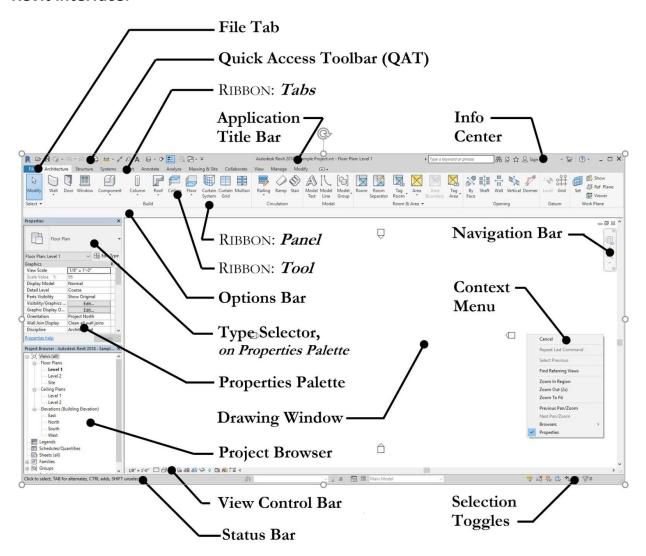
## **In-class Assignment 1: Revit Modeling Basics**

Instructor: Hoda Homayouni Ph.D.

## **Revit interface:**



**Step 1.** Open a new Construction Template in Revit.

Step 2. Download the AutoCAD drawing of the research building from the class website, and import it into Revit. (Insert tab> import)

- **Step 3.** Create multiple levels. Change the heights to 4m and name the top grid "Roof".
- **Step 4.** Choose the wall type of your choice.
- **Step 5.** Go to the first level and trace the existing plan. Click on your walls and make sure all the arrows are outside of the walls (indicating the wall's exterior would face the outside). If they are on the interior side, click on them to place them on the exterior.
- **Step 6.** Right click on one of the walls, choose "select all instances", and then change the properties of the wall (Top Constraint) and choose to extend it up to the roof level.
- **Step 7.** Change the properties of the walls facing the courtyard to "storefront". (if faced with a warning go ahead and "unjoin elements", then edit the walls to join them back again).
- Step 8. Add floors.
- **Step 9.** Add few rooms to your model (use interior walls for modeling the rooms).
- **Step 10.** Add roof. Change the slope of your roof to be 0 on each side to have a flat roof.
- **Step 11**. On East and west elevation views, hide your topography lines (right click> hide in view>elements).
- **Step 12**. Add the parapet walls.
- Step 13. Add various types of doors and windows.
- **Step 14 (Optional).** Edit the structure of the wall to material of your choice. (Wall properties=>Edit type => Edit structure) Notice the difference among the wrapping types.

- **Step 15.** Go to the "massing and site" tab and put some landscaping elements into your model (you may need to load family and load trees from the "planting" folder).
- **Step 16.** Select a perspective view and check out the realistic rendering or ray traced views and save it as a new 3D view (within your Revit model).
- **Step 17.** Explore any other options that might interest you in Revit and enhance the model. Ask any questions you may have.
- **Step 18.** Save your model as "Campus-building-your Lastname.rvt" and submit the file in class website. You may contact me in case you have any questions or concerns at hoda@uw.edu.