on screen after it had been minimized. |
| I22147 | The high performance analog bar's alarm indicator could exceed the upper and lower bounds of the widget when the scaled alarm value was outside the display range. |
| I22132 | The advanced filtering window in the tag browser could remain in the foreground when using other programs. |
| I22101 | The TCP/IP Port may not open the full number of specified connections when a Modbus Compatible Device shares the port with another compatible driver. |
| I22067 | Applications configured with Subordinate Application tags with circular references caused VTScada to crash. |
| I22048 | A Mercury driver might not cleanly end its session when not created as a child of its port tag. |
| I22047 | TraceViewer traces did not contain full MQTT inbound traffic. |
| I22045 | Several serial port related application settings could be ignored when using a Modbus Compatible Device with a Serial Port, leading to a potential loss in communications. |
| I22033 | The Honeywell Mercury driver would report incorrect values in the rare scenario where the RTU would incorrectly respond with an echo of the read request. |
| I22030 | The Alarm acknowledge code could have been sent to and used by a user to acknowledge an alarm without having the alarm acknowledge privilege. |
| I22013 | The VTScada Application Manager's startup progress indicator could have appeared next to the wrong application after scrolling. |
| I21942 | The Modbus Driver may not have properly used settings stored in a parent tag. |
| I21685 | Some dialogs were opening centered in the screen when they should have centered over the window that opened them. |

VTScada version 12.1.19 - Released April 05, 2023

New Features

| ID | Description |
|-------|--|
| F1725 | The API SetUserLanguage() has been created which allows users to change their language to any available language during runtime. |
| F1719 | The installer now supports disabling the Modem TSP driver installation. |
| F1704 | The Mitsubishi Driver now supports Q Series PLC and several types of serial frames. |

Incidents Cleared

| ID | Description |
|--------|--|
| I22218 | The Rockwell Driver did not support Long Integer addresses from MicroLogix PLCs. |
| I22198 | Some dialogs were missing their titles. |
| I22186 | VTScada could fail to receive data from some OPC UA servers with limited hardware resources. |
| I22161 | The French translation for "setting" in certain contexts was incorrect. |

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| I22118 | Trace Viewer may have failed to display the Port Name field in some cases for driver traces. |
| I22096 | There was a slow memory leak when VTScada was using TLS. |
| I22051 | In rare circumstances after a station's driver has changed, a Derived Flow report on the new driver may be missing information. |
| I21906 | Rectangles would not rotate correctly about the center if drawn without a border. |

VTScada version 12.1.18 - Released March 21, 2023

New Features

| ID | Description |
|-----------|--|
| F1723 | Input tags using the DNP3 driver will now record attributes such as Quality and Comm Failure that can be used in graphics and reports. |
| F1722 | The I/O & Calculations tag now has better support for "Select Before Operate" mode when used with the Set Value Button and Numeric Data Entry widgets. The Alarm tag now supports "Fail to Operate" and "Uncommanded Change of State" modes when connected to an I/O & Calculations tag. |
| F1720 | VTScada now has the ability to accept external language translations in the form of a dictionary passed into the GetPhrase API. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22184 | The address assist dialog for the Recipe Ingredient tag could present addresses with the wrong data type. |
| I22144 | Pie chart labels corresponding to 0 value slices could overlap with other labels. |
| I22095 | The Source Debugger would display an incorrect error message if attempting to use a script-only function in a watch expression. |
| I22055 | Some Rockwell driver errors could not be found in the help files. |
| I21640 | Sometimes an incoming SMS acknowledgement could fail to acknowledge the alarm in VTScada under heavy SMS volume situations. |

VTScada version 12.1.17 - Released March 07, 2023

New Features

| ID | Description |
|-----------|---|
| F1724 | VTScada now supports the use of the address assist and tag import with the Autosol OPC UA server. |
| F1718 | It is now possible to read strings from register based addresses in PLCs such as Delta and Modbus by setting the "String stored in registers" flag of the IO tag along with specifying the length in bytes. |
| F1710 | VTScada now supports filtering by address content in the Advanced filter flyout window of the tag browser. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I22160 | Page notes were not being added consistently to site details pages. |

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| I22148 | Reads could have gotten stuck calculating the LRC in ASCII mode of communication for the Delta Driver and Modbus Compatible Device. |
| I22139 | The RPC Services list had a wrong label in its properties dialog. |
| I22134 | An animated image with a higher FPS at minimum tag value than maximum would not display correctly. |
| I22105 | The OPC UA Client Driver would fail if the OPC UA server rejected a null Data Filter. |
| I22029 | Analog display widgets drew their values and alarms beyond both their Max/Min display ranges and past any physical limits that would exist leading to misleading readings. |

VTScada version 12.1.16 - Released February 28, 2023

New Features

| ID | Description |
|-----------|---|
| F1717 | When importing gas composition results from a file in the Oil and Gas Solutions layer, the Heating Value is now imported along with the rest of the results if it is available |
| F1715 | It is now possible to set page or widget parameters of type Text as non-translatable. |
| F1709 | The GetModuleTimeStamp function has been added. This is an efficient way to get the timestamp of the module's source file when the module was last compiled or edited in VTScada. |
| F1702 | There is a new Services page and widget for displaying RPC services status and performing changeover of the services during server maintenance. The interface is also available in a script application and the Trace Viewer. |
| F1693 | The columns in the HDV's table of pens now auto-size more appropriately. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I22135 | RPCManager.GetInSyncServers would fail to return new information when a potential server became unavailable. |
| I22112 | VTScada might crash when the Windows Text Cursor Indicator was turned on. |
| I22042 | VTScada ODBC Driver would return the "Column does not exist" error when a query had consecutive spaces in column names. |
| I22040 | Configuring the VoIP server and proxy fields was confusing because a SIP URI was required. |
| I21955 | WinToolTipCtrl could cause a buffer overrun if it is called with an array of very large strings. |
| I21941 | VTScada could crash when a user added a very deeply nested expression. |
| I21933 | If an existing widget was modified such that it displays an additional tag, then performing a Go To Page operation on that tag from the Tag Browser or Alarms page could fail to locate the pages showing that widget. |
| I19967 | Under rare circumstances, the addition of a page could force an application restart. |

VTScada version 12.1.15 - Released February 13, 2023

New Features

| ID | Description |
|-------|---|
| F1701 | VTScada now supports displaying the tag name alongside the tag value in the HDV and Plot Data widgets. |
| F1698 | Test Framework asserts can now be called in steady state, so that a test can be written to wait until the assert passes, or a timeout elapses, at which time the test assert fails. |

Incidents Cleared

| ID | Description |
|--------|---|
| I22094 | Poll Driver's Data Age widget could display a counter value off by one. |
| I22093 | A serial port could repeatedly attempt to connect when an error occurred, even if it was no longer required to connect, which could lead to delays and timeouts processing other data. |
| I22090 | The Voice Modem Wave Bus Enumerator driver would not install on Windows Server 2012 R2. |
| I22076 | When editing a roster contact, it was impossible to select another contact's edit field without first clicking elsewhere first. |
| I22070 | Page notes would not always appear consistently on site details pages. |
| I22064 | Improved the efficiency of updating the language files. |
| I22063 | Historical data may have been slow to display when reading from the CSV Data Driver or the MQTT Client Driver. |
| I22061 | A Rockwell Driver would not read tags if the type of any of the PLC's addresses was a structure that could not be accessed externally. |
| I22032 | The MultiSmart Well tag's description was blank when configured to use a single well. |
| I22011 | Some REST clients generated charset errors when trying to query a VTScada server. |
| I22010 | Under special circumstances, modules added to an application with the same name as structures used in the code, could be used as the structure definition instead of the actual structure definition. |
| I21987 | The Tag Browser could show a blank tag list for a short time on startup before starting to load the tag list. |
| I21945 | There was a potential for a system slowdown during heavy configuration activity. |
| I21944 | The Idea Studio code was less efficient than it could be when making page and widget changes. |
| I21862 | Double-clicking a ChangeSet in a Windows Explorer window would do nothing if a Modbus driver existed within a running application. |

VTScada version 12.1.14 - Released January 25, 2023

New Features

| ID | Description |
|-------|---|
| F1706 | Page Button and Page Hotbox widgets can now be configured to launch the Page Menu or subordinate pages. |
| F1683 | It is now possible to reset tag parameters to their default value using the right-click menu. |

Incidents Cleared

| ID | Description |
|--------|--|
| I22080 | The I/O tag's properties dialog could show an equipment type that is not the actual assigned equipment type. |
| I22069 | The Delta Driver was unable to read all of the D registers in an AH PLC. |
| I22028 | Longer tag names did not fit well in the new Operate dialog window title bar. |
| I22022 | An acknowledge code was sent to email or SMS roster contacts even if a security user had not been specified in the roster configuration. |
| I22012 | A historian tag logging to a 3rd-party ODBC database could cause the application to hang. |
| I22009 | Renaming an application list in the VAM list manager could result in a missing or empty list if earlier changes were not committed beforehand. |
| I21999 | A large historian could experience a significant memory spike when it synchronized. |
| I21979 | The SQL Driver Error Codes had wrong values reported in the VTS Help documentation. |
| I21948 | The Open dialog in the Idea Studio took unnecessarily long to load. |
| I21935 | The splitter bar could disappear on reopening the Tag Browser, HDV, or Import Tag tool under specific circumstances. |
| I21794 | A tag parameter that accepts a tag or an expression may have failed to reference a tag when using an ancestor relative path. |
| I21165 | Several text functions could cause VTScada to crash if using large strings due to exceeding the maximum VTScada string length. |
| I20876 | The Alarm Notification section of the Application Configuration dialog did not include the alarm priority labels, i.e. "Critical" and "High". |

VTScada version 12.1.13 - Released January 12, 2023

New Features

| ID | Description |
|-------|---|
| F1712 | By default, the "Go To Page" option searches the parameterized pages specified in the page menu or in page change widgets. It now is possible for an application to specify an additional set of parameterized pages that should be included in the "Go To Page" search by including a GetPagesForTagsHook callback module. |
| F1700 | The Application Configuration dialog now provides a way to disable the Ack All button on the Alarm Page. |
| F1697 | VTScada now supports opening source code in a preferred editor from the Source Debugger |
| F1696 | The Source Debugger now provides a String option in the data format popup window of the module content list. |
| F1695 | The content of the details dialog under the diagnostics tab for the OPC UA Client driver can now be copied. If using an Anywhere Client, the content can be downloaded as a text file. |
| F1694 | VTScada now permits system integrator licenses to be moved between computers. |
| F1690 | Digital Status and Digital I/O and Calculations tags now support toggling their values using the following widgets: Illuminated Toggle Switch, Checkbox Switch, and Toggle Button. |

F0911 Added convenient programming interfaces for accessing importing application paths (the working copy path, data path, and path for trace files) among other details about the application.

Incidents Cleared

| ID | Description |
|-----------|--|
| I22037 | The Fisher ROC driver could indicate to a polling driver that communications were good when there was actually a communications error. |
| I22035 | ReadOnlyStation configured servers can now temporarily delete pens from their own view on a HDV trend. |
| I22027 | Whenever a VIC displayed a window containing the realm name in its title, a small amount of memory was leaked in the VIC's process. |
| I22025 | Notes data sources now show their descriptions in the HDV. |
| I22019 | Grundfos Dedicated Controller could fail to export the event and data logs to a csv file on the Anywhere Client. |
| I22017 | The Rockwell Driver could lose track of existing CIP connections if their active termination was disabled. |
| I22016 | Importing a widget which contained a period as part of the filename would display an error. |
| I22007 | Function selector used in widget properties displayed a blank window after a minimize. |
| I22005 | Bar Graph and Pie Chart widgets previously had a limit on the number of linked tags. |
| I22004 | The BACnet driver tag import set all I/O tags to analog mode. |
| I21989 | The report tag could not run certain reports on a schedule. Impacted reports included the Meter Run reports in the Oil & Gas solutions layer and PVR reports. |
| I21988 | Some file types may not have been able to be downloaded from the browser when using an Anywhere Client. |
| I21982 | The MultiSmart, MPE SC, and MPE Duplexer Stations' Well\Faults\High Level tags were generating their descriptions with an unnecessary ParmPhrase call. |
| I21977 | New equipment types added in the StyleSettings tag could disappear when applied, or could display the phrase ID instead of the phrase. |
| I21961 | The OPC UA client driver would fail to browse nodes on an OPC UA server with a size limited Browse response. |
| I21960 | The Rotary Control widget could become "stuck" displaying a new value, and the current value, but never applying the new value. |
| I21959 | Deactivating an expired demo license would require assistance from support. |
| I21957 | The unlinked indicator could appear in the title bar if there were unlinked widgets shown in the Idea Studio Open or Export, the select widgets dialogs, or the Menu Item dialogs. |
| I21950 | Illuminated toggle switches flickered noticeably when the confirmation dialog was enabled. |
| I21937 | The I/O Multi-text widget and Recipe List's saved value cells would not display a tag value if no label was found in the equipment type of the tag being drawn. |
| I21936 | Some dead settings (HDVAnalogLegend* and HDVDigitalLegend*) were removed since they had no impact on HDV behavior. |
| I21923 | The time entry tool could show negative hours in some circumstances. |

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| I21922 | Operator log messages were always filtered out of event history when Global Tag & Area filtering is applied |
| I21921 | After grouping graphics into a tag widget with "Include Trend, Context Menu, and Tooltip Options" deselected, the widget parameters would be set to incorrect values. |
| I21908 | The Dynacard Upload Driver tag could not be configured to reverse the X and Y coordinates of the dynacard unless the "Read Number of X-Y Points from a Variable" checkbox was also checked. |
| I21887 | When a page was created with spaces in its name, those spaces were dropped when the page SRC file was created, which made the page file name difficult to read. |
| I21809 | It was possible for VTSDriver to set RefreshReady too early for the Modbus Compatible Device driver. |
| I21757 | Operations on a large number of items in the Idea Studio could be slow and CPU intensive. |

VTScada version 12.1.12 - Released December 01, 2022

Incidents Cleared

| ID | Description |
|-----------|---|
| I21984 | On some alarm notification call-outs using VOIP, no audio would be heard on the call until a key was pressed. |
| I21974 | When first creating a new Roster tag, it was impossible to add contacts. |
| I21964 | The Extended Addressing legacy Modbus driver would not work with Lufkin extended addressing. |
| I21963 | The BACnet Driver could have tried to build messages too large for the supported packet size. |
| I21952 | The Mitsubishi driver would incorrectly read negative signed word and unsigned double word types in ASCII mode. |

VTScada version 12.1.11 - Released November 01, 2022

New Features

| ID | Description |
|-----------|--|
| F1689 | Roster tags now support expressions to be set for the Method and Enabled attributes of each contact. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I21943 | The BACnet Driver failed to route to devices with binary addresses containing ASCII control characters. |
| I21934 | The incorrect Voice Modem Wave Bus Enumerator driver version would be installed on Server 2022. |
| I21931 | It was not possible to show a Style tag's invalid value label using the IO Multi-Text Widget. |
| I21928 | It was possible to remove the locked initial area filter in the tag browser. |
| I21926 | Reordering contacts in a Roster was difficult. |
| I21915 | Deleting an application that has a file with a pathname in excess of 256 characters could cause VTScada to crash. |

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| I21898 | The Mitsubishi driver would fail to write negative values for word sized outputs in ASCII mode. |
| I21880 | VTScada could fail to maintain an OPC UA server connection if a write to the server happened too soon after connecting. |
| I21732 | Some of the default process tags created by ROC300 and FloBoss407 flow computers in the Oil & Gas Solutions layer referenced point type 10 instead of point type 42. |

VTScada version 12.1.10 - Released October 19, 2022

New Features

| ID | Description |
|-----------|---|
| F1688 | Several more drivers now show address information in the Address column of the Tag Browser. |
| F1687 | The Rockwell Driver can now access PLC-5 and SLC controllers that don't support PCCC/CIP through a 1756-DHRIO Interface Module in a ControlLogix chassis. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I21916 | Custom-mode PLC alarm tags without ack or acked addresses would fail to report alarms. |
| I21912 | The SNMPSAgent could fail to process incoming requests under specific conditions when using UDP. |
| I21911 | If the Application Manager was set to automatically start and VTScada was running as a service, it was not possible to connect to the Application Manager using a thin client. |
| I21909 | After an Active notification was sent to multiple contacts in a roster, and one of those notifications failed to send due to a comm error, when the alarm cleared only the first contact was sent the Normal notification. |
| I21897 | No commit message was provided in the version log when overriding an OEM layer widget. |
| I21893 | A Calculation IO tag could output a value within the output threshold if its calculation expression became invalid temporarily. |
| I21881 | Some phrases in category 5 - 7 were misclassified and therefore missing translations in other languages shipped with VTScada. |
| I21730 | It was sometimes difficult to know if the web browser for the camera widget was running properly. |

VTScada version 12.1.09 - Released October 05, 2022

New Features

| ID | Description |
|-----------|--|
| F1645 | The individual field values of alarm notification messages can now be customized by a hook module which can reside in a custom tag type or in the root of the application. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I21904 | VTScada could crash if an incoming call was ended while the greeting speech was being spoken. |
| I21894 | After setting a background colour in a widget, it was not possible to return to "no Color" for the background of the widget. |
| I21888 | OAuth secured 2.0 alarm notifications could fail to notify the first email contact in a roster. |
| I21886 | The Modbus compatible device driver could fail to read a SCADAPack datalog after upgrading to 12.1.01 or higher. |
| I21883 | The OAuth grant scope window would not automatically close upon an external change to the active OAuth state. |
| I21866 | Increased the number of parallel connections which can be made to a single video source server with the camera tag, and improved efficiency by re-using HTTP streams for the same camera. |
| I21857 | The tag browser's operate dialog was unable to set to invalid tags that support invalid values. |
| I21832 | The main window of the VIC application would open behind the browser window with no indication of it opening. |
| I21815 | Flow computer tags can now use custom alarm/event log messages without needing to override all configuration read addresses. |
| I21773 | GUIText Text alignment was incorrect for strings that were both squished and clipped. |
| I21491 | VTScada took an unnecessarily long time to restart after a crash or a hard stop. |

VTScada version 12.1.08 - Released September 23, 2022

New Features

| ID | Description |
|-----------|--|
| F1682 | VTScada now supports the Traditional Chinese language. |
| F1679 | VTScada now reads OPC UA server profiles and modifies its behavior to support the OPC UA Micro Embedded profile. |
| F1666 | The Application Manager now shows Application Starting progress and Restart Required status in place of the Application Running Indicator. |

Incidents Cleared

| ID | Description |
|-----------|--|
| I21878 | It was not possible to configure a report to trigger with a tag that started with the letters "H", "D", "W", or "M". |
| I21876 | The IEC60870 driver virtual driver failed to configure normalized ASDU types on upgrade from versions before 12.0.0. |
| I21874 | The default MPE SC station page was missing the 24hr well level graph in version 12.1. |
| I21867 | Some tag parameters saved as packed streams would not unpack properly in versions after 11.5. |
| I21859 | The Modbus driver could not communicate with KOYO addresses above v24000. |
| I21856 | Out of date terminology was used for the "Disable Context Menu" option in various widgets. |

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| I21846 | A Type-Derived Child tag could show the override orange for tag name which was not overridden. |
| I21844 | The web browser message receive queue did not place a limit on the overall size of the queue or the number of messages which web content could place into the queue. |
| I21842 | The available contact methods in the Roster Tag would not update until the configuration folder was closed and reopened. |
| I21841 | It was possible for several invisible checkboxes to take focus and cause invisible tab-stops. |
| I21840 | A user without account-managing privileges was unable to apply account changes using a changeset, and no feedback was given for account changes rejected when applying a snapshot. |
| I21837 | The Modicon Driver would register CRC errors for responses from a Lufkin RTU using extended addressing. |
| I21828 | Retrieving data from a historian tag logging to a 3rd-party ODBC database could cause the tag to stop working. |
| I21818 | A badly formed phone number could cause the SMS Appliance tag to hang when sending a text message. |
| I21812 | The RPCTimings application was not updated during installation. |
| I21746 | Improved the performance and VTScada responsiveness with multiple MJPEG streams on display. |
| I21728 | An Anywhere Client could fail to change over to another server. |
| I21541 | When renaming a type-derived child tag, an unnecessary record was logged in the repository. |

VTScada version 12.1.07 - Released September 08, 2022

New Features

| ID | Description |
|-------|--|
| F1678 | The Roster tag now has a public interface for accessing its contact information for display in custom widgets. |
| F1677 | Printing from the Sites Page has been enhanced to default to a PrintPage module in an embedded site details page if specified rather than just a screenshot. |
| F1675 | The PLC Alarm tag now reflects the alarm state of the PLC more accurately. |
| F1674 | A port number can now be specified in the configuration folder for a SMS appliance tag. This is useful when the COM port information for a cell modem is unavailable or incorrect from the installed device drivers. |
| F1659 | Access to the tag value tables and the main History table is now restricted to the users with the Remote Tag Value/History Retrieve privilege. |

Incidents Cleared

| ID | Description |
|--------|--|
| I21869 | In rare cases when using thin clients, VTScada could crash. |
| I21854 | The Rockwell driver did not match responses with their requests in CSP mode. |
| I21853 | The GE Driver could have logged Invalids on application start or if the read addresses were changed. |
| I21850 | If Twilio was configured to work only on a specific workstation, other workstations could not add/edit voice or text contacts in a Roster. |

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| I21845 | There were unused and missing translations in the set of VTScada phrases. |
| I21843 | It was not possible to use the Numeric Entry widget to clear value of I/O and Calculation memory tags. |
| I21839 | When entering a title in the Idea Studio's Add Page dialog, it was required to tab through invisible GUI elements to arrive at the OK button. |
| I21838 | The IEC 60870-5-104 Driver would fail to complete a GI poll request when in Slave mode, sending multiple, repeated packets when an application is upgraded from VTScada 12.0.0 through 12.0.30 to a later version. |
| I21836 | In the Roster tag contact configuration, the wrong user account may have been saved if the configurer was logged into a realm when they entered the contact username. |
| I21830 | When a new Flow Computer tag was created, some Enron Modbus driver parameters would not be defaulted correctly if the device type was never changed. |
| I21824 | Ad Hoc alarms had a Configuration tab within the Alarm Details dialog which did not apply to them. |
| I21819 | The Rockwell Driver could not address words higher than 0 in physical I/O modules from SLC and MicroLogix controllers. |
| I21816 | The changeset file name was blank when creating a changeset for the first time and unrelated apps could share retained system-level variables. |
| I21806 | Some exported CSV files were not properly displaying UTF-8 characters in Excel. |
| I21798 | The snapshot expression window's Tag Browser fly-out button did not open the Tag Browser to the current tag's tree level. |
| I21785 | The Export options presented in the HDV Export Wizard were not translated. |
| I21729 | Context menus may fail to appear or appear out of position when right-clicking an edit field in a scrolled window. |

VTScada version 12.1.06 - Released August 24, 2022

New Features

| ID | Description |
|-----------|---|
| F1664 | The BACnet driver now support message segmentation as well as Tag Import for most common objects with a Present Value property. |

Incidents Cleared

| ID | Description |
|-----------|---|
| I21834 | Alarm ack codes wouldn't be sent out with alarm notifications unless the logged on user on the server was a manager. |
| I21833 | Installing VTScada 12.1 at the root of a drive would result in some files failing to install correctly. |
| I21831 | The VTScada process would not shut down cleanly on systems with modems. |
| I21827 | Registers in the X, Y, B, and W ranges were misinterpreted using ASCII for values above 9 with the Mitsubishi Driver. |
| I21822 | The Rockwell Driver did not convert DF1 station addresses correctly from octal. |
| I21821 | Opening the Server Certificate tab in the OPC UA Client Driver config folder caused high CPU. |

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| I21814 | Disable Trends, Navigator Menu and Tooltips widget parameters are not working on the General Digital Text with Label widget in the Oil & Gas Solutions layer |
| I21813 | When editing the State alarm of an IO-Discrete tag in the Advanced mode, the State value could not be set, even though it could be set in Basic mode. |
| I21808 | If a FileStream was at EOF, reads would not work after a seek backwards. |
| I21807 | The IO tag properties dialog showed the incorrect background color. |
| I21804 | The OpenID Connect title for the VTScada Account Name field was misleading. |
| I21802 | The privilege "Manager" and "Administrator" had the same Chinese translation, which could cause confusion when working with privileges. |
| I21801 | The GrundfosBoosterModeSelect widget did not react to external mode changes. |
| I21800 | The legend tool on the small maps in the Map Tile Build Download and Set Area Limiting dialogs could not be closed after opening them. |
| I21796 | VTScada could crash when a subordinate driver of a DriverMUX (which is also the DriverMUX's parent tag) failed to communicate. |
| I21764 | Writes via OPC connections to a read-only server were successful while they should have been denied. |
| I21758 | Moving the mouse cursor on a VIC Idea Studio instance could cause excessive CPU consumption. |
| I21756 | Multiple VICs running the Idea Studio on the same client machine had poor performance. |
| I21753 | It was possible to create a Recipe Book tag with the same CSV FileName as another Recipe Book tag by accident. |
| I21715 | The VTScada Internet Client would install the palette file in the Windows system directory. |
| I21671 | The Source Debugger could cause VTScada to hang when viewing a COM Property value exposed by a COM Client if a COM Client being debugged was also hanging. |
| I20784 | I/O and Calculation output tags would not write their manual values. |

VTScada version 12.1.05 - Released August 10, 2022

New Features

| ID | Description |
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| F1639 | It is now possible to download CSV formatted files of alarm data from the alarm page when viewing with an Anywhere Client. |

Incidents Cleared

| ID | Description |
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| I21810 | An "upon change" alarm option was not available for Discrete Calculation IO tags. |
| I21805 | The Oil and Gas Solutions application was not updated during installation. |
| I21795 | An I/O and Calculations tag might not have updated its value when its expression parameter was changed to a tag or constant. |
| I21792 | There was a memory leak when writing to Modbus compatible devices. |
| I21787 | There was a very small possibility for the Polling Driver to poll a Modbus Driver too early resulting in an initial poll missing some of the inputs. |

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| I21781 | A dialog saying that DialogInitPos failed to load was displayed when debugging a child bubble. |
| I21780 | Adding a X509 certificate from the Application Manager running over a VIC connection would fail. |
| I21779 | Ad hoc alarms may not have been displayed by the Alarm Priority Icon widget or may not have appeared in the structure returned by the GetAlarmStateStats() function. |
| I21778 | If you switched to the Alarms tab on the Edit Properties panel, when you switched away it could warn you that changes had been made, even if you hadn't made any changes. |
| I21777 | Some phrases were missing French and Simplified Chinese translations. |
| I21771 | Retrieving data from tag-specific tables might not return old data when the SQL query had filters. |
| I21760 | The installer would create an install.log file in the root of the C: drive if it was cancelled early in the installation process. |
| I21755 | A Page Hotbox widget could appear in the wrong location. |
| I21750 | The rectangle displayed in place of a hotbox in the Idea Studio didn't match the hotbox's area for Momentary Button or the Toggle Switch widgets. |
| I21744 | VTScada would crash during installation if installing on Windows 8 or Server 2012. |
| I21701 | Using a combination of VICs and Anywhere Clients across an HTTP/2 proxy could cause thin client sessions to fail. |
| I21674 | When an alarm notification was sent as a text or email, if the username of the contact was valid, it included an acknowledgement code even if the user account was disabled. |
| I21668 | Momentary button widgets would only respond on Windows touchscreens when the Show Button option was selected with the Legacy Style option deselected. Now, Windows touchscreens are supported in all momentary button configurations except when the Show Hotbox option is enabled. |
| I21618 | An asterisk appeared next to the top user in the accounts list while applying the deletion of another user. |
| I21509 | The VTScada Internet Client launch dialog would not work with some pasted URLs containing escaped characters. |
| I21494 | The ROC Driver could fail to read more than 60 history points. |

VTScada version 12.1.04 - Released July 28, 2022

New Features

| ID | Description |
|-------|--|
| F1670 | The link displayed in the VIC update dialog now downloads the new VIC installer directly. |
| F1632 | The time at which an active alarm was acknowledged, and the time at which an unacked alarm cleared, is now displayed in the alarm details dialog, and can optionally be shown as separate columns in the alarm list. |

Incidents Cleared

| ID | Description |
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| I21770 | If a Roster exists in an OEM layer, and an application based on that layer has added contacts to that Roster, after upgrading to 12.1, if the OEM layer is *started* followed by the application being started, the contacts from the application layer would be lost. |
| I21768 | Importing a changeset with OAuth 2.0 configured could cause the import to hang. |
| I21766 | Clicking the Help button for the "MultiSpeak Registration Failed" error did not open the corresponding topic. |
| I21763 | When exporting a report to a CSV file while using the Oil & Gas Solutions layer, dates were being formatted incorrectly |
| I21762 | The CATM5X Driver's CCM Manager had Show Comms and Show Stats sub-modules which could never be displayed properly. |
| I21761 | Checkboxes for excluding the Trend, Navigation and Tooltip options and the Tag Icon Marker weren't available when making a new widget from within the widget palette. |
| I21754 | The History Stats Value dialog would keep the unsaved value when the Cancel button is pressed and display them next time the dialog was opened. |
| I21745 | The Oil & Gas Solutions Well Test Table widget would not export data on the Anywhere Client. |
| I21736 | The detailed statistics for a thin client session could be incorrect for long-running sessions. |
| I21733 | A user could have specified a reversed time range in the History Statistics widget. |
| I21722 | It was possible for Locate to attempt to read far outside of the search text which could result in a crash. |
| I21695 | There was no warning in 12.1 if uninstalling VTScada while it was still activated. |
| I21636 | Pop up page created without borders were opening in the middle of the screen when window coordinates were close to the edge of the display area. |
| I21589 | Checkbox widget for Selector Switch tags did not appear to be clickable when Switch Position Feedback was supplied. |
| I20924 | Focus boxes for ellipse and arc-based graphics did not always cover the correct area. GUIPie not rendered correctly in all circumstances. |
| I19496 | Third party software licenses used in VTScada and other distributed products have been updated and made more accessible. |

VTScada version 12.1.03 - Released July 13, 2022

New Features

| ID | Description |
|-------|---|
| F1668 | When creating a tag widget, there are now options to exclude the Trend, Navigation and Tooltip options and/or exclude the Tag Icon Marker. |
| F1663 | A History Statistics Value widget has been created that draws a single calculated historical tag value that is computed over a user-entered time range. |
| F1654 | New Pie Chart and Bar Graph widgets have been added for showing multiple tag values. |
| F1653 | VTScada now supports the Simplified Chinese language. |
| F1650 | An optional Page Shuffle feature has been implemented in VTScada where an app may periodically change pages based upon Settings.Dynamic settings. |

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| F1641 | An "upon change" alarm option has been added to Discrete IO tags. |
| F1631 | Certain alarm priorities can now be prevented from being acked by the Ack All button via a new option in the Alarm Priority tag. The Ack button for each individual alarm can now be disabled programmatically via a custom AlarmCellAckHook module. |

Incidents Cleared

| ID | Description |
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| I21749 | Signing in with OpenID Connect would display a "Sign in failed" message when used with some providers. |
| I21748 | Duplicate notes were being added to the historian, causing systems to slow down when processing the information. |
| I21741 | An application could become very slow and unresponsive while synchronizing tag history that contains data notes. |
| I21737 | The VTScada Installer did not use the custom slides and wizard watermark. |
| I21718 | VTScada would fail to acquire access tokens from Google or Microsoft. |
| I21694 | Ungrouping a widget/group with opacity set to 0 would result in the contained graphics not being added to the container page/widget. |
| I21675 | The Consent button in the OAuth 2.0 settings dialog would not be disabled if there were pending changes. |
| I21665 | It was possible to change the Scan Interval parameter for an IO tag whose I/O Device was a Polling driver. |
| I21651 | A connection could not be established by the Anywhere Client in Firefox through an HTTP/2 proxy. |
| I21646 | If the ByteLimit parameter of BlockWrite is set to an Invalid variable it would fail to write any data. |

VTScada version 12.1.02 - Released June 29, 2022

New Features

| ID | Description |
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| F1665 | Deprecated drivers/modes now have a warning not to use them in favor of the new Rockwell driver type. This includes the CIP Symbolic driver and several PLC types within the Allen Bradley Driver. |
| F1662 | A new report, Overall Total report, was added to give a single, overall total for the given time range. |
| F1661 | Two new options have been added to the History Statistics tag that represent the change in a value over time. |
| F1638 | The context menu is now available to all non-tag alarms and objects in an alarm list. |

Incidents Cleared

| ID | Description |
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| I21717 | An option was presented on the Thin Client landing page to open the VTScada Internet Client (VIC) with no way to disable this option. |
| I21714 | The VTScada installer would delete the wrong directory during the "Cleaning up files" phase if the installation path contained spaces. |
| I21713 | It was possible for the Modbus Driver to report data to the wrong IO tag in a redundant server environment. |

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| I21709 | Under rare circumstances, some customers could not activate VTScada version 12.1.01. |
| I21708 | The Enron Driver would send an extra byte in its read requests, causing the read to fail on some PLCs. |
| I21703 | The default input deadband for analogs could be too large to see small data changes. |
| I21697 | VTScada would still require a hardware key for some license keys. |
| I21693 | Some drivers may have reported an unable to connect message when using a UDP or TCP port connection on startup. |
| I21692 | The margins in the License Management dialog were not the same as the margins in the About Box which otherwise had similar appearances. |
| I21690 | Opening a VIC from a browser with a URL containing a page specifier and/or page parameters would open the application default page without any specified parameter values. |
| I21688 | Upgrading to 12.1 from an earlier version did not offer a new grace period to facilitate upgrades for isolated systems. |
| I21672 | OpChange documentation and comments made it appear that the tag name parameter was required in the Parms (dictionary) parameter when it no longer was. |
| I21576 | The Historian could have erroneously written records containing very long text fields. |

VTScada version 12.1.01 - Released June 16, 2022

New Features

| ID | Description |
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| F1660 | Allen Bradley DF1 Compatible PLC/RTU has been moved into a [Legacy Drivers] section of the tag type selector. The Rockwell Driver has been renamed to "Rockwell Driver (Allen Bradley Devices)" to indicate that it is the preferred driver to be used. |
| F1658 | Logging of events for automated multi-writes can now be enabled/disabled. |
| F1649 | The Training Simulator has been improved by removing unnecessary tags and by adding I/O for use when teaching the Recipe Management feature. |
| F1648 | The Web Browser widget now uses a different profile for each user in each application, and supports security options such as restricting domains and disabling JavaScript. There also are two Web Browser navigation widgets (a button and a hotbox) that can be used to control the web page currently being displayed in a Web Browser widget. |
| F1646 | HTTP requests now support "Digest" authentication. |
| F1640 | There is now a demo of the REST interface in the Examples folder. |
| F1636 | The Alarm List API now supports GetCurrentFilter(). |
| F1633 | Alarm lists can now be configured to be initially sorted by a particular column and direction. They can still be sorted by other columns after the fact. |
| F1630 | An application property, AckAllAcksOnlyVisible, can now be used to cause the Ack All button on the Alarm Page to only acknowledge the visible alarms. |
| F1629 | A new Edit Roster Contacts security privilege has been created in order to give operators permission to edit contacts without requiring other privileges. |
| F1628 | Rockwell Driver now supports Serial and CSP Socket communication with some legacy Allen Bradley PLC's. |

- F1625 VTScada's high performance widget folder now contains additional widgets for build high performance HMIs.
- F1621 VTScada has a new license activation scheme and no longer requires a dongle.
- F1620 VTScada can now import tags directly from an OPC-DA server using the OPC Client Driver.
- F1619 The Rockwell Driver now supports PLC5, SLC and MicroLogix PLC's that use Allen Bradley Data file addressing via PCCC commands.
- F1614 Support for up to 9 pumps has been added under a MultiSmart station tag.
- F1605 The MultiSmart Station tag now supports liftstations containing two wells.
- F1600 VTScada now supports SQL queries via POST requests on the REST interface.
- F1597 VTScada now supports launching the VTScada Internet Client from all supported web browsers.
- F1590 Oil and Gas Solutions tags with child Modbus and Enron drivers can now specify the Address format in support of extended addressing for the drivers.
- F1581 VTScada Agent now supports SNMPv3.
- F1563 Cloning a VTScada workstation without generating a new unique machine identifier could lead to the inability to synchronize application configurations, even after a new unique machine identifier was generated on the cloned machine. While it still is necessary to generate a new unique machine identifier when cloning a workstation, failing to do so will no longer cause synchronization problems as long as the cloned workstation is given a new name.

Also, when a workstation is renamed, a new entry will appear in the Version Log rather than the old entry appearing with the new name. The old entry will still be available for review, under the old name. These entries will appear the same on all workstations, whereas before renamed workstations appeared with their original name when viewed in the Version Log from another workstation. Related to this, on upgrade, new entries will be added to the Workstations list for all renamed workstations. Their old entries will remain in the list, but will appear under the workstation's original name.
- F1562 A new column in the tag browser has been added to show attributes for tags. Searching in the tag browser has been extended to allow users to have a list of all tags marked as Questionable or having a valid Manual Value.
- F1560 A new button has been added to the Alarm List's toolbar so a user can easily discover they can copy and paste the list contents to the windows clipboard.
- F1550 You can now embed live camera feeds into VTScada pages. Web sites can also be embedded in VTScada pages.
- F1547 Support has been added for Voice Over IP (VoIP) via Session Initiation Protocol (SIP) for use with the VTScada Alarm Notification system.
- F1537 The IO tag's ConfigFolder has been enhanced to show units for some fields and the calculated Deadband is now displayed in the Deadband field as placeholder text.
- F1536 The Modbus driver was reworked to allow the reading of IO to run on a separate processor core, thereby freeing up CPU for the rest of VTScada activities. The result is greater responsiveness and the ability to handle larger applications when using the Modbus driver.
- F1464 VTScada installer has been improved with a smaller size and faster installation.

- F1427 Twilio now uses rotating URLs for additional security and no longer requires a configured VTScada account for use.
- F1400 I/O and Calculations tag and Analog Status tag are now able to set input deadband value to filter out insignificant analog noise.
- F1315 VTScada now supports running script fully in parallel, taking better advantage of multi-core processors. The Bubble function has been added, which launches a module into an isolated bubble that can run in parallel with other bubbles. There is a controlled message-passing interface for communication between a child bubble and its parent bubble. This makes it possible to run script in an isolated fashion such that it cannot read or write to objects running in other bubbles.
- F1606 The Roster tag now a) supports up to 40 contacts, b) can be configured with additional settings that affect its behaviour, c) can configure different delays in between contacts as well as repeats, d) is easier to use with the elimination of "Continue Roster Sequence", e) has an improved properties dialog.
- F1601 Honeywell Mercury Driver now supports TCP/IP communications.
- F1594 Honeywell Mercury Driver now accepts incoming calls and supports the EC 350, ERX 350 and Mini-Max versions of the RTU.
- F1592 It is now possible for steady-state-only functions to be reloaded in the Function Library without restarting the application.
- F1591 VTScada now supports the MakeParmPhrase function in the function library, which enables easier construction of parameterized phrases.
- F1582 A RecipeProportions tag has been added to allow hooked RecipeIngredients to be either adjusted to add up to the specified total, or multiplied by a scale factor before outputting to the PLC.
- F1579 A new report called "Recipe Batch Report" has been added for batches run for a RecipeBook tag.
- F1577 The Recipe Version Selector widget now allows you to sort in descending order. The Recipe Selector widget now allows you to have the last version become selected whenever a new recipe is selected.
- F1576 A Honeywell Mercury driver has been developed to work with the ECAT and Mini-AT versions of the RTU.
- F1575 Data attributes and all its bits now can be retrieved via VTScada's Remote Data Access and ODBC interface.
- F1571 The ability to issue control actions directly from the Tag Browser has been added.
- F1566 A new widget has been added to the RecipeBook tag to allow a user to skip the writing of ingredients or cancel a batch operation in case of a hang while writing. Skip and cancel options have also been added to the status bar of the Recipes page.
- F1565 VTScada now has built-in functions for table interpolation, tank shell volume corrections, and oil pressure/temperature volume corrections.
- F1559 VTScada now supports a Function Library to enhance and simplify expression-building.
- F1558 A new tag type, SQL View, has been created to specify data available to retrieve from the ODBC query interface.
- F1553 VTScada now supports using the MELSEC label addressing scheme for the iQR series PLC.
- F1551 Support for certain PID loop variables has been added to the TI505 Driver.
- F1549 The Delta Driver now supports the AX series PLC via Modbus communications.

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| F1546 | VTScada now supports the Mitsubishi Melsec iQR PLC series through use of a new Mitsubishi Driver tag. |
| F1542 | A new driver, Delta Driver, has been created for communicating with Delta PLCs using standard Modbus with Delta addressing. |
| F1544 | The Rockwell Driver's performance has been further optimized. |
| F1538 | The ModbusTransport now has Read and Write modules for performing Modbus reads and writes using standard function codes. |
| F1528 | Minor improvements to the Recipe tags and graphics were made. |
| F1522 | VTScada now has a Recipes page for configuring recipes and writing recipe ingredient values to a PLC. |
| F1512 | VTScada now supports configuring recipes and writing recipe ingredient values to a PLC. |
| F1511 | The TI505 driver can now open multiple TCP/IP connections to an RTU, reducing traffic congestion during heavy usage. |
| F1480 | VTScada now has support for Milsoft's DisSPatch outage management system using the MultiSpeak web services interface. |
| F1456 | The TCP/IP and UDP/IP Port tags are now capable of establishing multiple concurrent connections to a device, thus increasing throughput rates. Both the device being connected to and the driver being used must support concurrent connections for this to be used. |
| F1434 | VTScada now supports Internet Client sessions in a multi-monitor arrangement, configured using a Realm Display Setup tag. For example, with a 1x3 arrangement of equally sized monitors, 3 Display Manager instances, 1 per monitor, can be presented. |
| F1422 | VTScada can now import tags directly from an OPC-UA server using the OPC-UA Client Driver. |
| F1360 | The Modbus and Enron Modbus drivers now support extended PLC addressing and allow multiple simultaneous connections to a PLC. |
| F1342 | A new Rockwell Driver, combining features of the CIP/ENIP Driver and the Symbolic CIP Driver has been added. |

Incidents Cleared

| ID | Description |
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| I21686 | In a rare situation, VTScada could crash during installation. |
| I21669 | In a rare situation, VTScada could crash when a window containing a DropDownList was closed. |
| I21655 | VTScada would use more CPU than it should when editing a text expression in the Idea Studio. |
| I21654 | Security options may not have shown up if initially opened and closed in the wrong order. |
| I21648 | A parameter title in the Program Spawn Properties dialog would not change with the user language. |
| I21644 | When changing pages, the title bar would display the page name briefly before displaying the page title. |
| I21634 | FileDialogBox did not show subdirectories when called with CSIDL_PERSONAL (5). |
| I21603 | Some tag types had override/highlight problems in their config folder. |
| I21565 | Priority 1 and 2 alarms would be notified even if the app was configured to only notify priority 1 alarms. This has been fixed in new applications, but can be altered in existing applications using the MaxCallAlarmPriorityReported setting. |

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| I21564 | The properties dialog of Modbus and Enron drivers was using different terminology for what is now called the "Station Address". |
| I21536 | When a new version of the VTScada Internet Client was installed on top of an old version, it would not include updates to the Idea Studio ribbon. |
| I21518 | POC-Weatherford and POC-Unico pump-off controller tags contained a large number of unused disabled alarms. |
| I21514 | Reading/writing of the SNMP agent configuration XML file and the related MIB generation could take very long, hog the application thread, and starve other threads. |
| I21512 | The VTScada ODBC Driver was unable to handle the errors returned by HTTP requests. |
| I21493 | If none of the contacts in a roster could be notified due to configuration or hardware issues, the roster would either flood the event history with failure messages until the notification issue is resolved, or log a single failure message with no further attempts to notify the alarm. |
| I21432 | Security improvements have been made to the VTScada installer. |
| I21419 | A rare crash could occur on a heavily loaded system. |
| I21406 | The MultiSmart station had several duplicated tags relating to Motor Protection. |
| I21393 | Users were getting a compile error when configuring an expression for a tag widget. |
| I21392 | FilterTagList does not accurately detect ParmPhrase structure matches. |
| I21389 | A new popup page could become non-popup on app restart or on deployment if it was not edited immediately after its creation. |
| I21387 | In rare cases, VTScada could crash after renaming a tag. |
| I21373 | The number of rows returned by an SQL query was limited regardless of the number of columns being retrieved, which could cause performance issues. |
| I21329 | The MultiSmart Station tag was missing some child tags for Unit 2. |
| I21310 | Un-optimized parameter expressions could cause a tag to refresh unnecessarily with a transient invalid parameter value. |
| I21289 | Unoptimized expressions could lead to unexpected values for interdependent tag parameters on refresh. |
| I21281 | VTGIO drivers are no longer installed by new VTScada installations. |
| I21275 | The VTScada installer might have required a reboot after installing modem drivers, even though one was not needed. |
| I21243 | Text on pages could disappear until VTScada was restarted. |
| I21210 | Cut/Copy/Paste actions in the Tag Browser, while focus is on the Search field, were also performing the action on the selected tags. |
| I21194 | The Edit Parameter dialog kept showing up when opening a subordinate application's page with partially specified parameters. |
| I21085 | When selecting a page from a subordinate application via the master application's page menu, it was possible to select a master app tag for a subordinate page's parameter value. |
| I21027 | Restarting VTScada could result in losing the OAuth 2 consent for grants previously acquired. |
| I21009 | Security improvements have been made for OAuth 2.0. |
| I20723 | Animated graphics on a page could fail to animate. |
| I20620 | Some Multismart Auxiliary Control tags were missing their data source definitions |
| I20497 | MultiSmart Station had duplicate and a misspelled Well\Flow Stats\Total Volume Freeze tag. |

- I20279 The Poll Driver could get stuck in fast poll mode if the primary server went offline after initiating a fast poll.
- I19800 In the tag browser, non-root-level name filters with a leading "*" would yield different results for disabled and enabled tags.
- I19280 I/O and Calculations tags were logging Invalid on tag startup and configuration changes to the expression.
- I17299 The IsRunning function was very slow to execute, taking many seconds.