



## Adding an E-Stack unit to an IES model

This document will provide a comprehensive step-by-step guide to adding our e-stack passive ventilation units to an existing IES VE model. Should you have any further questions please contact Joe Clawley or Matthew Waterson at [joe.clawley@breathingbuildings.com](mailto:joe.clawley@breathingbuildings.com) / [matthew.waterson@breathingbuildings.com](mailto:matthew.waterson@breathingbuildings.com), or call the office at 01223 450 060.

### Contents

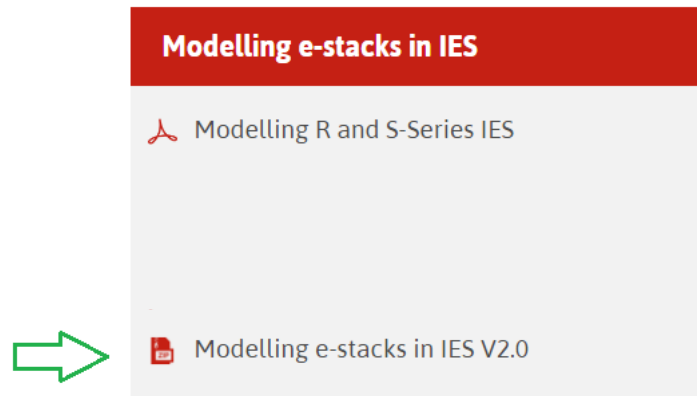
Download and unzip the e-stack geometry file .....	2
Importing the geometry into your project .....	2
Identifying e-stack units within GEM file .....	3
Attaching an e-stack unit to your model .....	4



## Download and unzip the e-stack geometry file

[www.breathingbuildings.com/products/modelling-e-stacks-in-ies-or-tas](http://www.breathingbuildings.com/products/modelling-e-stacks-in-ies-or-tas)

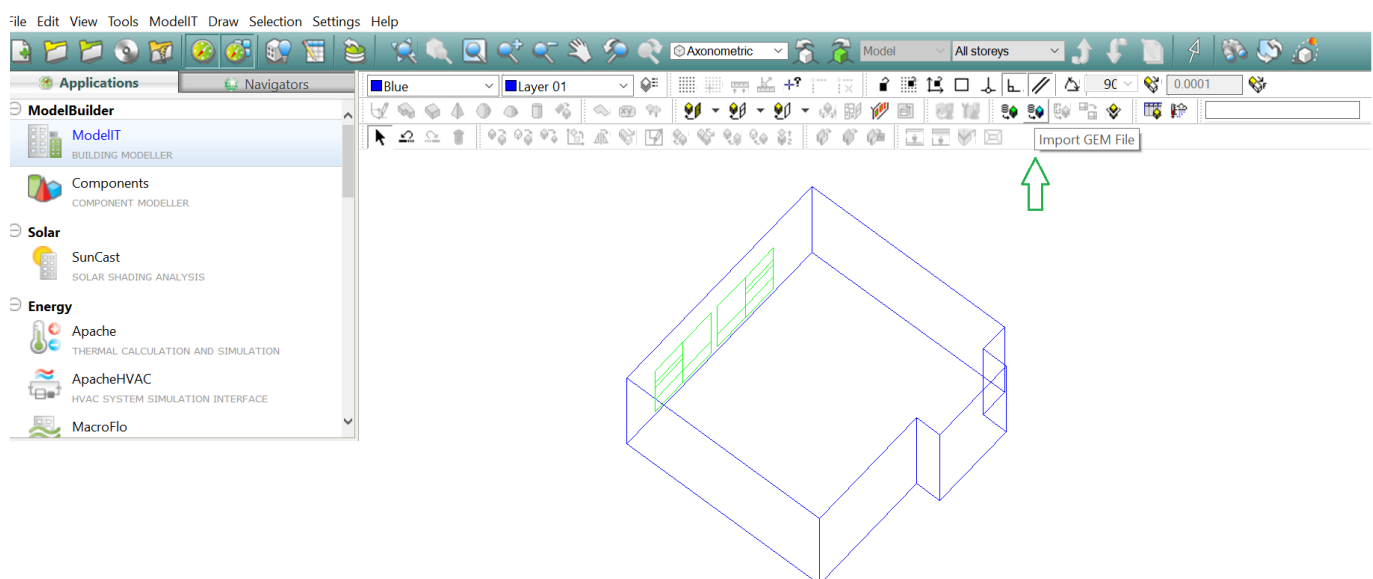
Follow the above link to our dedicated help page, and download the 'Modelling e-stacks in IES V2.0' file as shown below:



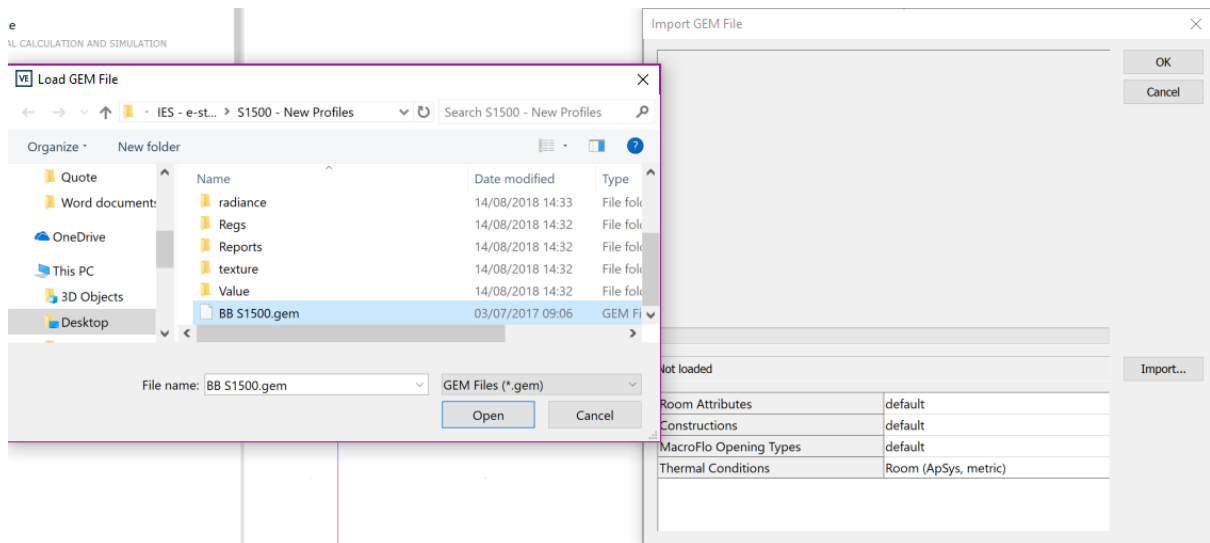
Download the file, right-click on the folder and extract the contents into an appropriate location for your project. It is important the files are extracted from their initial zipped state for IES to be able to import the geometry of the e-stacks.

## Importing the geometry into your project

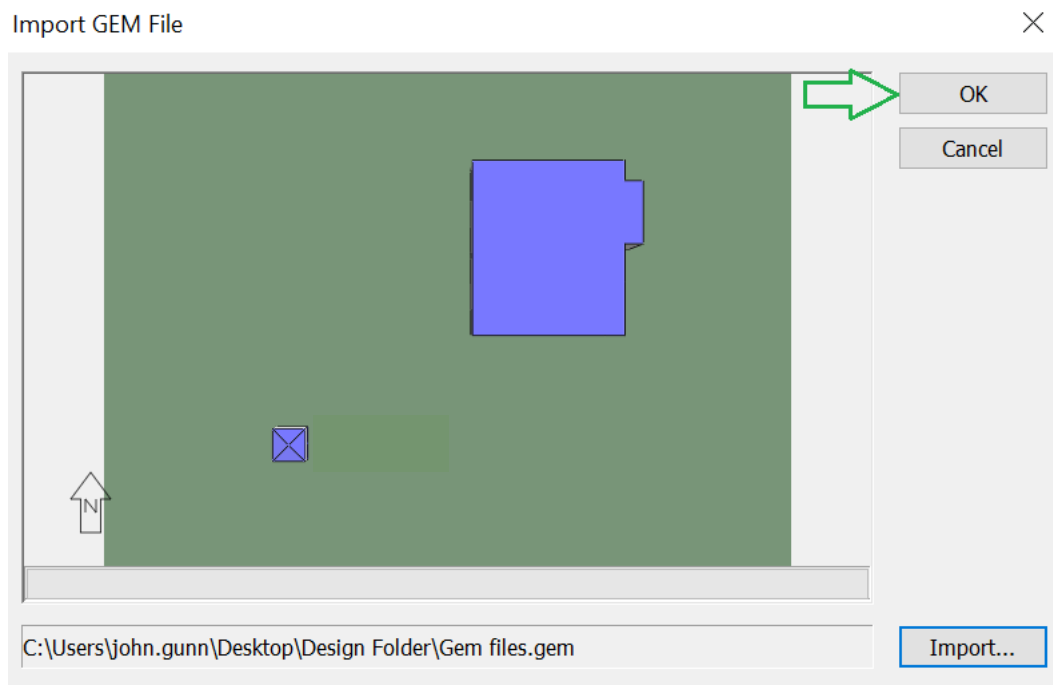
Open your project file in IES and click on the 'Import GEM File' button as shown below:



Click the 'import' button, locate the folder where the geometry is saved, and open the 'GEM files.gem' file as shown below (Shown here for the S1500 e-stack unit):

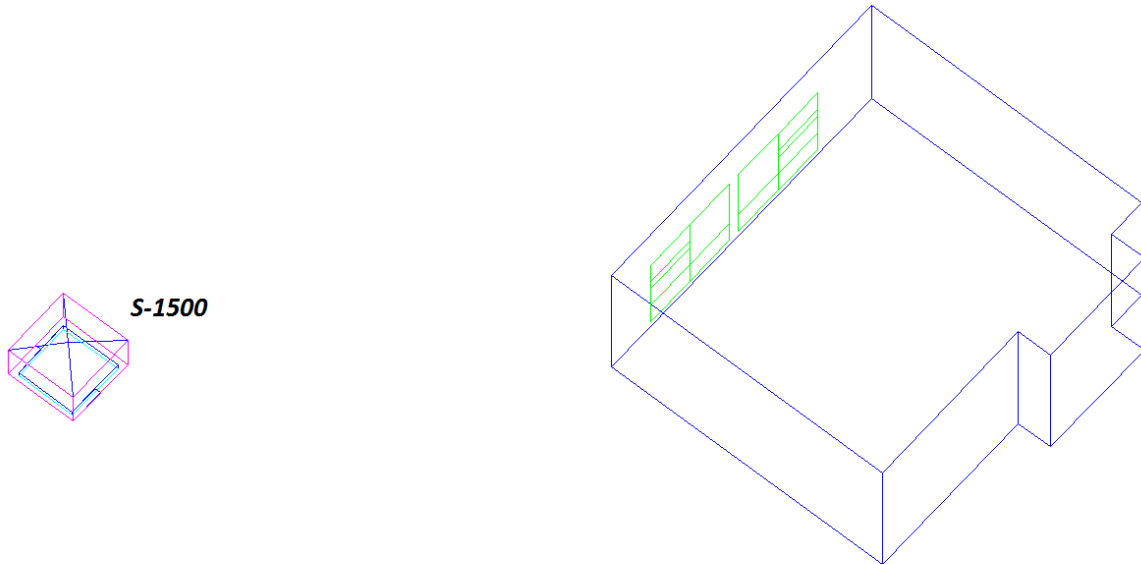


The geometry is for one of our e-stack units, in this example the S1500 has been selected, click the 'OK' button, and the units will be placed beside your model in the IES file as shown below:



## Identifying e-stack units within GEM file

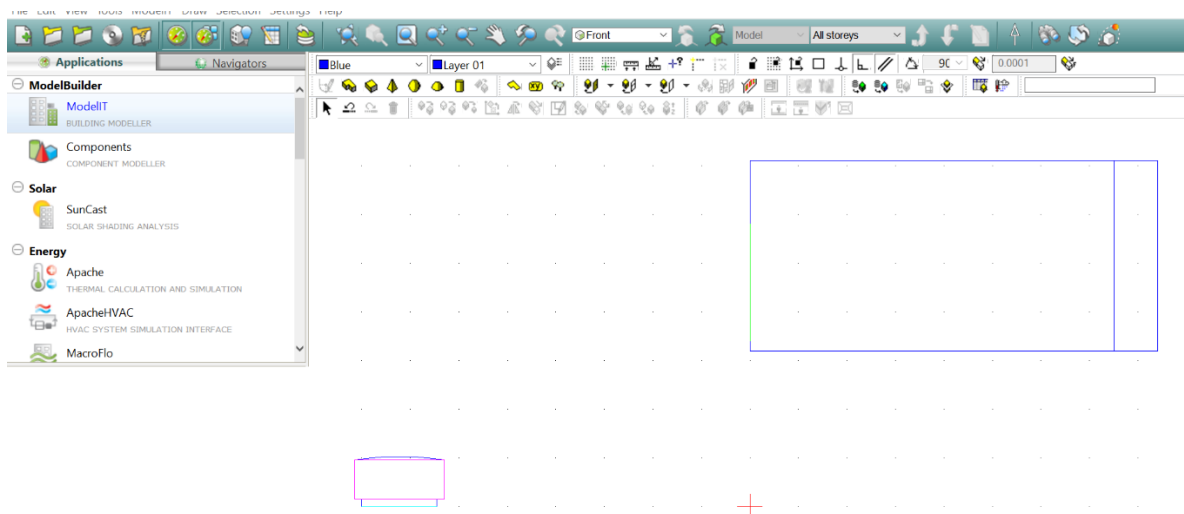
Delete the units which will not be required for your model; the units modelled are labelled below:



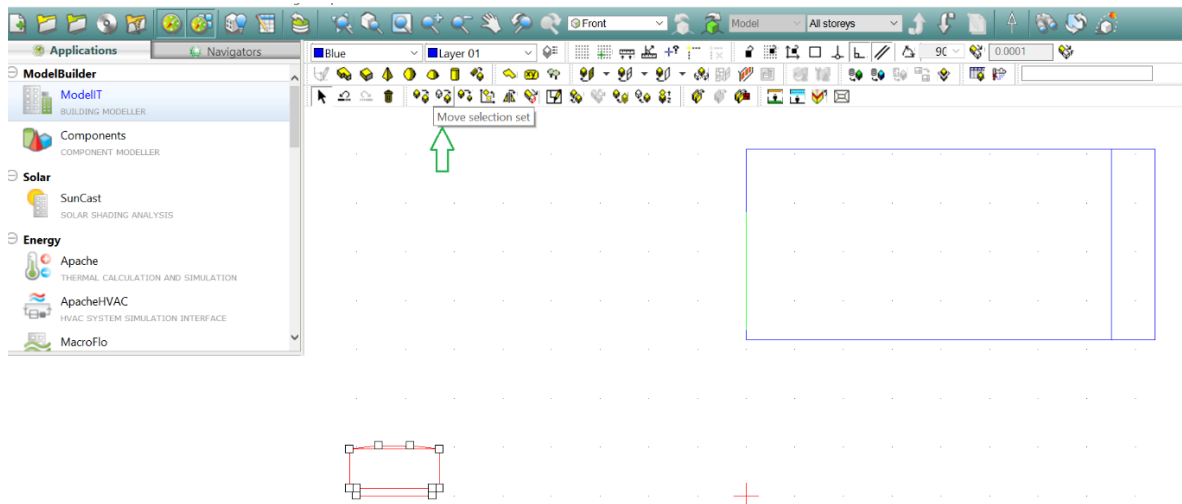
## Attaching an e-stack unit to your model

In this example the room will be fitted with one of our R-Series units, as is typical with IES VE there are multiple ways to do this, here is just one example.

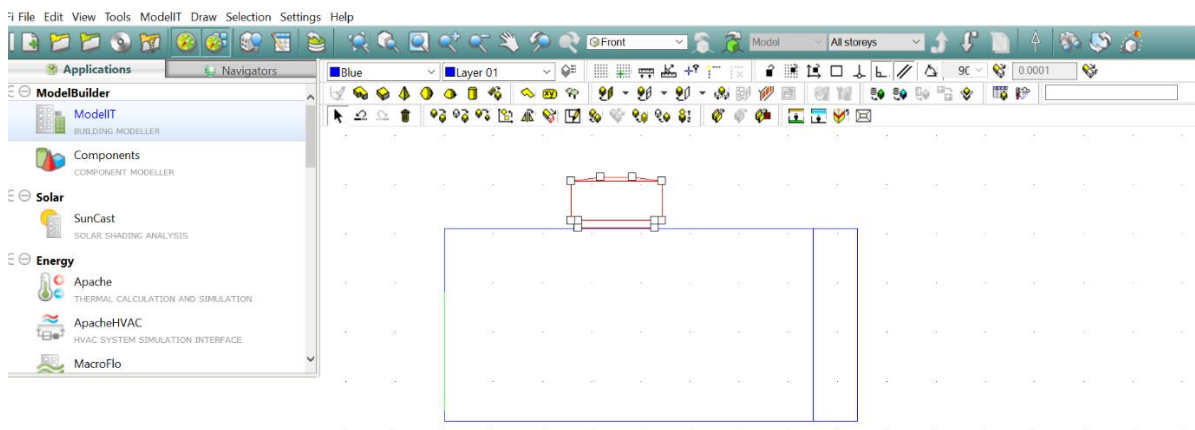
Change to a side view of the room, the idea will be to align the unit to the correct plane (height) to fit into the model. The image below shows the same model from a *front* view, as opposed to the *axonometric* view in the image above.



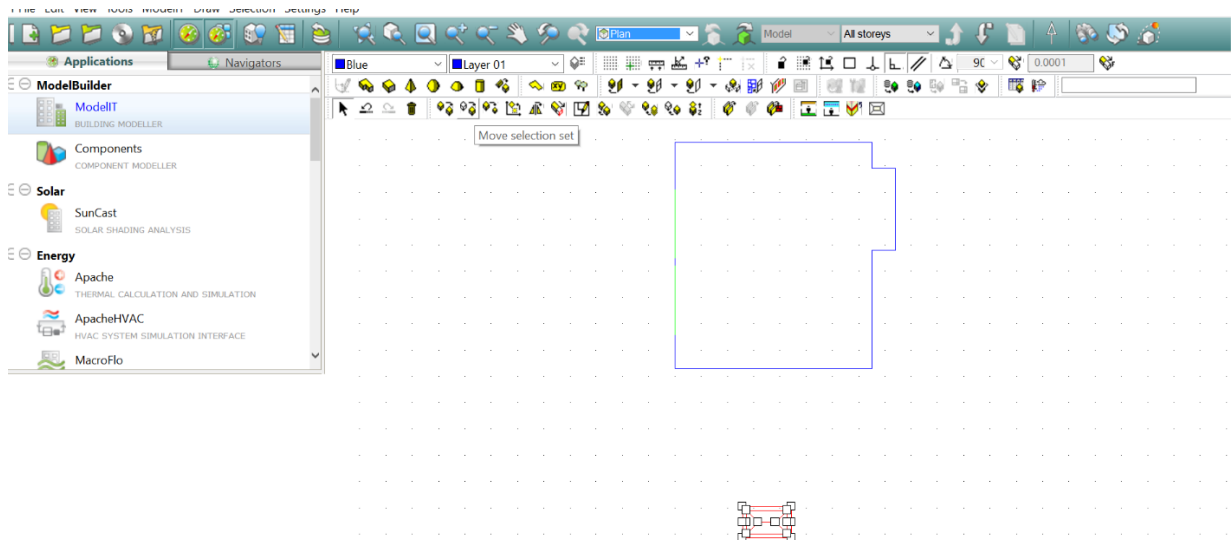
Select the e-stack unit, and click the 'move selection set' button as shown below:



Use the 'type in' box in IESVE as change the height of the unit to be equal to the height of the roof. For example if the roof is at 3m, type  $x=0,3$  to move the unit to be at the same height as the roof.

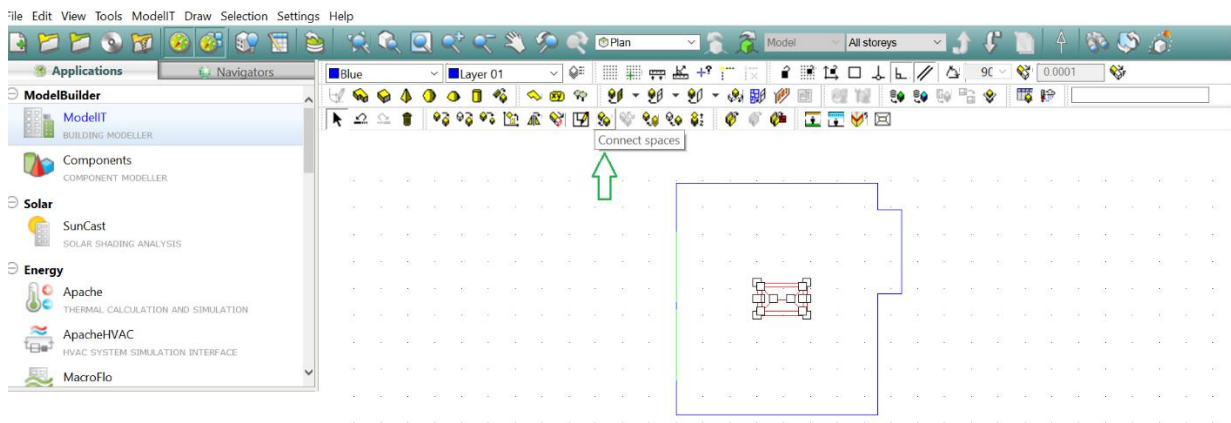


The e-stack unit is now at the correct height, but as can be seen from a plan view, its position is still not quite correct. In the plan view use the same 'move selection' set button to drag the e-stack unit to its correct position.

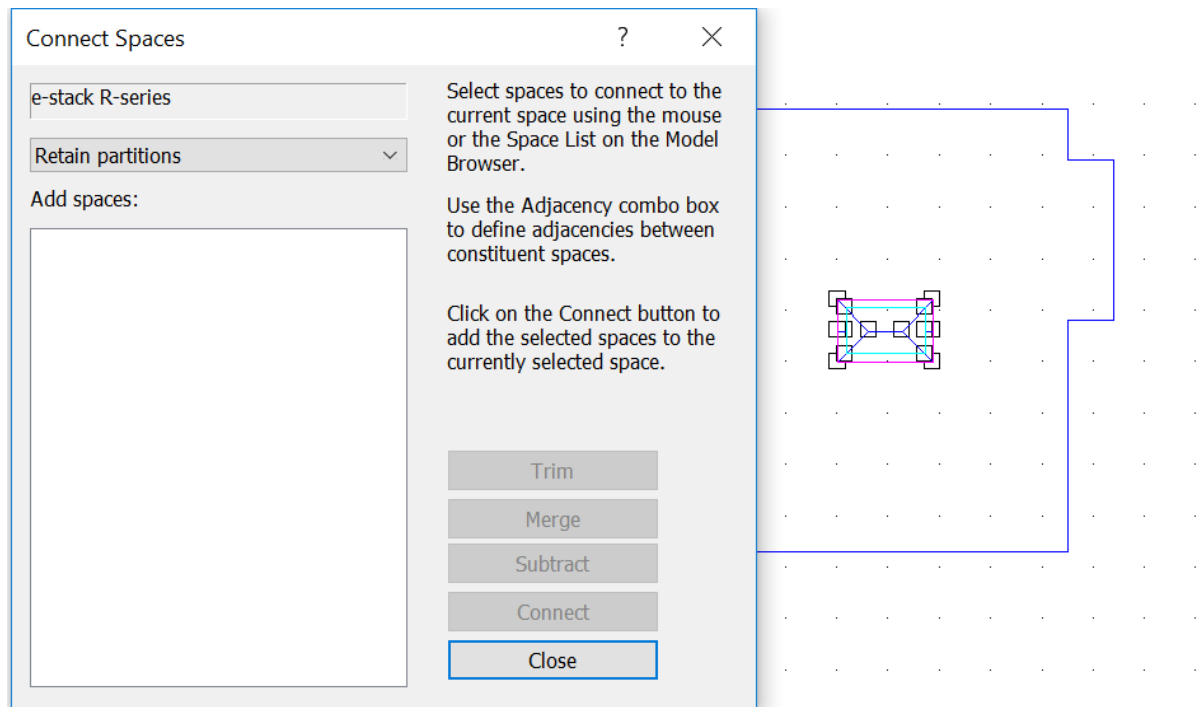


It is important that the unit does not intersect the ceiling, and that there is also no gap between the two parts. When the unit has been properly attached to the building there will be a line which appears along the surface of the ceiling, indicating the unit has merged properly.

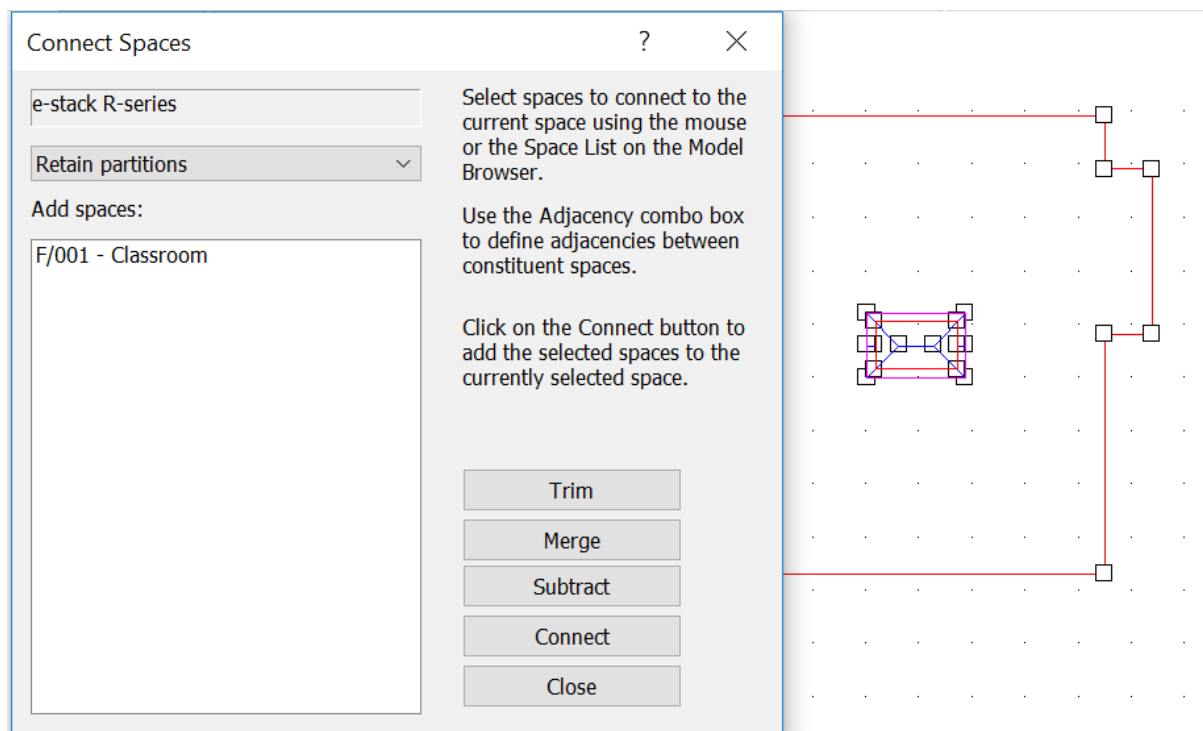
Once in the correct position as shown below, select the e-stack unit and click the 'connect spaces' button as shown below:



Doing so will reveal the selection box:



While open simply select the room to which the e-stack unit is to be connected, and it will appear in the 'Add spaces' box:



Click the 'merge' button, and the two parts connect.

