Objectives
Upon completion of this course you should be able to:

- Explain the basic functions and layout of Flash
- Use the Timeline and Layers within movies
- Use the drawing tools and symbols
- Use the panels to manipulate objects
- Create motion tweens and shape tweens
- Add sound files to your movie

Course Topics

- Application Layout
- Application Terms
- Drawing
- Symbols
- Object Manipulation
- Animation
- Sound
**Interface**
- Menus
- Movie Name
- Timeline
- Layers
- Information Box
- Property Inspector
- Stage
- Panels
- Toolbox

**Menus**
- File
- Edit
- View
- Insert
- Modify
- Text
- Commands
- Control
- Windows
- Help

**Timeline**
- The timeline is made up of many frames shown in chronological order.
- It provides easy access to all frames within your scene.
- To add things to specific pages, you will need to add a key frame.

**Layers**
- Layers are transparent sheets that can be edited without affecting another layer.
- They are a basic part of Flash and are used much in the same way as they are in Photoshop.
- They enable overlapping drawings, as well as simultaneous tweens and effects.
- They appear on the timeline.
- Objects can be placed on upper layers to hide objects underneath.
- Make sure that you are working on the correct layer before you work on the object itself.
- To create a new layer:
  - Go to the Insert Menu, and choose Layer.
- To select a layer:
  - Click the layer name.
- Moving layers:
  - Click and drag the layer either above a layer or below a layer.
- Name a layer:
  - Double click the instance name.
  - Delete the current name.
  - Type a new name for the layer.
Information Box
- Gives you information on the height and width of an object
- Gives you the X and Y coordinates for an object on the stage

Property Inspector:
- Context Sensitive
- Displays settings for what you have selected in the toolbox

Stage:
- The stage is where the flash movie is displayed.
- Think of it as the screen that projects your movies.
- The work area is everything around the stage.

Panels:
- They contain tools that allow you to organize, view, and modify elements in a movie.
- Panels are the option menus in Flash.
- They hold information about the objects.
- They are what you use to manipulate the objects.
- To show a panel, choose Window → Panels, and then choose the panel.

Toolbox:
- Flash is not a graphics design tool. Macromedia Fireworks and Adobe Photoshop are graphics design tools. Flash will do a good job with graphics but they are not its primary function.
- The toolbox contains the tools for drawing, editing, and adjusting graphics
- Choose Window → Tools to access the toolbox.
- The Color Tray allows you to change both line and fill colors.
- The Options Tray displays the different options for the various tools.
  - Example tools:
    - The Paint Bucket Tool is used to fill enclosed areas with color, gradients, or bitmap fills.
    - The Dropper Tool is used to acquire the color and style information from existing pencil lines, brushstrokes, and fills.
    - The Eraser Tool simply erases.
    - Normal, Fills, Lines, Selected Fills, Inside
    - The Hand acts as a way to move about the Stage rather than the scroll bars.
    - The Zoom Tool zooms in on the Stage.

Drawing Tools

Ovals and Rectangles
- Oval Tool
  - Creates circles, ovals
  - Line Color
    - Click and choose line (border) color.
  - Fill Color
- Click and choose fill (inside) color.

- **Rectangle Tool**
  - Creates Boxes, pill-shapes
  - Rounded Corners
    - Click to create pill shapes.

**Brush Tool**
- Paint Fills
  - Paints only inside the fills and not over the lines.
- Paint Inside
  - If you start inside an object, it will only paint inside.
- Paint Behind
  - Only paints behind the graphic.

**Fill Tool**
- Paint Bucket
  - Fill Objects
    - Fills an object with a desired color.
  - Fill Gaps
    - Fills an object with gaps.

**Lines**
- Line Properties
- Stroke Panel
  - Used to change the size and shape of a selected line.
  - Choose **Panels → Stroke**.

**Colors**
- Swatches
  - Holds a list of predefined colors.
- Mixer
  - Allows you to create your own custom colors.
  - Change the R(red), G(green), or B(blue) values to create a custom color.
  - Click a spot on the color bar to create a custom color.
- Gradients
  - Gradients are a mixture of two or more colors, which blend together at their edges to form a unique color.
  - Linear gradients produce vertical or horizontal line patterns.
  - Radial gradients produce circular patterns.
  - Creating Gradients - Choose **Window → Panels → Fill**.
  - Choose radial or linear gradient.

**Selecting and Manipulating Objects**
- **Resize**
  - Using the arrow tool, select the object, and then choose the Scale button.
  - Grab the small squares that appear, and expand or contract the image.
- Rotating objects
Using the arrow tool, select the object, and choose the Rotate button.
Grab the small circles that appear, and move them up or down to rotate the object.

***Note – All of these tools have their own set of properties that can be changed from the options panel located below the toolbox.

Symbols

- Symbols are objects that a user creates, which are saved and can be reused later in the movie.
- They are important because they minimize movie size, which enables Flash to run faster in a user’s Web browser.
- Creating Symbols
  - Press F8 or Insert → Create Symbol
- They are stored in the movie Library.
  - The Library holds all symbols created in a particular movie.
  - Common Libraries
    - Flash library of symbols
- Double-click the symbol to enter its edit mode.

Instances

- Instances are a single “instance” of a symbol.
- For example, if you created a symbol of a dog and wanted to use it more than once, every time you used it, it would be an “instance” of the dog.
- Reusing the symbol make Flash movies run much faster than other media such as Windows Media Player and Real Player.

Activity 1 – Drawing the background and using multiple layers:

1. Select the rectangle tool.
2. Set the corner radius to 50.
3. Set stroke and fill color.
4. Draw a rectangle the size of the stage.
5. Double-click the layer, and name this layer Background.
6. Add a new layer, and call it Animation.
7. Lock the Background layer so that it cannot be changed.

Activity 2 – Creating Symbols:

1. Make sure that you are working in the Animation layer.
2. Draw a circle on the stage.
   a. You can set the stroke and fill color to anything you like, just make sure you can see it on top of the background color.
3. Use the selector tool, and select the entire circle.
4. From the Insert menu, select Convert to Symbol.
5. Name the symbol Circle.
Activity 3 – Motion Tweening:
1. Go to Frame 20, and insert a new key frame.
2. Use the arrow keys, to make the animation smooth, and drag the circle down.
3. Go to Frame 40, and insert a new key frame.
4. Use the arrow keys to make the animation smooth, and drag the circle back up again.
5. Click in the timeline in between Frames 1 and 20, and choose motion from the tween menu properties inspector dialog box.
6. Click in the timeline in between Frames 20 and 40, and choose motion from the tween menu properties inspector dialog box.
7. To test your animation, go to the Control Menu and choose test movie.

Activity 4 – Shape Tweening:
1. Shape tweening is very similar to motion tweening.
2. Delete the Animation layer.
3. Create a new layer, and call it Shape.
4. Make sure you are working in the Shape layer.
5. Click on frame 1 and draw a square.
6. Right-click on frame 50 and click on “Convert to Keyframes”.
7. While in frame 50, right-click on the shape and click on “Envelope”.
8. Move the boxes and circles until you create the desired shape.
9. Click in the timeline in between Frames 1 and 50, and choose shape from the tween menu properties inspector dialog box.
10. To test your animation, go to the Control Menu, and choose test movie.

If you have questions, please feel free to email me at: tony.rando@ttu.edu or call 742-4500 x 227.