

# SOUND ONCLICK

## Objective:

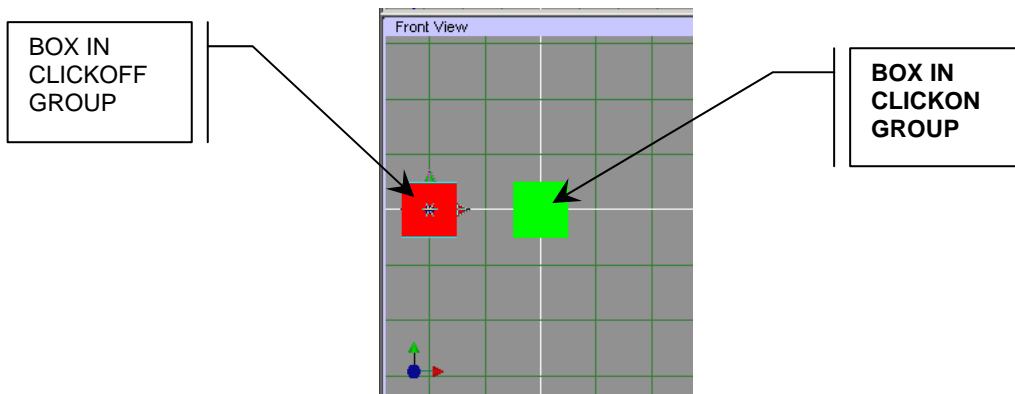
To be able to start and/or end a sound by clicking on an object in the scene.

## Actions:

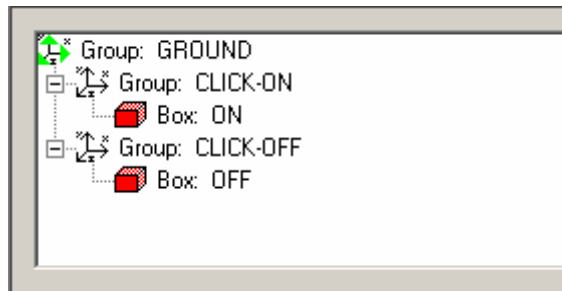
1. Use Top View
2. Place a box of default size in the window and zero it for all 3 axes.
3. **Create > Create Group** and also zero it for all 3 axes.

**NOTE:** Zeroing first isn't absolutely necessary but in the long run it does help to keep track of where things start and helps to keep things aligned. It's a good habit to get into.

4. Name the Group "**ClickOn**".
5. In Tree Window drag the box into group.
6. Repeat Steps 2 thru 5 to create a second group identical to the first one EXCEPT:
  - ★ zero the second box on all axes
  - ★ zero the group to X -2, Y 0, Z 0 (it will set the second box to the left of the first box).
7. Name the second Group "**ClickOff**".
8. Assign different colors to each box (I used green for ON and red for OFF).
9. Your Front View should look similar to this:

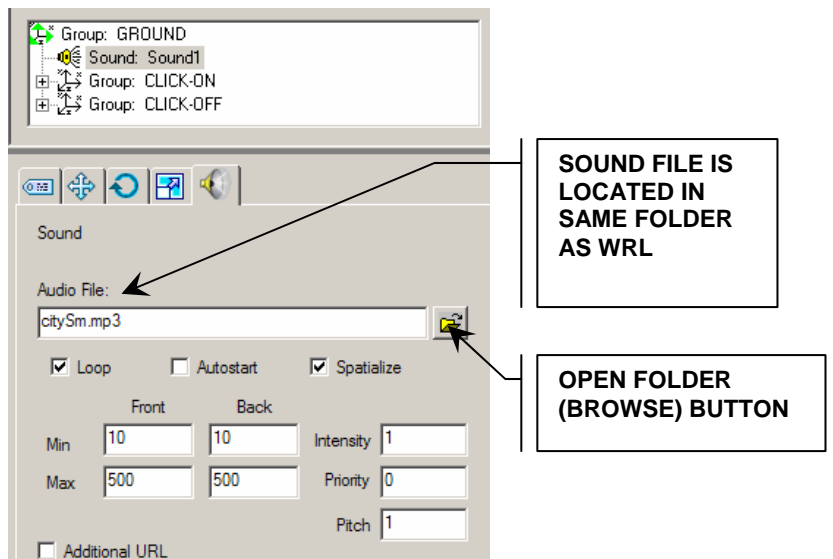


10. Your Tree Window should look similar to this:

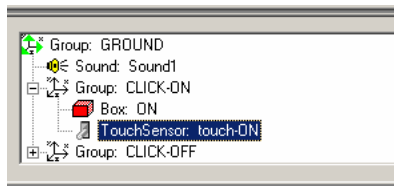


**NOTE:** If you have not already saved the WRL file please do so now. Then export the WRL version to the folder where you will be using it. Since you are setting up a relative path to the sound file the program needs to know where the original file is located in order to calculate the proper path to find the sound file. Get in the habit of saving your files as soon as you open them.

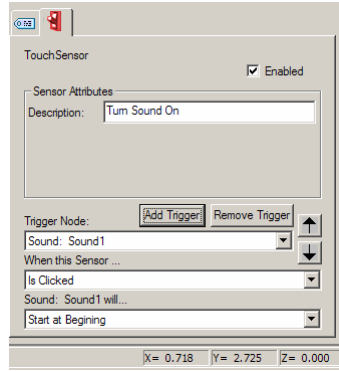
11. Next you need to add your sound.
12. Click **Create > Create Sound** and click in the Top View window to place the sound node in the scene.
13. Select the new Sound Node icon in your Tree Window and then click on the Translate tab in the properties window below it.
14. In the Translate tab for the Sound Node, zero it on all axes (again just for neatness).
15. In the Sound properties tab click the open folder button to browse for the sound file on your computer. The file must be either in the same folder as your WRL file or no more than one folder level beneath it.



16. Now all that's left is to add your Touch Sensors to turn the sound On or Off.
17. Click **Interaction > Create Touch Sensor** to add the Sound On action.
18. The Touch Sensor icon will appear in the Tree window as part of the main Ground Group
19. Drag the Touch Sensor icon from the Ground Group into the **CLICK-ON** Group.



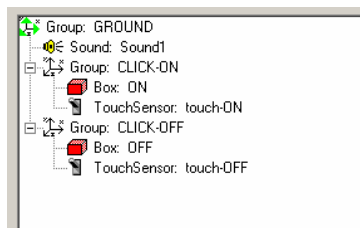
20. Select the Touch Sensor icon to open its properties window.



21. In the Touch Sensor properties window click on the **Add Trigger** button and you will be prompted to choose the “Trigger Node” (what it is that you will click on to use the trigger).
22. Move your cursor over the Tree Window and it will turn into an arrow with a clock on it.
23. Click on the Sound Node that you added in Step 12 to choose it as the Trigger Node and enter it into text box.
24. In the “After the sensor ...” box choose “Is Clicked” to set HOW the sound will be triggered.
25. In the last “Sound: Sound1 will ...” box choose “Start at Beginning” to set the sound to start when it is clicked.

**NOTE:** In the “Sound: sound will ...” textbox there is a choice of “Toggle” which at this time does not work for sound although it does work for other sensors (so that you don’t have to have separate OFF and ON Triggers). Hopefully it will be operational in a future version. Currently you need to set separate triggers for each action.

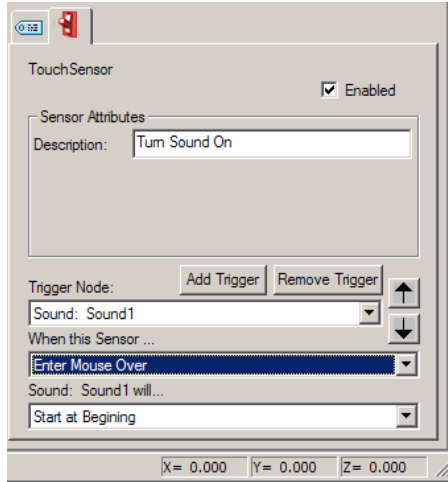
26. Repeat Steps 16-25 to add another Trigger Node to stop the sound.
27. Drag this Trigger Node into the Group **CLICK-OFF**.
28. In the properties window set the “Sound will ...” to “Stop”.



29. To test your sound system choose **Publish > Preview in Flux**.
30. Click the boxes to turn the sound on and off.

### Option 1: Using “Enter Mouse Over” instead of “Is Clicked”

1. You can choose to stop and/or start the sound by moving the mouse over the trigger (box) rather than clicking on it.
2. Select the TouchSensor Node in the **CLICK-ON** Group.
3. In the properties window change “When this sensor ... Is Clicked” to “When this sensor ... Enter Mouse Over”.



4. Now test your sound system by choosing **Publish > Preview in Flux**.
5. Move your mouse over the On box to turn the sound on.
6. If you want to use the Mouse Over to turn the sound off just also change the **CLICK-OFF** Time Sensor Node to “Enter Mouse Over”.

### Option 2: Using “Exit Mouse Over” instead of “Enter Mouse Over”

1. Follow steps 1 thru 6 above but instead of setting “When this sensor ... Enter Mouse Over” use the option of “Exit Mouse Over”.

### Option 3: Using Autostart for the sound

1. You can also set the sound to start automatically when the page is loaded by selecting the Sound Node to open its properties window.
2. In the Sound Node properties windows select the Sound tab and put a checkmark in Autostart.
3. You can then use your “Is Clicked” or “Enter Mouse Over” to stop and restart the sound.

### Summary:

4. Create a Group Node containing a TouchSensor Node and some object to be clicked on.
5. Set a Trigger using the TouchSensor Node to be triggered either when the object is clicked or the mouse cursor moves over or off of it.

### Words to Know:

- ★ **Clickable Object** – object placed in the scene that can be clicked on with the mouse to perform some predefined action.
- ★ **Zeroing** – to set an object’s XYZ axes to zero in the scene.