Matrix

The Matrix button (and its related checkbox) is located in the top middle panel. Selecting it brings up Matrix Options in the lower right panel.

A matrix in Particle Phantasy is a three dimensional shell or shells that can be used to remove 3D elements or to push or pull them towards other elements.

The size of the shell is selected in the middle lower panel. The size $(5 \times 5, 81 \times 81, \text{ etc.})$ actually is the dimension for all three (X, Y, and Z) coordinates. If the Outside shell is larger than 3×3 then an Inside Shell is also available.

The Destructive checkbox if selected will remove elements (from the center point of the 3D element array). All elements inside the Outside Shell size (if the Inside Shell isn't active) will be removed. If Invert is also selected then the elements outside the Outside Shell size will be removed instead. If an Inside Shell is active then the elements between the two shells will be deleted, unless Invert is selected, in which case all the elements not between the two shells are removed.

If the size of the Outside Shell is larger than 3 X 3 then the Inside checkbox becomes available. To switch between Inside and Outside Shell settings select either the Pull or Push checkbox under the respective item.

If Destructive is not selected then the matrix processing will use the Pull and/or Push setting when processing the matrix. It checks each element that falls within the specified range and if one exists it pulls or pushes other elements that are within the Shell size distance from it. If only the Outside Shell is active then the program checks only for elements inside the size range, or outside the range if Invert is also selected. When an Inside Shell is active then only elements that are between the two shells are checked; selecting Invert with both active checks only those that aren't between.

Rev Objects - identical to the Reverse Objects on the Color Depth panel, this applied immediately after Matrix is processed and in addition to any reversing done in other areas.