Release highlights

2016Q2

CADMATIC Version 2016Q2 features enhanced views presentation of 2D Hull Work Breakdown Drawings, new features in norms type management and insert multiple Hull lines management, new free node connection points for Diagram's equipment symbols, production checks for spools according to check parameters, the possibility to see updated parts and triangle marks in isos and spools, new types of bends in Cable specs, as well as project settings export and printing possibilities in eShare, many additions to eGo and a lot more.

License

CADMATIC Plant and CADMATIC Outfitting 2016Q2 is compatible with the license files marked for version 2016Q1 and not compatible with older files. The license server 2016Q2 can be used for application versions 5.0 or newer.

Compatibility with Windows10 and between versions

CADMATIC Hull 2016Q2 is compatible only with CADMATIC Outfitting 2015Q3 and newer, CADMATIC Outfitting 2016Q2 is compatible with CADMATIC Hull versions 5.2 and newer.

Exchanger for AutoCad supports AutoCad 2016.

CADMATIC Hull 2016Q2, Outfitting 2016Q2, eBrowser and eGo are compatible with Windows 10.
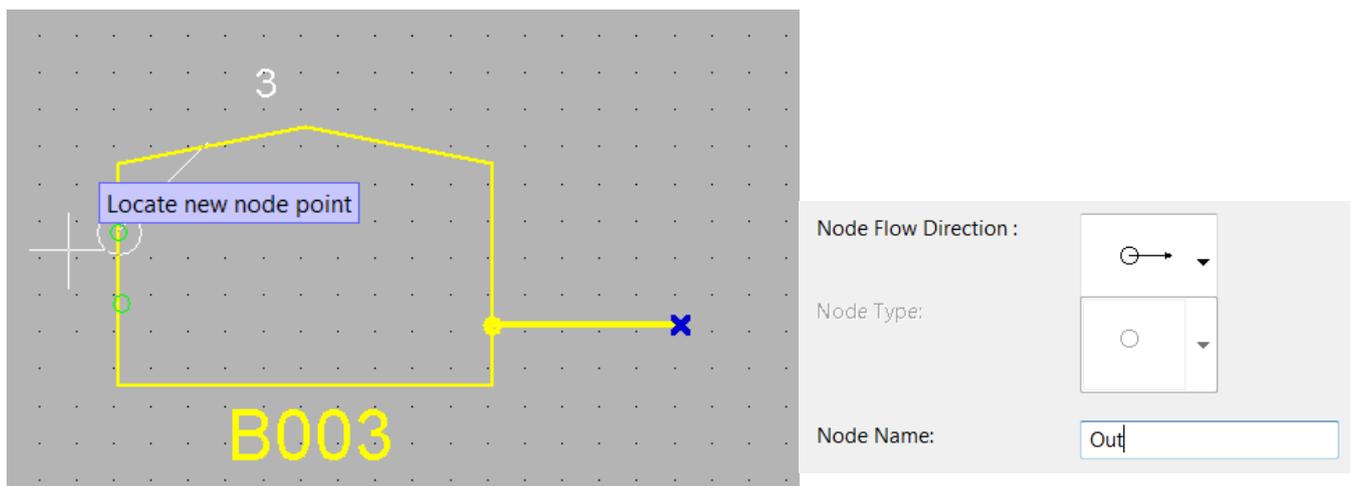
Diagram

Object nodes

Connections to tanks, vessels and other similar objects are often added during pipeline sketching. If a pipeline is changed a free node remains on the tank. A new setting is available to set free nodes as visible. Visible nodes assist the designer to see where available nodes are located. Node locations can now also be moved and unnecessary nodes deleted. Free nodes are shown only in the application and they are not exported to diagram drawings.

Objects such as pumps and check valves can have flows in only one direction. The direction of the flow can be set for object nodes. In the diagram the flow direction of free nodes of objects can now be modified using a special command for Free Nodes. A pipeline adopts the flow direction from the start node automatically.

The commands also function for nodes that are already defined in the object symbol. The edits are only applied for the object in the diagram not for the symbol of the object template. Permanent edits to nodes that come from the symbol of the object template have to be done by the administrator in the symbol editor.

Diagram Administration

The system now detects SQL native client versions that are installed on a computer and new versions of the SQL native client can be used

The Diagram revision table fields can be selected in settings

CADMATIC Hull

Work Breakdown 2D Drawings

The Work Breakdown 2D Drawings function now also creates separate (perpendicular) views for straight face plates as it does for plates, brackets and shell frames.
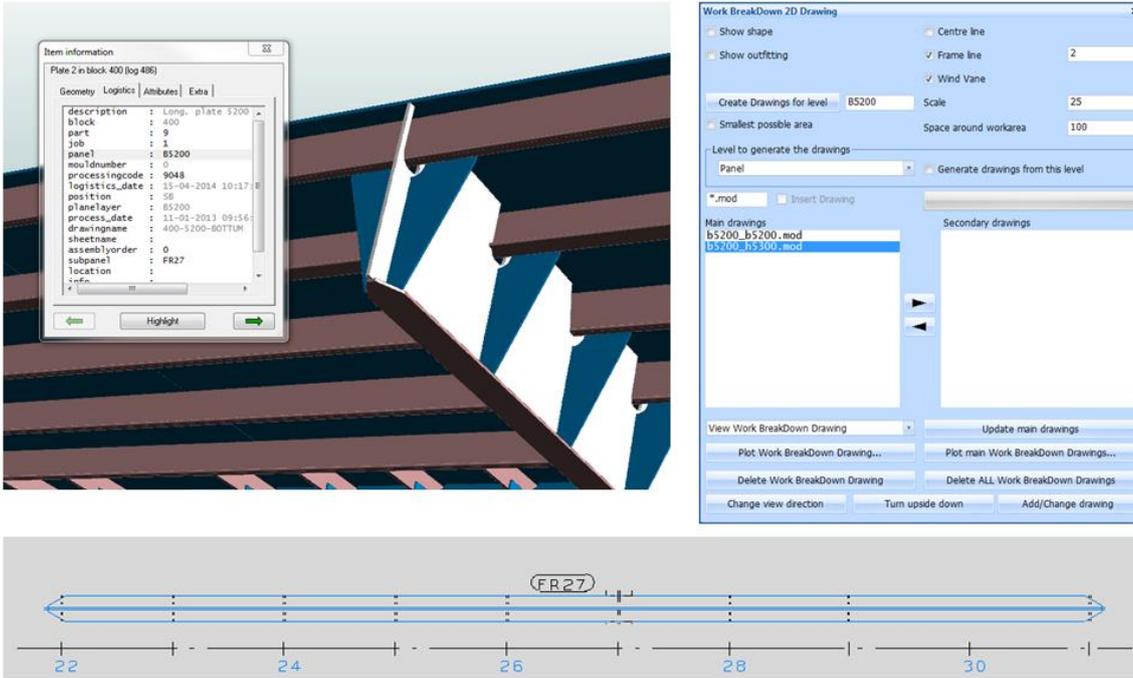
Additional feature in the Insert Multiple Hull Lines Wizard

The Multiple Hull Lines Wizard in the Shell application, which allows the user to easily create multiple longitudinal hull Lines by defining the interspaces (patterns) between the hull lines, has been extended with an extra 'Table' tab. With this tab the user can check the 'Definition' and the 'Pattern' results in a table presentation and, if needed, make changes before the positions are accepted and the hull lines are created.
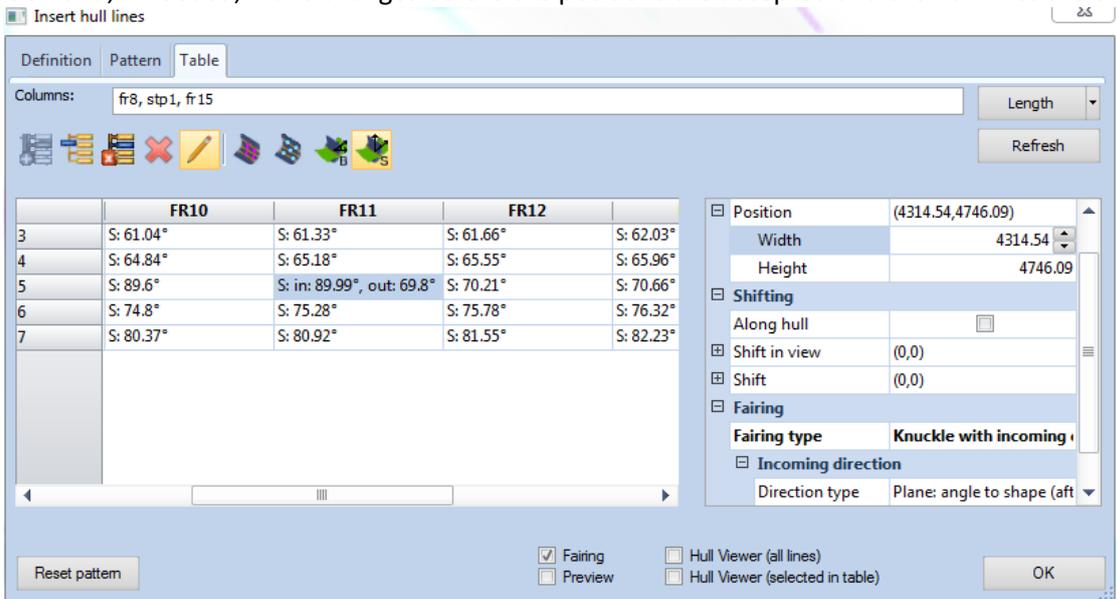
New features in norms type file management

The following new features can be used by the (project) administrator when defining norms type files:

Use of real values instead of previously obligatory V variables

Administrators can now use real values in the type files. It, therefore, is no longer necessary to first assign a V variable to the value. This allows, for example, a cutout type 106 in our default norms (on the left) to be simplified (on the right). In older CADMATIC Hull versions this would result in incorrect presentations:

New additional variables for plate thickness, profile height and profile thickness

For lug and cutout type files the following variables are available:

- **TB** contains the body thickness of the profile or the shell frame passing through the cutout
- **TF** contains the thickness of the flange of a shell frame or profile passing through the cutout. If the profile type has no flange then TF is zero.
- **TH** contains the thickness of the plate, the profile or the shell frame containing the cutout.

These thicknesses are used to define the plate, profile or shell frame without any compensation for slanted crossing parts as is done for H1 and B1 variables that are normally used.

IF statements for W lines (for cutouts and lugs)

The W-line in the type file of a lug and cutout can now be made conditional with one or more optional **IF** statements. The first W-line containing an IF condition that is valid is the actual used W-line. If none of the IF conditions are valid, the next one without an IF condition is the W-line that will be used, for example

```
IF TB < V8 : W -1 ALM 1
IF TB < V9 : W -1 AH10 1
W -1 ST42 1
```

It is also possible to use an **ELSE** statement, for example

```
IF TB < V8 : W -1 ALM 1
ELSE W -1 ST42 1
```
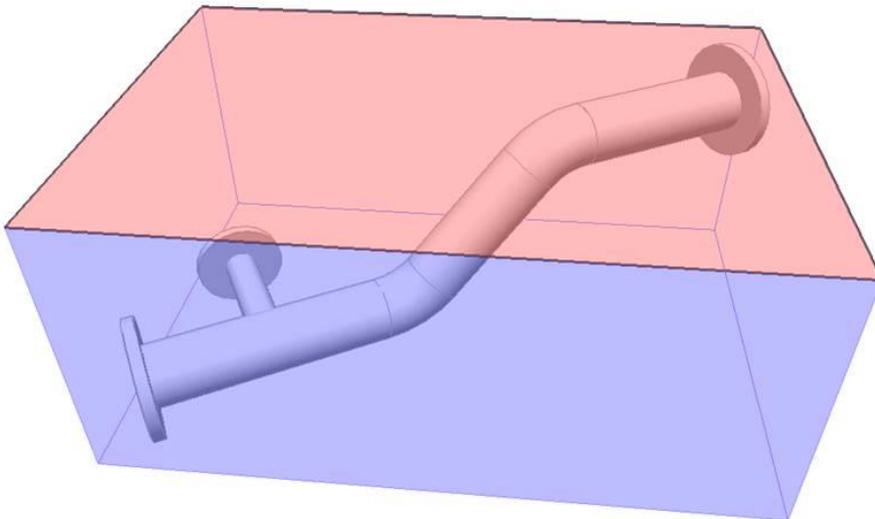
CADMATIC Outfitting/Plant

Checking pipes for production

Use of Spool Production Check

When exporting isos/spools to Piping Isometrics & Spools the system automatically does a spool production check and alerts the user if there are spools that cannot be produced, for example due to being too large to fit in a galvanization tank.

First type of check implemented - Volume Check Settings

The volume check settings define the volume of the galvanization tank and the used model query which defines if a spool is galvanized.
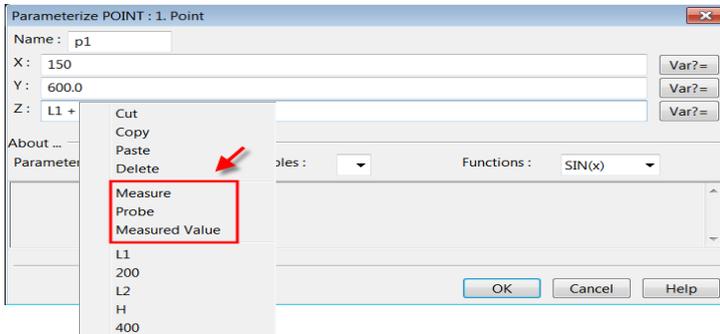
Measuring and Probe commands

Measuring and Probe commands are available in the right-click menu for every relevant length and angle type fill-in field. This makes it easy to use measured distances, lengths of polylines, angles and extracted dimensions when inputting values or parametric expressions for example in Component Modeller.


The probe function provides allows users to extract dimensions of objects in a model without directly picking two points in the 3D space. Probe can be used to define an object's thickness at location, object's extents at location or extents along a line. For a set of objects the user can get dimensions from the bounding box. The measuring angle provides enables the computation of angles in standard planes.
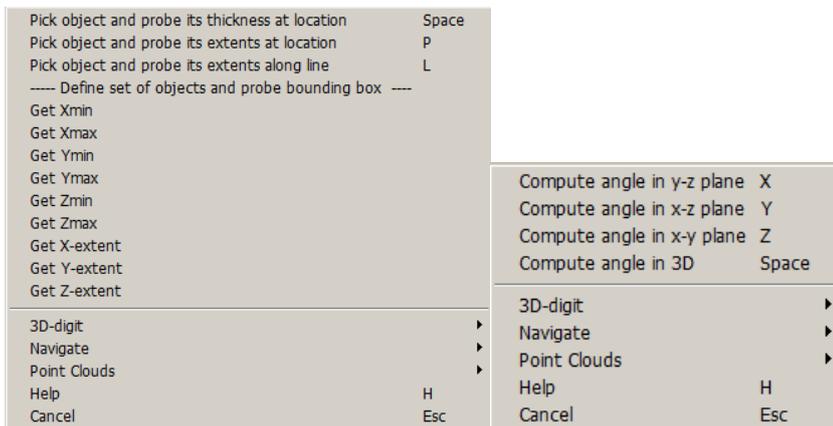

Cable Tray Specifications

All bends except 90 degree bends are now enabled in the Cable Tray Specifications. There are new fixed Functional Codes for 15, 30, 45, 60 and 75 degree bends components.
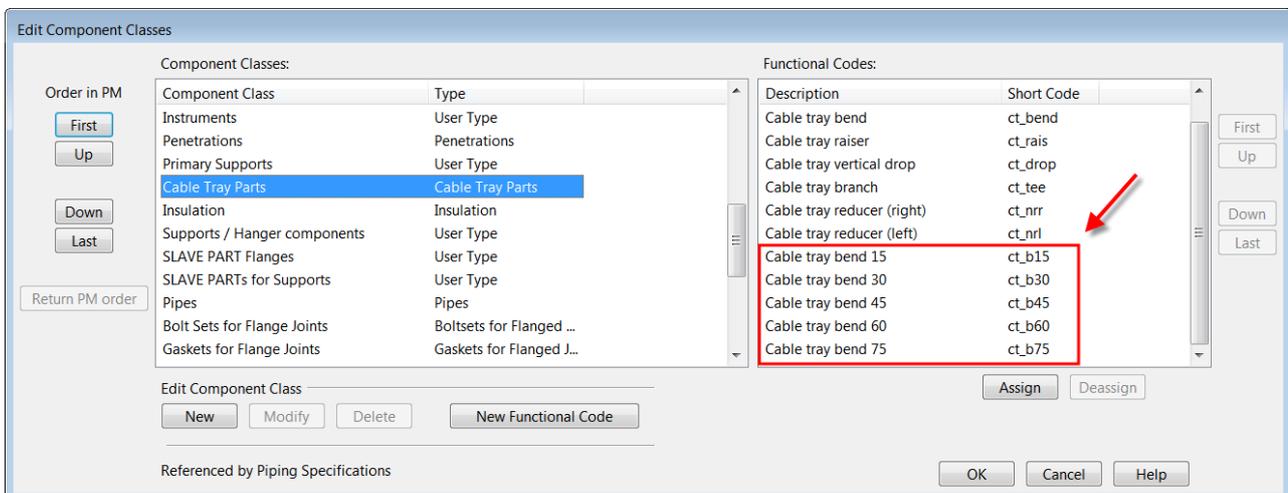
Piping Isometric Drawings and Spools

Updated Parts

It is easy to see updated parts in Isometric & Spool Drawings by using the new option to "Use update colors when editing iso". Updated and new parts are shown in red and unchanged parts are shown in green. Isometric Drawings and Spools are naturally updated only when there is a special need to keep manual additions in drawings. Normally drawings are recreated.
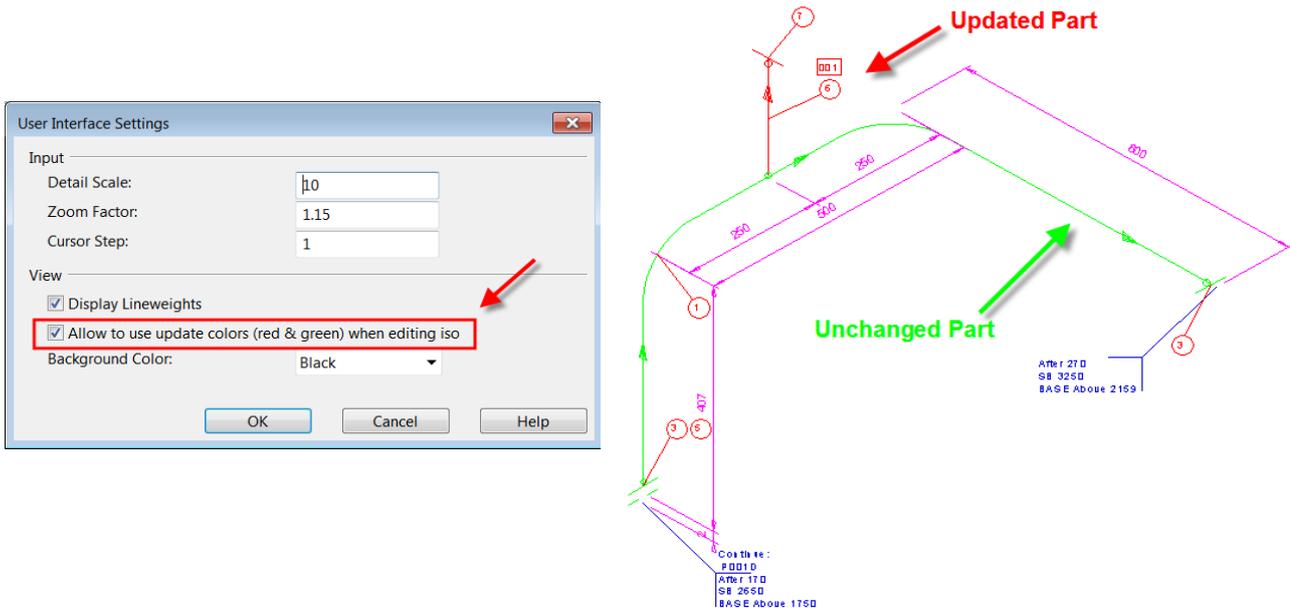

Triangle marks

Automatic Annotation setting for the Triangle of Isometrics and Spools to Insert Actuator Angle for Valve.
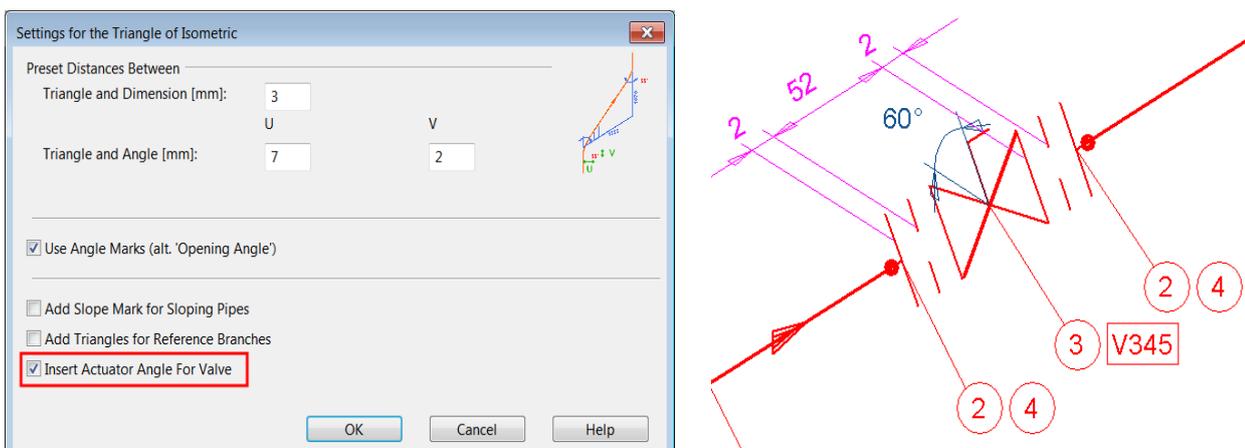

Unique Part Numbering

A new option was added for Part Numbering "All Parts Get Different Part Number". This enables unique part numbering also for parts without any tags to separate them. For example, Add-on Components like backup flanges do not have Object Ids, which could be used as separate tags. Now they can have unique part numbering using this new option.
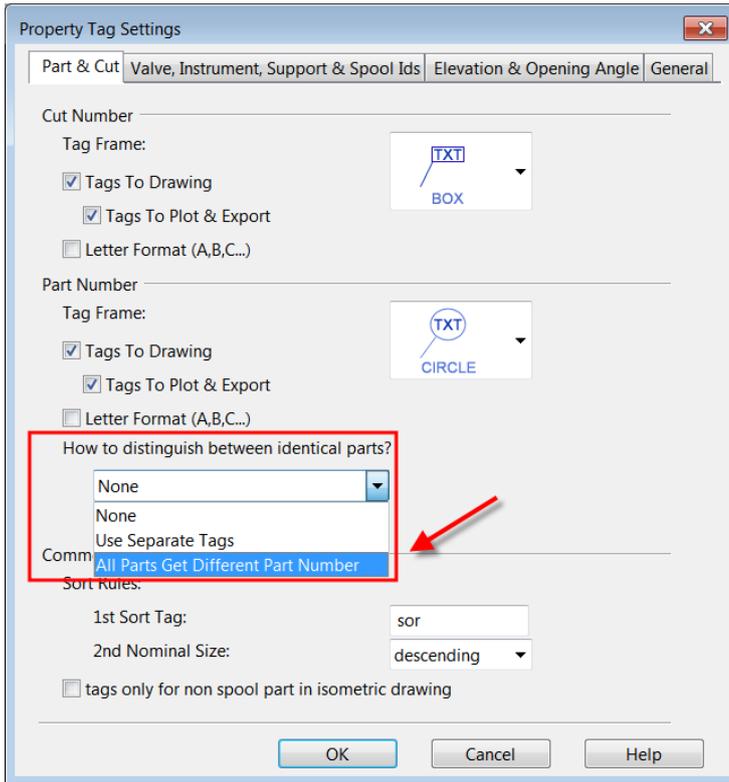
Information management

eShare – Creating new projects made easy

eShare features a new functionality that allows administrators to easily import and export the whole project configuration. This makes setting up several projects easier, if the projects share a similar configuration. This is especially useful, because the built-in adapters now allow using the project name in the connection strings, queries and URL templates, which means that in the best case scenario the same configuration can be used in all the projects. To make using this feature easy, eShare allows the use of one of its existing projects as a "template project" for new projects. eShare automatically creates the new project so, that it has the same configuration as the parent project.
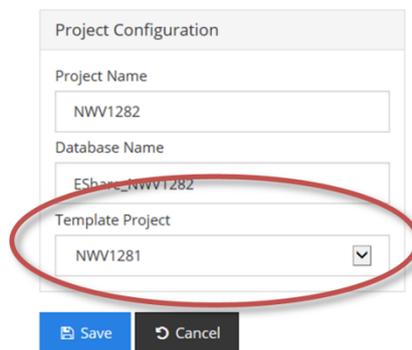
Using an old project as a template for a new one simplifies creating projects.

## eShare – Printouts of the 3D models and attributes to be taken to the site

eShare has a new feature which allows users to print images of objects with all its attributes. Also graphs can be printed. The printouts can be given to sub-constructors as hard copy to the site and used as references or as conversational items when access to the actual system is not available.
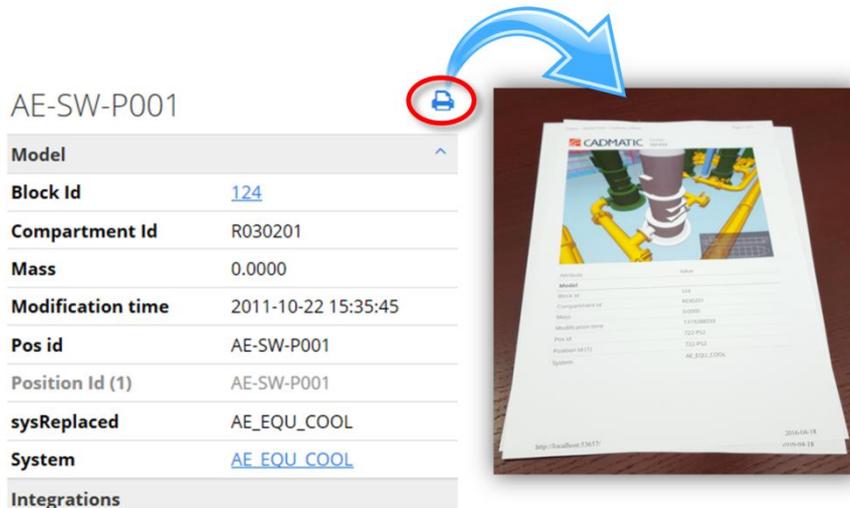
3D view and related attributes can be printed for use when eShare is not accessible.

eShare – Better control over what users see by default

The administrator can now configure default columns for document lists so that occasional users don't have to do configurations to get the information they need. Using the document tree is more efficient, as the administrator can now configure it to show all the documents on the upper levels of the tree. Administrators can also define rarely used model attributes to be hidden by default, and users can then chose whether they want to see the attributes or not on a case-by-case basis.
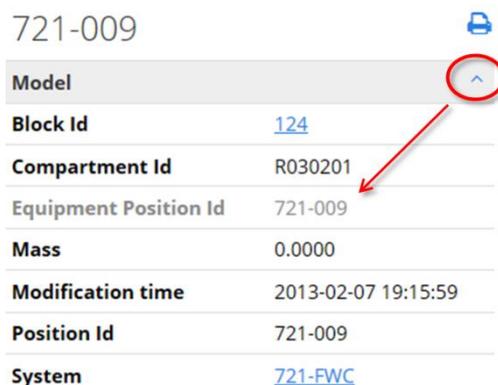
Rarely used attributes and duplicate information can be hidden by default, and shown only if the user so desires.

eShare – Documents that come from design applications can be removed

The project administrator can remove managed documents from eShare without removing the documents completely from the design applications, which is useful if you want to keep the document history, but not to publish it for occasional users.

eShare – Numerous usability improvements

- Search results show document links for items only found in documents.
- Administrator can set the name and the color for the default category of statuses.
- URL API accepts project name instead of project id.

eGo – usability improvements

- User can switch between model hierarchies.
- User is able to see status tracking of a group object when navigating through the model tree or search.
- User can toggle the visibility of 3D spaces in examine.
- eGo remembers the address of the eShare server from which the model was downloaded as well as the address of the previous eShare server that it was connected to.

New platforms supported

- eGo is now compatible with Windows 10, both in Desktop and Tablet mode. eGo is also available as a 64-bit version to unleash the full power of 64-bit tablets.