

Title: Detection of Online Impersonation based on User Profiling in Social Networks through Optimized Support Vector Machine Algorithm

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ABSTRACT

The researchers presented an optimized support vector machine algorithm to detect online impersonation based on its user profiling in social networks. The applied metaheuristic algorithm, firefly algorithm, the instance-based selection which to filter noisy instances and select relevant data for SVM training. The scheme compromises Machine Learning techniques which to training and test the extracted dataset from both users, Genuine and Intruder. Comparison between the traditional support vector machine (TSVM) and optimized support vector machine (OSVM) through its speed of training, accuracy score and predicted label in testing. Results are consisting the percentage of OSVM trained data optimized, computed accuracy and prediction.

Keywords: Online Impersonation, User Profiling, Social Networks, Supervised Machine Learning, Binary Classification, Support Vector Machine, Kernel Function, Firefly Algorithm, Instance Selection, Behavioral Pattern