

ABSTRACT

Over time, the number of educational games that exist is increasing. The game makes education more fun. However, it is very unfortunate that there are still many educational games that are too rigid and too focused on the educational aspect so that they forget their identity as games that aim to relieve fatigue. This research was conducted to avoid this problem, by adding an Artificial Intelligence system to educational games, it is hoped that the game can provide an interesting and entertaining experience without creating a sense of stiffness and eliminating the educational aspect.

To provide an interesting experience from the game being played, the artificial intelligence system implemented is one of the Parametric Equation Algorithms, namely the Bézier Curve Algorithm. An algorithm that forms a curve trajectory that will become a cross motion of obstacles. The trajectory of the curve will not perform the same movement pattern twice. By implementing this algorithm in one aspect of the game, an interesting experience will be born in every gameplay of the game being played, because one gameplay will not be exactly the same as the previous one.

This game was developed on the Android platform with the Bézier Curve Algorithm system already implemented. The test was conducted on 33 high school/vocational high school students with the age range (15-20 years). The results obtained, 96.9% of respondents agree that the game is interesting for them and 93.9% feel interested in Indonesian debate after playing the game, 81.9% get an interrupt button that appears in a different location each time they play the game.

Keywords: *Game, Artificial Intelligence, Android, Education, Bézier Curves*