JURNAL MEDIA INFORMATIKA BUDIDARMA

Volume 7, Nomor 1, Januari 2023, Page 542-553 ISSN 2614-5278 (media cetak), ISSN 2548-8368 (media online) Available Online at https://ejurnal.stmik-budidarma.ac.id/index.php/mib DOI 10.30865/mib.v7i1.5598



Personality Detection On Twitter User With RoBERTa

Rianda Khusuma^{1*}, Warih Maharani², Prati Hutari Gani³

School of Computing, Informatics, Telkom University, Bandung, Indonesia Email: 1*riandakhusuma@student.telkomuniversity.ac.id, 2wmaharani@telkomuniversity.ac.id, 3pratihutarigani@telkomuniversity.ac.id
Correspondence Author Email: riandakhusuma@student.telkomuniversity.ac.id

Abstract– Social media provides a service where users can make status updates about themselves. One of the social media that has such a facility is twitter. Twitter allows its users to express themselves easily by uploading tweets to their Twitter accounts. These activities on social media can indirectly describe the personality of the account owner. One form of personality classification that can be used is the big five personality. This theory classifies individual characters into five personality types, namely openness, conscientiousness, extraversion, agreeableness, and neuroticism. In the work environment, personality will significantly affect the work that is suitable for someone to do. To do a personality test, a test that is done manually, certainly takes longer and costs more. Therefore the use of machine learning to detect personality from social media is needed. By using the RoBERTa model to perform personality classification and dataset support from Twitter tweets, a system can be formed to detect personality. In the RoBERTa model, by determining the optimal ratio of training data and test data, as well as performing hyperparameter tuning, accuracy results can be obtained in classification activities, reaching 57.14%.

Keywords: Twitter; Personality Classification; Big Five Personality; RoBERTa; Hyperparameter