**Final Project Prototype**

**Project Description**

*YT* is a data visualization video project about *YouTube* culture. What caught my curiosity about this platform is its popularity and stable use among digital users, but it had no artistic project exploring its culture. Since its creation in 2005, the platform has gained new users, channels, and videos after almost 20 years of activity. Because it is a platform that was unexplored in an artistic sense, I want to dive deeper into the subject and try to define *YouTube*’s identity. I want to discover how and why this platform resists and adapts to the changes and trends of the digital culture. I want to find its recurrent themes that will answer why this platform is essential to our digital culture.

My initial idea was to display popular and niche *YouTube* videos of the past 18 years that are data-generated on a webpage. The data will be *YouTube* videos and comments from various channels from 2005 to 2023. I will use pre-existing *YouTube* datasets that cover the years between 2005 (i.e., *YouTube*’s first year of existence) and 2023 to create a randomly generated list of videos. The page will generate new videos after a delay. The usual thumbnail icons will display videos instead in these smaller windows. Generated comments will be displayed. If the video does not interest the user, they can generate new videos by clicking the “skip” button. But if they do, the comments will start floating around on the webpage instead of staying in the comment section. I wanted to use the concept of apophenia, which is the perception of patterns within random data; it draws connections unrelated to the subject and is displayed only due to perceptual simultaneity. Apophenia will happen if the user presses the “skip” button too many times. Each time the user clicks on this button, more floating comments will be generated, and even generated videos will start floating around on the webpage. Comments and images will blend to create an abstract representation of the platform. The more the button is clicked, the closer the users will be to create an abstract representation of *YouTube*'s identity. The web page design was supposed to be like *YouTube*’s video layout.

I wanted to use video and web development for this project because it represents *YouTube*’s essence, a digital platform where you can upload videos. *Node.js,* *React.js*, *npm* packages like *node-ytdl-core* or *react-youtube, HTML* and *CSS* were the programming methods planned in the initial idea because I am new to data collection and its way of collecting it through programming, so I wanted to use something that I was more familiar with.

The goal was to loop sequences of generated *YouTube* videos on a webpage. Once the generation of videos works, I will try to find a way to generate a new video after a specific delay. If this works, I will try to randomize this delay. If this whole generative algorithm works, I will test if I can generate and display more than one new video on the webpage. If it works, I will start working on the webpage's design. Once the design is done, I will start working on the skip interactive button and generate comments on the webpage. If comments can be generated, I will work on adding more floating comments by clicking on the button. If this interaction works, I will try to add videos to the mix. If every step works successfully, then the project will be complete.

After a discussion with Sabine, the data visualization changed. The design will look more Mary Flanagan’s *pile of secrets*. *pile of secrets* is a series that displays video game footage on LCD screens and is exhibited in festivals, art centres and museums. Flanagan collected video game footage from 1980 to 2011 to answer the question: “What makes a game a game?” Flanagan gathered common elements in video games into her database. So, instead of displaying videos on a webpage, the video data will be displayed on multiple screens in a room. Each screen in this installation will be associated with a specific year.

At first, I wanted to display the videos by looping them one after the other. But while pulling the data from their datasets, I thought of testing layering the videos on top of each other like Jason Salavon’s *All the Ways (The Simpsons)*. Thisseries explores all *The Simpsons* episodes as data, covering season 1 to season 26. It gathers all the frames of every episode of the 26 seasons into a single episode. I wanted to layer all the videos like in Salavon’s project. However, while doing the video editing, I noticed that due to the various lengths of the videos, created some gaps in the layering at the end of the dataset video. So, I instead balanced the number of layers on a time frame of approximately five minutes, so the current result of the videos is closer to the aesthetic found in another inspirational data project, *Particle*. *Particle* is a processed urban imagery that fluctuates between recognizable landscapes and abstract data-like patterns combined with dense sound textures. It deconstructs visual and audible urban landscapes. The data collected is videos and sound from across the globe used for the *D-Fuse* documentary *Endless Cities*. The images and sounds have been broken into fragments and then reconfigured.

**Artistic Process**

My goal in this prototype was to select specific years, find datasets that give results fitting to these years, and download their associated videos. I decided to use a five year gap, resulting to four collections. The years were 2005, 2010, 2015, and 2020. Each year had a total of ten videos. All datasets used for this prototype come from *Kaggle*. For the year 2005, I used the dataset *Youtube Oldest Videos (2005) Dataset*, which is a dataset gathering videos released during the first year of the platform. For 2010, I used the *All PewDiePie Videos* and *Youtube videos having more than 1 Billion views* datasets. *All PewDiePie Videos* is a dataset gathering all the videos released by the infamous YouTuber PewDiePie. *Youtube videos having more than 1 Billion views* is a dataset gathering all the videos that reached over one billion views. For 2015, I used the *Top 14 Ever Most Viewed YouTube Videos* and *Youtube videos having more than 1 Billion views* datasets. The *Top 14 Ever Most Viewed YouTube Videos* is a dataset gathering the 14 most-ever watched videos on YouTube. For 2020, I used the *Youtube videos having more than 1 Billion views, Cyberpunk 2077 YouTube Reception* and *Data of YouTube Videos*

The steps missing in the processing is creating more yearly (i.e., the best would be to create), the number of screens to use to display the videos, and how to configure the space with the screens.

**Images/Screenshots**

Detailed images/diagrams of the overall system (i.e. how data flows between the various components)

**How code works**

For each component/feature, provide written descriptions on the usage/purpose and how it integrates into the project

**Where are you in the creative process**

Detailed explanations for which features/components are working and which need to be modified/adapted/scraped or reworked.

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