***Detection and Prevention measures for***

***Cyberbullying and Online Grooming***

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***The watchdog application***

**Online grooming** is an activity of portraying yourself to be someone you are not and exploiting the victim for your purposes, often sexual

Sentiment analysis is done on user posts and comments using NLP (Natural Language

Processing) algorithms to detect user sentiment

Dataset

Here we are using two datasets where the User Messages are classified using **Bad Words Dataset** and **Sensitive Words Dataset** and user's bad count is recorded into the database. If any user exceeds the limit of bad posts or adult images then he/she is automatically banned from using this social networking portal. And hence, this portal is more secure and reliable than Facebook.

***Adult Image Detection Algorithm****:*

This Algorithm detects whether image is an adult image or not using Skin Tone Pixels detection and threshold value for number of Skin tone pixels allowed. Any user who uploads an adult image is warned about posting such images

**PreProcessing**:

*Irrelevant Posts Detection Algorithm:*

Traditional text analytics framework, consists of a Text Preprocessing, Text Representation, and Knowledge

Discovery phase. The Text Preprocessing phase makes the input text more consistent using techniques such as stop word removal and stemming. Stop words and function words are words that expresses a grammatical or structural relationship with other words in a sentence. These words have little or no meaningful content and therefore the topics that are discussed in the text that is analyzed is not taken into consideration. Stop words and function words are also known as grammatical

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Processing

User posts, comments are analyzed to classify into Crime, Riots, and Worst or Vulgar categories using Text

Mining from Dataset and Online API's.. A foreign word could be words borrowed from other languages as well as misspelled words, abbreviations or slang words.

Illegal posts must be checked using Sentiment Analysis based on text. Sentiment analysis is done on user

posts and comments using NLP (Natural Language Processing) algorithms to detect user sentiments

If a person posts name of any person then he/she is notified. If a user uploads a picture of any other user, then he/she gets notified about the photo uploading event. Then the user can allow or deny the process of uploading. While uploading picture of any friend, approval of that user is needed otherwise that picture will not be uploaded on portal

Accuracy: NONE

Sentiment analysis is not enough. Because computer programs have problems recognizing things like sarcasm and irony, negations, jokes, and exaggerations - the sorts of things a person would have little trouble identifying. And failing to recognize these can skew the results. 'Disappointed' may be classified as a negative word for the purposes of sentiment analysis, but within the phrase “I wasn't disappointed", it should be classified as positive.also  Russell said, “Like all opinions, sentiment is inherently subjective from person to person, and can even be outright irrational. It’s critical to mine a large — and relevant — sample of data when attempting to measure sentiment. No particular data point is necessarily relevant