

**PENGEMBANGAN MEDIA PEMBELAJARAN BUKU DIGITAL
BERBASIS AUGMENTED REALITY MATA PELAJARAN KOMPUTER
DAN JARINGAN DASAR PADA SUB POKOK
BAHASAN PERAKITAN KOMPUTER**

Oleh

I Komang Hery Abdi Suputra, NIM. 1515051087

Program Studi Pendidikan Teknik Informatika

Jurusan Teknik Informatika

ABSTRAK

Tujuan dari penelitian ini adalah mengembangkan aplikasi *Augmented Reality* Perakitan Komputer pada platform android, sebagai salah satu media untuk mempermudah dan memberikan daya tarik tersendiri dalam pemahaman materi perakitan komputer pada mata pelajaran komputer dan jaringan dasar SMK TI Bali Global Singaraja.

Pengembangan aplikasi *Augmented Reality* Perakitan Komputer menggunakan model ADDIE yang terdiri dari lima tahapan, yaitu tahap *analysis, design, development, implementation* dan *evaluation*. Pada model ini dilakukan proses evaluasi disetiap tahap-tahap yang dilalui secara terus-menerus sehingga menghasilkan produk yang sesuai dengan kebutuhan di lapangan.

Hasil akhir dari pengembangan ini berupa aplikasi *Augmented Reality* Perakitan Komputer yang dapat digunakan melalui perangkat *mobile* dengan sistem operasi Android. Hasil akhir penelitian ini menunjukkan bahwa, aplikasi *Augmented Reality* Perakitan Komputer termasuk kedalam kriteria sangat baik. Hasil yang diperoleh berdasarkan uji *black-box* diperoleh presentase keberhasilan 100%, uji *white-box* diperoleh presentase keberhasilan 100%, uji ahli isi persentase keseluruhan penilaian yaitu 95,5%, uji ahli media diperoleh persentase keseluruhan penilaian yaitu 94%, uji *usability* diperoleh presentase keberhasilan 89,7%, uji efektivitas diperoleh presentase keberhasilan 62,18% yang termasuk dalam kategori sedang, dan untuk uji respon pengguna dengan metode UEQ memperoleh hasil sangat baik.

Kata Kunci : *augmented reality*, media pembelajaran, perakitan komputer, android

**THE DEVELOPMENT OF DIGITAL BOOK LEARNING MEDIA
BASED ON AUGMENTED REALITY OF IT
AND BASIC NETWORK SUBJECT
ON COMPUTER ASSEMBLY MATERIAL**

Oleh
I Komang Hery Abdi Suputra, NIM. 1515051087
Informatics Education Study Program
Informatics Department

ABSTRACT

The purpose of this study is to develop Augmented Reality Computer Assembly applications on the Android platform, as one of the media to facilitate and provide its own attraction in understanding computer assembly material in IT and the basic network subject in SMK TI Bali Global Singaraja.

The development of the Augmented Reality Computer Assembly application used the ADDIE model which consists of five stages, namely the analysis, design, development, implementation and evaluation. In this model the evaluation process is carried out in every stage that is passed continuously with the result that produces a product that complies with requirements in the field.

The result of this development is the Augmented Reality Computer Assembly application that can be used via mobile devices with the Android operating system. The final results of this study indicate that, the Augmented Reality Computer Assembly application belongs to very good criteria. The results obtained based on the black-box test are the percentage of success is 100%, the white-box test obtained the percentage of success is 100%, the content expert test overall percentage of assessment is 95.5%, the media expert test obtained the percentage of overall assessment is 94%, the usability test is obtained the percentage of success is 89.7%, the effectiveness test was obtained the percentage of success is 62.18% which was included in the medium category, and for the user response test with the UEQ method obtained very good results.

Keywords: augmented reality, media, computer assembly, android