### 2.4 BIM Management Tool

The BIM Management Tool (BMT) allows us easy handling in dealing with IFC and the BIM method. It can be accessed from the Windows menu: "Window" -> "BIM Management Tool" or by clicking on the "Storey/BIM Manager" button. The active floor is indicated to the right of the button. In this case, any elements I add are added to the storey "Storey 1".

## **3D file structure in the BIM Manager**

First, we'll look at the structure of 3D in the BIM Manager.



The first BIM Manager tab shows the contents of the 3D file. Right-click to activate the building or floor. The active floor is highlighted in bold!

Tip:

Stories and Buildings can only be deleted if they are empty, means no elements are assigned to it. Additionally, at least one Building with a Storey will be retained in the working file!



1. Edit Storey or Add new building/storey.

😵 Geschoss editieren			×
Name Geschoss	DG		
Geschosshöhe (Z)	5600.0		
Dicke Fertigfussboden	100.0		
Ok		Abbrechen	

- 2. Visibility, show and hide elements. Also works by IFC type
- Activate, tree structure By selecting the Activate elements or Deactivate elements buttons, you can control the state of the elements. Minimize or maximize the tree structure.
- Display storey information Here you can choose whether information such as finished floor thickness and floor height should be displayed. With "Show one", visibility is limited to a single storey.
- 5. Opening the BIM 3D manual

Tip:

Bidirectional activation switches to the currently active element in 3D.

# **IFC** file structure in the **BMT**

We're now in the IFC file tab.

Tip:

With the IFC license, you can import a single IFC. With the "BIM Manager" license, you can import several IFC files at the same time.



- 1. Visibility, show and hide elements. Also works by IFC type
- Activate, tree structure By selecting the Activate elements or Deactivate elements buttons, you can

control the state of the elements.

Minimize or maximize the tree structure.

3. Create element & BCF

Elements from imported IFC files are displayed as "Connected IFC object" elements and can be converted into cadwork elements. In this way, they can be used for planning purposes (e.g. as reference elements). By clicking on Add element to cadwork, the selected elements are converted into cadwork elements. In the IFC structure, they are grayed out and added to the 3D structure.

4. IFC settings

Bi-direktionale Aktivierung springt jeweils zu dem momentan aktiven Bauteil im 3D.

IFCimport settings and adaptations.

Mapping IFC properties allows you to map IFC structure attributes. View by type allows you to change the display in the BMT according to IFC type or IFC hierarchy.

5. Opening the BIM 3D manual

Tip:

IFC elements created (converted) as cadwork elements can be overridden in the BIM Manager in IFC files.



#### Important:

Always check the content of data received in an IFC viewer (QualityGate), then carefully check the accuracy of data imported into cadwork (accuracy, information).

#### IFC viewers : List of different IFC viewers

Conversion can be performed via Modify -> Add element to cadwork or via the context menu in the BIM Manager. Valid elements are converted to cadwork elements after execution of conversion. Invalid elements cannot be converted to native cadwork elements. Invalid means, for example, that the geometry is incorrectly described. Check the data carefully for correctness (accuracy, information).