

Welcoming the future in the Food & Beverage Industry



True industry transformation is evident and there is a paradigm shift in manufacturing occurring: changing organizations, the creation of new roles, and the development of new sustainability competences. Innovation and digitalization enabled by the zenon Software Platform can help the Food & Beverage Industry to achieve its net zero ambitions. With the new version of zenon, we feel privileged to partner with these sustainability makers in their transformation journeys.

New sense of freedom in digitalization architectures

Vertical integration with OPC UA

zenon's OPC UA Server is now certified by the OPC Foundation. Benefit from a high quality and flexible integration within the OT/IT landscape.

- OPC UA Process Gateway (Server):
 - · New watchdog variable with server status
 - · Improved performance
- OPC UA Driver (client):
 - · Customizable variable import
 - · Certificate Validity Information on status variable
- OPC UA Language Switch: Support of LocaleId for historical alarms and events

Linux Service Engine

Get access to a wide range of solution opportunities based on Linux.

- OPC UA Process Gateway: Online data, historical data and CEL/AML
- Extended support for zenon functions and scripts
- Local licensing

Drivers

Selected driver news and enhancements:

- TIA driver supports TIA19
- stratonNG driver: TLS secured communication
- NET version upgrade for GenericNET driver to version 8

zenon Logic

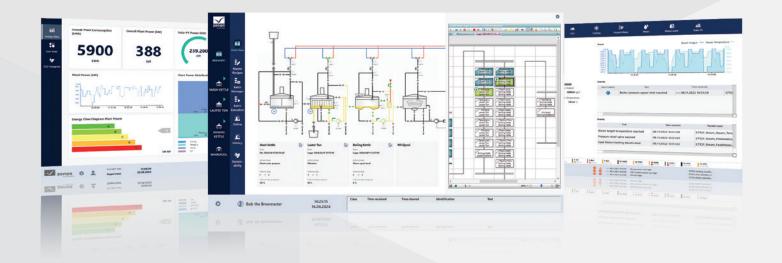
Superior integration of software PLC, in terms of functionalities, performance and security.

- Platform independent and improved API for shared memory driver
- ▶ Function Blocks for TimingStatistics
- Support for UTF-8
- TLS secured communication

zenon IIoT Services and Web Engine

Benefit from integrated technologies for easy-to-engineer IIoT solutions.

- Web Engine support for:
 - · Multiple webX files (zenon Projects) per Web Engine
 - · Identity Service Login
- Device Management: Improved device and project version handling
- ▶ IIoT API for historical AML and CEL entries





Continuous enhancement of User Experience

Web Visualization Service (WVS)

Provide web-based user interfaces which are easy to use and engineer.

- ▶ Batch Control:
 - Master Recipe List and Control Recipe List
 - New/Duplicate/Configure/Delete Control Recipe functions
 - · Select and Start Batch Control Recipes
- RGM screen supports interlocking and reading and writing selected values
- ▶ Equipment Model screen offers search and sort
- Headless AddIn Wizards
- New System Driver variable to indicate WVS Client ID
- Supports World View, Faceplates and the opening of multiple frames
- ▶ Easier configuration of WVS with less manual work
- Supports Dynamic Limit Value Texts

Alarm Message List (AML)

Incident investigation with state-of-the-art alarm and process deviation management.

- Automatic re-sorting of AML entries based on timestamp
- Customizable Filter Row at AML column headers
- Show uncleared and/or unacknowledged alarms only in Screen Switch function
- New columns in AML: External reference, Description
- Show AML text with certain alarm states

Batch Control

Design your processes easier and avoid user errors.

- ▶ Transitions which are always "true" for branch configuration
- Context menus and toolbar buttons can be turned off

Extended Trend

Improvements in user experience for dynamic data analytics applications.

- Simplified variable (archive) selection dialog
- Export displayed data
- Scale styles include value ranges of curves
- Screen-specific functions also available at active cursor
- Variable Identification available at cursor output list

Data Historian and Data Analytics

More efficient and flexible data archiving enabling performant and robust historian solutions for advanced process analytics.

- "Gap Detection" for Spontaneous Archives: Save values during long intervals without value changes
- New System Variables for Start and Stop Time of selected lot
- GraphQL Interface enhanced:
 - · Define query resolution
 - More detailed options for requesting data

Trend Visualizer

New tool for web-based data analytics that is part of the IIoT Services and utilizes the Report Engine GraphQL interface.

- View and analyse historical data online
- Only a browser is needed for data analysis

Service Engine

Enhanced flexibility for applications with diverse user groups.

- Identity Service Login support
- Single exports of filter profiles is now possible
- ▶ Switch of language, fonts, etc. more customizable
- Various improvements of the 3D Integration



Mature Engineering of Modular Solutions

Smart Objects

Enhanced functionalities and improved integration of Smart Objects for quicker application engineering.

- Use Smart Objects in Multi-User projects
- Multi search-and-replace for rule-based mapping, and apply all variable mapping of all SOTs at once
- Increased flexibility in creating dynamic alarm and event texts

MTP/Orchestration

- Validator improved
- Orchestration Studio enhancements
- ▶ Introduced Internal Modules
- Marketplace Addin: Connect to third party marketplaces
- ▶ Redesign of templates for generated projects

Improved engineering experience

- Usability improvements of Automatic Line Coloring (ALC)
- Improved Validation Messages when creating Service Engine files
- Engineering Studio and Report Engine update to SQL Server 2022
- Enhanced zenon platform setup
- Import of Process Gateway configurations into the Engineering Studio

Maintenance & platform security

- Improvements in System Diagnosis tools
- Security enhancements for Report Engine users
- ▶ Identity Service security enhancements
- OpenSSL version update for zenon Software Platform to OpenSSL 3.0

