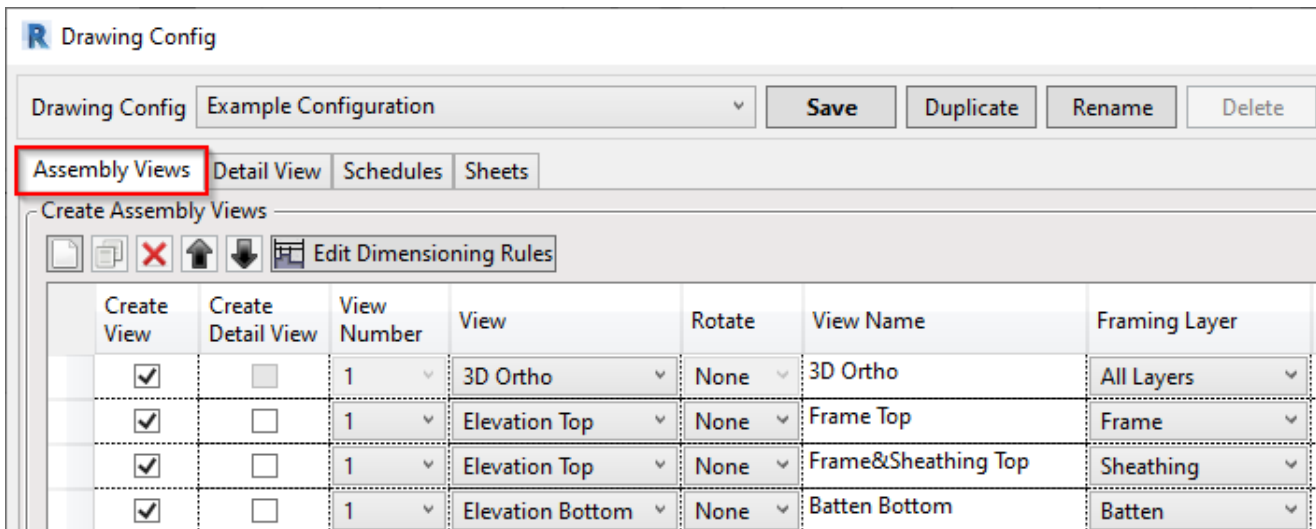
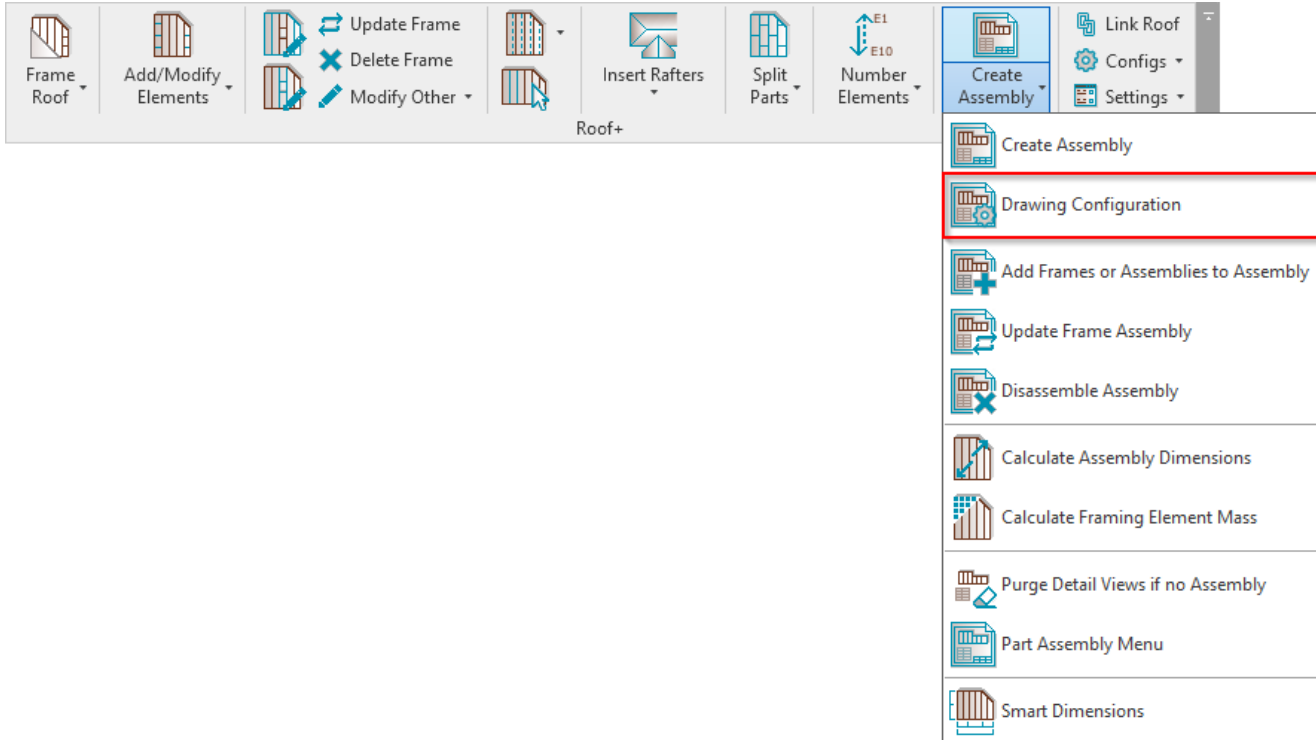


# SHOP DRAWINGS – Drawing Configuration – Assembly Views

Modified on: Sat, 21 Nov, 2020 at 7:22 PM

## Assembly Views



**Assembly Views** – predefine assembly views, view graphical presentation, framing layers, and all other information you want to present.

Create new views by clicking the **New** button. Click **Duplicate** to duplicate the selected view. A full row should be selected to activate this option. Click **Delete** to delete the selected view. Select **Move Up/Down** to move the view within the configuration dialog:

**R Drawing Config**

Drawing Config: Example Configuration Save Duplicate Rename Delete

Assembly Views: Detail View | Schedules | Sheets

Create Assembly Views

+ + ✗ ↑ ↓ ⌘ Edit Dimensioning Rules

Create View	Create Detail View	View Number	View	Rotate	View Name	Framing Layer
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	3D Ortho	None	3D Ortho	All Layers
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame Top	Frame
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame&Sheathing Top	Sheathing
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Bottom	None	Batten Bottom	Batten

## Create View, Create Detail View

Create View	Create Detail View	View Number	View	Rotate	View Name	Framing Layer	View Template	Dimensioning
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	3D Ortho	None	3D Ortho	All Layers	3D Ortho Assembly	-- None --
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame Top	Frame	Structural Section	Frame
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame&Sheathing Top	Sheathing	Framing - Sheathing	Sheathing
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Bottom	None	Batten Bottom	Batten	Structural Section	Batten
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Assembly Front	All Layers	Framing - Sheathing	Assembly
<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	Elevation Bottom	None	Batten&Sheathing Bottom	Sheathing II	Framing - Sheathing	Sheathing
<input type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Frame Front	Frame	Structural Section	Frame

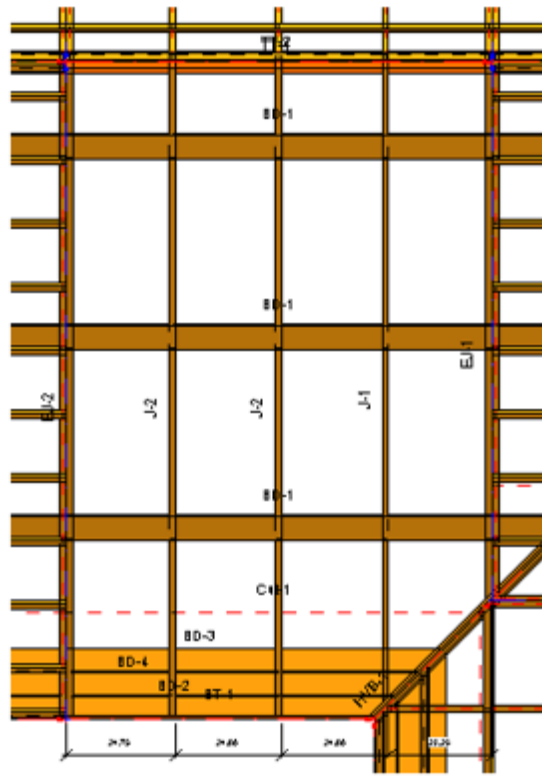
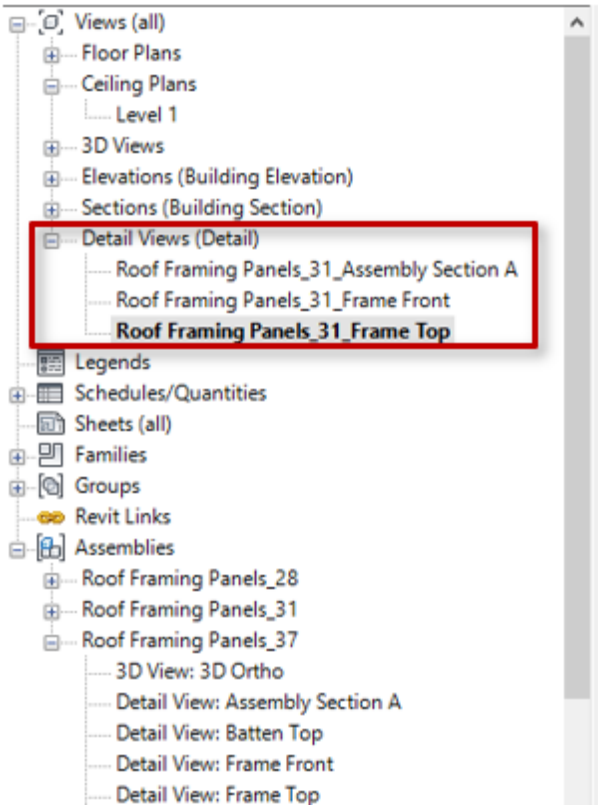
**Create View** – select the views you want to create in the assembly.

Assemblies

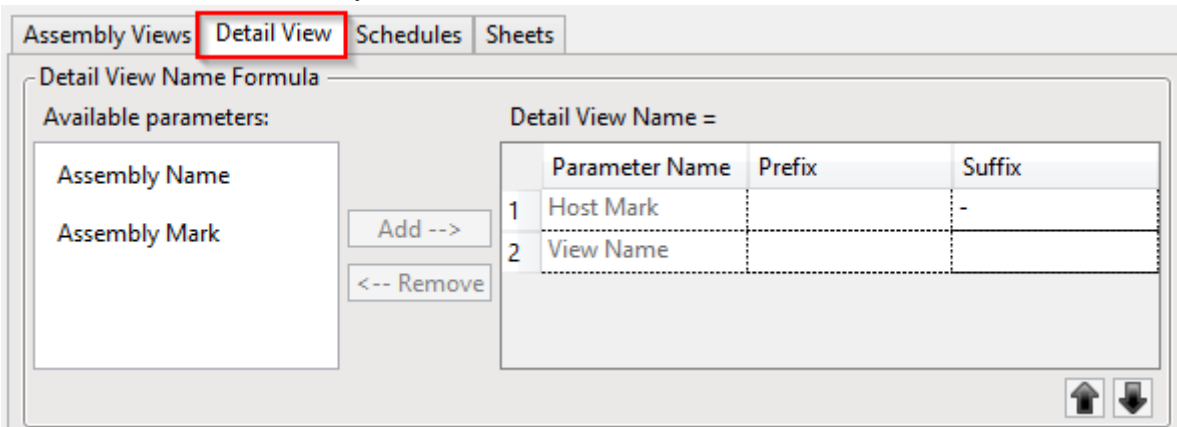
F5

- 3D View: 3D Ortho
- Detail View: Assembly Front
- Detail View: Batten Bottom
- Detail View: Batten&Sheathing Bottom
- Detail View: Frame Top
- Detail View: Frame&Sheathing Top
- Schedule: Assembly Material Takeoff
- Schedule: Assembly Part List
- Schedule: Batten
- Schedule: Bottom Sheathing
- Schedule: Frame
- Schedule: Top Sheathing
- Sheet: F5 -1 - Sheet
- Sheet: F5 -2 - Sheet

**Create Detail View** – whereas with a simple assembly view you see only the assembly itself – in isolation from other parts with which it interacts – Detail Views lets you see how a given assembly relates to other pieces of the pie, like walls, floors, elevations, grids, etc.



The next tab **Detail View** lets you control the view name:



### Views and View Templates

Create View	Create Detail View	View Number	View	Rotate	View Name	Framing Layer	View Template	Dimensioning
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	3D Ortho	None	3D Ortho	All Layers	3D Ortho Assembly	-- None --
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame Top	Frame	Structural Section	Frame
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame&Sheathing Top	Sheathing	Framing - Sheathing	Sheathing
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Bottom	None	Batten Bottom	Batten	Structural Section	Batten
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Assembly Front	All Layers	Framing - Sheathing	Assembly
<input type="checkbox"/>	<input checked="" type="checkbox"/>	1	Elevation Bottom	None	Batten&Sheathing Bottom	Sheathing II	Framing - Sheathing	Sheathing
<input type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Frame Front	Frame	Structural Section	Frame

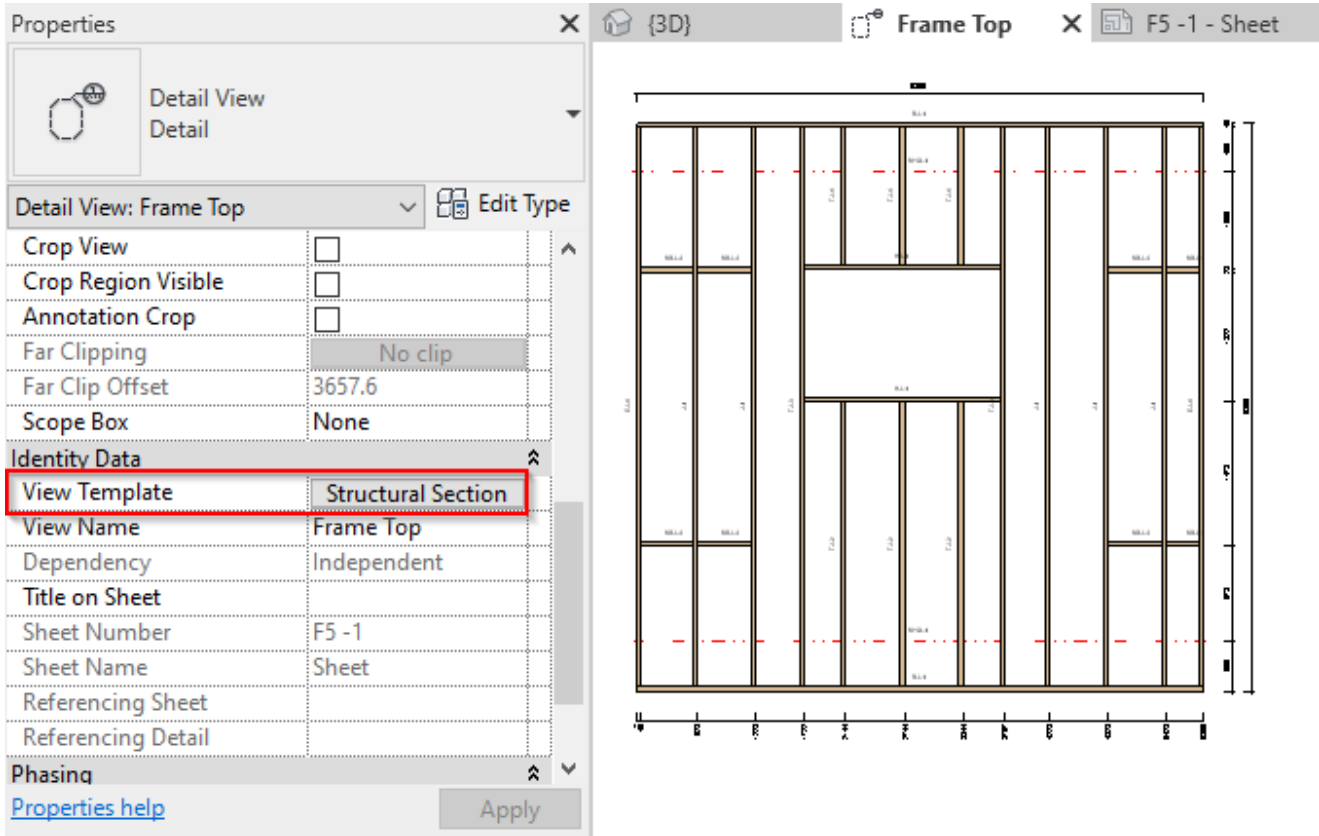
**View** – select the view type to create in the assembly. The list of view types comes from Revit. It can be: section, elevation, plan view, legend, 3D view, etc.

**Rotate** – rotate the view 90, -90, or 180 degrees. Usually used for floors and roof panels.

**View Name** – enter a name for the selected view.

**Framing Layer** – select the framing layer you want to filter in the view. It can be: Main Frame, Vertical Nailer, Horizontal Siding, Sheathing, Log, etc. If None is selected, then all layers will be visible in the view.

**View Template** – select the view template for every assembly view. View templates bring things like scale, graphical presentation, etc. into the view. The list of view templates comes from your current Revit project. You can find and modify your project view templates in **Revit** → **View** → **Graphics** → **View Templates** → **Manage View Templates**.



### Dimensioning Rule

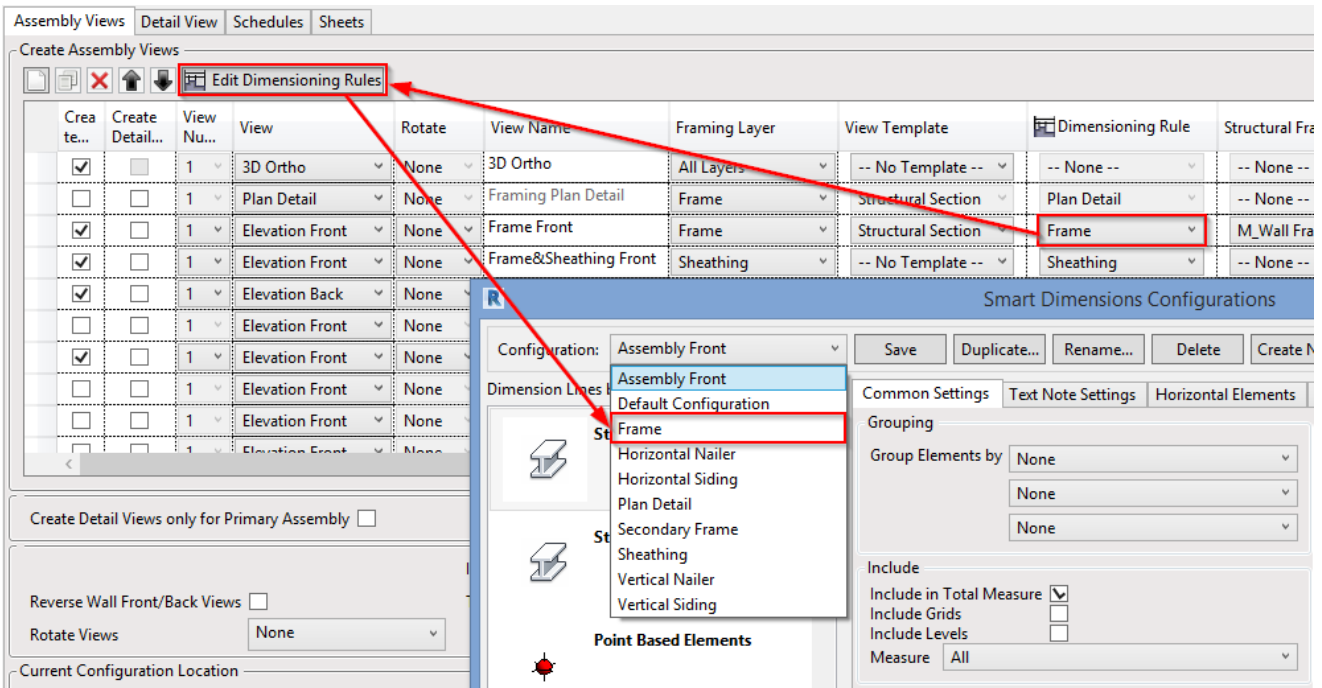
Create Assembly Views

**Edit Dimensioning Rules**

Create View	Create Detail View	View Number	View	Rotate	View Name	Framing Layer	View Template	Dimensioning Rule
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	3D Ortho	All Layers	3D Ortho Assembly	Frame
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame Top	Frame	Structural Section	Frame
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Top	None	Frame&Sheathing Top	Sheathing	Framing - Sheathing	Sheathing
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Bottom	None	Batten Bottom	Batten	Structural Section	Batten
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Assembly Front	All Layers	Framing - Sheathing	Assembly
<input checked="" type="checkbox"/>	<input type="checkbox"/>	1	Elevation Bottom	None	Batten&Sheathing Bottom	Sheathing II	Framing - Sheathing	Sheathing
<input type="checkbox"/>	<input type="checkbox"/>	1	Elevation Front	None	Frame Front	Frame	Structural Section	Frame

**Dimensioning Rule** – dimensioning rules for the selected view. Dimensioning rules are saved under separate names and can be used for other projects.

Dimensioning rules can be created and modified under **Edit Dimensioning Rules**.



**Tags**

Dimensioning Rule	Structural Framing Tag	Sheathing Tag	Structural Connections Tag	Tag Other	GP is Visible	Number of Visible Layers	Views are Visible
Frame	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Frame	M_Floor	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Sheathing	-- None --	Framing Par	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Batten	M_Floor	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Assembly	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Sheathing	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>
Frame	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2	<input type="checkbox"/>

Elements in the views can be tagged. The list of tag families comes from your current project. Sample tags are loaded into your project using **Load Families**:

**R** Select Family Catalogs for Loading

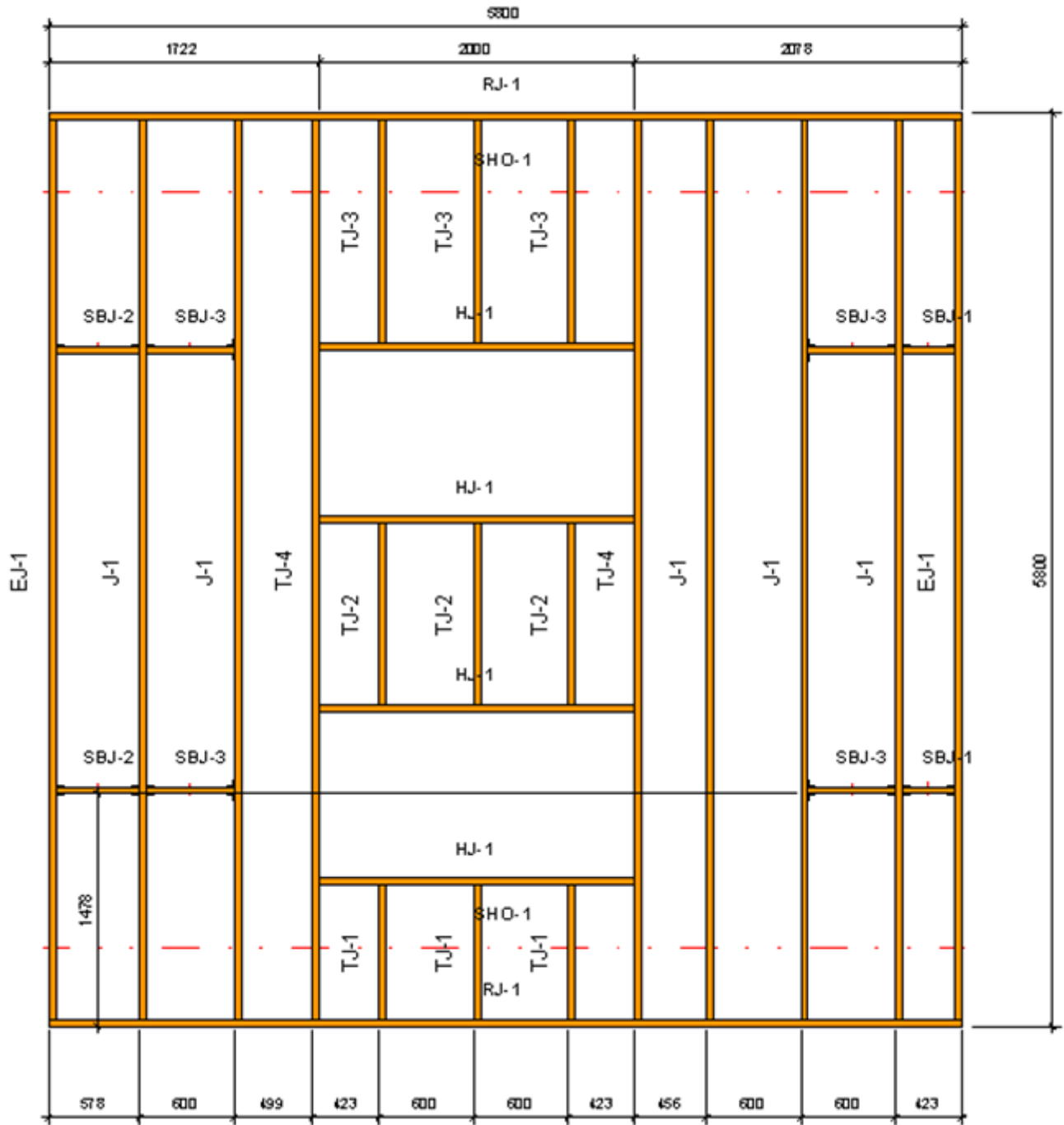
Catalog Name	Load
Main New I-Joists 2020-2021	<input type="checkbox"/>
Main New Joists 2020-2021	<input type="checkbox"/>
New Special Families 2020-2021	<input type="checkbox"/>
Old Main Families 2019-2020 (obsolete)	<input type="checkbox"/>
Sample Details	<input type="checkbox"/>
Sample Roofing	<input type="checkbox"/>
Sample Schedules	<input type="checkbox"/>
Sample Tags	<input checked="" type="checkbox"/>

Notes

Company Catalog Name	Browse	Load
	<input type="button" value="Browse"/>	<input type="checkbox"/>

Overwrite Parameters

**Structural Framing Tag** – select a family for tagging all studs and plates in the view.



**Sheathing Tag** – select a family for tagging all sheathing panels (Parts) in the view.

**Structural Connections Tag** – select a family for tagging all details, like anchors, clip angles, etc. in the view.

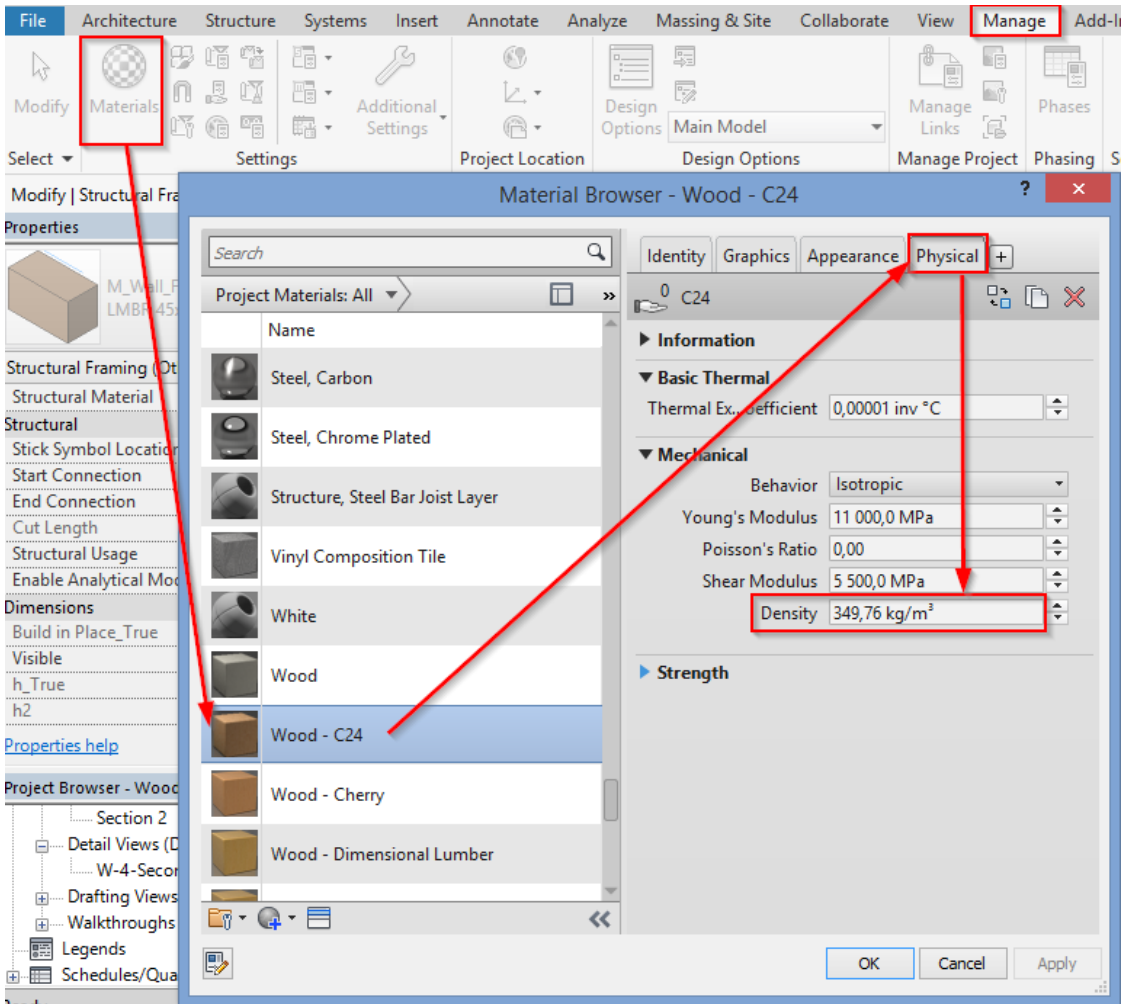
**Tag Other** – tags other elements, like electrical switches, openings, etc. in the view. Tag families come from **Annotate** tab → **Tag All**.

**Gravity Point**

**Roof+** can calculate all element masses and insert the **Gravity Point** at the center of gravity of a given assembly.

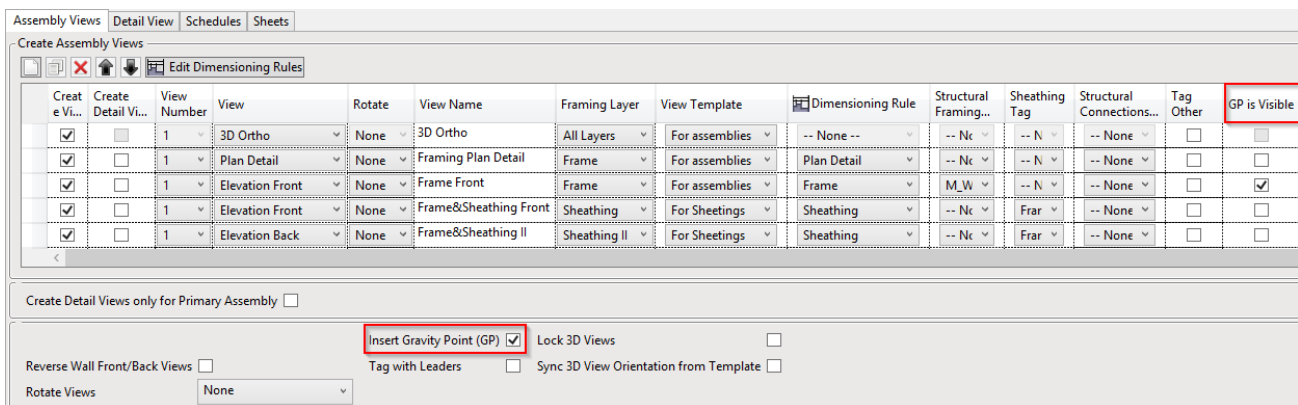
To insert **Gravity Point** into the assembly views, a few requirements must be fulfilled:

1. All elements in the assembly must have a **Density** parameter assigned in the **Material's Physical** properties:



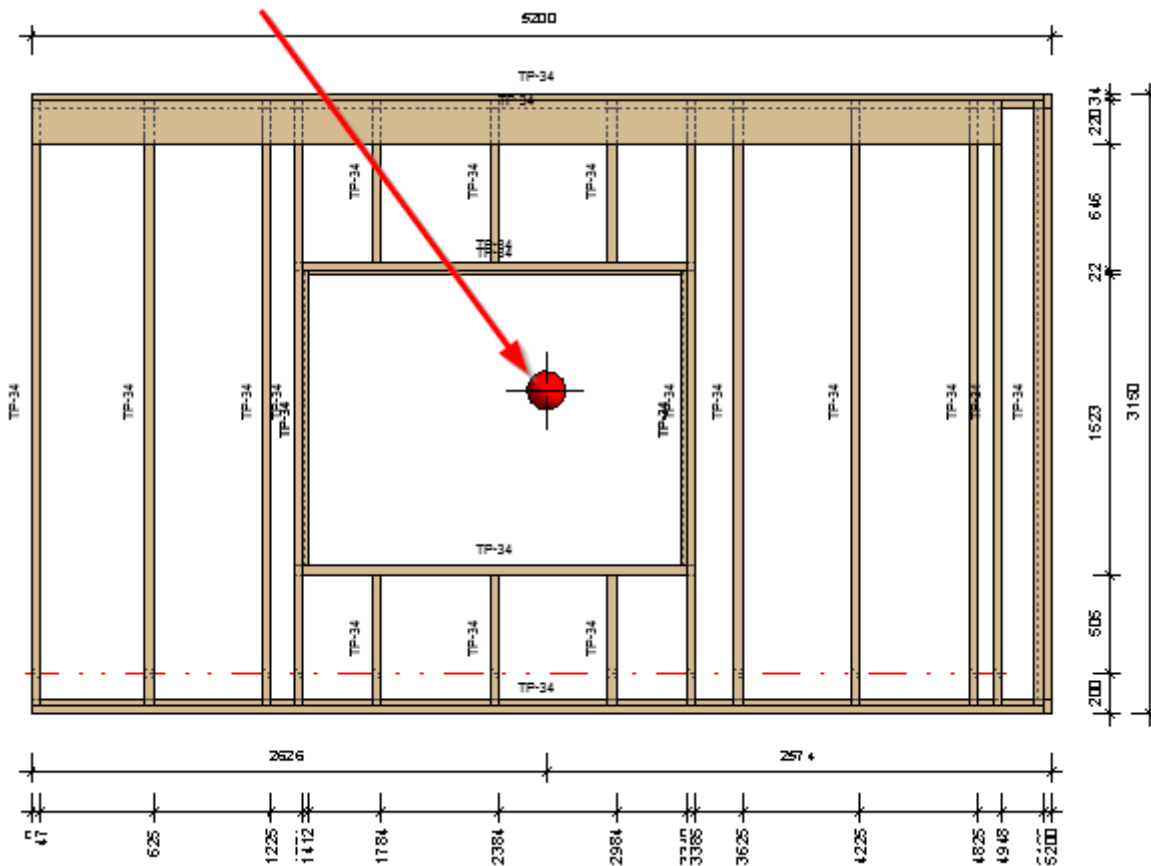
2. Tick **Insert Gravity Point (GP)**.

3. **GP is Visible** – select assembly views in which the gravity point will be visible.



**Result:**





The Gravity Point also can be dimensioned in the assembly view. All dimensioning rules are in **Smart Dimensions**:

**Smart Dimensions Configurations**

Configuration : Assembly [ Save ] [ Duplicate ] [ Rename ] [ Delete ] [ Create New ] [ Configuration Settings ]

**Dimension Lines by Priority**

- Structural Framing
- Point Based Elements**
- Point & Face Based Details
- Hosted Point Based Details
- Parts
- Walls
- Structural Columns

**Common Settings** | Text Note Settings | Elements In View

**Grouping**  
 Group Elements by: None, None, None

**Dimension Type**  
 Dimension Type: Linear - 3mm Arial

**Include**  
 Include in Total Measure:   
 Include Grids:   
 Include Levels:   
 Measure: All

**Join Dimension Lines**

	Category
<input type="checkbox"/>	Structural Framing 1
<input type="checkbox"/>	Structural Framing 2
<input type="checkbox"/>	Point Based Elements
<input type="checkbox"/>	Point & Face Based Details 1
<input type="checkbox"/>	Point & Face Based Details 2
<input type="checkbox"/>	Point & Face Based Details 3
<input type="checkbox"/>	Hosted Point Based Details

**Filtering**  
 Filter by: None, none, And, ( Filter by: None, none, And, Filter by: None, none, ) Filter Material: None

[ OK ] [ Cancel ]

## Number of Visible Layers

Dimensioning Rule	Structural Framing Tag	Sheathing Tag	Structural Connections Tag	Tag Other	GP is Visible	Number of Visible Layers
-- None --	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2
Plan Detail	-- None --	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2
Frame	M_Wall Fra	-- None --	-- None --	<input type="checkbox"/>	<input checked="" type="checkbox"/>	2
Sheathing	-- None --	Framing Part Tag	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2
Sheathing	-- None --	Framing Part Tag	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2
Vertical Nailer	M_Wall Fra	-- None --	-- None --	<input type="checkbox"/>	<input type="checkbox"/>	2

**Number of Visible Layers** – allows you to add the number of visible layers in the view.

## Views are Visible

GP is Visible	Number of Visible Layers	Views are Visible	Insert Grids
<input type="checkbox"/>	2	<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	2	<input checked="" type="checkbox"/>	<input type="checkbox"/>
<input checked="" type="checkbox"/>	2	<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	2	<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	2	<input type="checkbox"/>	<input type="checkbox"/>
<input type="checkbox"/>	2	<input type="checkbox"/>	<input type="checkbox"/>

**Views are Visible** – select which views will be visible in the selected view.

Assemblies

- W-4
  - 3D View: 3D Ortho
  - Detail View: Assembly Front
  - Detail View: Elevation Front
  - Detail View: Frame Front
  - Detail View: Frame&Sheathing Front
  - Detail View: Frame&Sheathing II
  - Detail View: Framing Plan Detail**
  - Detail View: Plan Detail
  - Schedule: Assembly Material Takeoff
  - Schedule: Assembly Part List
  - Schedule: Frame
  - Schedule: Secondary Frame
  - Schedule: Sheathing
  - Sheet: W-4 -1 - Assembly
  - Sheet: W-4 -2 - Frame
  - Sheet: W-4 -3 - Secondary Frame