

Emotion Detection in Social Media Text Data Using IndoBERT

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ABSTRACT

Emotions play a crucial role in daily human interactions, particularly within social communication [1]. They can greatly affect decision-making and a comprehensive understanding of emotional expressions in text can improve human-computer interactions [2]. The goal of this study is to detect emotions in text data distributed through social media using the IndoBERT approach, which blends global text context comprehension with local feature extraction. Emotions can be classified into six fundamental categories: fear, disgust, anger, surprise, happiness, and sadness [3].

In this research, we aim to evaluate the performance of the IndoBERT method in identifying these six emotions within social media text data. The objective is to apply the model and assess its effectiveness in recognizing the intended emotions. The study employs text data from several social media platforms like Twitter, YouTube, Instagram, Blogs & Forums, News, Facebook, and Tiktok, with a focus on telecommunications topics.

The experimental findings reveal that IndoBERT attains an accuracy rate of more than 90% and successfully detects six emotions. This result confirms that the IndoBERT approach shows prospects for identifying emotions in social media texts. By delivering accurate and timely emotional analysis, it can improve diverse applications, such as sentiment analysis, human-computer interaction, and consumer insights.

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