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JUDUL: <u>E-HOMELOAN BBCB PORTAL SYSTEM</u> SESI PENGAJIAN: <u>SEMESTER 2 (2004/2005)</u> Saya <u>MOHD TAUFIK RAFIE B. HJ MAHMOOD</u>

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E-HOMELOAN BBCB PORTAL SYSTEM

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This report is submitted in partial fulfillment of the requirements for the Bachelor of Information and Communication Technology (Software Development)

FACULTY OF INFORMATION AND COMMUNICATION TECHNOLOGY KOLEJ UNIVERSITI TEKNIKAL KEBANGSAAN MALAYSIA 2005

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ADMISSION

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E-HOMELOAN BBCB PORTAL SYSTEM

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citations.

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DEDICATION

To my God, Allah SWT

To my greatest idol, Rasulullah SAW To my beloved parents, Mahmood Mamat & Mariam Hussien To my Family, All Family Besut, Kelantan, Terengganu To Staff BBCB (Homeloan), BBCB Staff. Melaka, Terengganu, Kuala Lumpur To My Lecturer, All Lecturer To MyFTMK Dean, Prof. Dr. Ishak Desa

To My Supervisor, En Nazrul Azhar Hj Bahaman

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Bismilah AL-Rahman AL-Rahim

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Thanks God, thank in front of ilahi because with spill and his favor can accomplish Projek Sarjana Muda after that prepare thesis report in the time which already been decided. In this chance, I would like to acknowledge the following people for their kindness and support during my research session and during my system and project development. My gratitude goes first to our dean of FTMK, Prof. Dr. Ishak Desa, PSM Committee members and then all lecturers in Faculty of Information Communication, thankful for their invaluable insight into the challenges of designing, deploying, and supporting the system development process, especially En Nazrul Azhar as my supervisor of Projek Sarjana Muda, they whose directions and efforts aided the outcome of this study and training session. Their invaluable contribution, encouragement and assistance throughout this study and training will always be remembered and appreciated.

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ABTRACT

Project young scholar (PSM) is one of the condition and syllabus obligatory for student who take degree young scholar from the Kolej Universiti Teknikal Kebangsaan Malaysia, student be musted pass to enable one the student gets Sarjana Muda or degree. PSM be carried out for 26 weeks along execute PSM, student will in disclose with atmosphere development and study against the any application Malaysian ICT which become more challenge. Coincidently each student be encouraged execute study and outside development which one involve firm government or private follow system related with course which be taken. Significant this to ensure each student gets application what be student during learning in the campus for 3 years and experience work during in the industry training. Which system will be developed in the Projek Sarjana Muda with shape is portal system loan housing bank with online method. This system special is developed for Bank Bumiputra Malaysian Commerce Berhad. This portal system goal be developed is because to help the bank loan housing in administer loan housing morely systematic in good order, fast and more comprehensive. Portal System E-Homeloan Bank BBCB executes two loans that are conventional loan and Financing-i. In the conventional loan too, have four kinds loan housing between he HomeFixed Loan, HomeXtra, HomeXtraII, HomeFlexi where each kind loan have facility package, scheme loan, interest rate and so on. While in the Financing - i loan too, execute affair loan housing base on principle Islamic law. Portal System which will be developed has several applications facility and service between he is registration online for both kinds process and loan housing bank. Besides this there are other service also be prepared in this system between he is calculation against the loan housing and interest rate balance daily compare balance monthly. Know Can term payment go back loan housing. Can know price and amount be known loan product from the calculation which be done. All the data and information about loan housing bank will be recorded and be to store continue in database E-Homelon bank BBCB as a reference observation the bank be to side be become proof loan which be to do by each borrower who already make registration. Along execute Projek Sarjana Muda, students be demanded execute study on the system which be to develop. This is because to ensure system which more be developed resolute and become proof to the development and study system. On my opinion, patience, determination and sincerity to execute certain project, study, significant the be given because this assignment need us facing with various problems which will be attacked during be to world occupation actual be to side oppose current world motherland boundless ICT

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ABSTRAK

Projek Sarjana Muda (PSM) adalah merupakan salah satu syarat dan silibus wajib untuk pelajar yang mengambil Ijazah Sarjana Muda dari Kolej Universiti Teknikal Kebangsaan Malaysia, Pelajar dimestikan lulus bagi membolehkan seseorang pelajar itu mendapat Ijazah Sarjana Muda. PSM dijalankan selama 26 minggu Sepanjang menjalankan PSM, pelajar akan di dedahkan dengan suasana pembangunan dan kajian terhadap sesebuah aplikasi ICT Malaysia yang semakin mencabar. Justeru itu setiap pelajar digalakkan menjalankan kajian dan pembangunan luar yang mana melibatkan firma-firma kerajaan atau swasta mengikut sistem berkaitan dengan kursus yang di ambil. Ini penting bagi memastikan setiap pelajar dapat mengaplikasikan apa yang dipelajari semasa pembelajaran di kampus selama 3 tahun dan pengalaman kerja semasa di latihan indusri. Sistem yang akan dibangunkan dalam projek sarjana muda adalah berbentuk portal sistem pinjaman perumahan bank secara online. Sistem ini dibangun khas untuk Bank Bumiputra Commerce Malaysia Berhad. Tujuan portal sistem ini dibangunkan adalah kerana untuk membantu pihak bank pinjaman perumahan dalam menguruskan pinjaman perumahan dengan lebih sistemetik, teratur, cepat dan lebih komprehensif. Portal Sistem E-Homeloan BBCB menjalankan dua bentuk Pinjaman iaitu pinjaman konvensional dan Financing-i. Dalam Pinjaman konvensional pula, mempunyai empat jenis pinjaman perumahan antaranya Home Fixed Loan, HomeXtra, HomeXtrall, HomeFlexi dimana setiap jenis pinjaman mempunyai kemudahan pakej, skim pinjaman, kadar faedah dan sebagainya. Dalam pinajaman Financing-i pula, menjalankan urusan pinjaman perumahan berlandaskan prinsip Syariah. Portal Sistem yang akan dibangunkan mempunyai beberapa aplikasi kemudahan dan perkhidmatan antaranya pendaftaran online bagi kedua-dua jenis proses atau bentuk pinjaman perumahan bank. Selain itu terdapat perkhidmatan lain yang turut disediakan dalam sistem ini antaranya pengiraan terhadap pinjaman perumahan dan kadar faedah baki harian berbanding baki bulanan. Dapat mengetahui tempoh pembayaran balik pinjaman perumahan. Dapat mengetahui harga dan jumlah pinjaman yang diketahui hasil dari pengiraan yang dibuat. Semua data dan maklumat berkenaan pinjaman perumahan bank akan direkod dan disimpan terus dalam pengkalan data E-Homelon BBCB sebagai rujukan, pemerhatian pihak bank disamping dijadikan bukti pinjaman yang dibuat oleh setiap peminjam yang telah membuat pendaftaran. Sepanjang menjalankan projek sarjana muda, para pelajar dikehendaki menjalankan kajian keatas sistem yang dibangunkan. Ini kerana bagi memastikan sistem yang dibangunkan lebih mantap dan menjadi bukti kepada pembangunan dan kajian sistem. Pada pendapat saya, kesabaran, kecekalan dan kesungguhan untuk melaksanakan sesuatu projek, kajian, diberi itu penting kerana tugasan ini memerlukan kita berdepan dengan pelbagai masalah yang akan ditempuhi semasa dialam pekerjaan sebenar disamping melawan arus persada dunia tanpa sempadan ICT.

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LIST OF ABBREVIATION

KUTKM	-	Kolej Universiti Teknikal Kebangsaan Malaysia
FTMK		Faculty of Information Communication
		Technology
BBCB	-	Bank Bumiputra Commerce Berhad
PSM	-	Projek Sarjana Muda
SDLC	2 1	Software Development Life Cycle
CD-ROM	: - 4	Compact Disk-Read Only Memory
CASE	c — c	Computer-Aided Software Engineering
ASP	-	Active Server Pages
DFD		Data Flow Diagram
ERD	: - (Entity Relationship Diagram
STD	0.=0	State Transition Diagram
DSS	-	Decision Support System
AI		Artificial Intelligence
SDLC	-	Software Development Life Cycle
ICT	(.)	Information Communication Technology
СМ	-	Configuration Management
EP	-	Equivalence Partitioning
TRG	-	Terengganu

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Glossary

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- D. User Guide For E-Homeloan BBCB Portal System
- E. Examples Pamphlet and Documentation From BBCB

CHAPTER 1

INTRODUCTION



CHAPTER I

INTRODUCTION

1.1 Overview

With method a glance, E-Homeloan BBCB is a portal system which be developing to help side management bank be to division loan housing Bank Bumiputra's Commerce Berhad (BBCB), especially in manage affair loan housing bank, be it from the angle application, management, production, reference and any affairs or other process which one related with affair loan housing Bank Bumiputra's Commerce Berhad (BBCB).

E-Homeloan BBCB goal be developing is for realizational wish country be to side help side BBCB in achieve objective to produce a portal system which can execute operation transaction business and service loan housing with method online follows requirement customer nowadays. Besides this, the portal system this is also can connect between Bank Bumiputra's Commerce Berhad branche whole Malaysia. So indirectly, this portal system can help the public make transaction and process loan housing bank be anied Bank Bumiputra's Commerce Berhad branch which the nearest in whole Malaysia morely efisional and systemetic.

E-Homeloan Portal System bank also be developing use application web ASP. Besides this, Microsoft's usage Access 2003 as database or deposit data information and process which involve loan housing bank. E-Homeloan bank be develop an involve two divisions business product banking that is loan with shape housing banking conventional and loan housing with shape banking Financing-I (Islamic). In the conventional loan housing banking there are package, scheme loan, and interest rate, which always change, be sided excess facility margin attractive, which one consist of HomeFixed, HomeXtra, HomeXtraII and HomeFlexi.



While in the loan housing banking Financing-i (Islamic) execute activity which base on principal Islamic law. Instead through this banking disallow payment or acceptance interest rate. This banking is also also an encourage partnership make profit in the practice banking from the angle Islamic opinion. Become both loans housing this is which will be designed and be to construct after that be used by the public in make loan future housing. Besides thereof, both loans, which this be constructed, remain have unique excess, become, as you will to the user to make choice loan housing which be demanded.

The concept development portal system, which is carried out in the "Projek Sarjanamuda", is base on study and development. Where all the studies, interview, information and explanation on the loan housing bank BBCB will in advance observe or study to ensure the above information is true but not invention merely.

All the collectings information and material study be obtained product from the information, meeting and interview with officer bank division loan Bank Bumiputra's housing Commerce Berhad (BBCB). Base on study and survey or scenery which already been carried out against finance firm about process loan housing which do, be got which most process sometimes be to do with manual method, their even though have system information loan housing but concept manual remain be carried out. This is because the system which be develop do not have good function be to side shortage function service and facility other involve customer or the user oneself.

Indeed not be denied which this finance firm/banking have system unique those, where be to develop special for division loan Bank Bumiputra's housing Commerce Berhad (BBCB) branch only without relations with Bank Bumiputra Commerce Berhad head office. This is one of the proof weakness which get be effected through old system be used by them. Besides thereof, other study be identified is system old be used only nature standalone which one a system which only get in the application in branch Bank Bumiputra's office Commerce limited as for instant in the branch head office Terengganu BBCB, without involve any network be eached branch with other computer system. System, which is the cleared, be to name with *Homeloan Information System*. This only system is also can execute

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application loan housing usual shape only where only involve banking conventional. Besides this, system this is also can not relate with any Bank Bumiputra's Commerce Berhad branch in whole Malaysia. This is because this system not is developing with *online* method.

Before existence this portal system, all the managements and process loan housing bank be done with manual method. Indeed not be denied various problems, which arise especially in the ecstasy, make and get loan housing. Besides thereof, still have many more weakness and mistake be identified which one enable to cancel he agreement and loan which be applied. For instant, negligence from the applicant and negligence from the officer the bank oneself effect from the usage forms loan housing and other process which one involve usage concept manual.

Between the negligence applicant/borrower who be identified mainly is source from the mistake in process fill forms loan housing. This matter happen because do not have method and technique to make the application above. Besides this do not hold meeting with officer bank, which involve after which process registration settle be done. This matter happens because customer or applicants no knowing an officer bank, which is dutied, settle the above case. And meeting time with other customer already been done at the same time and resulted meeting, process loan housing have to be towed to the day other. This matter cause extravagance time happen be sided other arise problem.

While, other negligence usual be done by officer bank too is lost information or forms loan housing borrower who be to do during process registration loan housing be to early last time. This matter can difficulty arises and after that take a long time to get loan housing the above bank. Besides thereof effect from the possibility which happen also will harm other process which one related with affair or process loan housing bank which be done.

Besides this, the other event be identified become cause to the problem loan housing is because shortage suitable system and systematically be sided standoffish user to accomodate current prime ICT globalization which always change to follow per circulation epoch which become more challenge. So, effect from the user manual

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process loan housing bank which one have several margins and package attract for banking user conventional as choice their the best, know method to make culculation against interest rate balance daily compare balance monthly. Can to know term payment go back loan housing. Can know price and amount be known loan product from the culculation which be done. All the processes which be carried out by user is depend on the shape and kind choice loan housing samaada from conventional the banking or Islamic banking.

So with existence E-Homeloan bank Portal System BBCB can settle all the problems, which arise, be sided facilitate again affair loan housing which be to do morely in good order, fast and efision.

1.2 Problems Statement

1.2.1 Problem Analysis

Base on method manual which be carried out, be got side management experience several problems which make each slow affair and not effsyen. Between the problems which already was identified is:

i) Process management system and disorderly database.

System manual which be carried out in the branch head office Bank Bumiputra's state limited Commerce use excel, book, forms, pemplet and file for affair registration, promotion information be sided record all the data and information which related with loan housing. This technique is not effision, which one will cause to happen overlapping or repetition data and resulted lost data.

ii) Safety data guaranteed do not.

If all the data and information which be recorded through book or file without have characteristic safety, so each staf or officer who not about can achieve data conveniently. This situation will cause to happen invasion openly data.

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iii) System management and data, which systematic do not.

Work management with method write is systematic do not, his which one will slow execution certain affair loan housing and process make loan housing. Example situation which may happen if certain affair which be carried out systematic do not that is in the find process and check again data. Cost usage paper high is also, which one each data will be recorded in the book or file. Besides this problem lost data also will happen.

iv) Problem make culculation loan housing with interest rate (conventional)
which be imposed by each borrower follows annual automatically through portal system.

As which we all already known each loan housing which obtain by borrower will more be paid follow interest rate and condition which be imposed. So this process needs wariness to ensure his he to be count accurately true and and culculation automatically will facilitate again this affair. This matter is because to avoid mistake in the culculation writing.

 Problem to make culculation loan housing without interest rate (Financingi) which borrower imposes follows annual and other process involves loan housing.

Culculation loan housing which one do not involve interest rate loan housing which be done with method manual that is with method writing can arise mistake from the angle culculation.

vi) Difficulty to check data and information loan housing which be done by the bank which involve.

If happen increase or changes data and record on the process loan housing bank which do, side difficult management for identified records which that already

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been done because have to make more reference against record loan housing bank about from recording earlier.

1.2.2 Methods of Solution.

Suggestion for settlement problem statement for manual method which is carried out is:

1) Build one application web system ASP with method online fully be sided usage Microsoft's database access 2003 thats can store all the data transaction for process loan housing bank which be to do in Bank Bumiputra Commerce Berhad and any branch (BBCB) be to each state which the nearest. Microsoft Access 2003 is one of the databases, which will be developing together this system. Microsoft's where Access 2003 have characteristic good and planned database be sided can make certain relations between the entities. He also is used to store data be sided replace usage concept manual which one use excel and forms during in the process registration. Usage says primer or ' primary key ' is aim to avoid happening overlapping or repetition data. Data which be become as say primer is name and No Password applicant who be to register. Besides thereof use application web for usage promotion information and service, which be tastelessed.

2) To ensure safety data and guaranteed system, usage password for execution certain process be applicationed in the E-Homeloan bank. Before sail this portal System E-Homeloan BBCB, each applicant or borrower need to make process registration system with method online as member portal system. The goal registration be done is to ensure and enable each user can sail page for process execute business and other facility be prepared in the Portal System E-Homeloan BBCB. To enter portal system, user only need to put name user and password oneself as step safety system from be intruded or be used by side which not about. To check loan housing use account registration which already register as mediation, but voyage limited this system for division certain only, which one some process achievable by all the customers for explanation and information loan housing bank and have division which can only be achieved by user which register only.