

ELECTRONIC MAGAZINE: A POSSIBILITY OF SUCCESS OF THAI ELECTRONIC MAGAZINE FOR WORKING WOMEN WITH INFORMATION SYSTEM APPLICATION
by
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## A Final Report of the Three-Credit Course CR 699 Project

Submitted in Partial Fulfillment of the Requirements for the Degree of Master of Science in Computer and Engineering Management Assumption University

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#### Abstract

Nowadays, Telecommunications, Internet and E-Commerce play a major role in human life. Electronic magazine is another dimension of electronic business, which seems to replace paper magazines. In Thailand, there are many types of electronic magazines including business, travel, entertainment, automobile, sports, and many others. One most interesting type of electronic magazines is Thai Electronic Magazine for Working Women. Like what you might have seen on most bookstores' shelves, this type of magazines seems to be a very popular print media in Thailand.

This project has been started to study the possibility of success of Thai electronic magazine for working women with information system application.

The researcher collects the secondary data from many sources especially through the Internet. After necessary data have been collected, the researcher launched a set of questionnaires with many types of questions designed to ask 200 target respondents, Thai over-twenty-year-old women who regularly use Internet. The questionnaire has been tested before actually launched to the students.

After collecting data from the 200 sets of questionnaires, all data are coded to the computerized statistic program called SPSS and transformed to the optimum form to interpret. The transformed data are shown in the form of tables and figures for the ease of understanding. Some cross-tabulation tables are shown with their description.

In the last part, conclusion and recommendation, the research finds that it is possible for Thai electronic magazines for working women to be more successful and popular if interesting information systems have been applied. Ultimately, the research has explained the recommended ideal style of Thai electronic magazine for working women.


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I would like to thank the two most important persons, my parents. I am forever grateful to my mother and father whose willingness to invest in my future has enabled me to achieve my educational goal.

Finally, I hope that my project, the Possibility of Success of Thai Electronic Magazine for Working Women with Information System Application, will contribute to the ongoing development of Thai working women electronic magazines and will be a useful source of information for Thai online magazine industry.

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## I. INTRODUCTION

### 1.1 General Background

Nowadays, Internet and telecommunications play a major role in human life. One man even named himself "Dot Com Man" and said that he would never go out of his residence for one full year, living with computer and Internet (FM 97: IT Talk Radio Program, 2000). It is amazing that computer networks can influence people's lives that much. This is really the information technology era. One other interesting trend evolved from Internet network application and telecommunication is an electronic commerce or E-Commerce.

Electronic magazine is another dimension of electronic business, which seems to replace paper magazines. In Thailand, there are many types of electronic magazines including business, travel, entertainment, automobile, sports, and many others. One most interesting type of electronic magazines is Thai Electronic Magazine for Working Women. Like what you might have seen on most bookstores' shelves, this type of magazines seems to be a very popular print media in Thailand.

As these working women magazines have also turned into electronic on-line media, the researcher aims to find a better way to attract the target readers, that is, to apply information system to increase their invitation rating. The survey has been developed to acquire useful information to support whether or not there is a possibility for the information system applied Thai working women electronic magazine to be more popular.

### 1.2 Statements of the Problems

The problems are stated in this project as follows:
(1) Is Women Online Magazine the Most Favorite Type of Online Magazines for the Target Respondents?
(2) Can Information System Be Successfully Applied on Thai Electronic Magazines for Working Women?

The research findings from the designed questionnaires will lead to the answers of all the above statements.

### 1.3 Limitations

In doing this project, some limitations occurred.
(1) Scarce of Updated Information. The required secondary data on information technology, web sites, and electronic magazines are quite scarce. Most available information is seldom updated.
(2) Time Limitation: The research findings might be more accurate if the researchers have longer period to create a sample of electronic magazine with information system application based on the analysis of the survey results. Then the researcher can put the test electronic magazine online, and study the feedback target readers from their invitation rate, time length spent on reading, and comments for certain period of time. Then we might be able to know whether the electronic magazine with information system application has the possibility of success or not.
(3) Budget Limitation: The budget is considered insufficient to cover all costs of a perfect research.
(4) Fear of Answering English Questionnaires for Some Respondents Who Have Poor English Skills.
(5) Difficulty to Find Target Respondents with Willingness to Spend Time Answering the Open-ended Question.
(6) Lack of Research Team Members, needed to help distribute questionnaires to the respondents.
(7) Finally, the researcher can pass through all obstacles to finish this project

### 1.4 Objectives

(1) To find out what target respondents require, expect, and need from an electronic magazine.
(2) To study the behaviors and involvement of target respondents in information system supported online activities.
(3) To seek how important each factor of Thai electronic magazine for working women is for target respondents.
(4) To ensure that the women online magazine is the most favorite type of online magazines for Thai working women for target respondents.
(5) To analyze whether there is any possibility to apply information system successfully on Thai electronic magazine for working women.

### 1.5 Importance of the Study

The researcher believes that this project will be a good secondary source of information for those electronic magazine publishers.
(1) It is the guidelines for electronic magazine marketing.
(2) It is a way to find out what makes target readers interested in Thai electronic magazine for working women.
(3) The research will give some ideas to publishers or web sites team members on how to apply information system successfully on electronic magazine based on needs of target respondents who are also their target readers.

### 1.6 Methodology

(a) Determining Research Population

Total population of this research covers those who:
(1) Are 20 year-old or over Thai female Internet Users.
(2) Are working or taking Undergraduate or Graduate Programs.
(3) Used to visit online magazine web sites or the like.
(4) Use Internet regularly.
(b) Determining Research Sample

As the researcher needs to select the samples that are believed to be the representatives of the given population, the judgement sampling is used as the sampling technique. In this research, target respondents are 200 according to the sample size calculation (See III. Research Methodology).
(c) Determining Data Collection

In this project, descriptive data are collected through a questionnaire survey. A set of questionnaires has been designed to ask the questions that lead to the inference of the problems stated. To find and correct the possible mistakes on the designed questionnaire, pretest has been done before the field launch of the questionnaires.
(d) Determining Data Analysis
(1) Questionnaire survey is prepared to ask the 200 target respondents about their Internet usage, attitude, and preference on electronic magazines or the like web sites they have visited. In a set of questionnaires, 15 Close-ended questions and one open-ended question are used.
(2) Raw data are edited to correct some mistakes and prepare the coding
(3) Data are coded using the SPSS computer program.
(4) Data are shown as frequency and percentage in tables and graphs.
(5) The statements of the problems can be answered by analyzing the results of the survey.
(6) Conclusions and recommendations to the focused problems lie in the last chapter.


## II. LITERATURE REVIEW

### 2.1 Brief History of Internet

The Internet's history can be traced back to ARPANET - which was started by the US Dept. of Defense for research into networking sometime in 1969. Many people wanted to put their ideas into the standards for communication between the computers that made up this network, so a system was devised for putting forward ideas. Basically you wrote your ideas in a paper called a 'Request for Comments' (RFC for short), and let everyone else read it. People commented on and improved your ideas in new RFCs. The first RFC (RFC0001) was written on April 7th, 1969 - that this is probably the closest thing to a 'start date' for the internet. There are now well over 2000 RFCs, describing every aspect of how the internet functions.

ARPANET was opened to non-military users later in the 1970s, and early takers were the big universities - although at this stage it resembled nothing like the Internet we know today. International connections (i.e. outside America) started in 1972, but the internet was still just a way for computers to talk to each other and for research into networking, there was no World-Wide-Web and no email as we now know it.

It wasn't until the early to mid 1980s that the services we now use most on the Internet started appearing. The concept of 'domain names', things like 'microsoft.com', and special 'Domain Name Servers' wasn't even introduced until 1984 - before that all the computers were just addressed by their IP addresses (numbers). Most protocols used for email and other services appeared after this - although email itself had been around much longer the way it was sent between institutions was less standardized.

The part of the internet most people are probably most familiar with is the World-Wide-Web. This is a collection of hyperlinked pages of information distributed over the
internet via a network protocol called HTTP (hyper-text-transfer-protocol). This was invented by Tim Berners-Lee in 1989. He was a physicist working at CERN, the European Particle Physics Laboratory, and wanted a way for physicists to share information about their research - the World-Wide-Web was his solution. So the web was started, although at this time it was text-only. Graphics came later with a browser called NCSA Mosaic. Both Microsoft's Internet Explorer and Netscape were originally based on NCSA Mosaic.

The graphical interface opened up the internet to novice users and in 1993 its use exploded as people were allowed to 'dial-in' to the internet using their computer at home and a modem to ring up an 'Internet Service Provider' (ISP) to get their connection to this (now huge) network. Before this the only computers connected were at Universities and other large organizations that could afford to hire cables between each other to transfer the data over - but now anyone could use the internet and it evolved into the 'Information Superhighway' that we know and (possibly) love today.

### 2.2 Timeline of the Development of the Internet

 1957:The USSR launches Sputnik, the first artificial earth satellite. In response, the United States forms the Advanced Research Projects Agency (ARPA) within theDepartment of Defense (DoD) to establish US lead in science and technology applicable to the military.

1962:
RAND Paul Baran, of the RAND Corporation (a government agency), was commissioned by the U.S. Air Force to do a study on how it could maintain its command and control over its missiles and bombers, after a nuclear attack. This was to be a military research network that could survive a nuclear strike,
decentralized so that if any locations (cities) in the U.S. were attacked, the military could still have control of nuclear arms for a counter-attack.

Baran's finished document described several ways to accomplish this. His final proposal was a packet switched network.
"Packet switching is the breaking down of data into datagrams or packets that are labeled to indicate the origin and the destination of the information and the forwarding of these packets from one computer to another computer until the information arrives at its final destination computer. This was crucial to the realization of a computer network. If packets are lost at any given point, the message can be resent by the originator."

1968:
ARPA awarded the ARPANET contract to BBN. BBN had selected a Honeywell minicomputer as the base on which they would build the switch. The physical network was constructed in 1969, linking four nodes: University of California at Los Angeles, SRI (in Stanford), University of California at Santa Barbara, and University of Utah. The network was wired together via 50 Kbps circuits.

1972:
The first e-mail program was created by Ray Tomlinson of BBN. The Advanced Research Projects Agency (ARPA) was renamed The Defense Advanced Research Projects Agency (or DARPA)

ARPANET was currently using the Network Control Protocol or NCP to transfer data. This allowed communications between hosts running on the same network.

1973:
Development began on the protocol later to be called TCP/IP. It was developed by a group headed by Vinton Cerf from Stanford and Bob Kahn from DARPA. This new protocol was to allow diverse computer networks to interconnect and communicate with each other.

1974:
First Use of term Internet by Vint Cerf and Bob Kahn in paper on Transmission Control Protocol.

1976:
Dr. Robert M. Metcalfe develops Ethernet, which allowed coaxial cable to move data extremely fast. This was a crucial component to the development of LANs.

The packet satellite project went into practical use. SATNET, Atlantic packet Satellite network, was born. This network linked the United States with Europe.Surprisingly, it used INTELSAT satellites that were owned by a consortium of countries and not exclusively the United States government.

UUCP (Unix-to-Unix CoPy) developed at AT\&T Bell Labs and distributed with UNIX one year later.

The Department of Defense began to experiment with the TCP/IP protocol and soon decided to require it for use on ARPANET. 1979:

USENET (the decentralized news group network) was created by Steve Bellovin, a graduate student at University of North Carolina, and programmers Tom Truscott and Jim Ellis. It was based on UUCP.

The Creation of BITNET, by IBM, "Because its Time Network", introduced the "store and forward" network. It was used for email and listservs. 1981:

National Science Foundation created backbone called CSNET 56 Kbps network for institutions without access to ARPANET. Vinton Cerf proposed a plan for an inter-network connection between CSNET and the ARPANET. 1983:

Internet Activities Board (IAB) was created in 1983. On January 1st, every machine connected to ARPANET had to use TCP/IP. TCP/IP became the core Internet protocol and replaced NCP entirely.

The University of Wisconsin created Domain Name System (DNS). This allowed packets to be directed to a domain name, which would be translated by the server database into the corresponding $\mathbb{P}$ number. This made it much easier for people to access other servers, because they no longer had to remember numbers.

1984:
The ARPANET was divided into two networks: MLLNET and ARPANET. MILNET was to serve the needs of the military and ARPANET to support the advanced research component, Department of Defense continued to support both networks.

Upgrade to CSNET was contracted to MCI. New circuits would be T1 lines, 1.5 Mbps which is twenty-five times faster than the old 56 Kbps lines. IBM would provide advanced routers and Merit would manage the network. New network was to be called NSFNET (National Science Foundation Network), and old lines were to remain called CSNET.

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The National Science Foundation began deploying its new T1 lines, which would be finished by 1988 . 1986:

The Internet Engineering Task Force or DETF was created to serve as a forum for technical coordination by contractors for DARPA working on ARPANET, US Defense Data Network (DDN), and the Internet core gateway system.

1987:
BITNET and CSNET merged to form the Corporation for Research and Educational Networking (CREN), another work of the National Science Foundation.

1988:
Soon after the completion of the T1 NSFNET backbone, traffic increased so quickly that plans immediately began on upgrading the network again.

Merit and its partners formed a not for profit corporation called ANS, Advanced Network Systems, which was to conduct research into high speed networking. It soon came up with the concept of the T3, a 45 Mbps line. NSF quickly adopted the new network and by the end of 1991 all of its sites were connected by this new backbone.

1990:
While the T3 lines were being constructed, the Department of Defense disbanded the ARPANET and it was replaced by the NSFNET backbone. The original50Kbs lines of ARPANET were taken out of service.

Tim Berners-Lee and CERN in Geneva implements a hypertext system to provide efficient information access to the members of the international highenergy physics community. 1991:

CSNET (which consisted of 56 Kbps lines) was discontinued having fulfilled its important early role in the provision of academic networking service. A key feature of CREN is that its operational costs are fully met through dues paid by its member organizations.

The NSF established a new network, named NREN, the National Research and Education Network. The purpose of this network is to conduct high speed networking research. It was not to be used as a commercial network, nor was it to be used tosend a lot of the data that the Internet now transfers. 1992:

Internet Society is chartered. World-Wide-Web released by CERN. NSFNET backbone upgraded to T3 (44.736Mbps) 1993:

InterNIC created by NSF to provide specific Internet services: directory and database services (by AT\&T), registration services (by Network Solutions Inc.), and information services (by General Atomics/CERFnet).

Marc Andreessen and NCSA and the University of Illinois develops a graphical user interface to the WWW, called "Mosaic for X".

1994:

No major changes were made to the physical network. The most significant thing that happened was the growth. Many new networks were added to the NSF
backbone. Hundreds of thousands of new hosts were added to the INTERNET during this time period.

Pizza Hut offers pizza ordering on its Web page.
First Virtual, the first cyberbank, opens.
ATM (Asynchronous Transmission Mode, 145Mbps) backbone is installed on NSFNET.

1995:
The National Science Foundation announced that as of April 30, 1995 it would no longer allow direct access to the NSF backbone. The National Science Foundation contracted with four companies that would be providers of access to the NSF backbone (Merit). These companies would then sell connections to groups, organizations, and companies.
$\$ 50$ annual fee is imposed on domains, excluding .edu and .gov domains which are still funded by the National Science Foundation. 1996 to Date:

Most Internet traffic is carried by backbones of independent ISPs, including MCI, AT\&T, Sprint, UUnet, BBN planet, ANS, and more.

Currently the Internet Society, the group that controls the INTERNET, is trying to figure out new TCP/IP to be able to have billions of addresses, rather than the limited system of today. The problem that has arisen is that it is not known how both the old and the new addressing systems will be able to work at the same time during a transition period.

### 2.3 Introduction to the Internet in Thailand

Thailand was an early participant in bringing the Internet to Asia, and it has a fascinating, but little-known networking history. The grassroots efforts by a few

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dedicated and visionary university professors have resulted in a fully functional national network, despite the limited infrastructure and numerous technical obstacles of the early days.

In fact, networking in Thailand began when virtually nothing existed in the country to establish a viable computer network. Telephone density was low, technical knowledge was scarce, and computers were expensive. However, some Thai engineers managed to create the academic network with a small budget and some technical assistance from Australia. Beginning with a UUCP connection and X. 25 in 1987, the Thai academic network gradually transitioned to full TCP/IP in 1992. Boosted by the strong economic growth of the early ' 90 s, collaboration occurred with the private sector and was augmented by international financial support. The use of the Internet in Thailand is now highly valued, especially by the younger generation. Currently, the Internet is not only a significant tool for information sharing among academics and students, but also an alternative media and a new business opportunity for Thais

The state of academic networking in Thailand has grown significantly, reaching almost every university and research institution in the country. Many Thai schools and universities are using the Internet and its applications in their curricula. The government is planning to invest more in Information Technology (IT) and human resources by improving the telecommunications infrastructure and providing more education.

The development of the Internet in Thailand began in mid-1987 when two faculty members at the Asian Institute of Technology's (AIT) computer science department made some test UUCP connections to the University of Melbourne, University of Tokyo, and UUNET via X. 25. A year later, the Australian International Development Plan (IDP) assisted Prince of Songkhla University (PSU) in the south of Thailand in setting up dial-up email connectivity to the University of Melbourne. In 1991, a UUCP
network was established to five universities in Thailand. In 1992, when Chulalongkorn University acquired the first 9.6 Kbps leased line to UUNET, the network was transformed to TCP/IP. By 1995, the usage had grown extensively the Internet commercialized and expanded outside the academic realm to the general population. Currently, the Internet is available in almost every big city in Thailand, especially where universities are located. Anyone who can afford it can utilize the commercial Internet Services that are available and growing throughout the country.

### 2.4 Definition of Information System

Information system is defined as
(1) A system, whether automated or manual, that comprises people, machines, and/or methods organized to collect, process, transmit, and disseminate data that represent user information.
(2) Any telecommunications and/or computer related equipment or interconnected system or subsystems of equipment that is used in the acquisition, storage, manipulation, management, movement, control, display, switching, interchange, transmission, or reception of voice and/or data, and includes software, firmware, and hardware.
(3) The entire infrastructure, organization, personnel, and components for the collection, processing, storage, transmission, display, dissemination, and disposition of information.

Technically, an information system can also be defined as a set of interrelated components that collect (or retrieve), process, store, and distribute information to support decision making, coordination, control, analysis, and visualization in an organization.

### 2.5 Information System Application on Internet

An increasingly important way that both public and private organizations are networking internally and with other organizations is through the Internet. The Internet is perhaps the most well-known-and the largest-implementation of internetworking, linking hundreds of thousands of individual networks all over the world. The Internet has a range of capabilities that organizations are using to exchange information internally or to communicate externally with other organizations.

The Internet is based on client/server technology. Users of the Net control what they do through client applications, using graphical user interfaces or character-based products that control all functions. All the data, including e-mail messages, databases, and Web sites, are stored on servers. Servers dedicated to the Internet or even to specific Internet functions are the heart of the information on the Net.

Major Internet capabilities include e-mail, Usenet newsgroups, LISTSERVs, chatting, Telnet, FTP, gophers, Archie, Veronica, WAIS, and the World Wide Web. These are all standards and tools to retrieve and offer information. The following are the functions of the Internet and its capabilities:

## People-To-People Communications

Electronic Mail
The Net becomes the most important e-mail system in the world because it connects so many people from all over the world. Private individuals typically use Internet e-mail facilities to keep in touch with friends. Organizations use it to facilitate communication between employees and between offices, to communicate with customers and suppliers, and to keep in touch with the outside world. Researchers also use this facility to share ideas, information, or even documents. E-mail over the Net has also made possible many collaborative
research and writing projects even though the participants are thousands of miles apart. The user can easily attach documents and files when sending a message to someone or to broadcast a message to a predefined group.

## Usenet Newsgroups

Usenet newsgroups are worldwide discussion groups in which people share information and ideas on a defined topic such as colorimetry or rock bands. Discussion takes place in large electronic bulletin boards where anyone can post messages on the topic for others to read. Over 15,000 such groups exist on almost any conceivable topic. Each Usenet site is financed and administered independently.

LISTSERVs.
A second type of public forum, LISTSERVs are also discussion groups, but they use e-mail mailing list servers instead of bulletin boards for communications. If you find a LISTSERV topic in which you are interested, you may subscribe to a mailing list. From then on, through your e-mail, you will receive all messages sent by others concerning that topic. You can, in turn, send a message to your LISTSERV mailing list server and it will automatically be broadcast to the other subscribers. Tens of thousands of LISTSERV groups exist discussing every conceivable topic.

## CHATTING

Chatting allows people who are simultaneously connected to the Internet to hold live, interactive written conversations. Only people who happen to be signed on at the same time are able to "talk" because messages are not stored for later viewing are they are on Usenet newsgroups. On the other hand, this function can be an effective business tool if people who can benefit from interactive
conversations set an appointment to "meet" and "talk" on a particular topic. The limitation of this is that the topic is open to all without security so that the intruders can participate.

## TELNET

Telnet is included in this section even though it actually serves a different purpose-allowing someone to be on one computer system while doing work on another. Telnet is the protocol that established an error-free, rapid link between the two computers, allowing you, for example, to $\log$ in to your business computer from a remote computer when you are on the road or working from your home. You can also $\log$ in and use third-party computers that have been mad accessible to the public, such as using the catalogue of the United States Library of Congress. Telnet will use the computer address you supply to locate the computer you want to reach and connect you to it.

## Information Retrieval

## FILE TRANSFER PROTOCOL

File Transfer Protocol (FTP) is a tool used to access a remote computer and retrieve files from it. FTP is a quick and easy method if you know the remote computer site in which the file is stored. Once you have logged on to the remote computer, you can move around directories that have been made accessible for FTP to search for the file(s) you want to retrieve. Once located, FTP makes transfer of the file to your own computer very easy.

## ARCHIE

Archie is a tool that can be used to search the files at FTP sites. It monitors hundreds of FTP sites regularly and updates a database of software, documents, and data files available for downloading called an Archie server. Although no

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individual Archie database can list more than a very tiny percentage of the files in the world, clicking on a relevant listing form one Archie server will bring you to another computer system where other relevant files are stored. There, the Archie server may have yet other relevant references, allowing you to continue your search for pertinent files, moving from database to database, library to library, until you locate what you need. Archie database searches use subject key words you enter, such as "Beijing," "telecommuting," "polymers," or "inflation," resulting in a list of sites that contain files on that topic.

GOPHERS
Most files and digital information that are accessible through FTP are also available through gophers. A gopher is a computer client tool that enables the user to locate information stored on Internet gopher servers through a series of easy-touse, hierarchical menus. The Internet has thousands of gopher server sites throughout the world. Each gopher site contains its own system of menus listing subject-matter topics, local files, and other relevant gopher sites. One gopher site might have as many as several thousand listings within various levels of its menus. When you use gopher software to search a specific topic and select a related item from a menu, the server will automatically transfer you to the appropriate file on that server or to the selected server wherever in the world it is located. Once on the distant server, the process continues-you are presented with more menus of files and other gopher server sites that might interest you. You thus can move from site to site, narrowing your search as you go, locating information that you want anywhere in the world. When you do find information or files you want, you are free to browse, read them on-line, or download them onto your own computer for more leisurely reading or printing. With descriptive
menu listings linked to other gopher sites, you do not need to know in advance where relevant files are stored or the exact FTP address of a specific computer. VERONICA

Veronica (which stands for Very Easy Rodent-Oriented Netwide Index to Computer Archives) is an additional capability for searching gopher sites. When the user enters a key word, Veronica will search through thousands of gopher sites to find titles that contain that keyword. It then places these files onto a temporary menu on your own local server so that you can browse through them, making file retrieval by topic much easier.

WAIS
WAIS (Wide Area Information Servers) is yet a fourth way to handle the problem of locating files around the world. WAIS is the most thorough way to locate a specific file, but it requires that you know the names of the databases you want searched. Once you specify database names and key identifying words, WAIS searches for the key words in all the files in those databases. When the search has been completed, you will be given a menu that lists all the files that contain you key words.

Searching for Information On The Web
The World Wide Web
The World Wide Web is a system for storing, retrieving, formatting, and displaying information using a client/server architecture, graphical user interfaces, and a hypertext language that enables dynamic links to other documents. A tool called search engine is for locating specific sites or information on the Internet, containing software that looks for Web pages containing one or more of the search terms entered by the user.

Instead of spending hours scouring the Web you can have the information in which you are interested delivered automatically to your desktop through "push" technology. A computer broadcasts information of interest directly to you, rather than having you "pull" content from Web sites.

### 2.6 Electronic Magazine: The Content Provider

 Internet Business ModelsEnterprise networking and the Internet are enabling organizations to build new business models in which they are directly linked to customers and suppliers as well as to other parts of their organizations. Currently, there are 8 Internet Business Models including Virtual Storefront, Marketplace Concentrator, Information Brokers, Transaction Brokers, Electronic Clearinghouses, Digital Product Delivery, Content Provider, and Online Service Provider.

Under the Internet Business Models, an electronic magazine can be categorized as a content provider that creates revenue by providing content. Electronic magazines' revenues can be generated by selling advertising space or by having advertisers pay for placement in an organized listing in a searchable database. Examples of another content providers are Wall Street Journal, Interactive, QuoteCom, Pathfinder, Catalog, Mart Home Page, and Tripod.

### 2.7 Examples of Thai Electronic Magazine for Working Women

(1) Pooying Today MagazineOnline at www.pooyingtoday.com

Pooying Today at www.pooyingtoday.com is an on line magazine in the cyber world for modern working women. It is filled with entertainment and interesting contents and tips, which most women need

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to know. This on line magazine has been orderly divided into three main sections including Monthly, Weekly, and Daily Section. Story of the Month, Working Women, Health for U, Cyber Gals, Love and Relationships, Sex, About Guy, Beauty-Face, Beauty-Hair, BeautyFashion, What's New, Be-Safety, Entertainment, Place to Go, and Travel-Calendar columns are in the Monthly Section. Interesting columns like Try-It and Book columns have been put into the Weekly Section for those who have been exhausted all through the week to relax. For those whose daily hobbies are mostly sending/checking emails, sending messages through pagers, voting or posting opinions on topics through webboard, and playing games, Pooying Today MagazineOnline also provide visitors with all these kinds of pages in the Daily Section. www.pooyingtoday.com's identities are its neatness, nice structure, attractive and colorful design, modern looks, and interesting topics that meet almost all target readers' need. This electronic magazine also provides readers with links to reach other interesting web sites about Shopping, Computer \& Internet, Entertainment, Travelling, News \& Media, Sport and Recreation, Business \& Economy, Science \& Technology, Education \& Reference, Government \& Organization, and Currency Exchange Rates. (See Appendix B: Example 1. www.pooyingtoday.com)
(2) Simple MAG at www.simplemag.com

Simple MAG is an on line magazine for working women administered by management team of www.mweb.co.th, a famous "Full Service Portal" web site of today. Simple MAG's contents are very attractive and frequently
updated. Its channels or sections include Beauty, Career, Fashion, Health, Horoscope, Entertainment, Pets, Pregnancy and Baby, Recipe, Relationship, Sex \& Romance, Shopping, Wedding \& Marriage, and Yoga. Moreover, the site also allows visitors to apply for memberships, post messages on webboard, send messages through pagers, participate in reward activities, play games, download interested information, check emails, vote on specified topics, do quizzes, reach interesting web sites through links, and get into chat rooms. One of the charming features of this on line magazine web site is its high degree of visitors' participation needed in its various activities with appealing rewards. Noticeably, this web site has fully applied information system in these user involvement sections. Visitors can track the past issues if they like on www.simplemag.com. (See Appendix B, Example 2. www.simplemag.com)
(3) Image Magazine at www.i-am-image.com

Another magazine which female readers might be familiar with on bookstores' stands for more than ten years, is Image Magazine, which has now become on line under the administration of Image Publishing Inc. The on line version still remains the same old style as the print version, graceful but simple. Its nice and elegant design is feature that enchants visitors almost every time they visit. The sections on the web site are I-Beauty, I Am Sex \& Relationship, Image Fashion \& Celebrities, In Person, I-Guess, Register, Webboard, Q of the Day, and Pocket Book. Still, there are some applications of information system on this on line magazine. (See Appendix B, Example 3. www.i-am-image.com)
(4) Mother and Child Magazine at www.motherandchildmagazine.com
"Mother and Child" has long been a useful informational print medium for women for over 20 years. It's amazing that now its target readers can reach them at www.motherandchildmagazine.com. Here they provide much information for women in the mother role including such columns as Children's Health, Mothers' Health, Children's Development, Family Life, Interviews of Celebrities as Parents, and Short Stories about Family. Other than these interesting pages, readers can also post messages on webboard. Readers will also be able to access a search engine, listen to music, or reach the movie preview sections, which belong to a web site named www.shinbroadband.com through Mother and Child. This on line magazine is simple so it is quite easy to use by all users. However, Mother and Child Magazine still has lower degree of information system application comparing with many other electronic magazines. (See Appendix B, Example 4. www.motherandchildmagazine.com)
(5) Malila.com at www.malila.com

Malila.com is another appealing electronic magazine for modern working women. Reaching the first page of Malila.com, readers can select both Thai or English version. On Malila.com, there are many attractive sections including Cookery, Healthy Living, Womanhood, Four Legged, Coffee Corner, Archive, and Stamped Diary. Malila.com also has a Webboard section for those visitors who like to post their opinions on topics. (See Appendix B, Example 5. www.malila.com)
(6) Sakulthai at www.sakulthai.com

Sakulthai is a weekly magazine that has been awarded as the Best Thai Magazine for three consecutive years from the Office of Prime Minister. The target readers range from women to all family members. The www.sakulthai.com seems to be a short introduction of its print version in the bookstands as the full contents of the magazine is shown but readers can access only some of them. The accessible columns are Photos \& News from the front cover of the magazine, Interviews with interesting persons or celebrities, Library with general useful tips and health issues, ArticlesDocumentaries, Miscellaneous/Know-how/Family including horoscope and mail responding. The other sections are webboard, visitors' book, and search engine for visitors to search for the contents within Sakulthai.com. Although there are some minor application on this electronic magazine, Sakulthai is still a noteworthy magazine of the year. (See Appendix B, Example 6. www.sakulthai.com)
(7) Yingthai On Line at www.yingthai-mag.com

Yingthai On Line is under the administration of the same management team of Sakulthai. Unlike Sakulthai, Yingthai directs its target readers at women at early working age to middle age. On this web site, there are so many columns including those regular columns as Computer Talk, Women Quiz, Home \& Furniture, Health, Home Lawyer, and Horoscope. Others are Articles-Documentaries, Entertainment, Interviews, Beauty, and Food \& Nutrition. The application of information system appears in the search engine, feedback and webboard section. (See Appendix B, Example 7. www.yingthai-mag.com)
(8) Pooying or WorkingWomen Magazine at www.pooyingmag.ksc.net

Pooying Magazine, namely WorkingWomen, is another example of Thai electronic magazine for working women the research will raise. Many readers might be familiar with its name because it has been well known for 18 years as the print magazine for working women with the slogan "To Perfect Your Career Life". Pooying has now become on line in the same old style, simple, nice, and eye-catching. Pooying's columns consist of Biography of Celebrities, Lifestyles of interesting career women, Favorites (about favorite appliances of celebrities), and His Style (attractive or famous men's lifestyles). This magazine allows visitors to download some of its wallpapers, however there is no active application form in its membership section (Interested persons must write emails to the web site team for application) and there are neither webboard nor forms for visitors to send their feedback to the management team. It shows that Pooying's degree of information system application is quite low. (See Appendix B, Example 8 www.pooyingmag.ksc.net)

## III. RESEARCH METHODOLOGY

### 3.1 Introduction

For the research about the Possibility of Success of Thai Electronic Magazines for Working Women, a set of questionnaires was designed to find the solutions that lead to the answers of the statements of the problems. In this chapter, all steps of research methodology including data collection, research design, interview process for data collection, and data analysis, would be described in details.

### 3.2 Data Collection

(a) Determining Population

The total population in the surveyed locations are approximately 1000 people consisting those who:
(1) Are 20 year-old or over Thai female Internet users.
(2) Are working or taking Undergraduate or Graduate Programs.
(3) Used to visit online magazine web sites or the like.
(4) Use Internet regularly.
(b) Determining Sample

From ACNielsen Report in 1999, total population is 100,000 . The sample size under TaroYamane's Formula (Churchill, Gilbert Jr., 1992) is:

|  | n | $=$ | $\mathrm{N} /\left(1+\mathrm{Ne}^{2}\right)$ |
| :---: | :---: | :---: | :---: |
| Where: | n | = | Sample Size, |
|  | e | $=$ | Tolerance of the sampling error (7.05\%) |
| and | N | $=$ | Total Population |
|  | n | $=$ | $100000 /\left(1+100000(0.0705)^{2}\right)$ |
| The sample size |  | $\approx$ | 200 Samples |

### 3.3 Research Design

In this research, the researcher used a set of questionnaires as the medium of communication between the researcher and respondents to collect the primary data. The questionnaires designed aims to ask 200 respondents to answer the problems stated. In each questionnaire, there is the instruction at its beginning to introduce each respondent to the questionnaire itself as well as its objective. The questionnaire is divided in to 2 sections: Personal Data and Question Section. In the Question Section, there are totally 16 questions in 6 pages. Most of the questions use the nominal scale as method of measurement except one question that uses the Likert scale to find the degree of importance on the factors and two questions that require respondents to rank the answer according to their preferences. One question is the close-ended ending with the openended question for the respondents to describe their reasons. As a pretest to check some errors and logical orders of the questions, some sets of questionnaire have been distributed before its actual launch. Then, the questionnaires were launched for the field study after the pretest and mistake correction.

### 3.4 Interview Process for Collecting Data

After the step of questionnaire design, the researcher launched 200 sets of questionnaire for data collection. The target locations of the survey are in the universities like Assumption University, NIDA, SASIN, an international bank, and some international private companies with Internet for employees. These locations are where English capable women are so they were selected to avoid problem of English questionnaire understanding because we can ensure that respondents can understand what questions truly mean. Furthermore, the people in the selected locations mostly use the Internet so there the researcher can easily find prospective respondents.

Before giving the questionnaires to the respondents, some observation techniques and screening questions have been asked to screen out the non-prospective respondents. It is quite difficult to identify age range of respondents in universities, especially Assumption University, so the researcher selects the female prospects who wear working or casual apparels to ensure that they are surely graduate students. There, the researcher also select both uniform-dressed and casual wear dressed female prospects who study in the evening undergraduate programs to ensure that they are senior undergraduate students who are going to be working women in the near future. However, the research has to ask the screening questions including "Are you a senior (fourth year) student?" and "Have you ever used the Internet?" or "Are you an Internet user?" Overall, for the international bank and international private companies, there are almost no problems about the ages of prospects as working women in these companies are over 20 years old in general. Nevertheless, to ensure that they use Internet, the research also has to ask, "Have you ever used the Internet?" or "Are you an Internet user?" to ensure that they are the real target respondents.

Finally, the researcher can collect 200 sets of responded questionnaires and move into the next step of research methodology, Data Analysis.

### 3.5 Data Analysis

This research provides the result of each by Editing, Coding, Tabulating and Finding the result, which has been described as follows:

## (1) Editing

The role of the editing process is to identify omission, ambiguities, and errors in each respondent's response so that the researcher can screen the mistakes out before the coding process is begun. To avoid the problem
of lack of cooperation from respondents, the 16 questions in the questionnaire have been designed to be as precise as possible.

All questions are then checked and grouped. The question that requires editing process the most is question number 10 and number 15 , which are categorized as the preference ranking question. The two questions require respondents to choose only 5 choices and rank from 5 (the most favorite) to 1 (the least favorite).
(2) Coding

In this process, the researcher used SPSS for Window, the computerized statistic package program, as a tool for data analysis. Herewith, the researcher has applied Descriptive Statistics to analyze the data as the number of indices is small and the researcher needs to describe meaningfully many scores under them. This method applies a frequency distribution that helps summarize the information presented in form of tables, pie charts and bar charts.
(3) Tabulating

In this project, the researcher applies simple tabulation. The simple tabulation is generally to place data in columns to simply present them, one for each group, in ascending or descending order.
(4) Finding the results

Finally, in the last step of research methodology, the researcher attempts to find out the result of data in the form of frequency counting and percentage and make the cross tabulation tables, which leads to the answers of the stated problems. All of the result findings lie in the next part of this report, Analysis.

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## IV. ANALYSIS

### 4.1 Overview

The analysis of result findings will be discussed in this Analysis Chapter. The main focuses of the researcher are: the requirements, expectations, and specific needs of target respondents on an electronic magazine, behaviors and involvement of target respondents in information system supported online activities, degree of importance of each factor of Thai electronic magazine for working women. Then the research has to analyze these findings to ensure that the women online magazine is the most favorite type of online magazines for Thai working women for target respondents, and finally to prove that there is the possibility of success on Thai electronic magazines for working women with information system application.

Hence, the researcher will discuss the findings and answers to the statement of problem.

### 4.2 The Objective of the Design Questionnaire

The questionnaire is divided in to 3 sections to find the following data;
(1) Personal Data
(2) Behavior Data
(3) Preference Data

Each section has been designed to ask the respondents in different objectives as follows:

Personal Data

This section was designed in order to define the biographical data of the focused respondents including age, monthly income, education, and occupation. The questions
in this section are from questions number 1 to number 4. The researcher focuses the survey on the 20 year-old or over Thai female who use Internet.

## Behavior Data

In this section, the researcher focuses on behavior of the respondents on their hobbies and use of Internet. The questions are number 1 to number 9 , number 12 to number 14 , and number 16 .

Preference Data
This is the last section of the questionnaire. In this section, the researcher focuses on the preference of the respondents on each section and factor of electronic magazine for working women to find the possibility of success in Thai electronic magazines with information system application. The questions in this section are number 10 , number 11 , and number 15 .

## PERSONAL DATA

## Question No. 1

1. How old are you?

- 1) 20-25 years old
- 2) 26-31 years old

ㅁ 3) 32-37 years old

- 4) 38 years old or over

Table 4.1. Personal Data: Age.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| $20-25$ years old | 116 | $58.0 \%$ |
| $26-31$ years old | 74 | $37.0 \%$ |
| $32-37$ years old | 8 | $4.0 \%$ |
| 38 years old or over | 2 | $1.0 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.1. Personal Data: Age.

## Question No. 2

2. What is your education level?

- 1) Bachelor Degree
- 2) Master Degree
- 3) Higher than Master Degree

Table 4.2. Personal Data: Education Level.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| Bachelor Degree | 115 | $57.5 \%$ |
| Master Degree | 83 | $41.5 \%$ |
| Higher than Master | 2 | $1.0 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.2. Personal Data: Education Level.

## Question No. 3

3. How much do you earn each month?

- 1) 6000-12000
- 4) 22001-26000
- 2) 12001-18000
- 5) 26001-30000
- 3) 18001-22000
- 6) Higher than 30000

Table 4.3. Personal Data: Income Level.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| $6,000-12,000 \mathrm{Baht}$ | 75 | $37.5 \%$ |
| $12,001-18,000 \mathrm{Baht}$ | 48 | $24.0 \%$ |
| $18,001-22,000 \mathrm{Baht}$ | 13 | $6.5 \%$ |
| $22,001-26,000 \mathrm{Baht}$ | 20 | $10.0 \%$ |
| $26,001-30,000 \mathrm{Baht}$ | 16 | $8.0 \%$ |
| $>30,000 \mathrm{Baht}$ | 28 | $14.0 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.3. Personal Data: Income Level.

## Question No. 4

4. What is your occupation?

- 1) Private sectors
- 2) State enterprise
- 3) Government sectors
- 4) Own business
- 5) Students
- 6) Other, please specify $\qquad$

Table 4.4. Personal Data: Occupation.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| Private Sectors | 90 | $45.0 \%$ |
| Student | 58 | $29.0 \%$ |
| Own Business | 22 | $11.0 \%$ |
| Others | 18 | $9.0 \%$ |
| State Enterprise | 10 | $5.0 \%$ |
| Government Sectors | 2 | $1.0 \%$ |
| Total | 200 | $100.0 \%$ |



Figure 4.4. Personal Data: Occupation.

## Result of Personal Data

According to the condition that the population must be Thai over-20-year-old women who regularly use the Internet, therefore the 200 respondents are all female at different age ranges of more than 20 years old.

Most respondents are from 20 to 25 years old, $58 \%$ of total respondents, while $37 \%$ of the respondents is 26 to 31 years old, $4 \%$ is 32 to 37 , and only $1 \%$ is 38 years old or over.

For the monthly income, most respondents receive between $5,000-10,000$ Bahts with the percentage of $57 \%$ followed by $30.5 \%$ of monthly income under 5,000 Bahts, $9.5 \%$ of monthly income between 10,001 to 15,000 , and $2.5 \%$ of monthly income between 15,001 to 20,000 Bahts. Only one respondent or $0.5 \%$ has monthly income of more than 20,000 Bahts.

From the survey, most respondents are Bachelor Degree graduated (57.5\%). $41.5 \%$ is Master Degree graduated. The rest of them (1\%) are Higher than Master Degree graduated.

Finally, it is found that $45 \%$ of total respondents work for private sectors, $29 \%$ are studying, $11 \%$ own business, $9 \%$ select others (charity associations and unemployed), $5 \%$ work in state enterprises, and $1 \%$ works for government.

## QUESTION SECTION

## Question No. 1

1. What do you usually do in your free time?

- 1) Watch TV/Listen to music
- 2) See movie

3) Use Internet

- 4) Read books
- 5) Play sports/games
- 6) Other, please specify $\qquad$

Table 4.5. The Hobbies of Respondents.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| Watch TV/Listen to Music | 116 | $58.0 \%$ |
| Read books | 30 | $15.0 \%$ |
| Use Internet | 23 | $11.5 \%$ |
| See movie | 20 | $10.0 \%$ |
| Play sports/games | 10 | $5.0 \%$ |
| Others | 1 | $0.5 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.5. The Hobbies of Respondents.

## Question No. 2

2. How long do you usually use Internet each time?

- 1) Less than 1 hour
a 2) 1-3 hours
- 3) 3-5 hours
- 4) More than 5 hours

Table 4.6. The Regular Internet Use Duration of Respondents.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| $1-3$ hours | 124 | $62.0 \%$ |
| Less than 1 hour | 60 | $30.0 \%$ |
| 3-5 hours | 13 | $6.5 \%$ |
| More than 5 hours | 3 | $1.5 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.6. The Regular Internet Use Duration of Respondents.

## Question No. 3

3. When do you usually use Internet?
a 1) 8.00 a.m. - 12.00 a.m.

- 2) 12.00 a.m. -4.00 p.m.
a 3) 4.00 p.m. -8.00 p.m.

■ 4) 8.00 p.m. - 12.00 p.m.
ㅁ 5) 12.00 p.m. -4.00 a.m.
a 6) 4.00 a.m. -8.00 a.m.

Table 4.7. The Usual Period of Time Respondents Use the Internet.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| 8.00 p.m. -12.00 p.m. | 95 | $47.5 \%$ |
| 8.00 a.m. -12.00 a.m. | 30 | $15.0 \%$ |
| 4.00 p.m. -8.00 p.m. | 29 | $14.5 \%$ |
| 12.00 a.m. -4.00 p.m. | 24 | $12.0 \%$ |
| 12.00 p.m. -4.00 a.m. | 14 | $7.0 \%$ |
| 4.00 a.m. -8.00 a.m. | 8 | $4.0 \%$ |
| Total | 200 | $100 \%$ |



Figure 4.7. The Usual Period of Time Respondents Use the Internet.

## Question No. 4

4. What do you mostly do when using Internet? (You can select more than 1 choice)

- 1) Search for data/information
- 2) Visit web sites and read interesting topics
- 3) Chat online
- 4) Post opinion/view on webboard
- 5) Give votes to set topics
- 6) Buy goods
- 7) Play online games
- 8) See horoscope column
- 9) Send/compose/check e-mails
- 10) Other, please specify

Table 4.8. The Internet Use of Respondents.

| The Internet Uses | Frequency | Percentage |
| :--- | ---: | ---: |
| Send/Compose/Check E-mails | 152 | $76.0 \%$ |
| Search for Data/Information | 135 | $67.5 \%$ |
| Visit Web Sites/Read Interesting Topics | 110 | $55.0 \%$ |
| Chat Online | 34 | $17.0 \%$ |
| See Horoscope Columns | 27 | $13.5 \%$ |
| Play Online Games | 17 | $8.5 \%$ |
| Post Opinions/Views on Webboards | 11 | $5.5 \%$ |
| Buy Goods | 8 | $4.0 \%$ |
| Others | 7 | $3.2 \%$ |
| Give Votes to Set Topics | 1 | $0.5 \%$ |
| Total Respondents | 200 |  |

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Figure 4.8. The Internet Use of Respondents.

## Question No. 5

5. Have you ever visited online magazine web site(s)?

- 1) Yes
- 2) No (Skip to no. 13)

Table 4.9. The Number of Online Magazine Visitors.

|  | Frequency | Percentage |
| :--- | ---: | ---: |
| Yes | 65 | $32.5 \%$ |
| No | 135 | $67.5 \%$ |
| Total | 200 | $100.0 \%$ |



Figure 4.9. The Number of Online Magazine Visitors.

## Question No. 6

6. Which type of online magazine do you like to visit most? (one answer only)

- 1) Women
- 2) Men
- 3) Sports
a 4) IT
a 5) Automobile
- 6) Business
- 7) Health
a 8) Travel
- 9) Entertainment
- 10) Other, please specify $\qquad$

Table 4.10. The Most Favorite Types of Online Magazines for Visitors.

|  | Frequency | Percentage | \% of Total Respondents |
| :--- | ---: | ---: | ---: |
| Women | 37 | $56.9 \%$ | $18.5 \%$ |
| Entertainment | 9 | $13.8 \%$ | $4.5 \%$ |
| Travel | 8 | $12.3 \%$ | $4.0 \%$ |
| Business | 5 | $7.7 \%$ | $2.5 \%$ |
| Health | 4 | $6.2 \%$ | $2.0 \%$ |
| Men | 1 | $1.5 \%$ | $0.5 \%$ |
| Sports | 1 | $1.5 \%$ | $0.5 \%$ |
| Total | 65 | $100 \%$ | $32.5 \%$ |



Figure 4.10. The Most Favorite Types of Online Magazines for Visitors.

## Question No. 7

7. Have you ever visited online magazine web site(s) for women?

- 1) Yes

ㅁ 2) No (Skip to no. 13)

Table 4.11. The Number of Women Online Magazine Visitors.

|  | Frequency | Percentage | $\%$ of Total Respondents |
| :--- | ---: | ---: | ---: |
| Yes | 53 | $81.5 \%$ | $26.5 \%$ |
| No | 12 | $18.5 \%$ | $6.0 \%$ |
| Total | 65 | $100 \%$ | $32.5 \%$ |



Figure 4.11. The Number of Women Online Magazine Visitors.

## Question No. 8

8. Which women online magazine web site(s) did you visit? (You can select more than 1 choice)

- 1) Elle
- 2) Image
- 3) Pooying Today
- 4) Pooying
- 5) Dosika
- 6) Tergubchan
- 7) Sakulthai
- 8) Cosmopolitan
- 9) Dichan
- 10) Other, please specify $\qquad$

Table 4.12. Women Online Magazine: The Visiting Rate of Respondents.

| Women Online Magazine(s) Visited | Frequency | Percentage |
| :--- | ---: | ---: |
| Elle | 31 | $58.5 \%$ |
| Image | 20 | $37.7 \%$ |
| Cosmopolitan | 18 | $34.0 \%$ |
| Dosika | 8 | $15.1 \%$ |
| Dichan | 7 | $13.2 \%$ |
| Others | 7 | $13.2 \%$ |
| Pooying Today | 6 | $11.3 \%$ |
| Tergubchan | 2 | $3.8 \%$ |
| Pooying | 1 | $1.9 \%$ |
| Sakulthai | 1 | $1.9 \%$ |
| Total Women Online Magazine Visitors |  | 53 |

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Figure 4.12. Women Online Magazine: The Visiting Rate of Respondents.

## Question No. 9

9. How do you know the above online magazine web site(s) in question no. 8? (You can select more than 1 choice)

- 1) Parents
- 6) Magazine
- 2) Friends
- 7) Newspaper

ㅁ 3) Lover

- 8) Internet links in other web
- 4) Radio
- 5) TV
sites
- 9) Other, please specify

Table 4.13. Source of Women Online Magazine Information.

| Source of Women Online Magazine Information | Frequency | Percentage |
| :--- | ---: | ---: |
| Internet Links in Other Web Sites | 24 | $45.3 \%$ |
| Magazine | 22 | $4.15 \%$ |
| Friends | 10 | $18.9 \%$ |
| Radio | 4 | $7.5 \%$ |
| Newspaper | 3 | $5.7 \%$ |
| Others | 3 | $5.7 \%$ |
| Lover | 2 | $3.8 \%$ |
| TV | 2 | $3.8 \%$ |
| Parents | 1 | $1.9 \%$ |
| Total Women Online Magazine Visitors |  |  |



Figure 4.13. Source of Women Online Magazine Information.

## Question No. 10

10. Please choose 5 sections you like most in a woman online magazine web site and rank them according to your opinion (from $5=$ the most favorite to $1=$ the least favorite)?

- 1) Fashion/Beauty/Heath
- 2) Working Tips
- 3) Entertainment
- 4) Cooking
- 5) Horoscope
- 6) Personality tests/Games/Contests
- 7) Chat/Web boards
- 8) Search engine/Links
- 9) E-mail/Information download
- 10) Other, please specify $\qquad$

Table 4.14. The Top Five Most Favorite Sections in Women Online Magazine.

| Sections | Favorite Degree |  |  |  |  | Mean |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | $\begin{gathered} 5= \\ \text { Most } \end{gathered}$ | 4 | 3 | 2 | $1=$ <br> Least |  |
| Fashion/Beauty/Health | 29 | 8 | 6 | 1 | 5 | 4.122 |
| Entertainment | 7 | 17 | 10 | 6 | 8 | 3.188 |
| E-mail/Information Download | 3 | 3 | 3 | 1 | 4 | 3.000 |
| Working Tips | 4 | 4 | 11 | 7 | 9 | 2.629 |
| Horoscope | 3 | 8 | 3 | 16 | 7 | 2.568 |
| Chat/Webboards | 0 | 1 | 3 | 1 | 2 | 2.429 |
| Search Engine/Links | 1 | 2 | 1 | 2 | 4 | 2.400 |
| Personality Tests/Games/Contests | 3 | 5 | 7 | 9 | 12 | 2.389 |
| Cooking | 1 | 3 | 7 | 8 | 8 | 2.296 |
| Others | 0 | 0 | 0 | 0 | 0 | 0.000 |



Figure 4.14. The Top Five Most Favorite Sections in Women Online Magazine.

## Question No. 11

11. How do you think about these factors of online magazine? Please mark ( X ) one of these scales for each factor.

| Factors | Opinion |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Absolutely <br> Important | Important | Fair | $\begin{gathered} \text { Not } \\ \text { Important } \end{gathered}$ | Absolutely <br> Not Important |
| 1) Support both Thai \& English Language |  |  |  |  |  |
| 2) Frequently updated |  |  |  |  |  |
| 3) Colorful design |  |  |  |  |  |
| 4) 4) Interesting topics/up-todate topics |  |  |  |  |  |
| 5) Enable online chat/web boards |  |  | $1$ |  |  |
| 6) Many photos and images |  |  | - |  |  |
| 7) Provide links to other interesting web sites |  |  | $\square$ |  |  |
| 8) Fast retrieval/download speed |  |  | $\bigcirc$ |  |  |
| 9) Contain news/interesting information | NCE 19 | ৯ |  |  |  |
| 10) Reader involvement/participation | ยาลัย |  |  |  |  |
| 11) Search engine availability |  |  |  |  |  |
| 12) Gifts/rewards giving for participation |  |  |  |  |  |
| 13) Interactive among readers or between readers \& server |  |  |  |  |  |
| 14) Animation pictures/E-cards |  |  |  |  |  |
| 15) E-mail sending/responding |  |  |  |  |  |
| 16) Enable online games and contests |  |  |  |  |  |

Table 4.15. The Degree of Importance of Online Magazine Factors.

| Factors | Opinion |  |  |  |  | Mean |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Absolutely Important | Important | Fair | Not <br> Important | Absolutely Not Important |  |
| Interesting/up-to-date topics | 33 | 18 | 2 | 0 | 0 | 4.585 |
| Frequently updated | 33 | 15 | 5 | 0 | 0 | 4.528 |
| News/interesting info. | 25 | 22 | 5 | 1 | 0 | 4.340 |
| Fast retrieval/download speed | 24 | 18 | 9 | 2 | 0 | 4.208 |
| Colorful design | 13 | 34 | 6 | 0 | 0 | 4.132 |
| Support both Thai \& English | 15 | 25 | 7 | 5 | 1 | 3.906 |
| Many photos and images | 8 | 23 | 20 | 2 | 0 | 3.698 |
| Search engine availability | 8 | 24 | 18 | 2 | 1 | 3.679 |
| Offer links to other web sites | 8 | 23 | 16 | 6 | 0 | 3.623 |
| Reader involvement/participation | 3 | 22 | 27 | 1 | 0 | 3.509 |
| E-mail sending/responding | 6 | 17 | 25 | 5 | 0 | 3.453 |
| Animation pictures/E-cards | 9 | 15 | 21 | 6 | 2 | 3.434 |
| Interactive among readers/between readers-servers | 3 | 22 | 22 | 6 | 0 | 3.415 |
| Enable online chat/ webboards | 5 | 11 | 29 | 6 | 2 | 3.208 |
| Gifts/rewards for participation | 4 | 17 | 19 | 10 |  | 3.170 |
| Online games and contests | 4 | 15 | 22 | 9 | 3 | 3.151 |



Figure 4.15. The Degree of Importance of Online Magazine Factors.

## Question No. 12

12. Suppose there is a newly borne woman online magazine that provides you with all the above factors from last question, will you visit it?

- 1) Yes
- 2) No

Table 4.16. Interests in Visiting a Full Service Women E-Magazine (Visitors).

|  | Frequency | Percentage | $\%$ of Total Respondents |
| :--- | ---: | ---: | ---: |
| Yes | 52 | $98.1 \%$ | $26.0 \%$ |
| No | 1 | $1.9 \%$ | $0.5 \%$ |
| Total | 53 | $100.0 \%$ | $26.5 \%$ |



Figure 4.16. Interests in Visiting a Full Service Women E-Magazine (Visitors).

## Question No. 13

13. Have you ever read woman magazine(s)?

- 1) Yes (go on to no. 14)
- 2) No
because $\qquad$
$\qquad$
(If your answer is "No", please ignore all other questions. Thank you for your cooperation in answering questions)

Table 4.17. The Number of Non-Visitors Reading Woman Magazine(s).

|  | Frequency | Percentage | \% of Total Respondents |
| :--- | ---: | ---: | ---: |
| Yes | 135 | $91.8 \%$ | $67.5 \%$ |
| No | 12 | $8.2 \%$ | $6.0 \%$ |
| Total | 147 | $100 \%$ | $73.5 \%$ |



Figure 4.17. The Number of Non-Visitors Reading Woman Magazine(s).

## Question No. 14

14. Which woman magazine(s) you have ever read? (You can select more than 1 choice)

- 1) Elle
- 2) Image
- 7) Cleo
- 3) Pooying Today
- 8) Cosmopolitan
- 4) Pooying
- 9) Dichan
- 5) Praew
- 10) Other, please specify $\qquad$

Table 4.18. Women Magazine: The Readership of Respondents.

| Women Magazine(s) Non-Visitors Read | Frequency | Percentage |  |
| :--- | ---: | ---: | :---: |
| Elle | 97 | $71.9 \%$ |  |
| Cleo | 92 | $68.1 \%$ |  |
| Image | 87 | $64.4 \%$ |  |
| Cosmopolitan | 86 | $63.7 \%$ |  |
| Preaw | 75 | $55.6 \%$ |  |
| Ploy Gam Petch | 54 | $40.0 \%$ |  |
| Dichan | 49 | $36.3 \%$ |  |
| Pooying Today | 19 | $14.1 \%$ |  |
| Pooying | 12 | $8.9 \%$ |  |
| Others | 4 | $3.0 \%$ |  |
| Total Non-Visitors | 135 |  |  |



Figure 4.18. Women Magazine: The Readership of Respondents.

## Question No. 15

15. Please choose 5 sections you like most in a woman magazine and rank them according to your opinion (from $5=$ the most favorite to $1=$ the least favorite)
a 1) Fashion/Beauty/Heath/Sex

- 2) Working Tips
- 3) Entertainment
- 4) Cooking
- 5) Horoscope
- 6) Personality tests/Games/Contests
- 7) Editorial/Readers' mails answering
- 8) Other, please specify $\qquad$



## St. Gabriel Library, Au

Table 4.19. The Top Five Most Favorite Sections in Print Women Magazine.

| Sections | Favorite Degree |  |  |  |  | Mean |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
|  | 5 | 4 | 3 | 2 | 1 |  |
| Fashion/Beauty/Health/Sex | 64 | 23 | 18 | 13 | 14 | 3.833 |
| Others | 4 | 0 | 2 | 0 | 3 | 3.222 |
| Entertainment | 19 | 44 | 30 | 23 | 17 | 3.188 |
| Horoscope | 13 | 23 | 26 | 29 | 23 | 2.772 |
| Personality Tests/Games/Contests | 15 | 11 | 21 | 21 | 23 | 2.714 |
| Working Tips | 9 | 17 | 12 | 21 | 26 | 2.553 |
| Editorial/Readers' mails answering | 3 | 3 | 4 | 3 | 9 | 2.455 |
| Cooking | 7 | 13 | 20 | 24 | 28 | 2.424 |



Figure 4.19. The Top Five Most Favorite Sections in Print Women Magazine.

## Question No. 16

16. Suppose there is a newly borne women online magazine that provides you with all the above factors from last question, will you visit it?

- 1) Yes
- 2) No

Table 4.20. Interests in Visiting a Full Service Women E-Magazine (Non-Visitors).

|  | Frequency | Percentage | \% of Total Respondents |
| :--- | ---: | ---: | ---: |
| Yes | 115 | $85.2 \%$ | $57.5 \%$ |
| No | 20 | $14.8 \%$ | $10.0 \%$ |
| Total | 135 | $100.0 \%$ | $67.5 \%$ |



Figure 4.20. Interests in Visiting a Full Service Women E-Magazine (Non-Visitors).

## Results of Behavior Data

From the survey on the Hobbies of Respondents in question no. 1, it is found that the top three hobbies most respondents usually select to do in their free time are: watching TV/listening to music (58\%), reading books (15\%), and using Internet.

Asking about the Regular Internet Use Duration, it is shown that most respondents use the Internet from 1-3 hours, followed by those who use less than 1 hour, 3-5 hours, and more than 5 hours at a time.

On the survey of Usual Period of Time Respondents Use Internet, the researcher found that most of them use the Internet during 8.00 p.m. to 12.00 p.m. ( $47.5 \%$ ), 8.00 a.m. to 12.00 a.m., 4.00 p.m. to 8.00 p.m., 12.00 a.m. to 4.00 p.m. 12.00 p.m. to 4.00 a.m. and $4.00 \mathrm{a} . \mathrm{m}$. to $8.00 \mathrm{a} . \mathrm{m}$. respectively.

The information gathered on the Internet Use of Respondents are respectively shown that the respondents usually: send/compose/check e-mails (76\%), search for data/information, visit websites/read interesting topics, chat online, see horoscope columns, play online games, post opinions/views on webboards, buy goods, do other specified things (including downloading programs, data, and information, sending Ecards, finding jobs, reading magazines) and give votes to set topics.

Launching the questionnaires to 200 respondents, the researcher found that only $32.5 \%$ of them are the Online Magazines Visitors (those who have visited online magazine websites). The majority of the respondents ( $67.5 \%$ ) are further asked to skip to question no. 13 prepared for Online Magazines Non-Visitors and also for Women Online Magazines Non-Visitors.

Among the Total Online Magazines Visitors, it is further found that $81.5 \%$ of them have visited Women Online Magazines. The remaining $18.5 \%$ was also asked to skip to question no. 13 as those who have never visited any online magazines at all.

The followings are the Ranked Women Online Magazines Visiting Rate found in the question no. 8: 1. Elle, 2. Image, 3. Cosmopolitan, 4. Dosika, 5. Dichan, 6. Others (SimpleMAG, Cleo, Ploy Gam Petch), 7. Pooying Today, 8. Tergubchan, 9. Pooying, and 10. Sakulthai.

The research findings further show the descending order of the Source of Women Online Magazines Information as follows: 1. Internet Links, 2. Magazines, 3. Friends, 4. Radio, 5. Newspaper, 6. Others (Search Engines), 7. Lover, 8. T.V., and 9. Parents.

Obtaining the preference data in the question no. 10 and 11 about favorites types of online magazines and the degree of important of online magazines factors (see Results of Preference Data in the next section), the researcher asked respondents whether or not they would be interested in accessing a full-service online magazines for women (question no. 12). Most of them (98.1\%) said they would.

For question no. 13, both Online Magazines Non-Visitors and Women Online Magazines Non-Visitors were asked whether they had ever read Women Magazines or not. The majority of Non-Visitors (91.8\%) had read Women Magazines.

The next question leads to the Readership of Women Magazines as the followings: 1. Elle, 2. Cleo, 3. Image, 4. Cosmo, 5. Preaw, 6. Ploy Gam Petch, 7. Dichan, 8. Pooying Today, 9. Pooying, and 10 Other women magazines (Kwan Reun, DNA, Voque). Finally After asking the Non-Visitors about their Top 5 Most Favorite Sections in Printed Women Magazines (see Results of Preference Data in the next section), the last question also asked whether or not they would be interested in visiting a Full-Service Women Online Magazines which can provide them with all sections they like as well as those fully applied information systems. $85.2 \%$ of the Non-Visitors replied they would.

## Result of Preference Data

The first set of preference data is the Most Favorite Types of Online Magazines for Online Magazines Visitors. The results ranked from the most to the least favorite are: 1. Women ( $56.9 \%$ of Online Magazines Visitors), 2. Entertainment, 3. Travel, 4. Business, 5. Health, 6. Men, and 7. Sports.

One of the other sets of preference data is found in question no. 10 , asking respondents to rank their favorite sections in women online magazines they had visited, with the result ranged from 2.296 to 4.122 . The top five most favorite factors in women online magazines are: 1. Fashion/Beauty/Health, 2. Entertainment, 3. Email/Information Download, 4. Working Tips, and 5. Horoscope. Others go to Chat/Webboards, Search Engine/Links, Personality Tests/Games/Contests, and Cooking sections.

According to the survey on the Degree of Importance of Online Magazine Factors (question no. 11), all factors are preferred at almost closed rate (range from 3.151 to 4.585), where 3 means fair, 4 means important and 5 means absolutely important). However, the two most important factors are Interesting/up-to-date topics and Frequently updated.

The last set of preference data is from question no. 15, the Top Five Most Favorite Sections in Women Magazines from asking those Online Magazines Non-Visitors. The most favorite section is Fashion/Beauty/Health/Sex, followed by Other sections specified by respondents (including interviews, short stories/novels, and advertisements), Entertainment, Horoscope, and Personality Tests/Games/Contests. The remaining sections are: Working Tips, Editorial/Readers' mails answering, and Cooking section.

### 4.3 Research Finding

(1) From the total sample size of 200 , the questionnaires had been distributed only to female Internet users who are 20 years old or over.
(2) As the questionnaires were distributed to 200 respondents, $58 \%$ of them are $20-25$ years old, $37 \%$ are $26-31$ years old, $4 \%$ are $32-37$ years old, and $1 \%$ is over 38 .
(3) From the finding about respondents' education level, the researcher found that $57.5 \%$ of respondents have Bachelor Degree, $41.5 \%$ have Master Degree, and only $1 \%$ has Higher than Master Degree.
(4) This survey has shown that $37.5 \%$ of the total respondents earn 6,000 12,000 Bahts, $24 \%$ earn $12,001-18,000$ Bahts, $14 \%$ earn more than 30,000 Bahts, $10 \%$ earn 22,001-26,000 Bahts, $8 \%$ earn 26,001-30,000 Bahts, and 6.5\% earn 18,001-22,000 Bahts per month.
(5) Studying about occupation of sample respondents, the researcher found that most respondents (45\%) work in private companies, $29 \%$ are studying, $11 \%$ own business, $5 \%$ work for state enterprises, $1 \%$ is from government sectors, and $9 \%$ works in other fields (charity associations and unemployed).
(6) For the first question in the question section about what respondents usually do in their free time, it is found that most of them (58\%) like to watch TV or listen to music, $15 \%$ read books, $11.5 \%$ use the Internet, $10 \%$ sees movies, $5 \%$ play sports or games, and $0.5 \%$ has other choices (shopping and travel).
(7) Next, the research intends to ask how long each respondent uses the Internet in each time and it is found that most of them (62\%) usually spend 1-3 hours
each time. Other $30 \%$ normally spend less than 1 hour at a time while $6.5 \%$ and $1.5 \%$ spend $3-5$ hours and more than 5 hours respectively.
(8) From question no. 3 asking about the Internet Use Period of Respondents, the researcher found that most respondents which represent $47.5 \%$ of total sample size usually use Internet during 8.00 p.m. to 12.00 p.m. $15 \%$ use during 8.00 a.m. to 12.00 a.m., $14.5 \%$ use during 4.00 p.m. to 8.00 p.m., $12 \%$ use during 12.00 a.m. to 4.00 p.m., $7 \%$ use during 12.00 p.m. to 4.00 a.m., and $4 \%$ use during 4.00 a.m. to 8.00 a.m.
(9) In question no. 4, the researcher asks respondents about their usual use of the Internet and it is found that $76 \%$ of them (the majority) use the Internet for e-mail sending, checking, and composing. $67.5 \%$ represent those who search for data or information through the Internet. $55 \%$ visit web sites and read interesting topics on them. $17 \%$ like to chat online and $13.5 \%$ would prefer to see horoscope columns. $8.5 \%$ usually play online games. $5.5 \%$ normally use the Internet to post opinions on webboards. $4 \%$ buy goods through Internet. $0.5 \%$ of respondents use the Internet to give votes to set topics and $3.5 \%$ use Internet for other purposes (sending E-cards, downloading, finding jobs, and reading magazines).
(10) From the survey, the research found that only 65 respondents from the total of $200(32.5 \%)$ have visited online magazine web sites while the majority or 135 respondents ( $67.5 \%$ ) have never seen these sites. Then those who have never visited them (135 respondents) are asked to skip to question no. 13, while the other 65 respondents can go on to the next question. (Note: The respondents who have never visited any online magazines will then be
called the Non-Visitors by the researcher from this point forward, due to the reason that they will definitely have never visited women online magazines)
(11) From asking those who have visited online magazines ( 65 respondents) on the type of online magazines they like to visit most, the survey has shown that Women online magazines represents the highest percentage of $56.9 \%$. Then it's followed by Entertainment (13.8\%), Travel (12.3\%), Business (7.7\%), Health (6.2\%), Men (1.5\%), and Sports (1.5\%).
(12) It is further found in question no. 7 that, from those who have visited online magazines ( $32.5 \%$ of the total respondents which represents 65 respondents), $81.5 \%$ of them ( 53 respondents from 65 respondents) have visited the actual women online magazines and $18.5 \%$ ( 12 respondents from 65 respondents) have never. Again those who have never visited women online magazines ( 12 respondents) are asked to skip to the question no. 13 and the remaining can go on to the next question. This question's result represents "The Number of Women Online Magazine Visitors." (Note: Both of those who have never visited any online magazines and those who have never visited online magazines for women will be called the Non-Visitors.)
(13) Asking which women online magazines respondents used to visit, the researcher found that $58.5 \%$ of 53 respondents who have visited online magazines for women used to visit Elle online magazine. 37.7\% of them visited Image, $34 \%$ visited Cosmopolitan, $15.1 \%$ visited Dosika, $13.2 \%$ visited Dichan, $13.2 \%$ visited other women online magazines (SimpleMAG, Cleo, Ploy Gam Petch), $11.3 \%$ visited Pooying Today, $3.8 \%$ went to Tergubchan, $1.9 \%$ for Pooying, and other $1.9 \%$ for Sakulthai.
(14) To find the source of online magazine for women's awareness, question no. 9 asks how respondents know the web sites in question no. 8. The answers are; $45.3 \%$ from Internet links, $41.5 \%$ from magazines, $18.9 \%$ from friends, $7.5 \%$ from radios, $5.7 \%$ from newspaper, $5.7 \%$ from other information sources (Search Engines), 3.8\% from lovers, another 3.8\% from televisions, and $1.9 \%$ from parents.
(15) Question no. 10 asks respondents to select 5 sections in women online magazines they like most and rank them according to the degree of favor from 5 (the most favorite) to 1 (the least favorite). The research has shown in the mean score format that Fashion/Beauty/Health gains the highest mean score of 4.122. The second rank is Entertainment with the means score of 3.188. 3 mean score is for Email/Information Download. 2.629 is for Working Tips, 2.568 for Horoscope, 2.429 for Chat/Webboards, 2.4 for Search Engine/Links, 2.389 for Personality Tests/Games/Contests, and 2.296 for Cooking Sections.
(16) For the question asking how important the respondents think about the factors of online magazines from absolutely important (= 5 scores) to absolutely not important ( $=1$ score), the highest mean score goes to Interesting/Up-to-Date Topics (4.585). 4.528 mean score is for Frequently Updated, 4.34 for News/Interesting Information, 4.208 for Fast Retrieval/Download Speed, 4.132 for Colorful Design, 3.906 for English and Thai Supports, and 3.698 for Many Photos and Images. The next followed ranks go to Search Engine Availability (3.679), Links to Other Web Sites (3.623), Reader Involvement/Participation (3.509), E-mail Sending/Responding (3.453), Animation Pictures/E-cards (3.434),

Interactive among Readers/Readers-Servers (3.415), Online Chat/Webboards Enabling (3.208), Gifts/Rewards for Participation (3.17), and Online Games/Contests (3.151).
(17) The last question prepared only for those who used to visit women online magazines (the Visitors) is no. 12, asking whether or not the respondents will visit a women online magazines that provide them with all the factors said in question no. 11. It is found that $98.1 \%$ of 53 respondents (the Visitors) said they would visit it while only $1.9 \%$ of them said they would not.
(18) Now we reach question no. 13, which is for those who have never visited both online magazine web sites ( 135 respondents) and online magazines for women ( 12 respondents), which would both be called the Non-Visitors. Therefore, this question is for 147 Non-Visitors from 200 total respondents. Asking the Non-Visitors whether or not they have ever read women magazines, the researcher found that $91.8 \%$ of them has read women magazines, and that the rest of $8.2 \%$ has never. Then the respondents who have never read women magazines are asked to ignore all the other questions because each set of questionnaires has been prepared for target respondents who usually like to read women magazines. As the result, those who have read ones ( 135 respondents) are to go forward onto the other questions. This question's result represents "The Number of Non-Visitors Reading Women Magazines."
(19) The questions from no. 14 to 16 are prepared only for those who have never visited online magazines web sites, or never visited online magazine web sites for women, and used to read women online magazines. In question no.

14, the respondents are asked which magazines for women they have ever read (They can select more than one choice). Therefore, from the total respondents of 135, the results are shown orderly as follows; Elle (71.9\%), Cleo (68.1\%), Image (64.4\%), Cosmopolitan (63.7\%), Preaw (55.6\%), Ploy Gam Petch (40\%), Dichan (36.3\%), Pooying Today (14.1\%), Pooying (8.9\%), and other magazines including Image, DNA, Voque, and Kwan Ruen (3\%).
(20) Question no. 15 asks respondents to select 5 sections in women magazines they like most and rank them according to the degree of favor from 5 (the most favorite) to 1 (the least favorite). The research has shown in the mean score format that Fashion/Beauty/Health/Sex gains the highest mean score of 3.833. The second rank goes to other sections including interviews, short stories/novels, and advertisements with the means score of 3.222. 3.188 mean score is for Entertainment. 2.772 is for Horoscope, 2.714 for Personality Tests/Games/Contests, 2.553 for Working Tips, 2.455 for Editorial/Readers' Mails Answering, and 2.424 for Cooking.
(21) The last is the question no. 16, asking whether or not the respondents will visit a women online magazine that provide them with all the factors said in the question no. 15. It is found that $85.2 \%$ of 135 respondents (who have never visited online magazines, and/or online magazines for women, but have ever read women magazines) said they would visit it while other $14.8 \%$ said they would not.

### 4.4 Answers to the Statements of the Problems

Now the data collection makes it sufficient to answer the problems stated at the very beginning of this project. The statements have been answered in descriptive forms and tables to support the detailed information. The conclusions are:

Statements No. 1:
Is Women Online Magazine The Most Favorite Type of Online Magazines for Respondents?

The question that can lead to the answer of this statements is the question no. 6 asking which type of online magazines the respondents like to visit most. The results are shown in the Age Cross-Tabulation Format in the following table:

Table 4.21. The Most Favorite Type of Online Magazines \& Age Cross-Tabulation.

| The most favorite type of online magazines | Age |  |  |  | Total | \% of 65 respondents |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 20-25 | 26-31 | 32-37 | $>=38$ |  |  |
| Women | 18 | 18 | 1 | 0 | 37 | 57\% |
| Entertainment | 9 | 0 | 0 | 0 | 9 | 14\% |
| Travel | 5 | 3 | 0 | 0 | 8 | 12\% |
| Business | 1 | 2 | 2 | 0 | 5 | 8\% |
| Health | 2 | 2 | 0 | 0 | 4 | 6\% |
| Men | 1 | 0 | 0 | 0 | 1 | 2\% |
| Sports | 1 | 0 | 0 | 0 | 1 | 2\% |

From the survey, it is shown in Table 4.21 that Women Online Magazine gains the highest percentage of $57 \%$ from 65 respondents who have visited Online Magazines. Consequently, the first statement has been proved by the findings that Women Online Magazine Is the Most Favorite Type of Online Magazines for Respondents.

Statement No. 2:
Can Information System Be Successfully Applied on Thai Electronic Magazines for Working Women?

This statement can be answered by analyzing questions no. 11, 12, 15, and 16. From question no. 11, which the researcher aims to survey how important the Women Online Magazines Visited Respondents think about the information system applied factors of online magazines from absolutely important ( $=5$ scores) to absolutely not important ( $=1$ score), the highest mean score is 4.585 and the lowest is 3.151 . That means most respondents at least think that these information system applied factors are important enough for an electronic magazine. Then question no. 12 has asked the Women Online Magazines Visited Respondents whether they would be interested in accessing the information systems applied electronic magazines for women, and most of them said they would.

For question no. 15, the Non-Visited Respondents have been asked about their favorite sections on general women magazines. It is the induction to the next question, question no.16, that asks whether or not they will be interested in accessing the full information systems applied women online magazines with all the above sections they like. And most of them said yes. Therefore, these results are useful enough to say that Information System Can Be Successfully Applied on Thai Electronic Magazines for Working Women.

## V. CONCLUSIONS AND RECOMMENDATIONS

### 5.1 Conclusions

The research on Thai Electronic Magazines for Working Women has come to the last chapter. This research aims to find out what target respondents, 20 year-old and over Thai working women, require, expect, and need from reading electronic magazines, study their behaviors and involvement in electronic magazine on-line activities, seek the areas to improve on Thai electronic magazine for working women, and analyze whether there is any possibility to apply information system successfully on Thai electronic magazine for working women. After data collection and analysis, the researcher has concluded the findings as follows:
(a) Among all the Hobbies of the Respondents, the Use of the Internet has been ranked the third after watching T.V./listening to music and reading books.
(b) The majority of the respondents use the Internet for 1 to 3 hours each time.
(c) The respondents who are also the Internet users mostly send/compose/check e-mails, search for data/information, and visit websites/read interesting topics. This means the Internet becomes more and more popular leisure time activity and source of information for the target respondents.
(d) The most favorite type of online magazines belongs to Online Magazines for Women representing $56.9 \%$ of all Online Magazines Visitors.
(e) The Major Source of Women Online Magazines Information are Internet Links, Magazines, and Friends.
(f) The surveyed results of Degree of Important on Information System Applied Factors in Online Magazines are quite satisfactory, with the least mean score of 3.151 and the highest mean score of 4.585 .
(g) Finally, Both Women Online Magazines Visitors and Non-Visitors are interested in visiting a Full-Service Women Online Magazine if available ( $98.1 \%$ and $85.2 \%$ respectively).

### 5.2 Recommendations

(a) According to the preference data about the contents, good online magazines for women should contain larger proportion of Fashion, Beauty, Health, and Sex Issues. The Entertainment, Horoscope, and Personality Tests / Games and Contests are still the prospects' favorites while sections like Working Tips, E-mails answering, and Cooking can also attract some attention.
(b) The advantages of Online Magazines comparing with Simple Printed Magazines are that the web team can interact with readers online, give them pleasant activities for their leisure time, most importantly in the researcher's point of view, keep their personal information for promotional purposes. Therefore, it is recommended for the web master to ask visitors to sign in for the membership for free, so that, they will have to give their personal information in exchange of joining some important activities as games, contests, and many more.
(c) For an electronic magazines for working women, the roles of information systems application can be in: offering data automation from internal information search engine, providing them with free e-mail service or free greeting cards for many occasions, gathering statistic information from letting visitors vote or answer the set questions, responding visitors' mails online or chatting with them online, requesting for interesting information from visitors through internal e-mail service or chat rooms to be posted in the online magazines, keeping members database after asking visitors to
sign in including login names, passwords, and personal information so that the web team can send them some promotional information or even newsletters about the online magazines later.
(d) Some application programs can be used on online games, personality tests, or contests, processing the input and transform into personalized output interactively. Imagine what visitors have to do. Just click their answers one by one, and the processed results will be shown in a very few seconds.
(e) It is important for the web team to post the online magazine for women links in many most visited websites as promotional tools, put the homepage advertisement or the public relation message on magazines the target respondents like to read (Elle, Image, Cosmopolitan, etc.), launch the radio spots, put ads on local newspapers, or even launch the TV spots. For magazines, they might not be willing to let you put any online magazine advertisements on their printed issues. The web team may offer them some remuneration such as offering them internet links or advertisements onto your online magazines, that can lead your customers to their magazines either.
(f) Wireless Application Protocol (WAP) or the mobile phone access Internet can also be applied in the near future when it is widely used. Here your internet links can be posted in some most visited WAP sites to provide access to your advertisement WAP pages that introduces your women online magazines websites shortly as a WAP sites still has many capacity limitations.
(g) It is further recommended for the one who wants to establish an online magazines for working women to study the dominants features of those
most visited women online magazines, apply what they do best on yours, and develop creatively a full-service online magazines for working women with information systems application on your own.


## St. Gabriel Library, Au

## Questionnaire

Instruction: This questionnaire is a partial fulfillment of a Final Report of the threecredit course, CE 6998 Project for the degree of Master of Science in Computer and Engineering Management. It is aimed at identifying the Possibilty of Success of Thai Electronic Magazine for Working Women with Information System Application. The questionnaire is divided into 2 parts including Personal Data and Question Section. It would be grateful if you could fill in the questionnaire with your true opinions and facts. Your responses will be kept strictly confidential. Thank for your kind cooperation.

## Personal Data

## Please fill in the blank or mark $X$ in the box of your choice.

1. How old are you?

- 1) 20-25 years old
- 2) 26-31 years old
- 3) 32-37 years old
- 4) 38 years old or over

2. What is your education level?

- 1) Bachelor Degree
- 2) Master Degree
- 3) Higher than Master Degree

3. How much do you earn each month?

- 1) 6000-12000
- 2) 12001-18000
- 3) 18001-22000
- 4) 22001-26000
- 5) 26001-30000
- 6) Higher than 30000

4. What is your occupation?

- 1) Private sectors
- 4) Own business
- 2) State enterprise
- 5) Students
- 3) Government sectors
- 6) Other, please specify $\qquad$


## Question Section

1. What do you usually do in your free time?

- 1) Watch TV/ Listen to music
- 2) See movie
- 3) Use Internet
- 4) Read books
- 5) Play sports/games
- 6) Other, please specify

2. How long do you usually use Internet each time?

- 1) Less than 1 hour
a 2) 1-3 hours
- 3) 3-5 hours
a 4) More than 5 hours

3. When do you usually use Internet?

- 1) 8.00 a.m. - 12.00 a.m.

व 2) 12.00 a.m. -4.00 p.m.

- 3) 4.00 p.m. -8.00 p.m.
- 4) 8.00 p.m. -12.00 p.m.
- 5) 12.00 p.m. -4.00 a.m.
- 6) 4.00 a.m. - 8.00 a.m.

4. What do you mostly do when using Internet? (You can select more than 1 choice)

- 1) Search for data/information
- 2) Visit web sites and read interesting topics
- 3) Chat online
- 4) Post opinion/view on web board
- 5) Give votes to set topics
- 6) Buy goods
- 7) Play online games
- 8) See horoscope column
- 9) Send/compose/check e-mails
- 10) Other, please specify $\qquad$

5. Have you ever visited online magazine web site(s)?

- 1) Yes
- 2) No (Skip to no. 13)

6. Which type of online magazine do you like to visit most? (one answer only)

- 1) Women
- 2) Men
- 3) Sports
- 4) IT
- 5) Automobile
- 6) Business
- 7) Health
- 8) Travel
- 9) Entertainment
- 10) Other, please specify

7. Have you ever visited online magazine web site(s) for women?

- 1) Yes
- 2) No (Skip to no. 13)

8. Which women online magazine web site(s) did you visit? (You can select more than 1 choice)

- 1) Elle
- 2) Image
- 3) Pooying Today
- 4) Pooying
- 5) Dosika
- 6) Tergubchan
- 7) Sakulthai
- 8) Cosmopolitan
- 9) Dichan
- 10) Other, please specify

9. How do you know the above online magazine web site(s) in question no. 8? (You can select more than 1 choice)

- 1) Parents
- 2) Friends
- 3) Lover
- 4) Radio
- 5) TV
- 6) Magazine
- 7) Newspaper
a 8) Internet links in other web sites
- 9) Other, please specify $\qquad$

10. Please choose 5 sections you like most in a woman online magazine web site and rank them according to your opinion (from $5=$ the most favorite to $1=$ the least favorite)?

- 1) Fashion/Beauty/Heath
- 2) Working Tips
- 3) Entertainment
- 4) Cooking
- 5) Horoscope
- 6) Personality tests/Games/Contests
- 7) Chat/Web boards
- 8) Search engine/Links
- 9) E-mail/Information download
- 10) Other, please specify

11. How do you think about these factors of online magazine? Please mark (X) one of these scales for each factor.

| Factors | Opinion |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Absolutely <br> Important | Important | Fair | $\begin{gathered} \text { Not } \\ \text { Important } \end{gathered}$ | $\begin{aligned} & \text { Absolutely } \\ & \text { Not } \\ & \text { Important } \end{aligned}$ |
| 1) Support both Thai \& English Language |  |  |  |  |  |
| 2) Frequently updated |  |  |  |  |  |
| 3) Colorful design |  |  |  |  |  |
| 4) 4) Interesting topics/up-todate topics |  |  |  |  |  |
| 5) Enable online chat/web boards |  | $71$ |  |  |  |
| 6) Many photos and images |  |  |  |  |  |
| 7) Provide links to other interesting web sites |  |  | 5 |  |  |
| 8) Fast retrieval/download speed |  |  | $\pm$ |  |  |
| 9) Contain news/interesting information |  |  |  |  |  |
| 10) Reader involvement/participation | ยาลัยอ | $\left.\frac{1}{2}\right)^{2}$ |  |  |  |
| 11) Search engine availability |  |  |  |  |  |
| 12) Gifts/rewards giving for participation |  |  |  |  |  |
| 13) Interactive among readers or between readers \& server |  |  |  |  |  |
| 14) Animation pictures/E-cards |  |  |  |  |  |
| 15) E-mail sending/responding |  |  |  |  |  |
| 16) Enable online games and contests |  |  |  |  |  |

12. Suppose there is a newly borne woman online magazine that provides you with all the above factors from last question, will you visit it?

- 1) Yes
- 2) No

Thank you for your cooperation in answering questions
13. Have you ever read woman magazine(s)?

- 1) $Y$ (go on to no. 14)
- 2) No
because $\qquad$
(If your answer is "No", please ignore all other questions. Thank you for your cooperation in answering questions)

14. Which woman magazine(s) you have ever read? (You can select more than 1 choice)

- 1) Elle
- 2) Image
- 3) Pooying Today
- 4) Pooying
- 5) Praew
- 6) Ploy Gam Petch
- 7) Cleo
- 8) Cosmopolitan
- 9) Dichan
- 10) Other, please specify

15. Please choose 5 sections you like most in a woman magazine and rank them according to your opinion (from $5=$ the most favorite to $1=$ the least favorite)

- 1) Fashion/Beauty/Heath/Sex
- 2) Working Tips
- 3) Entertainment
- 4) Cooking
- 5) Horoscope
- 6) Personality tests/Games/Contests
- 7) Editorial/Readers' mails answering
- 8) Other, please specify

16. Suppose there is a newly borne women online magazine that provides you with all the above factors from last question, will you visit it?

- 1) Yes
- 2) No

Thank you for your cooperation in answering questions


## APPENDIX

EXAMPLES OF THAI E-MAGAZINES FOR WORKING WOMEN


SINCE 1969

Example 1: Pooying Today MagazineOnline (www.pooyingtoday.com)



## Table of Contents




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$\because 1$

Figure B. 1. Pooying Today MagazineOnline (www-pooyingtoday.com).

Example 2: Simple MAG (www.simplemag.com)


Figure B.2. Simple MAG (www.simplemag.com).

Example 3: Image Magazine (www.i-am-image.com)


Figure B.3. Image Magazine (www.i-am-image.com).

## Example 4: Mother and Child Magazine (www.motherandchildmagazine.com)



Figure B.4. Mother and Child Magazine (www.motherandchildmagazine.com).

Example 5: Malila.com Magazine (www.malila,com)


Figure B.5. Malila.com Magazine (www.malila.com).

## Example 6: SakulThai Magazine (www.sakulthai.com)



Figure B.6. SakulThai Magazine (www.sakulthai.com).

Example 7: Yingthai Online (www.yingthai-mag.com)


Figure B.7. Yingthai Online (www.yingthai-mag.com).

Example 8: Pooying Magazine (www.pooyingmag.kse.net)


Figure B.8. Pooying Magazine (www.pooyingmag.ksc.net).

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