

# Dynamic Fill

The Dynamic Fill tool automatically creates Spaces and measurement markups from shapes on the content layer of a drawing. The tool detects shape boundaries and uses those shapes to create a [Space](#), [Area Measurement](#), [Polylength Measurement](#), [Perimeter Measurement](#), [Volume Measurement](#), [Polygon Markup](#), or any combination thereof.








The Dynamic Fill tool works on shapes found on the content layer of a drawing only. When it is engaged, markups on the drawing can be hidden from view to make it easier to see the content layer; see [Dynamic Fill Preferences](#) to enable or disable this feature.


## Creating a Space and/or Markup from Room or Shape

The Dynamic Fill tool is used to create a Space or a markup from a shape (usually a room) on the content layer of a drawing. While the simplest use of the Dynamic Fill tool is to create a Space and/or markup from a whole room, you can also add temporary boundaries to divide closed rooms or close open rooms.

1. Go to **Measure > Dynamic Fill** or press **J** on the keyboard. The Dynamic Fill toolbar appears.




2. To add a temporary boundary within the desired shape, select  **Add Boundary**, then click on two or more points on the drawing. To finish drawing the boundary, double-click the last point or press **ENTER**.
  - Temporary boundaries are useful when the desire is to extract only a portion of a room or shape. The temporary boundary will prevent the Fill function described below from spreading beyond its border, but will not otherwise affect the drawing.
  - Temporary boundaries do not need to be confined to a room or shape and can be applied freely in the drawing.
3. Select  **Fill**, then click and hold within the boundary of the desired shape. The Dynamic Fill tool highlights the space, stopping when it reaches the boundaries or when the mouse button is released.
4. To create markups from the highlighted shape, select one or more of the **Create** options:
  -  **Space**: Select to create a Space. Assign a name, opacity, and color from the menu.
  -  **Polygon Markup**: Select to create a Polygon markup using the current default properties or choose a markup of this type from your [Tool Chest](#).
  -  **Area Measurement**: Select to create an Area measurement using the current default properties or choose a markup of this type from your [Tool Chest](#).
  -  **Polylength Measurement**: Select to create a Polylength measurement using the current default properties or choose a markup of this type from your [Tool Chest](#).
  -  **Perimeter Measurement**: Select to create a Perimeter measurement using the current default properties or choose a markup of this type from your [Tool Chest](#).


-  **Volume Measurement:** Select to create a Volume measurement using the current default properties or choose a markup of this type from your [Tool Chest](#).

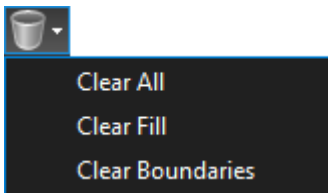
5. Click **Apply** to create the Space and/or markups.

Tips:

- When using  **Fill**, move the cursor while holding down the mouse button to highlight an area faster.
  - Encircling an area in this manner will automatically highlight everything within the described perimeter, even if that means crossing a boundary that would otherwise prevent it.


### Removing Unused Dynamic Fill Elements

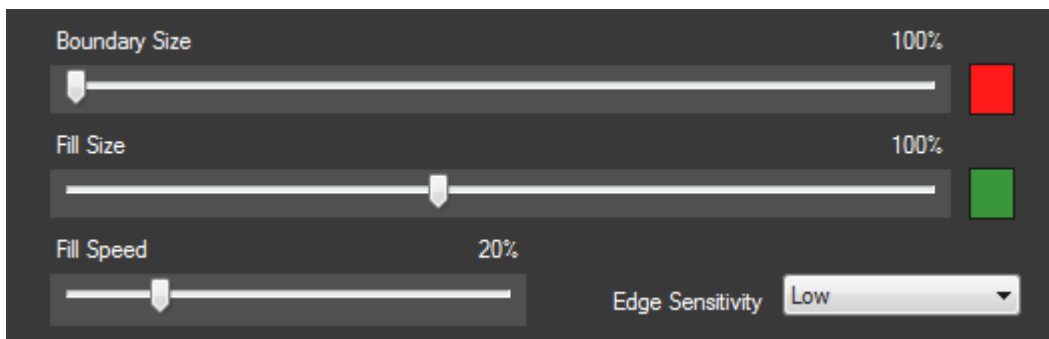
Dynamic Fill elements that have not yet been used can be removed from the PDF. To do so, select the desired option from the  **Clear Dynamic Fill** menu on the Dynamic Fill toolbar.



- **Clear All:** Removes all unused boundaries and fills.
- **Clear Fill:** Removes unused fills only.
- **Clear Boundaries:** Removes unused boundaries only.

### Dynamic Fill Tool Settings

The default preference settings for the Dynamic Fill tool are found in the [Dynamic Fill Preferences](#), but these settings can be adjusted on the fly by clicking  **Dynamic Fill Settings** on the Dynamic Fill toolbar. Changing the settings this way is temporary; once the Dynamic Fill toolbar is closed, the settings will revert to the defaults.



- **Boundary Size:** Select the size of the cursor used when adding a temporary boundary.
- **Boundary Color:** Click the color box to select the color used when adding a temporary boundary.
- **Fill Size:** Select the size of the cursor used when filling a shape.
- **Fill Color:** Click the color box to select the color used when filling a shape.
- **Fill Speed:** Select the speed at which the highlight spreads when filling a shape.

- **Edge Sensitivity:** Select the sensitivity used when detecting boundaries when filling a shape. Depending on the line weights in the content layer of the PDF, boundaries might be missed or false positives picked up and adjusting this setting can correct these issues.

## Related topics

[Working with Spaces](#)

[Area Measurement](#)

[Polylength Measurement](#)

[Perimeter Measurement](#)

[Volume Measurement](#)

[Polygon Markup](#)

[Dynamic Fill Preferences](#)