## Using the 3D Tools

Flash provides two 3D tools, the 3D Rotation Tool and the 3D Translation Tool. These tools allow you to move and rotate objects as if they were three-dimensional shapes. The shapes are not true 3D shapes, just 2D postcards and the tools only operate on Movie Clip symbols.

## The 3D Rotation Tool

The 3D ROTATION TOOL allows you to rotate an object in the $X, Y$ and $Z$ axes.

## A Creating the Movie Clip

In order to use the 3D ROTATION TOOL, an object created in Flash or an image imported into the LIBRARY panel must be converted to a MOVIE CLIP symbol.

1 Load FLASH or close the current files, then create a NEW FLASH FILE.



4 Display the MODIFY menu and select CONVERT TO SYMBOL (or press the F8 key).


## B Selecting the 3D Rotation Tool



2 The rotation guides have the following purposes:

- The RED guide controls the HORIZONTAL (or X axis) movement.
- The GREEN guide controls the VERTICAL (or Y axis) movement.
- The BLUE guide controls the DEPTH (or Z axis) movement.
- The ORANGE guide controls the movement in both the vertical and horizontal planes.


## C Rotating the Object



## D Adjusting the Perspective

You can control the FIELD OF VIEW (camera angle) by adjusting the PERSPECTIVE ANGLE in the PROPERTIES panel.


NOTE: The default camera angle is $55^{\circ}$ which can be entered in the PERSPECTIVE ANGLE box to return the view to normal.

## E Adjusting the Vanishing Point

The VANISHING POINT controls the depth of view the of three dimensional object.


## F Moving the Rotation Point

You can adjust the point around which the rotation occurs. At the moment the rotation is around the centre of the object.


4 Experiment with some other 3D rotations.

