

ABSTRACT

The navigation system helps visitors to access new, unknown places. With current technological advances allowing visitors to use this system with Smartphones, but unlike the Global Positioning System (GPS) which uses satellites, the Real Time Locating System cannot be run effectively if only relying on GPS because the view of the building from above so that the roof is covered and covered indoor. So we need a solution for this. The solution in question uses the Real Time Locating System to allow visitors to know the navigation in a room.

Making this system aims to make visitors not confused when coming to a new place. In this case study, a Real Time Locating System is implemented using Augmented Reality (AR) as a solution to direct visitors to their desired destination. The implementation is in the form of a mobile application that uses the Android operating system with the help of the Unity AR Foundation and ARCore. This research was conducted at Keraton Kanoman Cirebon, Cirebon City.

The results of the test show that the direction of the navigation path displayed on the application leads to the right destination and according to the path, however in scanning the QR Code it is necessary to adjust to the direction of the plan so that the navigation displayed directs the navigation to the right destination. Applications can run smoothly at a frame rate of 60fps without any degradation, and stable RAM usage around 1500 to 2000 MB.

Keywords : *Augmented Reality, Real Time Locating System, ARCore .*