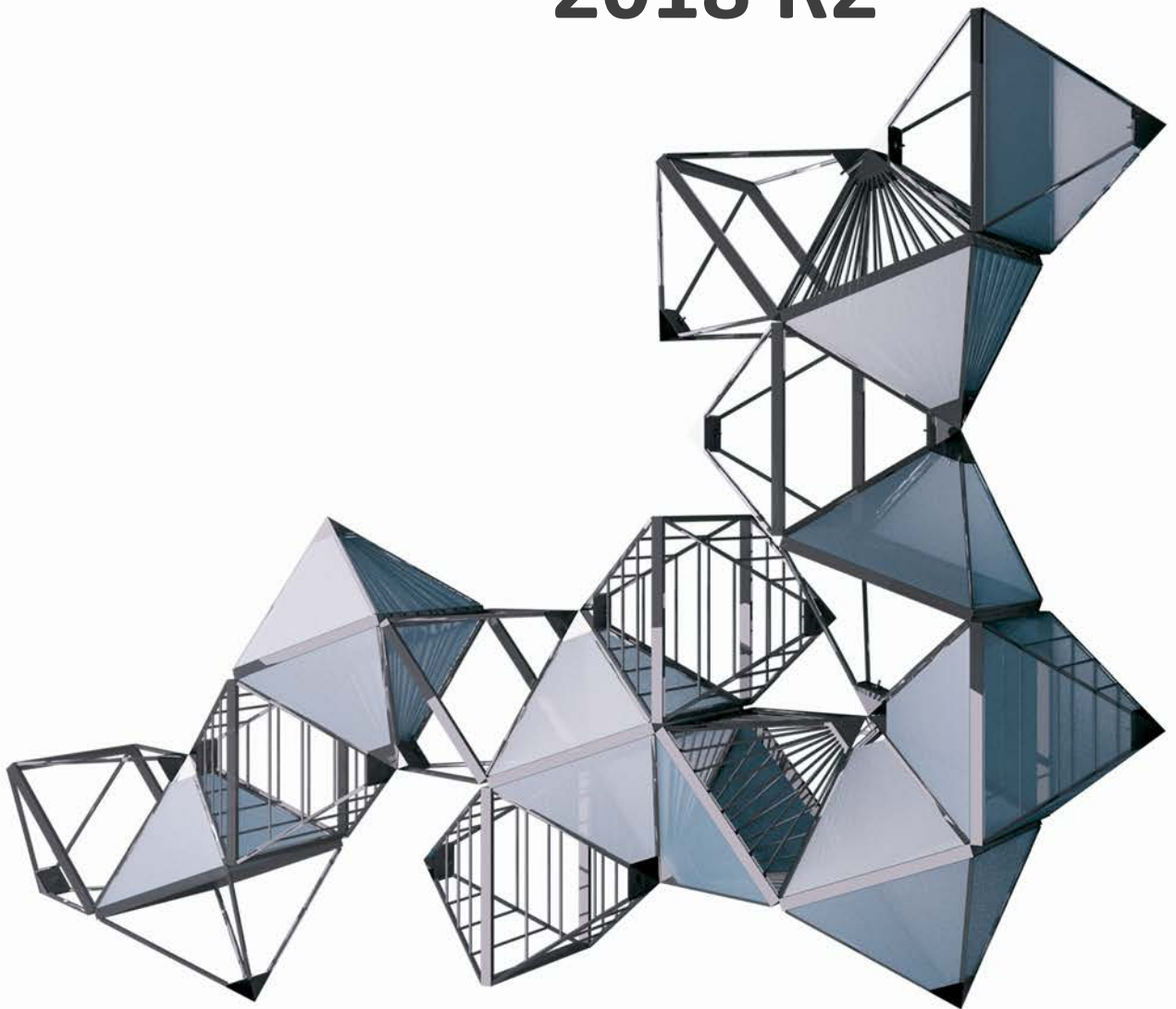


Innovation first

# What's New

 ADVANCE  
**POWERPACK**  
for Autodesk® Advance Steel

## 2018 R2





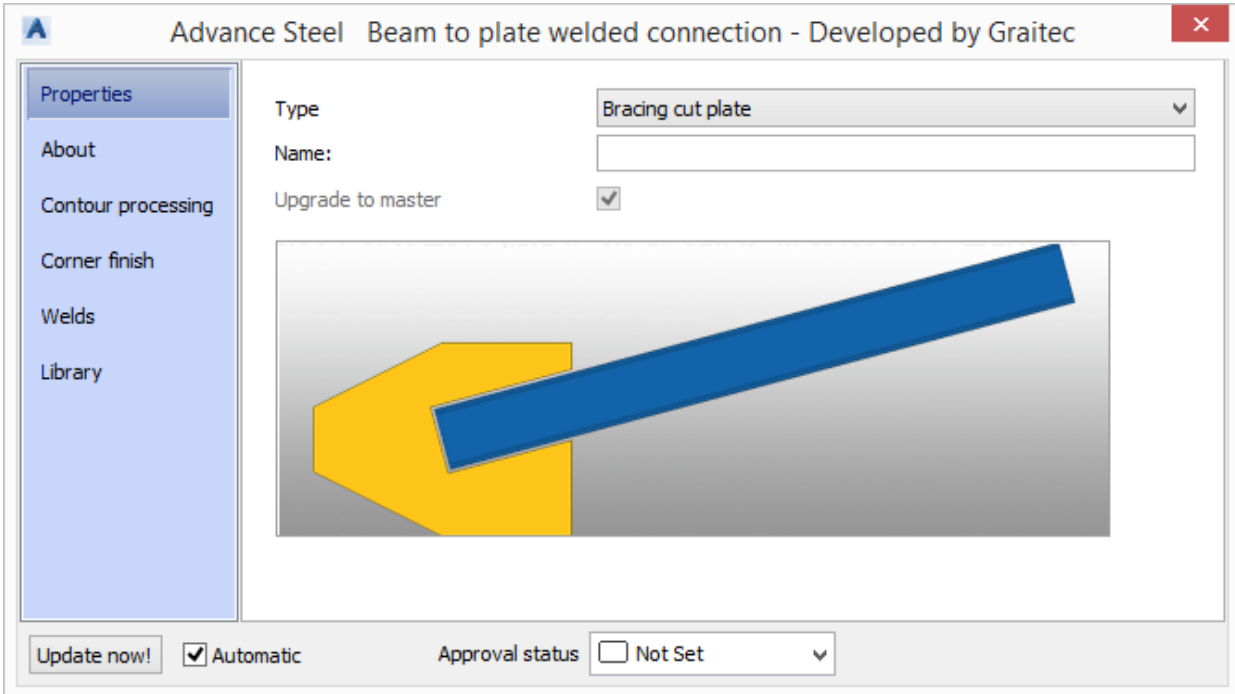
## Table of Contents

<b>NEWS</b> .....	<b>4</b>
Beam to plate welded connection.....	4
Bracing connection to beam or plate.....	4
New cold rolled profiles .....	5
<b>NEWS IN “STRUCTURE DESIGNER” MACRO</b> .....	<b>6</b>
Independent definition of columns for each selected portal frame.....	6
Separate rotation for columns of selected portal frame.....	6
New type of side bracing .....	7
Possibility to rotate purlins by 180 degrees.....	7
Possibility to overlap purlins .....	8
Possibility to select any section types .....	9
<b>IMPROVEMENTS</b> .....	<b>10</b>
"Header beam" joint available for sloped rafters .....	10
"Tube to tube connection" joint improved to work on polybeams.....	10
“Curved End Plate” joint – bolts are now properly arranged .....	11
Library for “Plate/grating stiffeners” joint.....	11
Castellated/ Cellular/ Beam with openings.....	12
New options for “Export model to ACIS” command.....	12
Miscellaneous improvements & corrections: .....	13

## News

### Beam to plate welded connection

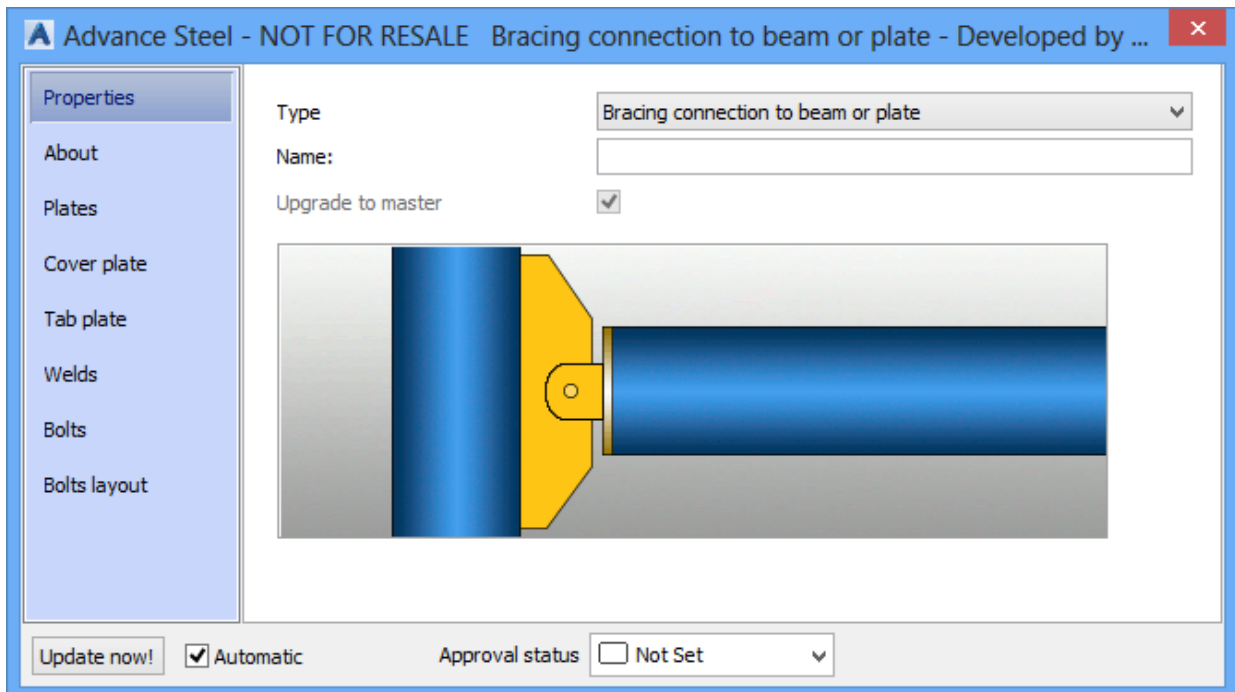
The 2018 R2 version of Graitec PowerPack for Advance Steel comes with the new beam to plate welded connection joint, specially designed to create a parametric feature between a plate and a beam.



*Note: The beam can be shortened or it can take into account existing shortenings.*

### Bracing connection to beam or plate

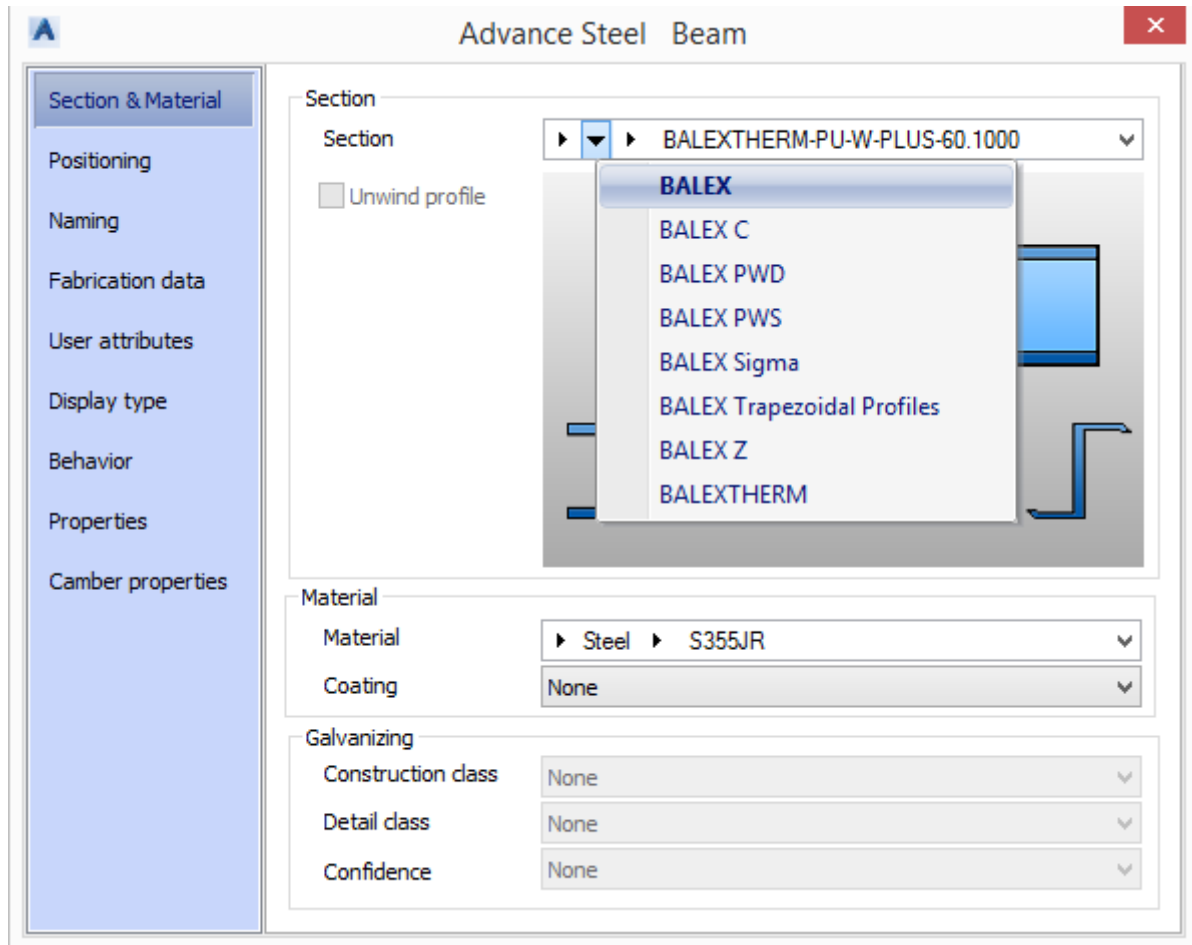
A new joint “Bracing connection to beam or plate” located on the *Connections* panel allows the creation of a special connection for bracings.



*Note: The main element can be a beam or a plate.*

## New cold rolled profiles

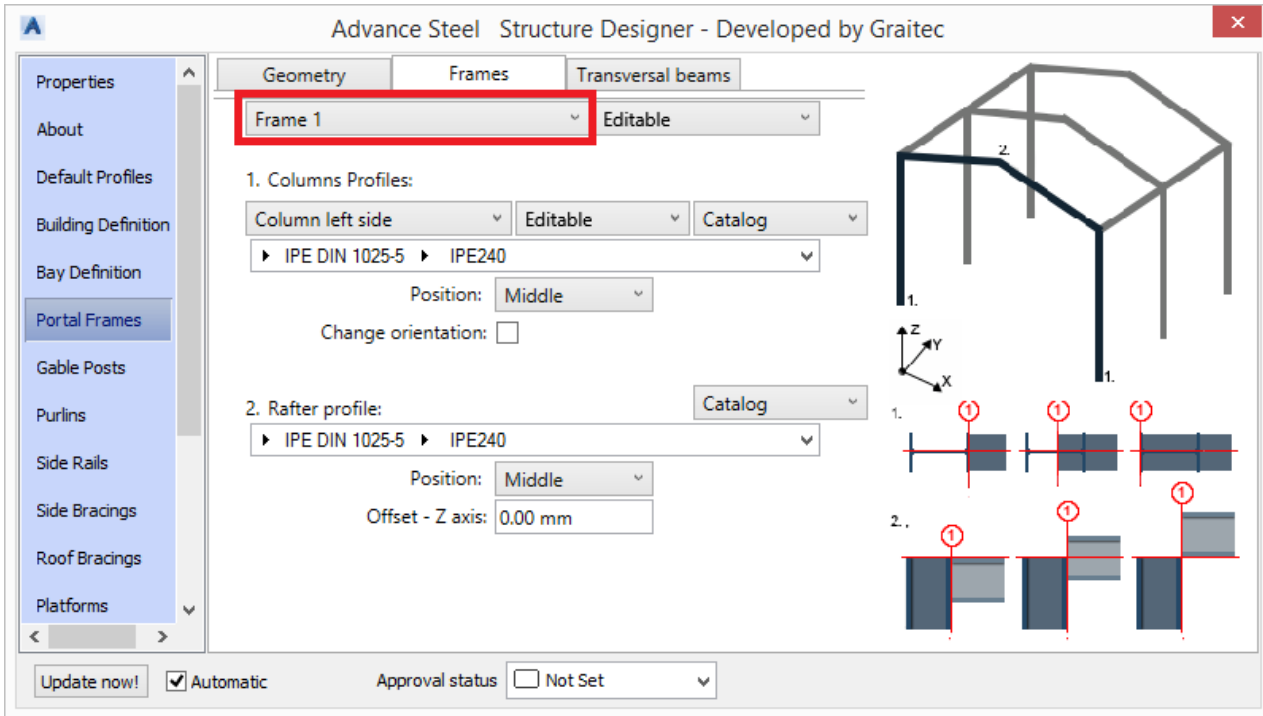
New cold rolled profiles (C and Z sections) are available from BALEX manufacturer.



## News in “Structure Designer” macro

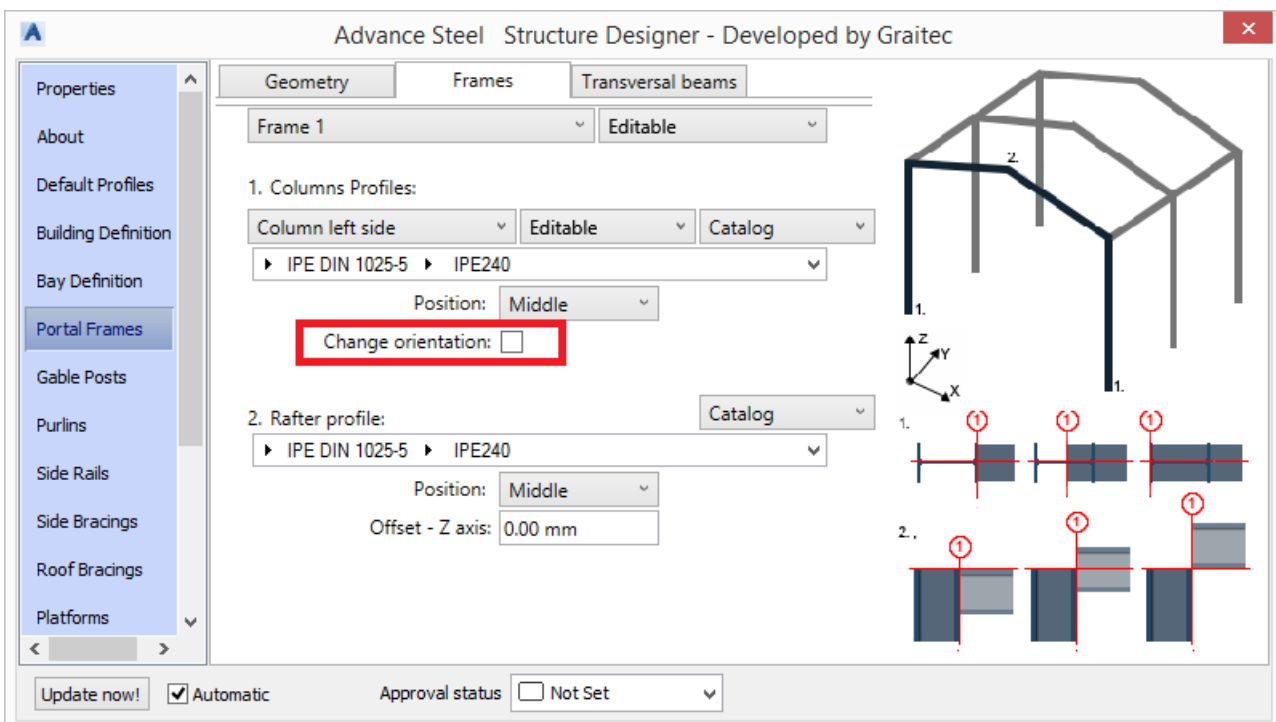
### Independent definition of columns for each selected portal frame

A new option regarding the selection of a frame for columns definition is available on the *Profiles* tab under the *Portal Frame Definition*. It allows defining columns independently for each selected portal frame.



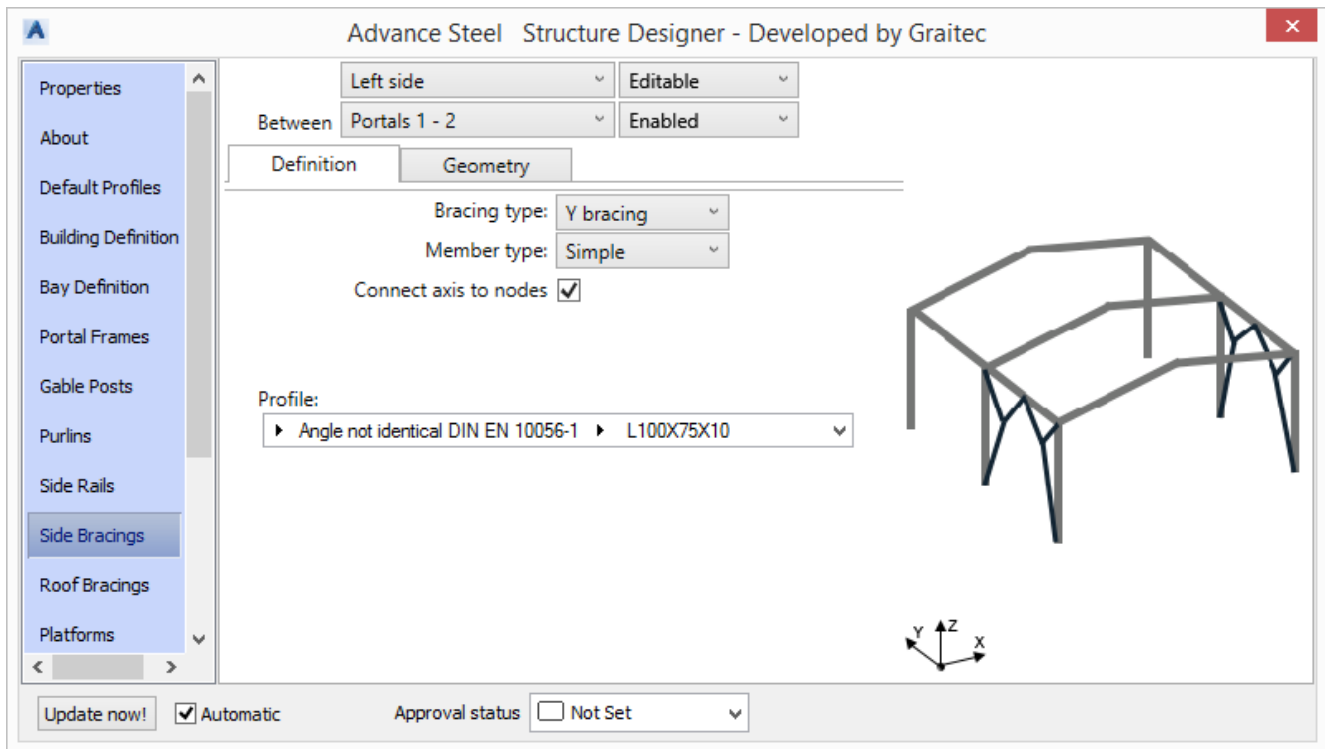
### Separate rotation for columns of selected portal frame

The new option *Change orientation* is located on the *Profiles* tab under the *Portal Frame Definition* and it allows the individual definition of rotation around the axis of the column cross-section for each selected portal frame. The column's orientation can be set separately for each frame and column.



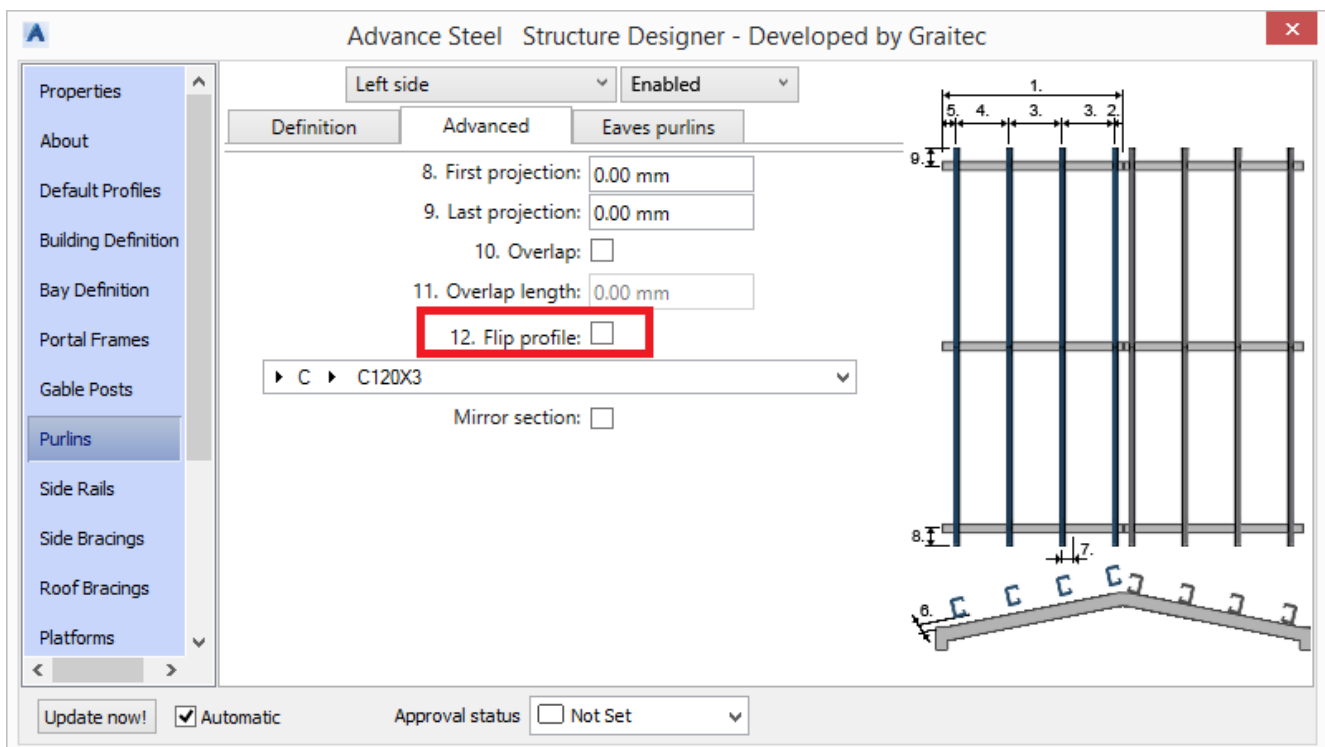
## New type of side bracing

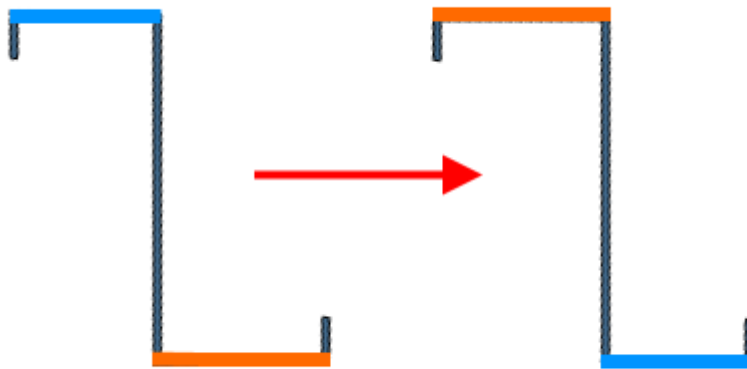
A new type of side bracings named *Y bracing* is available on the *Definition* tab under the *Side Bracings*.



## Possibility to rotate purlins by 180 degrees

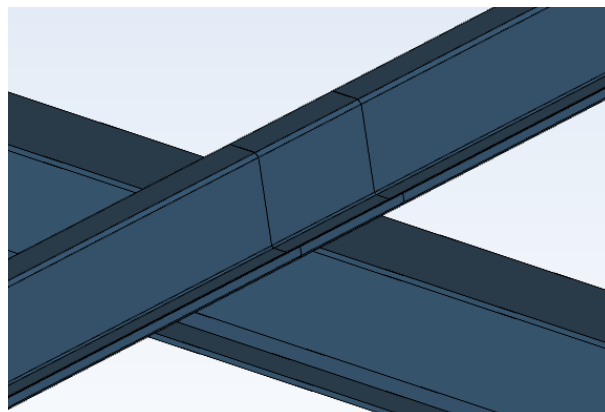
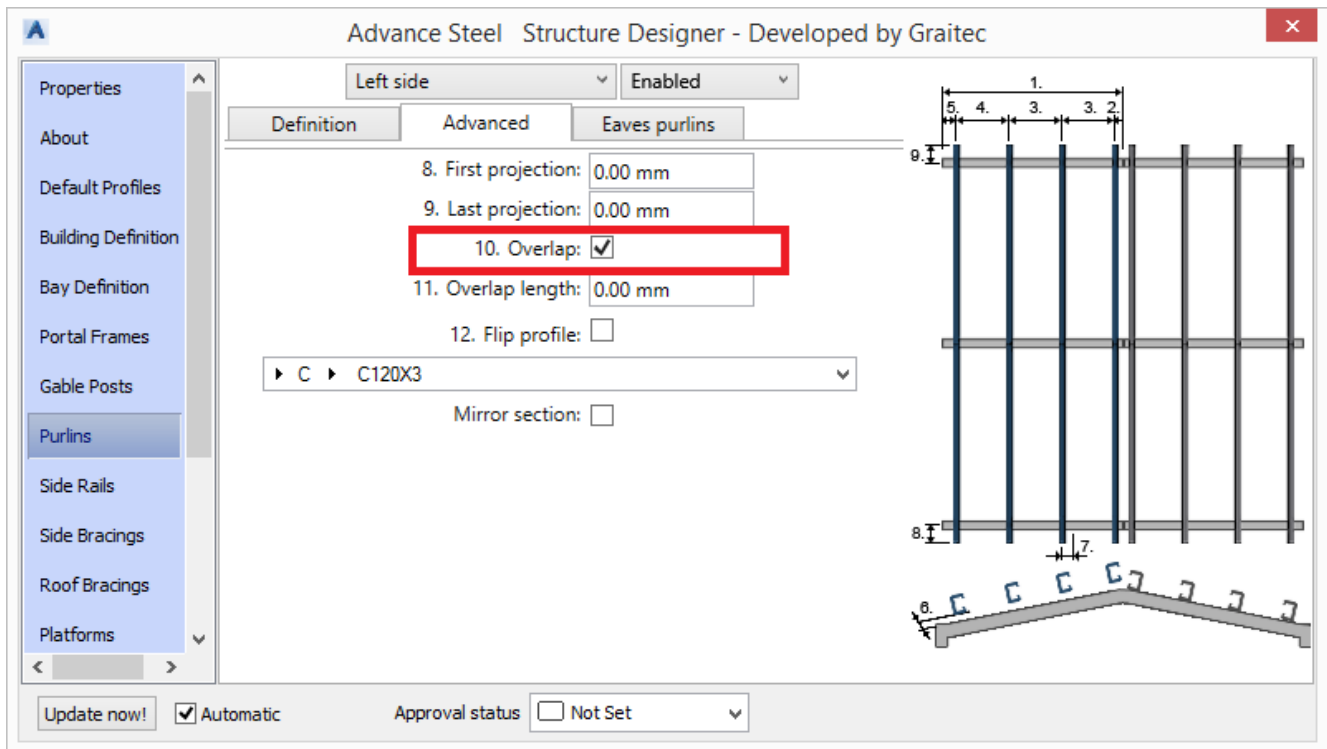
The new option *Flip profile* is located on the *Advanced* tab under the *Purlins*, and it allows purlin sections to be rotated 180 degrees along the axis. The option is important for non-symmetrical profiles (including some types of cold formed Z sections).





### Possibility to overlap purlins

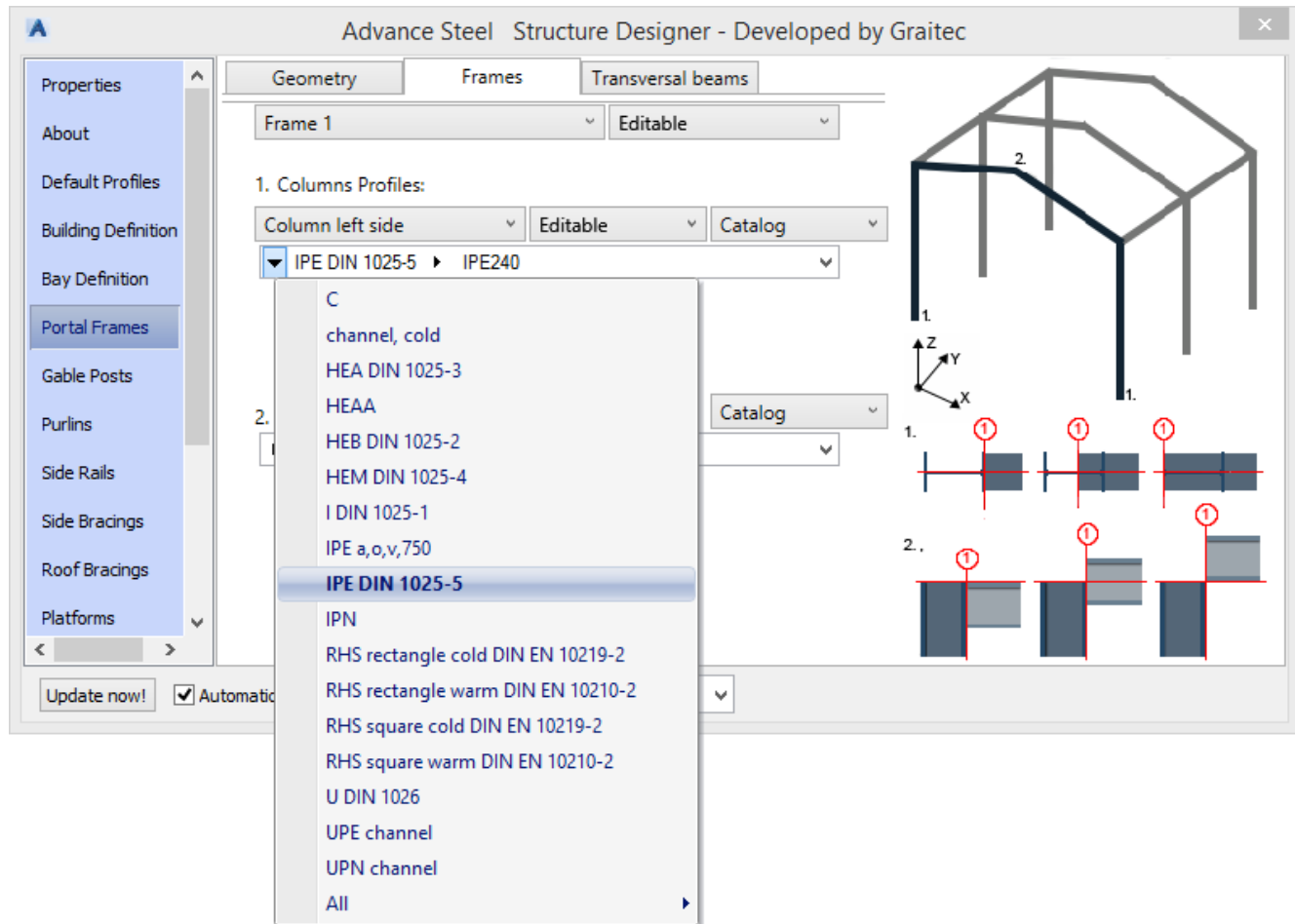
A new option for overlapping cold rolled members between each rigid frame is available on the *Advanced* tab under the *Purlins* tab.





## Possibility to select any section types

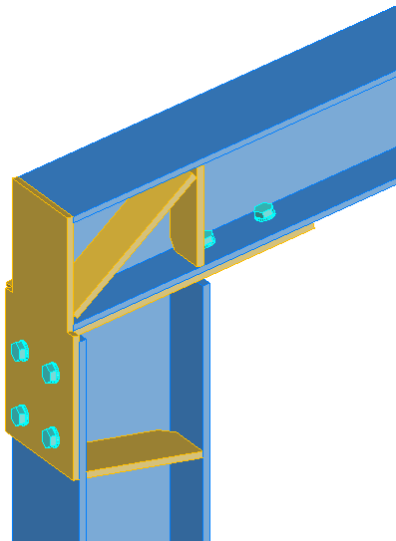
A wide range of cross section types is now available for linear elements (including columns, rafters, purlins, bracings, etc.).



## Improvements

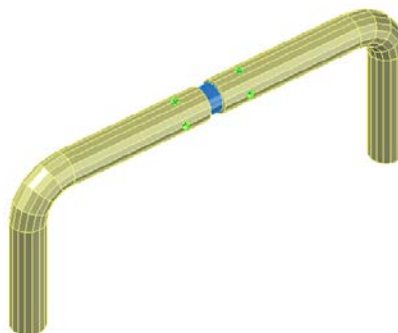
### "Header beam" joint available for sloped rafters

The "Header beam" can now be used for sloped rafters as well.

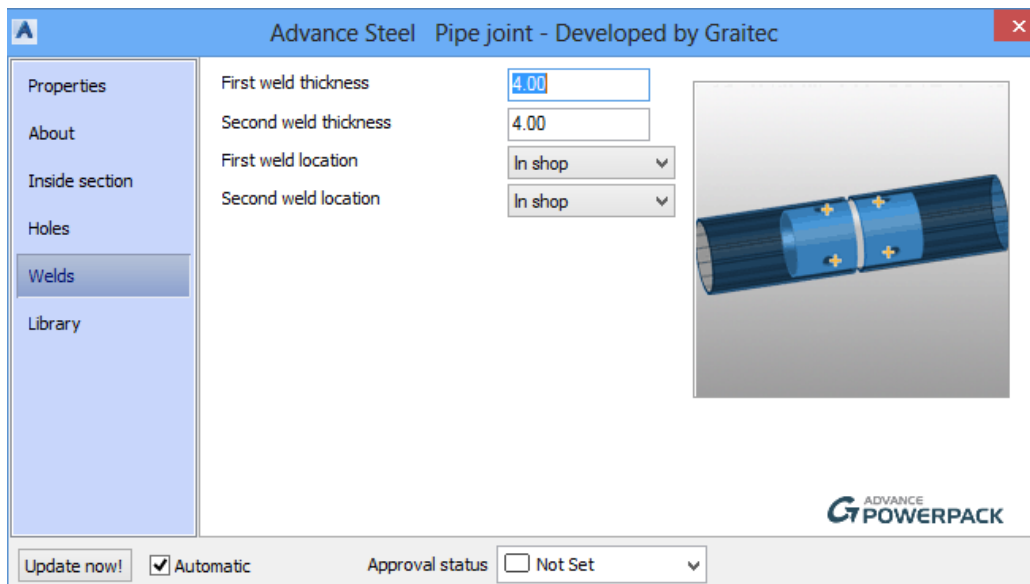


### "Tube to tube connection" joint improved to work on polybeams

The joint's functionality is expanded to include elements created as "polybeams". For example, handrails with elbows included can be joined to abide by the maximum length of profiles.

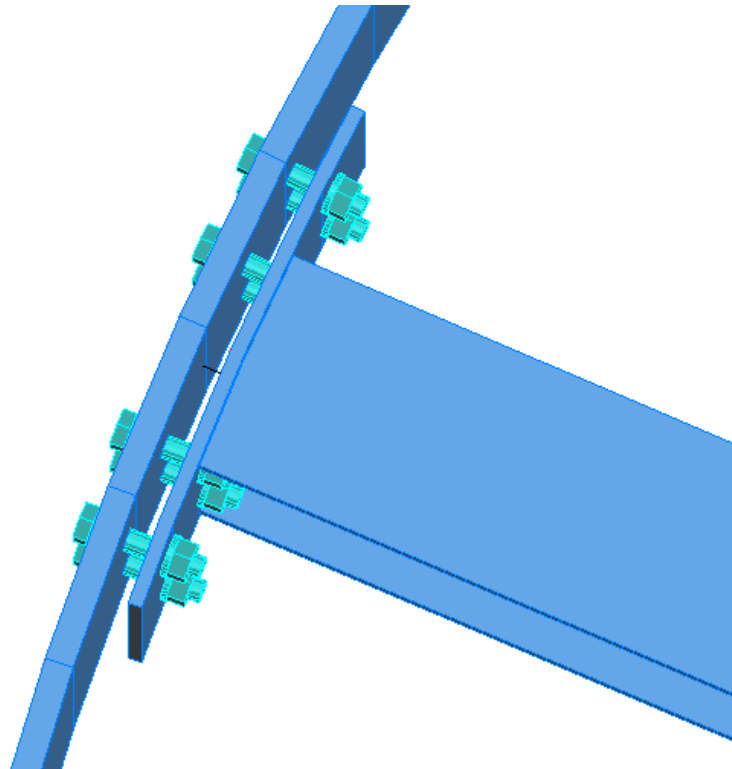


In addition, a new feature was created to allow the weld location to be set separately for the first and second element.



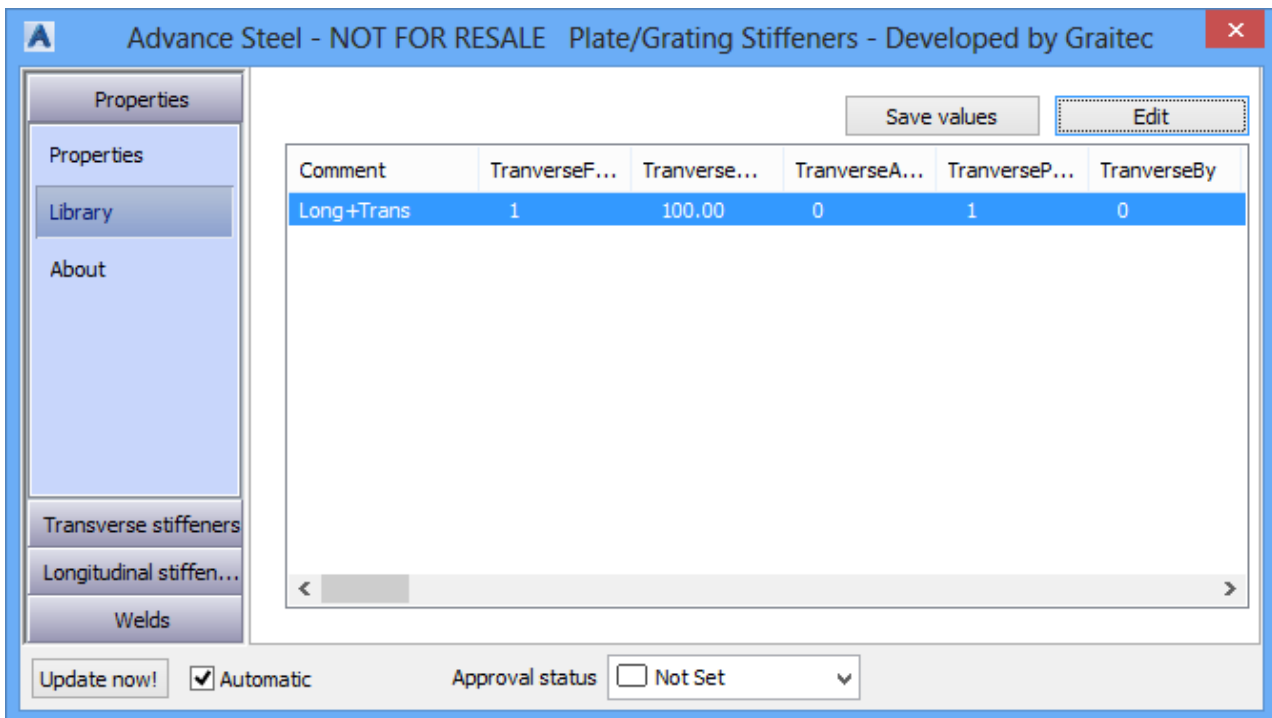
**“Curved End Plate” joint – bolts are now properly arranged**

“Curved End Plate” joint - bolts’ positioning was corrected for cases in which the clearance between the main beam and plate surpassed 10mm.



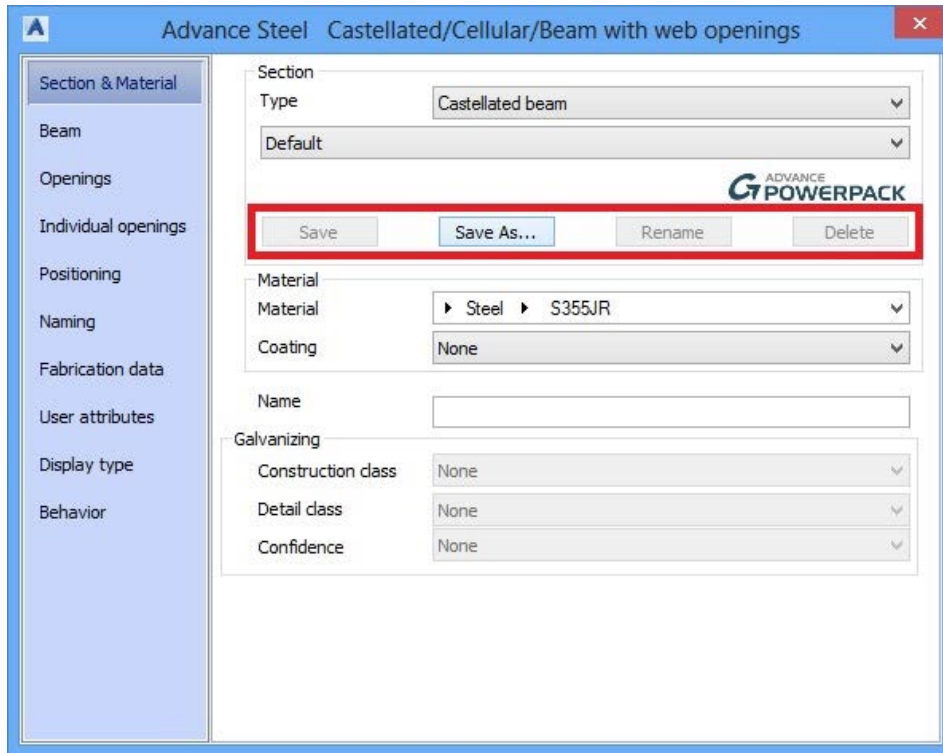
**Library for “Plate/grating stiffeners” joint**

Any configuration can now be saved in a library.



### Castellated/ Cellular/ Beam with openings

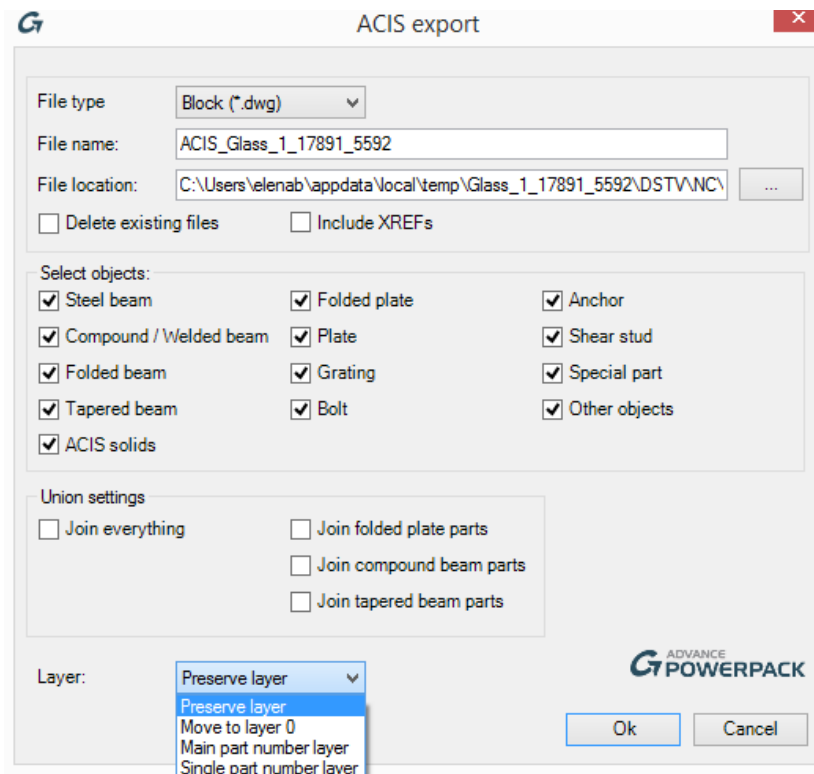
A new option was added for saving castellated/ cellular/ beam with openings elements.



### New options for “Export model to ACIS” command

Starting with the 2018 R2 version of PowerPack for Advance Steel, new options for layers in “Export model” command as “.dwg” format are made available:

- move parts to layer according to their single part number
- move parts to layer according to their main part number



**Miscellaneous improvements & corrections:**

- Correction of XREF position after “Export model” as ACIS function;
- Correction of XREF layer after “Export model” as ACIS function;
- Correction of exploding folded plates;
- Correction of “Explode details” and “Explode drawings” commands;
- Correction of “Cloud link” command.



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