Unit Test: Bottom Pop-Up Bar

Bottom Bar:

Functional Testing:

Button:

When button is clicked triangle icon points to the correct direction. When button is clicked content of bar is correctly displayed and transition is applied. When content of bar is being clicked button is still functional. When button is pressed(bar collapses) the changes made to the contents of the bar remain.

Resizing Tracks and Artists Checkboxes:

The size of each node (artist or track) should resize according to the attribute checkmarked. The attributes are: Popularity, Energy, Danceability, and Happiness. These are all measured on a scale from 0 to 1. Example: For the track "Famous" by Ty Dolla \$ign, which has a Popularity of 0.69, the node resized to 69% of its original size when the Popularity checkbox was selected. Comparing this to another track such as, "Relationship(feat. Future)" by Young Thug, which has a higher Popularity(0.84), it is clear to see that the more popular tracks are greater in size. The "Relationship(feat. Future)" node is 84% of its original size compared to the "Famous" node which is only 69% of its size, resulting in a distinct size difference.

In the case of more than one attribute being selected, all of the selected attribute numbers are multiplied together and then applied to the sizing. Example: Using the same track "Famous" (Popularity: 0.69), when the Energy checkbox is selected, 0.69 is multiplied by the Energy number (Energy: 0.29), which results in 0.2. This is then applied to the sizing and the node is now 20% of the original size. Continuing with this process, there are 16 cases that were tested due to there being 4 different checkboxes. The cases are as follows:

(Popularity),

(Energy),

(Danceability),

(Happiness),

(Popularity, Energy),

(Popularity, Danceability),

(Popularity, Happiness),

(Energy, Danceability),

(Energy, Happiness)

(Danceability, Happiness)

(Popularity, Energy, Danceability)

(Popularity, Danceability, Happiness)

(Popularity, Energy, Happiness)

(Energy, Danceability, Happiness)
(Popularity, Energy, Danceability, Happiness)

Filter Tracks and Artists Sliders:

There is a slider for each attribute that greys out the track or artist if it is not in the specified range given by the user. Example: The Popularity slider is given a range of 67-100. Since the track "Famous" by Ty Dolla \$ign has a Popularity of 0.69, it is not greyed out. However the track, "She Wanna Party" by Young Thug has a Popularity of 0.65, which is not in the specified range and results in the node being greyed out.

The edge cases were tested as following. Example: The Danceability slider is given a range of 56-100. Since the track "Famous" by Ty Dolla \$ign has a Danceability of 0.56, it is not greyed out. Moving the slider to the range 57-100 immediately grays out the node. The Danceability slider is then given a range of 0-56. Since the track "Famous" by Ty Dolla \$ign has a Danceability of 0.56, it is not greyed out. Moving the slider to the range 0-55 immediately grays out the node.

When attempting to move the min higher than the max on the slider the button stops and does not continue moving with the mouse along the range.