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A REVIEW ON ACADEMIC MANAGEMENT SYSTEM DEVELOPMENT FOR THE BRIDGING PROGRAMME SPACE UTM

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ABSTRACT - An academic management system is one of the systems that play an important role in managing students' academic records. It is challenging to manage student academic records because the current academic management still uses manual records such as Microsoft Excel, Microsoft Word, and Google Form. The current academic management is not systematic, and this issue leads to data sharing problems among staff, and the academic data management is unable to coordinate properly. Therefore, the objective of this study is to provide suggestions to develop an academic management system for the Bridging programme SPACE UTM in order to ease administrative staff to manage academic information more efficiently and can generate reports systematically. In order to develop a system, a study of the existing system has been conducted on three existing systems in the local learning centre. It is to analyse and compare the module of the existing system to use it as a reference when developing the system. By having these kinds of module comparisons, the system would be more efficient for the users. The project is developed based on a system development life cycle (SDLC) that consists of five phases which are started with user requirement specification and then followed by problem analysis, database design and system development, report writing, and system maintenance. In this study, the system framework developed according to the workflow includes BET registration, course registration, evaluation, examination result, and analysis report, consisting of user roles such as student, administrator, lecturer, and academic advisor. As for the implementation, the system will be developed using PHP programming language and MySQL database.

Keywords: academic management system, online system, system development life cycle, Bridging programme SPACE UTM.

1. INTRODUCTION

With the emerging new technologies, the Information and Communication Technologies (ICTs) have impacted every sphere of academic management in institutions of higher learning. The revolution of ICTs has an emphasis on designing and implementing information systems to improve and manage academic management records. Based on the previous study, an academic management system is one of the systems that play an important role in managing students' academic records, which is used for maintaining data related to student attendance, marks, and certification [1]. Another study defined an academic management system as a general

information system for maintaining and providing student information [2]. In SPACE UTM, the bridging programme is one of the academic programs that offer a full-time pre-degree study to international students as preparation before they further study for degree level at UTM. In general, the students must pass all courses offered in the Bridging programme before registering in their respective faculties. Academic information management for the Bridging programme is managed under the admin of the Centre of Degree and Foundation Studies (PPI), SPACE UTM, where the workflow includes the process of student registration, lecturer evaluation, student information confirmation, the process of lecturer entering marks, production of registration slips, examination results and various types of reports. However, the current academic management uses manual records where collecting information has been carried out through different software applications such as Microsoft Excel, Microsoft Word, and Google Form. The purpose of Microsoft Excel is to insert student marks, examination results, and analysis reports. While Microsoft Word is used to generate examination results. Lastly, Google Forms is used for student registration, Bridging Exemption Test (BET) application, and lecturer evaluation. Implementing different software applications in academic management makes data sharing among staff difficult. Academic data management cannot be coordinated properly, and some processes must be carried out manually. Moreover, this issue also leads to less systematic data management and time constraint. Therefore, the purpose of this study is to provide suggestions for developing an academic management system for the Bridging programme SPACE UTM to ease administrative staff to manage academic information more efficiently and generate reports systematically. In addition, this system development can reduce the time used to implement administrative planning at the School of Degree and Foundation Studies (PPI), SPACE UTM.

The following paper will be organized as follows. Section 2 will discuss the literature review on the comparison for both module and method for the system, and then followed by section 3 will discuss the research methodology. Then, section 4 will discuss the results and discussion, and lastly, section 5 will discuss the conclusion of the overall study.

2. LITERATURE REVIEW

In this section, the comparison between the module and academic management system research method based on the previous studies is explained. The comparison between the existing system and the proposed system is also discussed.

2.1. The comparison module on academic management system research

Academic management system plays a significant role in institutions of higher learning. Administrators and academic staff need to manage student records systematically. However, a few higher learning institutions currently adopt manual systems to manage their students' records. The previous scholar [3] states that many higher learning institutions currently use manual systems, which require a lot of time, competent manpower, costly equipment, and material needed to perform single tasks manually. This often results in information being lost during the transit from one service to another, space wastage, and information flow problems [3]. Therefore, a student management information system was developed to automate all those basic tasks like keeping records of all student details [3]. According to previous studies, traditional education systems encounter problems such as centralized record keeping where fault tolerance depends on a single cloud provider, not to mention locally hosted databases [4]. Hence, the academic management system was developed to maintain transactions such as student and faculty members' records, course registration records, and student marks. Previous scholar [4] explains the system roles of admin, student, and faculty member. The admin role is to manage students and faculty members' basic information records, manage faculty members assigned course lists, and manage university rules and settings such as deadlines. Then, the student's role is to manage course registration records and student information and view student transcripts. The faculty member's role is to insert marks for each final exam, midterm, and course work and to view student information and transcript [4]. According to previous scholars [5], many challenges arise from consistently unregistered data, duplicate manual data entry, the extra time it takes to manage multiple users accounts for a single user, and non-productive time spent on technical support [5]. Therefore, the previous scholar applies the methods with the SDLC model to develop a system that will later repair or replace the old system through the design and implementation of a data management information system [5]. Another previous scholar [6] explained the functional module design for the system developed that consists of student management and teaching affairs management. The student management module is related to dormitory management, where the system allows a user to create, update, and delete the room number, type, and status of a dormitory. While teaching affairs management module manages student class assignments that automatically assign students to classes. The system requires the user to specify the number and capacity of the class [6]. Besides, a previous study [7] stated that the current student mobility program is operated manually without a computerized system. Certain problems occur with present management that consumes a lot of time and effort among mobility students and academic staff. Therefore, the student mobility program management system was developed to improve the process of applying for mobility programs. The system

developed can manage university collaboration, share experience, manage mobility programs, manage course results, and generate reports [7].

2.2. The comparison method for academic management system development

In system development, programming skills are important to develop an efficient and successful online system. Based on a previous study, the student management information system was developed using technologies such as PHP, HTML, Jquery, JavaScript, CSS, and MySQL. This system uses PHP as the front-end software, an object-oriented programming technique connecting with MySQL, the back-end software, and some advanced client-side technologies [3]. Another study [8] regarding academic management systems was developed using HTML, CSS, and PHP. PHP is one of the common Web Development applications that enable the development of a dynamic web-based application. Moreover, PHP programming language is free and belongs to open-source software [8]. Other programming language used for system development is C# language and SQL server language. The database for the system is built using SQL server language, and C# language is used to design user interfaces for entering data and showing the required reports [9]. Besides, a previous study [10] developed a student management system for tuition centres using programming languages such as Hypertext Preprocessor (PHP) and Hypertext Mark-up Language (HTML) and a database using MySQL [10]. Another previous scholar developed a student mobility program system using PHP programming language and MySQL database [7].

2.3. The comparison between existing system and proposed work

A study has been conducted on three existing systems in the local learning centre. This study analyzes and compares the module of the existing system to use it as a reference when developing the system. The three existing related systems that have been chosen are the student activities management system [11], the student mobility program management system [7], and the student development system of Damya Deena Tuition Center [10]. Table 1 compares the three existing systems with the proposed system.

Table 1. Comparison between Existing Systems with the Proposed System

Module	Student activities management system [11]	Student Mobility Program Management System [7]	Student Management System Development of Damya Deena Tuition Center [10]	Proposed system
Login/ Registration	✓	✓	✓	✓
Student list	✓	✓	✓	✓
Student course registration	✓	×	✓	✓
Student result slip	×	✓	×	✓
Key in student marks	×	×	×	✓
Lecturer evaluation report	×	×	×	✓
Analysis report	×	✓	×	✓
Programming language	Not stated	PHP&MySQL	PHP & MySQL	PHP & MySQL
Technology	Not stated	Web-based	Web-based	Web-Based

Based on the comparison of those systems in Table 1, each existing system has its style and module. Some systems have similar modules to the proposed system, but some don't. All existing system has login and registration module and also student list module. The programming language used by the existing system is PHP and MySQL, which can be implemented in the proposed system.

3. RESEARCH METHODOLOGY

This section discusses the research methodology workflow based on the system development life cycle (SDLC) and project schedule to ensure system development progress follows the submission date. According to previous scholar which is Hendriyati [5] follow SDLC model that contains steps as a reference to develop lecturer and student management information system. Besides, another previous scholar, Salman [9] also follow SDLC model to develop student absence management system. SDLC is defined as system stages building that provides a series of activities that system designer and developer need to follow [9]. In addition, the system framework also discusses identifying the user role for the system.

3.1. Research methodology workflow

Research methodology in this study is based on the system development life cycle (SDLC) that consists of five phases: user requirement specification and problem analysis, database design and system development, report writing, and system maintenance. The research methodology workflow is shown in Figure 1 below.

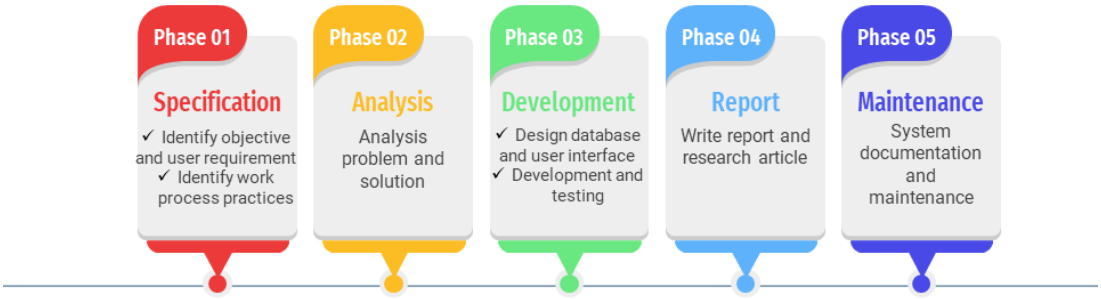

Figure 1. Research methodology workflow

3.2. System framework development

Every system development has its framework to identify each role that will use the system efficiently. In this study, the system framework developed according to the workflow includes BET registration, course registration, evaluation, examination result, and analysis report, consisting of user roles such as student, administrator, lecturer, and academic advisor. Therefore, the system framework is shown in Figure 2 below.

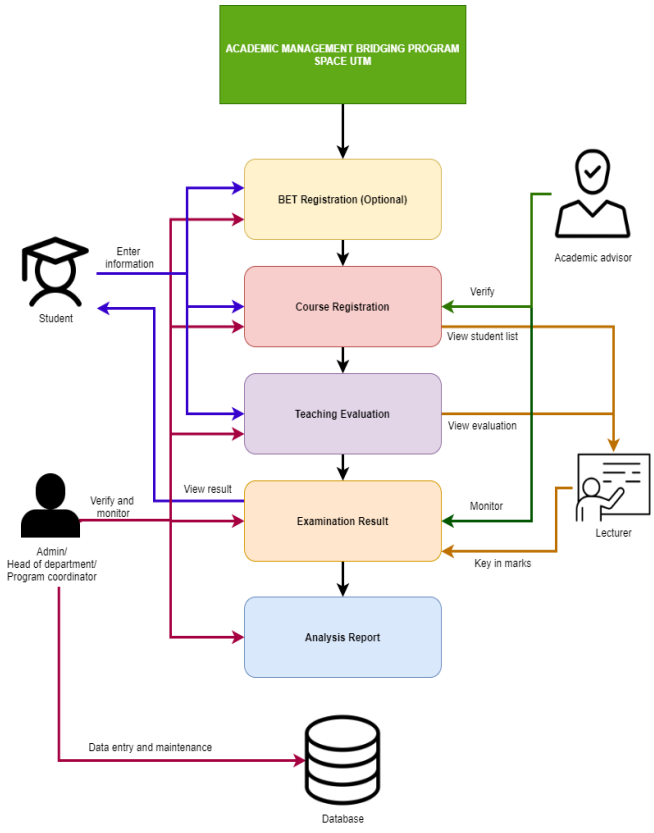

Figure 2. System Framework.

4. RESULT AND DISCUSSION

The system framework was developed to improve academic management from a manual to a systematic online system. Therefore, the online system will be developed successfully to manage the Bridging SPACE UTM programme and report efficiently. This system development will improve the academic management Bridging programme and academic management for other programs in PPI, such as the Foundation programme. Besides, the survey on student satisfaction with academic service quality in Bridging Programme (UTM) has been conducted in this study in order to get feedback on the work process and system found in the Bridging Programme, Centre of Foundation and Degree Studies UTMSPACE. Table 2 shows the demographic profile of respondents. The respondents have been categorized according to gender, the programme offered, and the semester enrolled. Subsequently, the respondents are required to estimate satisfaction levels through a five-point Likert scale (1=Strongly disagree, 2=disagree, 3=neutral, 4=agree, 5=strongly agree).

By the end of the survey, the total number of responses to this question was 41. Respondents were asked to suggest or provide comments to improve the portal and service of the academic process. Hence, the result of the survey is shown in Figure 3.

Table 2. Demographic profile

Demographic profile	Frequency	Percentage (%)
Gender		
Male	36	87.8
Female	5	12.2
Programme offered		
Science and Engineering	22	53.7
Computer science	15	36.6
Social science	2	4.9
Others	2	4.9
Semester enrolled		
February 2021	6	14.6
September 2021	12	29.3
February 2022	23	56.1

As can be seen from the Table 2 above, the demographic profile stated that most of the respondents were male (87.8%) and female (12.2%). Most of the respondents' programme offered were science and engineering (53.7%) and then followed by computer science (36.6%), social science (4.9%), and others (4.9%). Next, most of the respondents' semester enrolled was February 2022 (56.1), and then followed by September 2021 (29.3%) and February 2021 (14.6%).

Table 3. Result of survey

	Rating - 1 Strongly Disagree	**Rating - 2 Disagree**	**Rating - 3 Neutral**	**Rating - 4 Agree**	**Rating - 5 Strongly Agree**
The student portal is easy to reach without interruption and all information is available on the portal.	**0%**	**7.3%**	**17.1%**	**22%**	**53.7%**
The course registration process is easier and effective	**4.9%**	**7.3%**	**17.1%**	**39%**	**31.7%**
Lecturer evaluation process through Google Form is appropriate.	**0%**	**0%**	**29.3%**	**26.8%**	**43.9%**
The final examination result displayed through Blackboard is effective.	**0%**	**2.4%**	**9.8%**	**36.6%**	**51.2%**
Services to students are provided quickly and responsively.	**0%**	**7.3%**	**17.1%**	**29.3%**	**46.3%**

Based on Table 3 above shows the result according to the rating scale estimated by respondents. The majority of respondents (53.7%) strongly agree that the student portal is easy to reach without interruption and all information is available on the portal. Then, 51.2% of respondents strongly agreed that the final examination result displayed through Blackboard was effective. Next, 46.3% of respondents strongly agree that student services are provided quickly and responsively. Subsequently, 43.9% of respondents strongly agree that the lecturer evaluation process through Google Forms is appropriate, and other 31.7% of respondents strongly agree that the course registration process is easier and more effective. However, a minority of respondents (4.9%) indicated that the course registration process is difficult and less effective.

5. CONCLUSION

To conclude, this study is focused on academic management system development for the Bridging SPACE UTM. The academic management system is one of the systems that play an important role in managing students' academic records. Currently, academic management is not systematic and record manually using

different software applications such as Microsoft Excel, Microsoft Word, and Google Form. Therefore, this study suggests developing an academic management system for the Bridging programme SPACE UTM. The goal of the academic management system Bridging SPACE UTM is to provide a reliable approach to ease administrative staff in managing academic information more efficiently and generate reports systematically.

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A PRELIMINARY STUDY ON USER EXPERIENCE IN SCHOOL OF PROFESSIONAL AND CONTINUING EDUCATION WEBSITE

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ABSTRACT – In today's environment, where websites reflect organisation in the virtual world, information management is critical. Researchers in the field of human-computer interaction (HCI) have been interested in user experience when they realised the success of the website is not only determined by its function but also for its non-function features. The positive emotional when using the website will lead to website user retention. HCI researchers argue that interactive products need to become not only useful and usable, but also fascinating to explore and give positive feelings while using them. User experience relates with the user perception; affect and sensation when using and interacting with the product and that will lead to positive outcomes such as increased productivity etc. It deals with emotionalal, affective, hedonic, and aesthetic variables. By taking into consideration on the effect of user experience, it may contribute to the success of the website i.e; attract many users using the website. This study wants to investigate the most positive emotional words selected towards the website and the level of user experience. The pilot study found that the highest score for emotional words was safe (4.21), followed by trustful (4.04) and comfortable (3.98) and the mean score of user experience for Space website was 3.83.

Keyword: User Experience, University Website, User Interface, User Retention

1. INTRODUCTION

In March 2021, there were **1,187,527,949** websites available around the world (Netcraft, 2021); after a terrible encounter, 88 percent of online shoppers are less inclined to return to the site, and 79 percent of online shoppers said they would be less likely to buy from the site again if they had a bad visit. These figures demonstrate how crucial the users' perceptions of the product are. User experience refers to the user's perception, affect, and sensation, which can lead to good outcomes such as greater productivity and other benefits. User experiences in a website deals with the users' feelings/perception/emotional when they interact with

it and whether he/she feels satisfied/comfortable / happy / enjoy, when using the website. According to human computer interaction researchers, People will return to places where they feel comfortable and this holds true for websites as well. The positive emotional when using the website will lead to website user retention. Website users who love a website will keep coming back and use it regularly. For the electronic commerce website, online consumers are likely to return to a website and possibly buying some product from it. For an information website, user will come back to found more information from the website. By taking into consideration on the effect of user experience, it may contribute to the success of the website i.e; attract many users using the website. SPACE offers the following programmes such as Foundation programme, Diploma programme (full-time & part-time), Degree programme (full-time & part-time), joint/collaboration programmes and Transnational programmes. The website is very important to provide the information for all SPACE programmes.

Nagamachi & Lokman (2015) believed that a consumer's feelings should be considered during products development and design to produce a good product. Consumers and users would have an image of the product, whether it is good or bad, when they want to buy or use it. So if the developer or designer could translate it during the product development and design stage, it would become a good product. Emotionalal design is the idea of making designs that elicit emotionals and lead to great user experiences. A web designer should focus on users' needs in their interactions with the website. Emotionals are at the heart of how people interpret reality. Positive experiences drive curiosity. Three important elements that contribute to design for exceptional user experiences; user research, user interface and usability.

There are HCI studies, including the newest, providing the importance of web design being tailored accordance to specific user needs and ensuring that the user uses it with ease and satisfaction (Dacho 2017; Yang et al., 2019; Komulainen & Saraniemi, 2019). For the website, the user wants to browse to get the information from the website efficiently and it can be achieved by setting the website user interface in accordance to their preference patterns. The User interface is a layer that facilitates interaction between man and the system. A good user interface based on the user's perception is crucial in making it easier for the user to see the products being showcased clearly. From the user's standpoint, the website user interface is designed in a way to display the services that are being offered without ambiguity, to draw your user's attention and keep and attract the user to stay and come back again using the website.

This study utilises SPACE website (http://space.utm.my/) to include the potential users, which are secondary students, to identify the high and low of selected emotional words used which represent the user experience of the users.

Understanding the nature of user experience allows product development to be guided toward desired quality levels. SPACE offers the following programmes such as Foundation programme, Diploma programme (full-time & part-time), Degree programme (full-time & part-time), joint/collaboration programmes and Transnational programmes. The website is very important in order to provide the information for all SPACE programmes. SPACE students come from a variety of categories in terms of age, culture, location, and gender. User perception of the website influenced by the above factors. Due to the diversity of user categories, there should be differences in terms of the feelings of the users whether positive or negative feelings. When a person browses the website, if he/she feels positive emotionals such as feeling comfortable, beautiful, neatly arranged, relaxed and others they will stay and browse the website until he gets information or work until it is finished. By analogy, just as we like food, we will always choose and repeat the same food choice repeatedly. User experience can also measure whether the website has a quality or not in the eyes of users. With this, can find out about the user's perception and its impact on the experience when browsing the website.

There are several definition of user experience; ISO 9241-210 (2010) defined it as "a person's perceptions and responses that result from the use or anticipated use of a product, system or service". Sutcliffe (2010) defined it as "users' judgments of product quality arising from their experience of interaction, and the product qualities which engender effective use and pleasure". In summary, it is about the users' emotional, perception and feeling when using/interacting with the system.

Okada and his associates adopted the Kansei Engineering approach for user experience and they called it web comfortability (Okada and Watanabe, 2003; Inoue *et al*., 2006; Okada and Tejima, 2007; Okada and Castillo, 2007). Website comfortability is defined as "the means to provide not only useful functions, but also the feeling of comfortability or pleasantness in the virtual space". When the user feels comfortable using the website, he /she will always come again. Okada and Tejima (2007) had researched website comfortability of the design elements; colour and typographic layout for Japanese users. He and his other peer also researched cross-cultural website usability using the web comfortability concept (Okada and Castillo, 2007; Okada and Pornavalai, 2007). Okada and Watanabe (2003) studied the ideal layout of a comfortable website using the Kansei engineering approach, they found that; there are layouts that were considered as comfortable and

uncomfortable and the most comfortable layout is where it had a free space in the right side.

Layouts that had too much text (R/L and Sat) had a negative image and would bring an uncomfortable effect. Okada and Tejima (2003) investigated the influence of design elements in terms of comfortability on thirty (30) Japanese websites. The design factors being studied were; background, character and image animation, content location, advertisements, links colours, scroll, font, image size, navigation tool and navigation location. Their findings were; lack of images might decrease user comfortability, link colours and text-related influence user comfortability, amount of images, font colours and the contrast between the content and the background will determine user pleasantness and the number of advertisements will also affect user comfortability. Inoue *et al*. (2006) studied the influence of typography layout on the website, the reading time and the sense of comfortability and the results were; user reading time was not influenced by justification and side margins, the high value of comfortability, freedom and relaxation comes from using fully justified, the comfort of typographic is influenced by the reading pleasantness, freedom, beauty, and relaxation factors and lastly, short reading time does not necessarily lead to easiness to read. Okada and Castillo (2007) studied the influence of culture in website comfortability by developing six (6) prototypes of university websites, representing six (6) cultures (USA, Japan, Brazil, China, Paraguay and Chile), by incorporating cultural markers for each culture and using thirty (30) undergraduate students from Chile. Their findings were that colour, images and blank space were the most influential design elements and lastly that culture influenced the preference of users in the aspect of comfortability.

User Experience research is a relatively new subject that brings together academics from several disciplines, each with their own point of view. User Experience is concerned with the user and the production of a positive user experience, which is reflected in the emotionals, attitudes, and values that arise from interacting with a product. User Experience is a broad phrase that encompasses the user's characteristics, the product, and the context in which they are used. In addition, UX emphasises the importance of both the user's and the product's emotionalal aspects. The objectives of this research are; to identify the level of user experience among the user of SPACE website and identify the most positive user experience for SPACE website.

2. MATERIALS AND METHODS

This study use SPACE website (http://space.utm.my/) as the reference and the research subjects are 60 form 4 and form 5 secondary school students. A control experiment will be conducted to test on website user experience. The experiment will be divided into three (3) sections. Section A is to collect user demographics such as gender, age, education level, race, years of using the Internet and frequent surfing the SPACE website. Section B is to get information on the website. The subject will be asked to find six (6) information from the website. The questions will be constructed so that the answer will be in page 1, page 2 and page 3 in the website. The objective of asking him to find the information in all the pages in the website is to enforce the participant to browse all the pages in the website. The subjects need to clock down the time taken to find each of the information. For section C, the subjects will be asked to rate a list of emotional words given. This research adopted Okada's works for section C to investigate the user experience. Table 1.0 lists the user emotional words used in this research and Table 2.0 is the research instrument. It was a set of 13 emotional words, using a 5 point Likert scale. Each item was to be given a score of 1 for 'strongly disagree' and 5 for 'strongly agree'.

Table 1.0: Emotional Word Used In This Research

Item	**Emotional word**	**References**
1	Comfortable	Okada and Watanabe (2003)
2	Calm	Okada and Tejima (2007)
3	Simple	Okada and Castillo (2007)
4	Beautiful	Okada and Tejima (2007)
5	Familiar	Okada and Tejima (2007)
6	Uniform	Okada and Watanabe (2003)
7	Like To Use	Okada and Watanabe (2003)
8	Reliable	Okada and Watanabe (2003)
9	Safe	Okada and Watanabe (2003)
10	Pleasant	Okada and Tejima (2007)

11	Trustful	Okada and Tejima (2007)
12	Friendly	Okasa and Castilo (2007)
13	Easy To Read	Okada and Tejima (2007)

Table 2.0: Research Instrument For This Research

Emotional Words

Please evaluate SPACE Website based on the Emotional Words below.

		Strongly disagree				Strongly agree
1	Comfortable					
		1	2	3	4	5
2	Calm					
		1	2	3	4	5
3	Simple					
		1	2	3	4	5
4	Beautiful					
		1	2	3	4	5
5	Familiar					
		1	2	3	4	5
6	Uniform/Consistent					
		1	2	3	4	5
7	Like to use					
		1	2	3	4	5
8	Reliable					
		1	2	3	4	5
9	Safe					
		1	2	3	4	5

10	Pleasant					
		1	2	3	4	5
11	Trustful					
		1	2	3	4	5
12	Friendly					
		1	2	3	4	5
13	Easy to read					
		1	2	3	4	5

A pilot test was conducted using 5 subjects whereby 2 of them are female and 3 is male. The age range is between 17 years old to 29 years old. Table 3.0 lists the gender, age, completing time and the mean score for all the subjects. The highest mean score is 3.8 and the lowest is 3.1 and the average mean score is 3.4 which is at the positive side.

Table 3.0: Gender, Age and The Completing Time Of Pilot Test

Subject	Gender	Age	Time	Mean Score
Subject1	Male	24	28 minutes 10 seconds	3.3
Subject2	Female	29	25 minutes 16 seconds	3.2
Subject3	Male	17	40 minutes 0 seconds	3.1
Subject4	Female	26	10 minutes 20 seconds	3.5
Subject5	Male	17	15 minutes 50 seconds	3.8

Realibility analysis using Cronbach's Alpha was used to check on the reliability of the instrument. Cronbach's alpha is a reliability coefficient that gauges a set of items' internal consistency. Higher values of alpha which is more than 0.7 is required in order to be considered as reliable (Leedy, 1997). Table 4.0 shows that research instrument scores more than 0.7 and this means all items are reliable and acceptable.

Table 4.0: Cronbach's Alpha Score

Instrument Item	Cronbach Alpha	N Of Items
User Experience	0.904	13

3. RESULTS AND DISCUSSION

Table 5.0 shows the demographics profile of the subjects. Seven subjects were being rejected since they did not fill in the answer the part C of the instrument which is the user experience. 30% of them (19) were 16 years old, 62% (26) were 17 years old and the balance (8) were 18 years old. 58% (31) were male and another 42% (22) were female. 30% are Chinese (16), 32% are Indian (17) and the balance are Chinese (20). All the subjects have an experience of using the Internet where 17% (9) have an experience between 1-5 years, 38% (27) have an experience of 6-10 years and another 45% (17) have an experience of more than 10 years. 9% of the subjects (5) used the university website at least once a week, 25% (13) used it once a month, 28% (5) used it once a year and the balance (20) never used it before.

Table 5.0: The Demographic Profiles of The Subjects

Variables	Categories	Frequency	Percentage (%)
Age	16 YEARS OLD	18	30
	17 YEARS OLD	26	62
	18 YEARS OLD	8	8
Gender	MALE	31	58
	FEMALE	22	42
Race	MALAY	20	38
	CHINESE	16	30
	INDIAN	17	32

Years Of Internet Experience	1-5 YEARS	9	17
	6-10 YEARS	27	38
	> = 10 YEARS	17	45
University Website Surfing Frequency	ALWAYS	5	9
	OFTEN	13	25
	RARELY	15	28
	NEVER	20	38
TOTAL		**53**	**100.0**

Calculation of mean and standard deviation for each item tabulated as in Table 6.0. The study found that all of the emotional words have a rating of 2.5 or above, indicating that SPACE's website is emotionalally resonant with its target audience of secondary school students. The website Statista.com reports that 29.49 out of Malaysia's 33.11 million people utilise the internet, or 89% of the country's population utilise the internet. This statistical figure reveals that the majority of Malaysians, especially second-graders, are accustomed to using websites and other online services. The familiarity with the website's user interface, even among secondary students, contributed to the high score of emotional words is high. (i.e., most emotional words—except for familiar and like to use, which are above 3.5, or 70%). Content is risk free, genuine, and authentic. Furthermore, a research by Astani (2008) demonstrates that universities have done an excellent work of organising the information on their websites for users' convenience so that they feel good using them.
The two terms with the greatest emotionalal scores are safe (4.21) and trustworthy (4.04).

The users have the knowledge that the websites are risk-free, real, and genuine, nothing that they belong to one of the Universiti Teknologi Malaysia (UTM) faculties.

Table 6.0: Comparison of mean for each item

No	Item	Mean	SD
1	Comfortable	3.98	0.843
2	Calm	3.87	0.833
3	Simple	3.62	1.180
4	Beautiful	3.77	1.203
5	Familiar	3.32	1.189
6	Uniform	3.91	0.883
7	Like To Use	3.47	1.265

8	Reliable	3.92	1.016
9	Safe	4.21	0.885
10	Pleasant	3.94	0.908
11	Trustful	4.04	0.898
12	Friendly	3.89	0.891
13	Easy To Read	3.89	1.086

4. CONCLUSION

Website users will come back if the website gives them the positive emotional and feeling since they love to stay at the website that provide high user experience. For electronic commerce websites, this will result in a higher frequency of website visits and a better likelihood of acquiring a product. With regard to university websites, which contain a wealth of information such as university profiles, course programmes, and student activities, as well as a variety of online information systems such as subject registration, class schedules, academic calendars, and other features, it is critical to tailor the website to the user's emotionals, sense and feelings.

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