

BORANG PENGESAHAN STATUS TESIS*

JUDUL: MULTIMEDIA QUESTION GENERATOR FOR MOBILE USAGE

SESI PENGAJIAN: 2008/2009

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_____ TIDAK TERHAD


Tandatangan Penulis:

Alamat Tetap: No.21, Jalan 7,
Taman Sri 12, Batu 12,
42200 Kapar, Klang, Selangor
Tarikh: 3.7.2009


Tandatangan Penyelia:
(Dr. Sazilah Binti Salam)

DR. SAZILAH BT. SALAM
Pensyarah
Fakulti Teknologi Maklumat dan Komunikasi
Universiti Teknikal Malaysia Melaka

Tarikh:

CATATAN: **Tesis dimaksudkan sebagai Laporan Projek Sarjana Muda (PSM)
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MULTIMEDIA QUESTION GENERATOR FOR MOBILE USAGE

WAHIDAH BINTI BAKAR

**This report is submitted in partial fulfillment of the requirements for the
Bachelor of Computer Science (Interactive Media)**

**FACULTY OF INFORMATION AND COMMUNICATION TECHNOLOGY
UNIVERSITI TEKNIKAL MALAYSIA MELAKA
2009**

DECLARATION

I hereby declare that this project report entitled
MULTIMEDIA QUESTION GENERATOR FOR MOBILE USAGE

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

STUDENT



(WAHIDAH BINTI BAKAR)

Date: 3-7-2009

SUPERVISOR



(DR. SAZILAH BINTI SALAM)

Date: 3-7-2009

DEDICATION

Special dedicated to my beloved parents,
Tn. Haji Bakar Bin Md. Ali and Pn. Hajjah Masnah Binti Haji Ayob

For my supervisor,
Dr. Sazilah Binti Salam

And lastly to my beloved friends who have encouraged, guided and inspired me
throughout my journey in education.

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ABSTRACT

This project that entitled “Multimedia Question Generator for Mobile Usage is the application of mobile learning that produce to provide a supplementary method for lecturer to generate a question based on Taxonomy Level. This application basically has two main modules. Among the modules is to provide features for admin to register and manage the user accounts and to provide features for lecturers to create a question based on Taxonomy Level. The question will be saved as a file format that supported to use in the affordable mobile phone. The question will be stored to the question bank in the database. Hopefully, this project will become one of the potential supplementary methods for lecturer in the future.

ABSTRAK

Projek ini yang bertajuk “Multimedia Question Generator for Mobile Usage” adalah merupakan aplikasi yang dihasilkan untuk menyediakan satu kaedah tambahan kepada pensyarah untuk membina soalan berdasarkan Taxonomy Level. Aplikasi ini mengandungi dua modul utama. Antaranya ialah modul untuk menyediakan satu cara kepada admin bagi mendaftar dan menguruskan akaun pengguna dan menyediakan cara untuk pensyarah membina soalan berdasarkan Taxonomy Level. Soalan yang telah dibina akan disimpan sebagai format yang boleh digunakan pada telefon bimbit yang bersesuaian. Soalan yang telah dibina itu akan disimpan ke dalam bank soalan di dalam pangkalan data. Diharap agar projek ini menjadi salah satu kaedah tambahan untuk pensyarah yang berpotensi pada masa akan datang.

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LIST OF ABBREVIATIONS

SMS	-	Short Message Service
MMS	-	Multimedia Messaging Service
MP3	-	MPEG Audio Layer III
GPS	-	Global Positioning System
M-Learning	-	Mobile Learning
ICT	-	Information and Communication Technology
E-Learning	-	Electronic Learning
pdf	-	Portable Document Format
CBT	-	Computer-Based Training and Learning
CD-ROM	-	Compact Disc Read-Only Memory
PNG	-	Portable Network Graphics
HTML	-	HyperText Markup Language
PC	-	Personal Computer
ADDIE	-	Analyze, Design, Develop, Implement, Evaluate
ISD	-	Instructional System Design
PHP	-	Personal Home Page
MySQL	-	Structured Query Language
OS	-	Operating System
RAM	-	Random-Access Memory
GHz	-	GigaHertz
GB	-	GigaBytes
LCD	-	Liquid Crystal Display
CD-R	-	Compact Disc Recordable
IQBAES	-	Intelligent Question Bank and Examination System
SCORM	-	Sharable Content Object Reference Model

xml	-	eXtensible Markup Language
PSM	-	Projek Sarjana Muda
LAN	-	Local Area Network
CD	-	Compact Disc
TFT	-	Thin Film Transistor
mm	-	Millimeter
MB	-	MegaBytes
GUI	-	Graphical User Interface
RDBMS	-	Relational Database Management System
DBMS	-	Database Management System
d-Learning	-	Distance Learning
e-book	-	Electronic Book
DVD-R	-	Digital Versatile Disc Recordable
MQG	-	Multimedia Question Generator

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CHAPTER I

INTRODUCTION

1.1 Project Background

A mobile phone is an electronic device used for mobile voice or data communication over a network of specialized base stations. In addition to the standard voice function of a mobile phone, current mobile phones may support many additional services and accessories such as SMS for text messaging, email, packet switching for access to the Internet, gaming, Bluetooth, infrared, camera with video recorder, MMS for sending and receiving photos and video, MP3 player, radio and GPS.

Nowadays, M-learning employs the same pedagogical methods as any other conventional learning method. “M-learning is a relatively new tool in the pedagogical arsenal to assist students and teachers as they navigate the options available in the expanding world of distance learning. M-learners typically view content and lessons in small, manageable formats that can be utilized when laptop or fixed station computers are unavailable. It is currently being used in a variety of educational, governmental and industrial settings (Douglas McConatha and Matt Praul, 2007).”

The purpose of this project is to develop a question generator to the lecturers or educators. The system proposed is a Multimedia Question Generator for Mobile Usage. Question generator is a question creation engine that enables lecturers to construct the questions. This multimedia question generator for mobile usage is a

new supplementary for lecturers to create a set of question to students. It provides the features for lecturers to easily create question based on Taxonomy Bloom Level for mobile usage. The questions will be send to the server and store into the database.

Taxonomy Bloom is a classification of the different objectives that lecturers or educators set for students. It divides educational objectives into three domains that are Affective, Cognitive and Psychomotor. This taxonomy created for categorizing level of abstraction of questions that commonly occur in educational settings. It provides a useful structure in which to categorize test questions. There are six level in this taxonomy namely knowledge, comprehension, application, analysis, synthesis and evaluation.

For this project, Malacca Matriculation College's lecturer teaching in Biology subject will be as the data collection. The selected subject for this project is Biology because this subject is more difficult than other subject in the matriculation. Student need to spend more time memorizing names in Biology than other subjects.

1.2 Problem Statements

According to the research at the Malacca Matriculation College, the problem statements of the project have been identified. The problem statements are:

- **Past year questions are not easily sharable and not reusable**

The past year questions are stored in the library. Question bank in the library is keeping the entire examination questions. But, mostly hardcopy of the examination questions that have been stored in the library lost. So, lecturers are unable to share and reuse the questions.