Abstract

This study looks at how emotions, which are complex reactions affecting many parts of our lives and work, are influenced by different activities. Emotions are shaped by things we're aware of and things we're not, and they're connected to our mood, personality, attitudes, and what motivates us. In this research, we checked out how 50 peoples felt after doing one of three things: watching a movie then going for a walk, listening to music then going for a walk, or listening to music while walking. To figure out how these activities affected people's emotions, we used some well-known techniques like logistic regression and random forest. But we also tried something new: we tweaked a method called SVM (Support Vector Machine) by randomly adjusting its settings to see if it could better identify emotions compared to the usual methods. Our results showed that this new SVM method was pretty good at telling if someone was happy or sad after these activities, with at least an 81.4% success rate, which was better than the other methods we tried. When it came to recognizing if someone was happy, sad, or neutral, SVM did well again, with a success rate of at least 68.2%, beating logistic regression but not doing as well as random forest in this case.

Keyword: Emotion, Heartrate, SVM, Smartwatch, Hyper Tuning SVM