DESIGN SIMPLE BUILDING(cont.) -- ADD SPECIFIC WINDOWS AND DOORS

In E273 Studio, use College REVIT licenses; and works in groups of three.
At home, use free 3-year student license: http://www.autodesk.com/education/free-software/revit

PART 1 BIM (Building Information Management)

(adapted from 2017 video https://www.youtube.com/watch?v=DTYgXGVWDe4&index=2&list=PLzAQZFR7SsdgX_v1enjjIesCkMeMo8CON#t=23.783662):

Before we add specific doors and windows to your building from Lab 1, learn about the organization of Data in Revit:
Revit contains both **MODELING** capabilities **and** a **BIM (Building Information Management)** system with connectivity between elements, and a hierarchical order of properties

CATEGORIES *(every element in Revit is in a category)*: **"Walls", "Doors" , "Windows", "Text", "Dimensions", "Furniture"**

FAMILIES *(a sub-grouping of categories)*: **"Single Doors", "Double Doors"**

TYPES *(a sub-grouping of families)*: **Single doors made of specific materials**

OBJECTS *(a sub-grouping of types)*: **Just the one "Instance" of the door you're clicked on** *(not all of that "Type")*

Grouping of objects:

- o **Model Elements = all physical things**
  (if you change in one place, it changes in all places)
- o **View-specific Elements = dimensions, labeling conventions, etc.**
  (if you change, it , it only changes in that view – like on only Electrical Drawing)
- o **Datum Elements**

Be careful if you change properties of an element to make sure you don't change unintended things; For example, changing the **"TYPE"** of one door changes every **"Instance"** of that door type everywhere in your project.
==
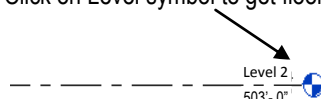
Watch this 2017 Revit video on Doors and Windows:
https://www.youtube.com/watch?v=D1Gs5vJQ9jQ&index=18&list=PLzAQZFR7SsdgX_v1enjjIesCkMeMo8CON
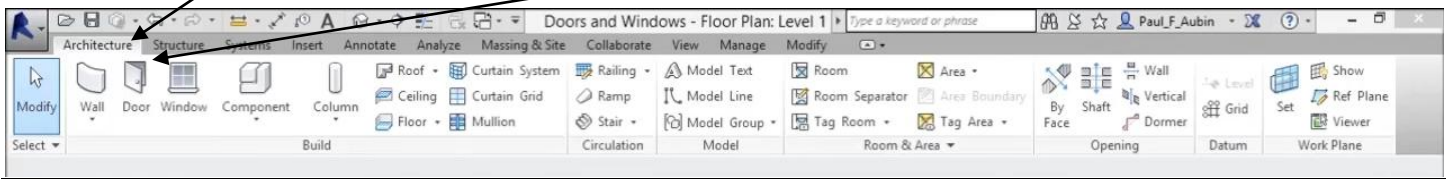
PART 2 DOORS

- • Open **Revit** (not "**Revit Viewer**") in **Autodesk** Folder
  *(in "**All Apps**" for Windows10)*
- • Click **Open** on Start Screen
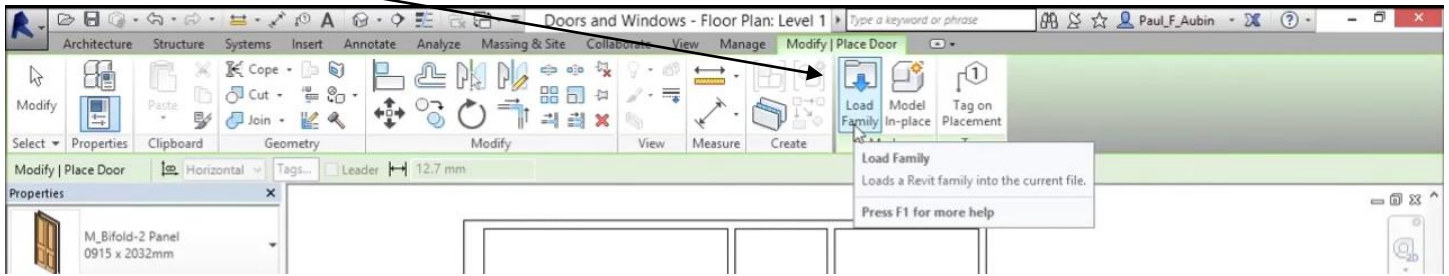- • Open your file "My House *your full name*" from your last assignment

- • Do everything below for both Level 1 and Level 2 of your house
- • Click "**South**" **Elevation** in **Project Browser** window
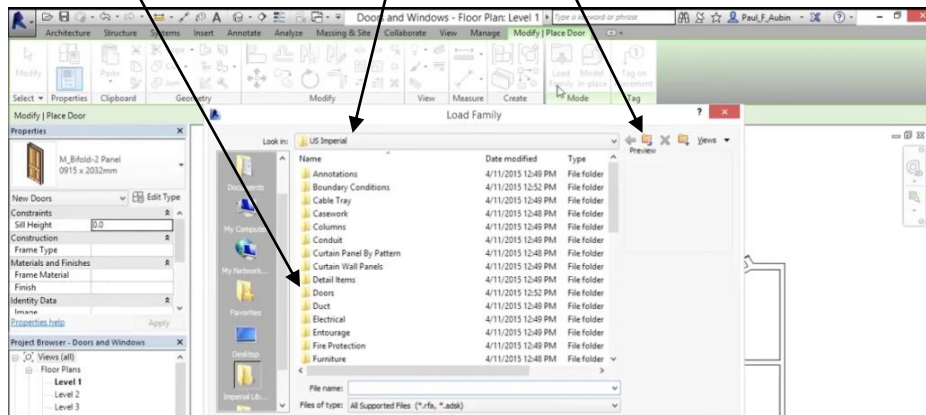- • Click on Level symbol to get floor plan *(you can also see floor plans by selected them in Project Browser Window)*

Level 2
503'- 0"

Click on the **"<u>Architecture</u>"** on the **Ribbon,** then Click on "**<u>Doors</u>**"

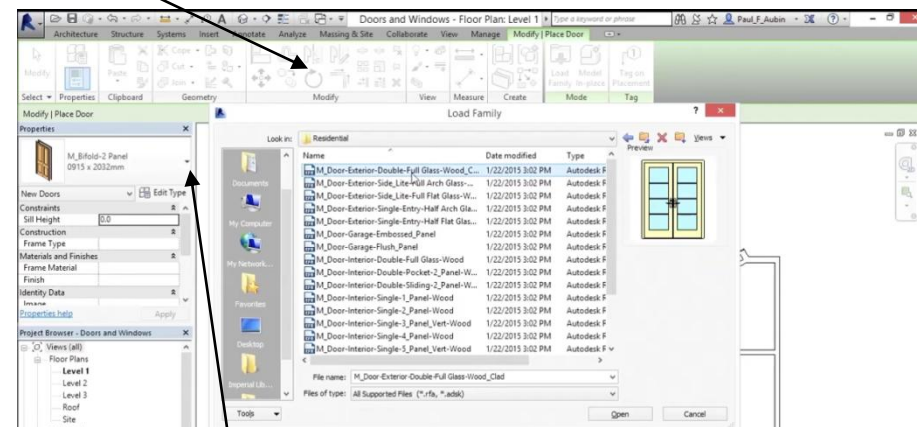**"<u>Load Families</u>" of Doors**

If it doesn't say **"US Imperial" units** here, click on this to go up one folder and switch it to Imperial Units
Then, pick **"<u>Doors</u>" folder**

Load files that you believe will best match Doors you most likely would like to choose from for your building

(Expect to spend some time fishing around in here, and possibly even
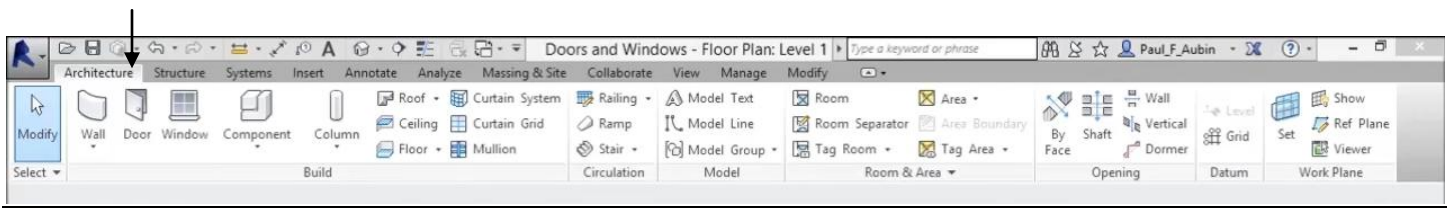loading more files from SWEETS CATALOG)

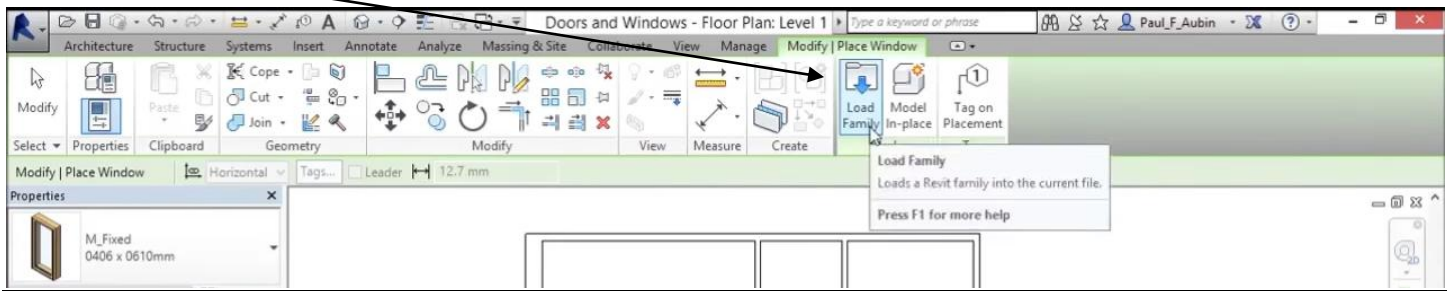Add Doors to your floor plans, selecting a type of door in each.

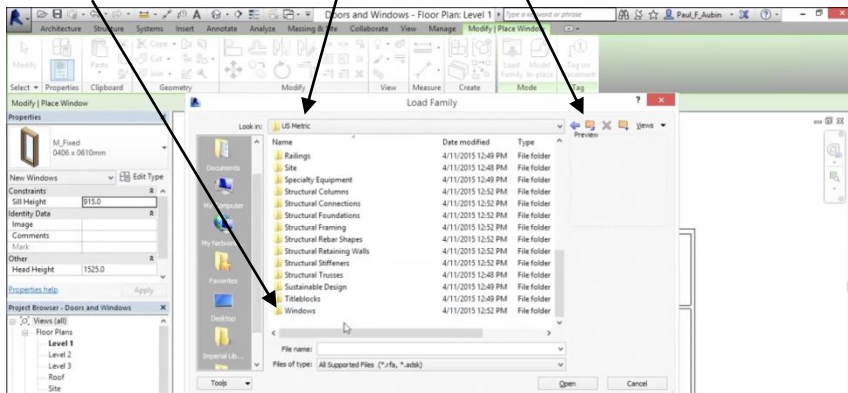# PART 3 WINDOWS   Do everything below for both Level 1 and Level 2 of your building
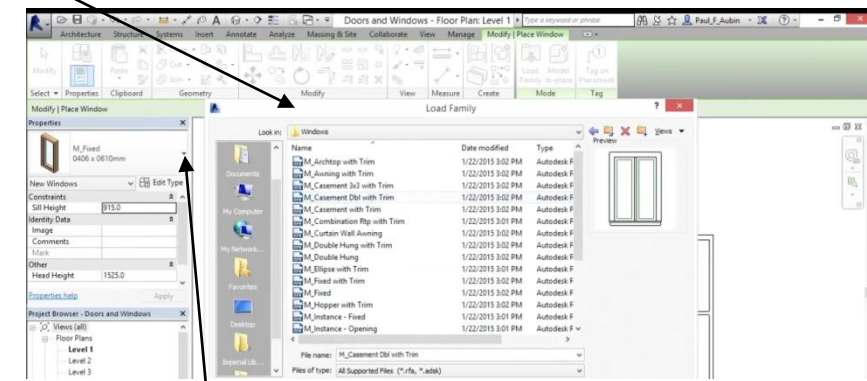
Click on "**Windows**"

"**Load Families**" of Windows (in Imperial Units)

If it doesn't say **"US Imperial" units** here, click on this to go up one folder and switch it to Imperial Units
Then, pick **"Windows" folder**

Load files that you believe will best match Windows you most likely would like to choose from for your building

(Expect to spend some time fishing around in here, and possibly even
loading more files from SWEETS CATALOG)

Add Windows to your floor plans, selecting a type of window in each.

HAND IN:

- Type **"W" "T"** for **Window Tiles** *(a mosaic of your computer windows)*
- Open, close, and play with windows until you have these windows in your mosaic with each nicely centered, etc in a tile:
  "3D View"   **"Floor Plan: First Floor"**   **"Floor Plan: Second Floor"**   **"Elevation - South"**
- Open a Word file
- **ALT+PrintScreen**, then **CTRL-V** to paste it into a word file
- Create a second page in your Word diocument
- **List all windows and doors you chose** for your building, plus <u>**a sentence or two about why you chose each**</u>
  - From each door or window you list, <u>**add pictures**</u> from a screen shot, cropped to show each window or door, like this:

- <u>**HAND IT IN STAPLED TO THIS ASSIGNMENT**</u>
- **ReSave Revit file** where you can retrieve it; i.e., **"353house** *your full names***"**