Decoding Protest Messages

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ABSTRACT

In the summer of 2020, the United States of America was plagued with the challenges of a novel virus outbreak. To add to these stressors, racial tensions were also heightened.. The murders of Ahmaud Aubrey, Breonna Taylor had created social and political tensions around unethical policing of black bodies. As the death of George Floyd spread across the nation, communities of all types found themselves face to face with addressing the systemic and cultural mis-treatment of black people These senseless deaths induced protests throughout the country for the Black Lives Matter movement. These moments sparked our research as we began to read and process the varied statements of support from various institutions within our intersectional and academic communities. As we researched the statements, or lack thereof, from colleges and universities, companies, and organizations our primary research question emerged. We wanted to determine if we could use computational analysis to determine the strength of these statements through their use of actionable words. For the early stages of our work, our research centered around the primary question "How can we extract meaning and social impact intent from messages of support during the George Floyd protests?" This abstract highlights our process and preliminary results from our work.

Keywords
Text-Mining, Socially Relevant Computing

1. BACKGROUND

For the technical aspects of this research, the knowledge and understanding of linguistics is important. Linguistics is "the scientific study of language and its structure, including the study of morphology, syntax, and phonetics" [1]. Additionally this project involves the knowledge of social justice. Social justice is justice in terms of wealth, opportunities, and privilege[2,3]. Another study that is key in to conduct this research was the critical race theory in Human Computer Interaction. "HCI research must be attuned to issues of race", meaning that these interactions are heavily based on views of race [4]. This also applies to the term of code switching in linguistics which relies on assumptions. These statements also prove that inclusion benefits those in power, a key topic in our research. After preliminary research, we hypothesized that institutions with higher percentages of diversity would issue stronger statements with more actionable words.

2. METHODS

To conduct out research, we completed a comprehensive search of websites, social media, and other statements from each institution regarding the current racial tension. After gathering these statements, we cleaned the data by extracting key words from the statements. We converted the clean data into the spreadsheet in order to better organize the data. We then created an additional spreadsheet and determined if the statements contained our designated actionable words which were the terms ``change", "equity", "inclusion", "support", and "race". Once the terms were noted of usage, we then noted the word count of the statements. We then color coded our spreadsheet to visually represent the term usages. We also took a note of who wrote the statement, and what kind of statement it was.

3. RESULTS

A co-relation text analysis was created to visualize the relationships between words in the texts (see Fig.1). We used these results and were able to gather a use of frequently referenced words.
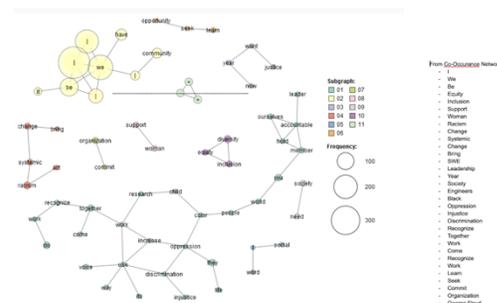

Fig. 1 The correlational diagram and resulting actionable terms list.

From this list of words we extracted 'actionable terms' to help inform the analysis of messages of value from the list. Referencing the use of these terms per entity in our spreadsheet yielded a visualization (see Fig. 2) of most frequented terms and entities with more perceived impactful language within their statements.

Fig. 2 A sample data visualization of actionable terms used by each institution.

The conclusion of our research, we found that our hypothesis was correct. Schools that had higher rates of racial diversity issued statements with more actionable terms. However, application is important also. We realize that not every HBCU issued a statement, and also not every HBCU issued a strong statement which can contradict our hypothesis. Some of our limitations of this research included data types such as Twitter and Instagram images, and also some simple statements that may not have truly been what was issued to the general body. In the future we plan to collect more data in order to come to a more decisive conclusion.

4. ACKNOWLEDGMENTS

5. REFERENCES

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