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JUDUL: **ICT PORTAL FOR LABUAN CORPORATION**
SESI PENGAJIAN: **1-2007**
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ICT PORTAL FOR LABUAN CORPORATION

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

FALCULTY OF INFORMATION AND COMMUNICATION TECHNOLOGY
UNIVERSITI TEKNIKAL MALAYSIA MELAKA
2007

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DECLARATION

I hereby declare that this project report entitled

ICT PORTAL FOR LABUAN CORPORATION

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

STUDENT : _____ DATE: 12/11/07
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DEDICATION

To my beloved parents, Mr. Johor Bin Hj Jabat and Pn Noimah @ Norsimah Binti Wahab, for their seems less expression of love and fully support.

To my supervisior, Mr burhanuddin Bin Mohd Aboobaider, for making it all worthwhile.

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ABSTRACT

ICT Portal developed especially for LABUAN Corporation for solve problems that faced by PL such as none systematically data which it store in database (Microsoft Access). Not only that, it also for upgrade the current system. The main purpose to develop this system is to make easy and exposed user into Information Technology world where it rapid developing and not user know about it. ICT Portal is system that based web where used only by intranet. This system develop using PhpMyAdmin which it a package 3 in 1 (PHP *(PHP Hypertext Preprocessor)*, MySql *(Relational Database Management System)*, Apache Server). This system comprises to three modules that is complaint system, upload and download software and forum discussion. Besides, this system explains analysis, design and the methodology are used throughout this system development. In the development this system, model Spiral selected because it very suitable where each phase shall be tested prior before stepping to phase another.

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ABSTRAK

ICT Portal dibangunkan khusus untuk Perbadanan Labuan adalah untuk menyelesaikan masalah-masalah yang dihadapi oleh PL itu sendiri seperti tidak sistemetik data yang di simpan di dalam pangkalan data (*Microsoft Access*). Bukan itu sahaja, malah untuk penambahbaikan sistem yang sedia ada. Tujuan utama sistem ini dibangunkan adalah untuk memudahkan dan mendedahkan pengguna dalam dunia teknologi maklumat yang sedang pesat membangun pada masa ini dimana sesetengah pengguna tidak peka mengenainya. *ICT Portal* adalah sistem yang berasaskan web dimana hanya digunakan secara intranet sahaja. Pembangunan sistem ini mengunakan perisian PhpMyAdmin dimana ia adalah pakej 3 dalam 1 (PHP *(PHP Hypertext Preprocessor*), MySql *(Relational Database Management System)*, Apache Server). Sistem ini terdiri kepada tiga modul iaitu sistem aduan (*complaint system*), muat naik dan muat turun perisian (*upload/download software*) dan perbincangan di dalam forum (*forum discussion*). Tesis ini menerangkan analisis dan rekabentuk serta metodologi yang digunakan sepanjang pembangunan sistem ini. Dalam pembangunan system ini, *Spiral model* dipilih kerana ia amat bersesuaian dimana setiap fasa akan diuji terlebih dahulu sebelum melangkah ke fasa yang lain.

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LISTS OF ABBREVIATIONS

ABBBREVIATION	NAME
ICT	Information and Communication Technology
PHP	PHP Hypertext Preprocessor
MySql	Relational Database Management System
ERD	Entity Relationship Diagram
UTeM	Universiti Teknikal Malaysia Melaka
LC	LABUAN Corpration
DFD	Data Flow Diagram
PSM	Projek Sarjana Muda

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CHAPTER 1

INTRODUCTION

1.1 Project Background

LABUAN Corporation also known as *Perbadanan Labuan* was founded on 1st July 2001 under LABUAN Corporation Act 2001(Act 209). This new entity comprises two agencies namely the *Lembaga pembagunan Labuan* and *Majlis Perbandaran Labuan*. LABUAN Corporation is one of the government organizations which is given the role of planning, actualizing, developing, and monitoring infrastructure as well as the economic social function in Labuan Federal Teritory (F.T Labuan) which in 609 Act).

The system that developed is "ICT Portal of LABUAN Corporation" which is a combination system and website. This system used to handles the complaint system, software and forum. Portal is a site created to function as a single point of access to information on the web, internally and externally. Portal provide a way for enterprises to provide a consistent look and feel with access control and procedures for multiple applications, which otherwise would have been different entities altogether.

This system develop to exchange the manual system where it used a form when the user want to make a complaint and all data were store in the Microsoft Access. The current system that they used takes more time to handle and the data not very consistent. The ICT division only has one technician that handle all the work related to the

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computer damage LABUAN Corporation. That will make the technician busier with handling the complaint from the user.

Inside this portal, there have three functions such as e-complaint, upload/download software and the forum discussion. The e-complaint system is to user make a complaint related to computer damaged. The upload and download function is for user to download the recommended software which it uploaded by the technician. The last function is a forum discussion where user and technician can interaction each other.

1.2 Problem Statement

A series of observations had conducted for ICT division in LABUAN Corporation to enhance their IT requirement. Based on this observations, one intranet portal in ICT division will develop to map their present difficulties as requirement as listed below.

- *User Complaint Form*- While gathering information, the major pain point is manual entry in forms for complaint that user make and there of entering in MS Access system.
- *Data Inconstancy*- ICT division has faced issues in data inconsistency, either by duplicate entry or sometime missed out.
- *Information Gap*- There have a gap between user and technician as there is not record maintained for historical evidences of issues like when user make a complaint through telephone. There no data was recorded.
- *Security*- There is no as such security document maintained on user access with user specification details. This may lead to serious security threat is not maintained and administered well.

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1.3 Objectives

The main objectives of the proposed project are listed as following:

- To keep data systematically.
- To manage the record systematically, efficiently and safely especially when user make a complaint.
- To give the ability for user to post any troubleshooting procedures for information sharing.
- To provide upload and download facilities for ICT software.

1.4 Scope

This system only used for the user of LABUAN Corporation and limited access which only can access inside the LABUAN Corporation building. This system divided into three users; there are an administration, ICT staff and user. Administrations more handle to the administration part in the ICT e-complaint system where the user can register their name to access that system. Administration also can unauthorize the register user where user can't access the system. ICT staffs (technician) handle the complaint that made by the user related to the computer damage and handle the upload software that recommended for the user and the forum discussion where there have discussion problems between technician and user. Lastly is the user which is for make a complaint or discuss a problem related to the computer damaged and download the software that recommended by the technician. Below are modules that were included in ICT Portal of LABUAN Corporation.

- *ICT e-complaint system.*

- ICT e-complaint system is a system that develops during Industrial Training where it used for make a complaint about related computer damaged such as monitor, printer and etc without go to ICT division to get a form. Using this

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system it will make easier for the user. This ICT e-complaint system can capture account user and can capture how many user make a complaint. Not only that, it can also unauthorized the users from access this system.

- *Upload and download software that recommended by the technician.*

- With this portal it provides upload/download software that recommended by the technician for the user for example, not everyone in the LABUAN Corporation knows how to update the antivirus when the antivirus detects viruses in their computer. Using this portal, the technician can teach the user step by step how to update the antivirus. Not only that the technician also can recommend a new antivirus to the user. The user can try installing the antivirus which is provided by the technician in the portal. The antivirus software will be uploaded by a technician in the portal and the user can download the software and install it by them following the user manual attached in the portal.

- *A forum discussion between user and the technician.*

- This ICT Portal for LABUAN Corporation provided a forum discussion where user can ask any question or problem related to computer damaged to the technician. This forum can support all users in one thread. Function is a forum discussion where it used for any discussion problem that related to the computer damage between technician and user. User can ask if there have a problem with their personal computer (PC) like how to make a processing faster when do typing work and technician can answer that question by post it in the forum. The advantage of this forum is user can learn something new.

1.5 Project Significance

ICT Portal will definitely bring benefits to the user and ICT division. It is because it can manage all the data consistency and store data safely in the database. With this portal also, it can expose user to the Information Technology World where

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they can learn how to install software, download software directly from the portal, ask a question about computer problem and can learn how to used a new system that were provided. Using this portal, it will make easier for a user to manage their time when they want to make a complaint. They can make complaint direct from any computer as long as they still in the LABUAN Corporation building.

1.6 Expected Output

The expected output from this ICT Portal is it up to date data, so it would more consistency data where administrator can search, update, add, and delete user. Administrator also can update their profile. The ICT Staff can search, update, add, and delete complaint from their account. ICT staff also can add the user complaint if user makes complaint through the telephone using ICT staff account and it will store the complaint in the user account. . ICT staff will give status (new, process and finish) and memo to the any user complaint. There have a forum discussion and also upload facilities in the ICT account. In user account, user can make and check complaint, updated profile, download software or file that recommended by the technician and can post in a forum discussion

1.7 Conclusion

ICT Portal of LABUAN Corporation contains of three main modules which is e-complaint system, upload/download software and forum discussion. This ICT Portal that will develop is following the requirement that required.

Once the scopes and objectives are identified, this will bring to next activity which is literature review and project methodology that will be discussed in detail in the next chapter.

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2.2 Facts and findings

This is the process to get all adequate knowledge to design a system. This is important information required for analysis the present process. This also helps to get the present problems faced by the users. The objective of getting facts and finding is to incorporate all facts in the systems so there will be no issues and problems when we implement the system.

2.2.1 Domain

The domain in this project is about the ICT in the corporate. It because the project is about the system that only used in the LABUAN Corporation an only can access in the company only.

2.2.2 Existing System

Journal 1:

A SMEs portal was developed to increase an economic growth where it important issue for industry. However, designing and developing efficient portals is not easy, and how to evaluate industry portals' performance has not yet been convincingly demonstrated. This framework used methodology of the analytic hierarchical process and incorporates both experts' and users' judgments into the performance evaluation process because it can enable industry associations to become more familiar with the nature and scope of portal performance evaluation. Develops a framework which addresses the practical aspect of portal evaluation in terms of multiple objectives and involvement is an originality of towards a framework of the performance evaluation of SMEs' industry portals. (Chou TC at All (May 2005)).

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Journal 2:

The VOILA! Online information literacy tutorials were provided an overview of the development, construction and evaluation of an information literacy testing instrument that developed by librarians at Hunter College libraries for student enrolled in the college's first-year orientation seminar (ORSEMs) and a review of the test results including general statistics and the connection of student performance to test construction is provided. The longitudinal development and evaluation of the test are reviewed, including initial statement of competencies, test creation, test construction (assessment type, question formulation and question type) and test evolution. Test construction was given a great deal of attention during the development of VOILA! as librarians wanted an instrument that was valid and reliable. The importance of iterative test design and attention to the details of test construction is stressed in the article, and the methodology used to determine validity and reliability is presented. (Ondrusek A (2005)).

Journal 3:

This journal is about the actor-network theory (ANT) that invites an alternative account of democratic process, namely in terms of issue-formation, which is particularly well suited to the study of democratic practices facilitated by information and communication technologies (ICT). An actor-network theory is a particularly fruitful approach, since it provides the conceptual and methodological equipment to account for democracy in terms of processes of issue formation. ANT provides the conceptual and methodological tools for the development of a research practice of tracing public controversies as they are enacted in such networks on the Web. In tracing a particular controversy on the Web, around the Development Gateway, a portal for development information set up by the World Bank, one begins to articulate an alternative understanding of the significance of ICT for institutional as well as extra-institutional forms of democracy. A number of requirements on effective democratic action, as facilitated by ICT, are derived from the case study, which moves beyond the

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