

**BORANG PENGESAHAN STATUS TESIS^**

JUDUL: E-EDUCATION FOR PMR STUDENT ( EEDU )

SESI PENGAJIAN: SEMESTER 1 TAHUN 4(2006)

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E-Education For PMR Student  
( EEDU )

MOHD ZAINI BIN ESA

This report is submitted in partial fulfillment of the requirements for the  
Bachelor of Science Computer (Software Development)

FACULTY OF INFORMATION AND COMMUNICATIONS TECHNOLOGY  
KOLEJ UNIVERSITI TEKNIKAL KEBANGSAAN MALAYSIA

2006

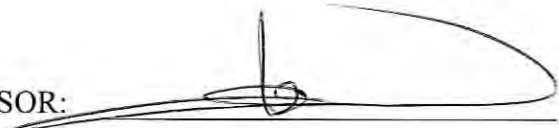
## DECLARATION

I hereby declare that this project report entitled

### **E-EDUCATION FOR PMR STUDENT ( EEDU )**

is written by me and is my own effort and no part has been plagiarized without citations.

STUDENT :  Date: 22/11/2006  
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## **DEDICATION**

To my God, Allah SWT

To my greatest Idol, Rasulullah SAW

To my beloved parents, Amidah Bnti Mat Bakeri

To my sisters

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First and foremost, I would like to express my appreciation to in Kolej Universiti Teknikal Kebangsaan Malaysia ( KUTKM ). Specifically the Proff. Madya Dr. Shahrin Bin Sahib @ Sahibuddin who is the FTMK Dean for giving me this golden opportunity to undergo my PSM . Many have helped me throughout my PSM and I would like to take the opportunity to thank the people who have facilitated and guided me.

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## **ABSTRACT**

This PSM program was designed to provide students with the real life experience on the system research which is to research a new system. The E-Education For PMR Student is an online system for quiz online. The purpose of the project is more towards on the developing IT knowledge among the primary and secondary school. For overall, this system using internet technology as a main communicator to generate the quiz and mark process. Beside that, from the research that I have done, there is some problem that happens in this system such as data redundancy for example. So with all chapter that we do, such as introduction, literature review, design and analysis, all the problem can be identify and this problem can be solved. The system that will be developed will help all users whether the teacher to do their task.

## ABSTRAK

Subjek PSM dijalankan adalah untuk menyediakan semua pelajar kepada kehidupan yang sebenar terutamanya dalam penyelidikan sistem dimana pelajar akan didedahkan untuk menjalankan penyelidikan sistem masing-masing. E-Education For PMR Student adalah sistem 'online'. Sistem ini merupakan sistem pembelajaran untuk meningkatkan kadar Celik IT di kalangan pelajar sekolah rendah mahupun menengah. Skop projek ini ialah menjawab soalan kuiz secara 'online' dan seterusnya pelajar akan mendapatkan jumlah markah yang diperolehi berdasarkan jawapan kuiz yang telah dijawab. Sistem ini menggunakan metodologi OOAD sebagai kaedah aplikasi dalam menjalankan tesis. Setelah menjalankan tesis ini, terdapat beberapa masalah yang telah dikenalpasti. Dengan adanya kaedah tesis yang digunakan dalam bab-bab penyelesaian seperti bab pengenalan, kajian literature, rekabentuk dan analysis, maka masalah seperti ini akan dapat diselesaikan. Dengan adanya system seperti ini, maka ia akan membantu semua pihak dalam menjalankan tugas masing-masing.

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## LIST OF ABBREVIATIONS

KUTKM	Kolej Universiti Teknikal Kebangsaan Malaysia
FTMK	Fakulti Teknologi Maklumat dan Komunikasi
PSM	Projek Sarjana Muda
OOAD	Object Oriented Analysis Design
UML	Unified Model Language
RUP	Rational Unified Process
OO	Object Oriented
TCP/IP	Transport Control Protocol / Internet Protocol
OS	Operating System
LAN	Local Area Network
NIC	Network Interface Card
ID	Identity
EEDU	E-Education
ERD	Entity Relationship Diagram
DBMS	Database Management System
AUT	Application Under Test

# CHAPTER I

## INTRODUCTION

### 1.1 Project Background

From medical, economy, ship, astronomy, estate, education and etc, all during this base on IT. Education generally experiences change which very apparent. Start with use black board in school, afterwards budge to white board, afterwards device help teach like OHP and next which online education in language IT adult now e-learning.

Online education for the last 10 years become requirements since web dominate internet. This is the reason that triggers me to start this project. The topic of this project is “E-Education For PMR Student”. This system can be used by any teacher and student of specific history subject in school. This approach is student ability evaluation by on line which let them to make to quiz or examination with more effective and it provide answer response with and immediately. Set that’s question be provided by teacher guide by Kurikulum Bersepadu Sekolah Menengah ( KBSM ) and students also have the opportunity to learn by them self. So mainly the purpose of this project is want to build the new systematic system of online education in the school.

The project is a web based system. It encourage student make study with more flexible on when hours and it also let those who at city outside follow education at community library or school laboratory.

## 1.2 Problem statement

In the current system, there are many problems. The manual system would give some problems to the user. Losing data is the main problem in the manual system. Mainly the questions quiz in the manual system is store in the cupboard or files is the specific data room, which it's content many more data from other. So the possibility of losing data is high. This thing always happens in the manual system.

There are several things that have been improved based on the current system. Firstly is the manual system that been used before will be computerized. By computerizing the system, there are database which can store data about the quiz questions sample.

When we want to find data especially student marks, just click search and the computer will search the data in the database. While using the computerized system the process will be more easily and faster. It takes more time to manage the data by using the manual system. Sometimes for searching student information, it is hard to find. All this things would not happen to computerized system.

## 1.3 Objectives

- Education which more effective and interactive can be performed. The system allow administrator to add, edit and remove the data or information.
- No more hours gap and distance which become barrier to learn. The system that will be developed store all the data in database.

- Increase rate wake IT at school level more.  
For are government respond, so that wake IT on school level more and achieve “Wawasan 2020”.
- The system is user friendly and easier to use by student.  
To make it easier for student to use the system because the system that will be developed can categorize for the quiz questions.

#### 1.4 Scopes

The main scope of the project is divide two categories teacher and student. Teacher or administrator can manage the system when student act as user the system.

1. Administrator
  - System Administrator to manage the application. Any the new teacher can register from the administrator.
2. Teacher
  - Teacher to manage the application. Any problems, issues or anything about the application will be overcome by the Teacher. The teacher also will be responsible in maintaining the application, such as updating the application to meet the current issues on education.
3. Registration Module
  - Registration module is a module that will be used by administrator for register both teacher and teacher for register both student. In these modules, teacher or student will get username and password. Username and password given will be used in login modules. All the data will be reuse in other modules.

In login module, teacher and student will key in data like their ID and password. This module will grant the teacher and student access to their responsible module. This module will add more security to the system by limiting access from unauthorized person.



4. Student Module.
  - This module is divide into two parts, one is for the student and one is for the teacher. Teacher is responsible to update the student data. This module can be access by both student and teacher but with different interface.
5. Search Module
  - In Search, the teacher can perform search for information that is stored in the “E-education For PMR Student” application. The teacher can search for the student from the application’s database.
6. Quiz question sample.
  - This section will list out the selected questions sample. This is for the user or student to make references on the certified quiz sample and the mark result, can be viewed from this module.
7. The target user of this system is the PMR student especially history subject.

### **1.5 Project significance**

The system that will developed can benefit teacher of school. This system not only far distance education by cyber but also it having test for student, and web page directory which related with education purpose and information which usefully like school information, calendar annually, education activity and etc.

In the maintenance, this system is easily to maintain. It is because this system is using database to store the data. Not like the manually system, all the data is storing in the cupboard and hard to maintain. So the benefit is this system is easily to maintain, systematic and effective than the old system. So it can handle more data than old system.

Last but not least, by realizing this project, we hope that it will bring out the benefits to the users and meet the user requirements and this application will be



expended to fulfill the students' needs in gaining more information on education and also other types of examination problems.

## **1.6 Conclusion**

The E-Education For PMR Student will be developed specially for the teacher of school and specific history subject. The objectives of this project also discussed to show what this project could do who will benefit from it. In the projects scopes, there are brief information about where the new system can be implemented and who can use the system. The functions of this project are also listed for easier understanding.

Chapter two will explain on the methodology and literature review for this project.

## **CHAPTER 11**

### **LITERATURE REVIEW AND PROJECT METHODOLOGY**

#### **2.1 Introduction**

The literature review and project Methodology is a chapter that describe analysis and case study of the existing or similar system that related to the project will be describe here.

In this chapter, the literature review is focus on the research of the current system and the new system. The purpose of a literature review is to explain how the question to be investigated fits into the larger picture and why this approached the topic. This section of a scholarly report allows the reader to be brought up to date regarding the state of research in the field and familiarizes to any contrasting perspectives and viewpoints on the topic.

#### **2.2 Fact and finding**

“E-Education For PMR Student” is a web-based system that is specifically for online education. The aim of this discussion is not for giving comments to current system or system constraints, but to give the overview of the concepts that will be used in the development of this project. The newly develop project will be target to counter the problem faced by the previously developed online education websites

## 2.2.1 Case Study 1 : E-Learning System

Website : <http://www.the-teamwork.com/en/home.aspx>



Figure 2.1 : E-Learning System

This Online E-Learning System has effectively website which are user booking Online. This is a part of existing website, through which members and visitors can access the E-Learning system. The links in the boxes shown on the left hand side of this website are typical of the links that would appear on the E-Learning website. The addition of these bottoms is all that is required to add the E-Learning Booking Manager to your website. These buttons can be customized in any shape or form to contents the website's needs and layout.

In the online user registration process, the user will be requested to fill in the registration form that consists of user's profile and user's login authentications. Upon completion of registration process, an automated e-mail will be sent via e-mail to verify the registration process. The user's will be requested to click the verification link that was sent to complete the registration process.

The new booking process allows the user to book the system though the online booking service. The cancel booking process allows the user to cancel the

booking that has been made provided that the users already have pending booking reservation. The manage profile process allow the user to modify their profile information if necessary. The booking report status allows the user to generate report on booking status that has been done through e-mail reservation.

The benefits of using E-Learning systems:

- Learn anytime, anywhere
- Easy to use
- Self-Paced and Control
- Value
- Cost Saving
- Is Learner Focused
- Is Measurable
- Interactive
- Keeping Up
- Emphasis's Solutions and Learning Results
- Same or Better Learning Outcomes
- Faster Response Time
- Better use of "Expert"
- Remediation and practice

As for conclusion, this booking service does not have any booking by E-Learning system.



## 2.2.2 Case Study 2 : Cisco System

Website : <http://www.cisco.com/>

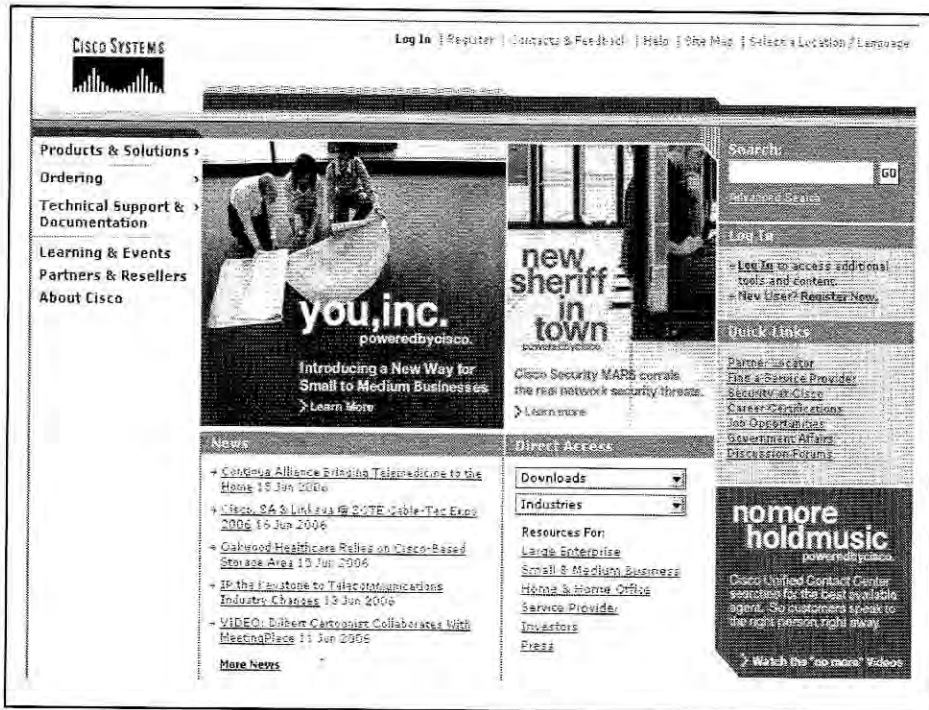


Figure 2.2 : Cisco System

As for the developed system, the current basic flow involves authentication, online user registration and searching.

The authentication process consists of authentication type that is authentication for login. In the authentication for login, the system will scan the login as to verify the validity of user's authentication.

In the online user registration process, the user will be requested to fill in the registration form that consists of user's profile and user's login authentications. Upon completion of registration process, an automated e-mail will be sent via e-mail to verify the registration process. The user's will be requested to click the verification link that was sent to complete the registration process.

The searching process in this system involves the searching for networking, references book, partner and reseller and etc about the networking system or Cisco Systems.



### 2.2.3 Case Study 3 : Cikgu.Net

website : <http://www.cikgu.net.my>

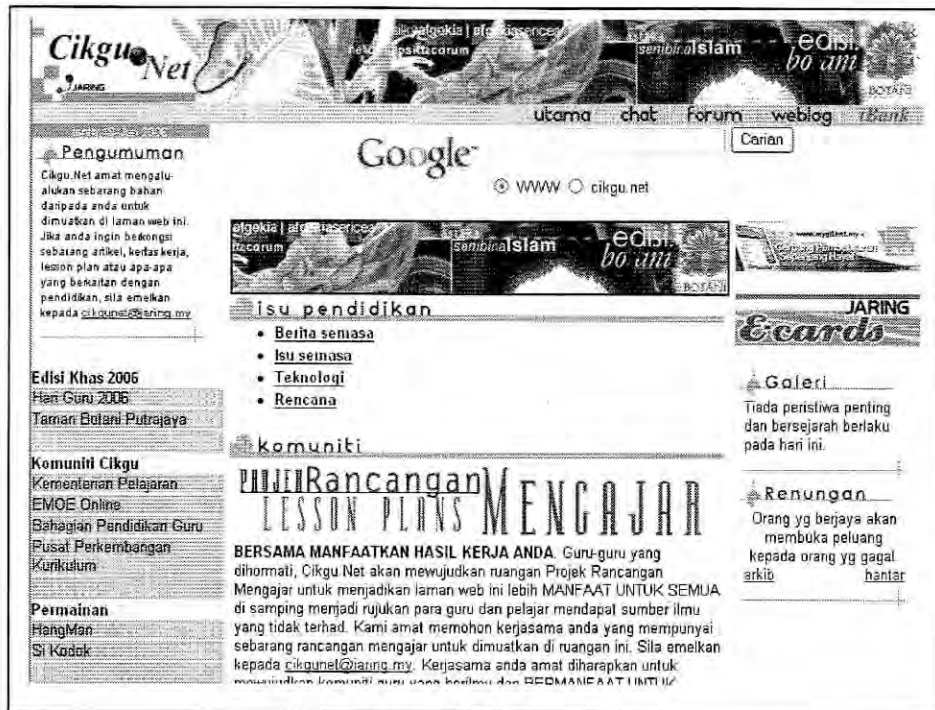


Figure 2.3 : Cikgu.Net

The currently developed online service is not a stable version of the online service because of its online service was not functioning according to user's request.

As for its functionality, it involves only web pages information about education and view search and not authentication in this system. The search process allows the user to search for available information for the selected education. The view search education allows the user to view the search education that was done previously by the user as to see the availability of the education.

As for conclusion, this education service does not allow the user to just view for information for the teacher.