

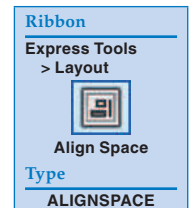
# Layout Express Tools

The **Layout** panel of the **Express Tools** ribbon tab includes additional commands related to layouts. This document explains the most useful express tools related to layouts. This document does not describe layout express tools that are outdated, perform operations that you can accomplish more easily using standard commands, or have limited application, including **List Viewport Scale** (**VPSCALE**) and **Merge Layout** (**LAYOUTMERGE**).

## Align Space

The **ALIGNSPACE** command offers the ability to position model space content in a floating viewport by specifying points in model and paper space. The **ALIGNSPACE** command is most useful as an accurate way to pan from a point in model space to a point in paper space. Unlike the **PAN** command, the **ALIGNSPACE** command allows you to specify exact points. [Figure ET29-1](#) shows an example of using the **ALIGNSPACE** command to position the center of an elevation drawn in model space at the center of a floating viewport in paper space. When using the **ALIGNSPACE** command to pan only, remember to set the viewport scale before using the **ALIGNSPACE** command.

Access the **ALIGNSPACE** command to activate a floating viewport if no viewport is active. If the layout includes multiple viewports, pick inside the viewport with the model space view you want to align. Then specify an alignment point in model space. For example, use object snaps, AutoTrack, or construction geometry to pick the exact center of the home shown in [Figure ET29-1A](#). The point acts as the base point from which model space pans. Right-click or press [Enter] to activate the **Return** option. Then specify an alignment point in paper space. For example, pick the exact center of the floating viewport shown in [Figure ET29-1B](#). Right-click or press [Enter] to pan the view from the point in model space to the point in paper space. See [Figure ET29-1C](#).



### NOTE

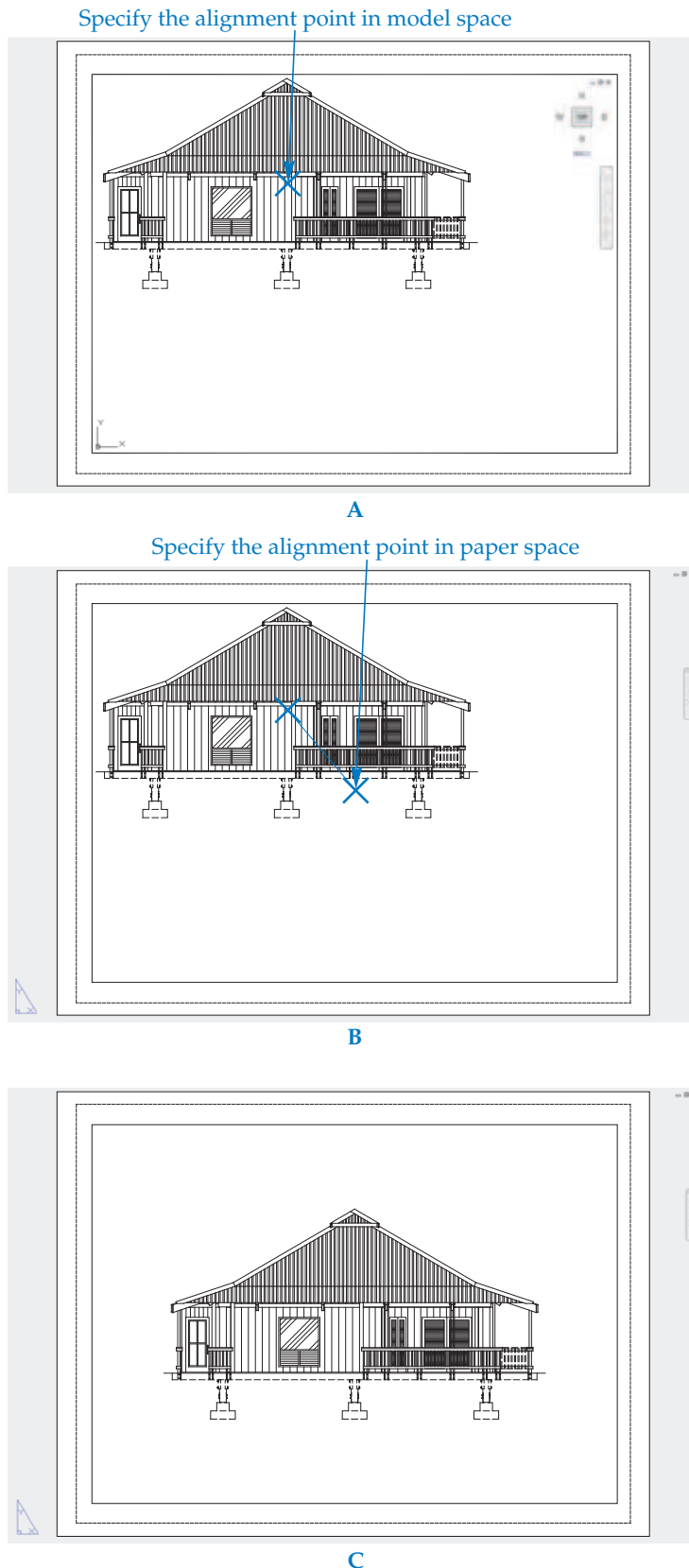
Notice that you can select two points in model space followed by two points in paper space when using the **ALIGNSPACE** command. If you select two pairs of points, AutoCAD pans and scales the view to the selected points in paper space. This technique has limited usefulness because of the possibility of inappropriately scaling and rotating the view.

### PROFESSIONAL TIP

Use construction geometry in paper space, such as a line that spans multiple floating viewports, to help align views in different viewports.

**Figure ET29-1.**

Using the **ALIGNSPACE** command to position the center of the front elevation of this home in the center of a floating viewport. A—Select the base point in model space. Only pick one point in model space. The X identifies the specified points for illustrative purposes only. B—Select the alignment point in paper space. Only pick one point in paper space. C—The view in model space aligns to a point in paper space.



# Synchronize Viewports

For most applications, standard scaling and alignment commands are adequate for scaling and adjusting model space views in floating viewports. However, the **VPSYNC** command can automate the process of equally scaling and aligning multiple viewports. Before using the **VPSYNC** command, identify a floating viewport to function as the master view. This is the view to which other views will be synchronized. Scale and locate model space content in the master viewport as needed. Then access the **VPSYNC** command to activate paper space, if a viewport is active. Select the master viewport, followed by the viewports to be synchronized with the master. You will probably have to make additional adjustments, such as panning the views or using the **ALIGNSPACE** command.

