Narrative Visualization Report

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Messaging:
The Spotify data set contains characteristics of songs like danceability, valence, energy and tempo. The message I am trying to convey with this narrative visualization is what type of genres are best to play at a party with friends. With this visualization, the user will be able to see how different genres have different scores of danceability, tempo, valence (how happy a song is), and the energy of the song. This will help the user see what types of genres are generally played at parties based on these attributes, if that is a regular party and not a sad party with sad music.

Narrative Structure:
This narrative visualization follows a martini glass structure. There are 3 scenes in total, where the first two scenes guide the user into seeing how different genres have different types of energy and tempos (two important factors in dictating how effective this genre would be at a party). The third and final scene is an interactive scene where the user can select a slider with the attributes seen in the previous two scenes to curate their own personal playlist.

Visual Structure:
There are next buttons, previous buttons and a start over button for the user to easily navigate in a linear fashion through the scenes. The first two scenes follow the same simple format with a displayed scatterplot with an annotation at the bottom of the page that explains the reason for the scatterplot and the data involved with it. A d3 annotation is used to prompt the user to hover over each of the data points for additional information. Lastly, the last slide has the user interact with the sliders so they can curate their own playlist. At this point a button is prompted for the user to start over so the user can playback the visualization. The reason for showing the scenes in the order is to get the user to understand the meaning of the genre vs. relationship with the attribute so they can curate their own playlist at the end.

Scenes:
The first two scenes are ordered in the manner in importance of attributes (danceability, valence, tempo, and energy) and their impact on what genre to pick when having a party with music. The first scene shows a graph comparing 30 genres and their average energy levels. The higher energy levels indicate more energy at the party and this is the most important attribute in having a successful party with good music. A good party also has the attendees dancing, so the user can also see the danceability of each genre.

The second scene has the same type of scatter plot but now is instead using tempo on the y axis. This is the second most important attribute in how successful a genre is at a party because generally faster tempos mean more dancing. So this scene is used after the first scene because danceability was an attribute shown in the first scene. The last scene allows the user to curate their own playlist now that they have an understanding of these attributes and what type of genres correspond to these attributes.

Annotations:
The annotations used were static to guide the viewer to understand what the data visualizations meant. Additionally, d3 annotations were used to prompt the user to hover over each data point so they could get more insight about how more attributes are related to specific genres.

Parameters:
The parameters used from the Spotify dataset were genre, valence, danceability, energy, and tempo. In all scenes genre was used as this was the variable we were investigating in this narrative visualization. In the first scene, danceability and energy were the response variables and in the second scene tempo and valence were used. In the final scene, these are used as filters to find a curated list of spotify songs that fit the dimensions of the selected range of the parameters. In the last scene, genre is not a parameter that is used for selection.

Triggers:
There are a few main triggers in this narrative visualization. The first being the next button. The next button triggers the transition to the next scene with the new visualization represented. The second is the previous button, this also triggers for the previous scene to occur. The third is the start over button that is presented when all scenes are finished. This prompts the user to start the visualization all over again without having to refresh the webpage. Another trigger is when the user drags their mouseover points on the scatterplots. It prompts a toolbox to popup with an additional attribute associated with the respective genre. In the last scene, there is a generate playlist button which filters and returns data and calculates a curated list of 10 songs based on the input parameters the user selected.