

ABSTRACT

In this task will be developed in a virtual game that connects with real-time cameras that can recognize a marker. So the game will be seen performing on the marker. Rubber Ball game system is divided into several subsystems namely the introduction of the marker, displaying the game on the marker and gaming systems. In recognition subsystem marker will be taken online from the camera image data to compare the marker with a pattern using the technique of Augmented Reality - Toolkit (AR-Toolkit). Then made 3D games using Papervision 3D that will appear above the marker. Game consists of a maze and a ball field as a player, and there are obstacles and points that should be taken to be able to proceed to the next level. In subsystem plays this game will detect the movement of the marker so that the ball will move to carry out the mission game. The movement of the ball using Euler matrix technique.

Keywords: *Augmented Reality, Papervision 3D, Euler, Realtime*