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Original Research Article

Perception of International Students on Facilities Management Service Delivery at UTHM Students' Housing

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ABSTRACT

Malaysia's higher education is now on a par with those of developed countries, including Britain, Germany and Australia. Recently, international students' enrolment has grown rapidly in Malaysia. This raises the demand for student housing. The establishment and development of students' housing is a challenge for many universities in Malaysia, as a result of the continuing extension of higher education and the internationalization policy of Malaysia which led to rising number of international students. Malaysia has become a strong force in international education there is a need to examine and understand how these students fit-in and perceive the facilities management services delivered in the students' housing of the universities. Therefore, the aim of this study is to evaluate the international students' perception on the facilities management service delivery at University Tun Hussein Onn Malaysia (UTHM) students' housing. The study identified the most important physical attributes that influence international students' perception on the facilities management service delivery in the study area. The quantitative data collection technique was employed in this study by use of face to face survey and a sample population of 210 international students was involved using stratified random sampling technique. The most important physical attributes that influence international students' perception was identified using SPSS (Version 20) in which descriptive statistics was used. The implication of the study is that it will help to formulate guidelines in terms of designs, construction and maintenance for future developments of students' housing.

Keywords: international students; facilities management; student housing and physical attributes

INTRODUCTION

In today's competitive educational setting where students have many choices available, attributes that enable higher institutions of learning to attract and maintain more international students should be studied seriously. Universities that aimed

to gain competitive advantage in the future may need to begin searching for creative and effective means to attract, maintain and foster stronger relationships with international students. [1] International students have been described as a special asset in today's higher learning arena, and

some countries like Britain, United States and Australia has put in place some techniques to attract more students. [2] However, in the East Asian region some countries like Hong Kong, Singapore and Malaysia have expressed their intention of becoming education hubs of higher learning in the region. Most universities in Malaysia do give a great deal of importance in meeting students' expectations which is organization. related to business Generally, the enrolment of international students in Malaysia has increased gradually since 1996, when several higher educational transformations were introduced to enable the entry of international students into universities. [3] The National Mission and 9th -10th Malaysia Plans set out the dream of moving Malaysia into a high-income knowledge-based economy by 2020. The National Higher Education Strategic Plan (NHESP) was formulated with a vision to transform higher education within the context of establishing Malaysia as an international hub of excellence for higher education. [4] More so, the target of NHESP is to have the total number of 200,000 international students by the year 2020. [5] It can be understood that there is a provision to accommodate this expansion from now to 2020 based on the internationalization policy for higher education in Malaysia which aimed at accelerating the inflow of international students to 150,000 by 2015. [6]

Table 1.1: Enrolment of international students in Malaysian higher education institutions (NHESP, 2011-2015)

Year	Public HEIs	Private HEIs	TOTAL
2007	14,324	33,604	47,928
2008	18,495	50,679	69,174
2009	22,456	58,294	80,750
2010	24,214	62,705	86,919

The international students' enrolment in private and public universities has increased from 40,525 in the year 2005, to 80,750 students, in the year 2009. [6] Therefore, Malaysia has become a strong

force in international education and they need to examine and understand how these students fit into and perceive the physical environment and the services delivered in their higher institutions of learning. Similarly, University Tun Hussein Onn Malaysia (UTHM) is among the Universities in Malaysia that have witnessed an increase in the number of international students. According to the UTHM International Office, (2014) the statistical data has shown that the number of international students increased from seventeen (17) students, in 2007 to four hundred and ninety three (493) students in 2014. Moreover, as the number of international students increased, also their needs, in terms of adequate facilities such as accommodation, transportation, restaurants and other facilitating services increases. These facilities need to be aligned from time to time to ensure that international students' satisfaction is achieved.

In facilities management, full users' complaints or requests must be recorded accordingly into an integrated maintenance schedule which is transparent, dependable and reliable. [8] Facilities management service providers should be proactive in finding out the users' needs and wants, here, communication is a very important aspect in achieving that goal. [9] Students' needs should be fully incorporated into the design and development of products and services, especially in students' housing. [10]

LITERATURE REVIEW Facilities Management

There are several of definitions of facilities management. FM is a process by which an organization provides quality working environment through sustainability and facilitating quality service to meet organization demands as well as satisfying clients at best cost possible. [11] FM has been defined as the management of infrastructure resources and services to support and sustain

the operational strategy of an organization over time. [12] Facilities management is a profession that involves multiple disciplines to ensure functionality of the building environment by integrating technology, process, places and people. [13] FM is the one that is commonly used is 'an integrated approach operating, maintaining, improving and adapting the buildings and infrastructure of an organization in order to create an environment that strongly supports the primary objectives of that. [14] FM is responsible for co-coordinating all efforts related to planning, designing and managing buildings and their systems, equipment and furniture to enhance the organization's ability to compete successfully in a rapidly changing world. [15] Facilities management is not a new concept in the USA, Japan, Western Europe and other parts of Asia. Facilities managers are found in large organizations, universities and banks, in fact, in almost everywhere, where there are facilities such as buildings, equipment, signage furniture, catering, security and other services to be provided in support of the main core business. [16] The move towards better management of facilities is set to continue as buildings with their infrastructure and equipment contents sophisticated. more become ever Facilities management is concerned with all the processes that ensure user needs is satisfied in particular business context. Today, institutions and organizations have to be proactive in their service delivery and ensure such services or facilities delivered meet customer needs. [18]

Facilities management is one of the fastest-growing professions in the UK and was one of the main cost-cutting initiatives during the 1970s when outsourcing of services became popular. The discipline is still in its infancy and its related duties are fragmented with limited knowledge on the subject. [15] Facilities managers are generally

known to be responsible for buildings and services which support businesses and organizations. This view does not comprise the holistic FM perspectives in the corporate world. [19] Facilities management is still in its infancy stage in South East Asia (Malaysia, Indonesia, Singapore, Hong Kong) but is expanding gradually particularly in Hong Kong in recent years. [20] Globalization, employee expectations, property market and information technology are among the factors that contribute to the expansion of FM in South East Asia. In recent times there is a great increment in the number of facilities in the South East Asia that shows the maturity of FM in a short. [21]

Students' housing facilities

Students' housing has characterized as a densely building with many rooms in which each room contains several beds. Thus students' housing provides sleeping and living quarters, usually without private baths, for a large number of students and such housing is furnished and rented by bed. [21] However, some universities embarked on a strong student housing programs to enhance their educational environments. housing, is a supervised living-learning accommodation consisting of shared housing amenities and facilities for the community of residents, which constructed on-or off campus, and owned or rented by the Universities. It provides lowcost chargeable rooms, and administered to accommodate the undergraduate postgraduate students. [23] Students' housing have been introduced to provide relatively low-cost, sanitary, safe and comfortable living environment to promote the social, personality, intellectual, physical, carrier, educational and moral development of those who live there. [24] Moreover, Student housing has been described for long as an essential component of the facilities provided by the Universities in helping

to expand their intellectual Physical attributes of competence. students' housing, such as architectural design, bedroom size, floor level and density can influence students' perceptions. In international recent years, enrolments have grown rapidly in Malaysia, this lead to the increase demand for student housing. The establishment development of student housing is a challenge for many universities in Malaysia, as a result of the continuing extension of higher education institutions and rising number of students. [25] The Universities that provided students' housing facilities in Malaysia generally, have few vacancies and each year the number of applicants exceeds the available accommodation. Universities that provided students' housing facilities in Malaysia generally have insufficient vacancies, and every year the number of applicants seeking accommodation exceeds the available accommodation. [25] Provision of student housing facilities has been described as a subject of concern which students considered in choosing a university. If universities fail to provide housing facilities for students, the students may face increase stress, and lack of affordable offcampus housing may create a significant problem. [26] Consequently, in selecting among two similar universities, students may prefer the university that provides students' housing facilities that meets students requirement. [27] Students' housing facilities can fulfill various needs and desires, and will provide rooms that are equipped with complete facilities and services, the space will also encourage friendship and provide friendly learning environment. [28]

The main objective of this study is to identify the most important physical attributes that influence international students' perception on facilities provisions at the study area. The overall aim is to

evaluate international students' perception on the facilities provided at five UTHM students' housings which include Taman University, Perwira, Taman Kelisa, Malewar and Tun Syed-Naseer. The study intends to help in formulating guidelines in terms of design, construction and maintenance for future developments of students' residential colleges.

Physical Attributes of students' housing

Physical factors of students' housing, such as architectural design, bedroom size, floor level and density can influence perceptions with the housing students' accommodation. [24] Physical factors in students' housing, such as architectural design, support services; space and location on campus also have influence on students' perception with their housing facilities. He further added that light, temperature, noise and air quality also has powerful influence over experience with residential college. [29] Moreover excessive noise has been rated as significant detractor from student experience. Prolonged exposure to noise and very high noise level during sleep may cause hearing loss, mental stress and irritation. [30] Quite is the most important requirement in any students' housing. [22] Residential experience among students emanate from high-quality facilities, good roommate relationship, strong floor communities and quite study environments in the students' housing. [24] Students assess their residential housing according to the privacy and level of crowding in their rooms. [31] However. Students' perception depends on some physical attributes which include brighter and wider rooms with less noise and stress in the students' housing. [23] Proper student will arouse a silent study environment, provide security and privacy, encourage good friendship among users and help the students' housing administrators to satisfy students' needs and aspiration for betterment of students' housing life.

They further added that physical attributes of students housing, encompassed study-bedrooms, pantries, washrooms, common and recreation rooms and support services. Moreover to create a house like environment, universities have included study facilities with bedrooms, reading room and meeting places known as common and recreation rooms for academic discussion and social gatherings within the students' housing. [33]

The distance from the university facilities, rental fare, satisfaction with transport services, external condition of the building, population, security, room size and safety has been described as the most important factors that influence students' perception in the students' housing. [21] If international students can get a lot of benefits by residing in the students' housing provided with required facilities, they can experience their study life same as home experience [34] However with positive perception in quality services and facilities, students can perform best in their studies. [32]

METHODOLOGY

The quantitative data collection technique was employed in this study by use of face to face survey. The data was collected only from international students, who are studying and living in five out of the seven students' housing in UTHM. The students' housing under study includes, Melewar, Taman University, Tun Syed Nasir, Perwira and Taman Kelisa. A random sample of 210 international students was drawn from the residential population, using stratified random sampling technique. Stratified random sampling was adopted because it obtains estimates of known precision for certain subdivisions of the population by treating each subdivision as a stratum. The total number questionnaires distributed to the targeted population of international students living in five UTHM students' residential colleges that served as the base for the data analysis was 210. However, 189 questionnaires were returned representing 90%. The questionnaires were distributed face-to-face to the targeted respondents in the study area. A 5-point Likert scale, ranging from 1 "Strongly Disagree" to 5 "Strongly agree" was used, with neutral choice of "Neither Agree nor Disagree".

The background of the respondents is very important, it disclosed the gender, age, marital status, ethnicity, level of study and residential college of the respondents. Out of 189 international students, 169 respondents representing 89% are males while 20 respondents representing 11% were females. The age distribution of the respondents ranges between 20-25 (53%), 26-30 (24%), 31-35 (10%) and 35 and above (12%). Marital status of the respondents, single 63%, married 36% and divorced 1%. Ethnicity of the respondents is classified as Arab 50%, Africans 33%, Pakistan 10%, Indian 2% and others 5%. The respondents' level of study also is classified undergraduate 45%, masters 31% and PhD 24%. The residential colleges of the respondents were Taman University with 14% of the total number of respondents, Tun Syed Nasir 29%, Kelisa 9%, Perwira 16% and Melewar 31%. Most of the respondents (91.5%) are undergraduate students.

International students' perception

A detailed analysis of international perception on the facilities students' provision at UTHM students' housing is collected through this section. It identifies the main interests of the overall responses of international students. In this regards, questions were presented to the respondents which describe various stages international students' perception. The Likert scale approach was used to rate the answers, whereas five choices were defined. These ranged from "Strongly disagree" as

the most positive answer, to "Strongly agree" as the most negative one.

RESULT AND DISCUSSION

facilities

The result of this analysis was shown below. It is important to note that all percentages were rounded to the nearest figure.

Perception of International students' on study bedroom

As illustrated in Table 2.1 below, 51 respondents, representing 27% neither agree nor disagree with the comfortability of study bedroom size, also 55 respondents representing 29% simply disagree that the furniture provided are comfortable for reading. On the other hand 60 respondents, representing 32% agree that there is adequate storage facilities in the study bedroom, 73 respondents, representing 39% also agree that there is *natural* and artificial lighting in the study bedroom.

Strongly Neither agree Strongly Disagree Agree Mean Std. Study Bedroom dev. disagree nor disagree agree Comfortability study 27 (14%) 37 (20%) 52 (27%) 52 (27%) 22 (12%) 3.03 1.231 bedroom size 20 (11%) 55 (29%) 47 (25%) 49 (26%) 18 (10%) 2.95 1.166 Furniture provided comfortable for reading 15 (8%) 44 (23%) 52 (28%) 60 (32%) 18 (10%) 3.12 1.114 Adequate storage facilities Natural/artificial lighting 13 (7%) 28 (15%) 48 (25%) 73 (39%) 27 (14%) 3.39 1.113 22 (12%) 32 (17%) 59 (31%) 56 (30%) 20 (11%) 3.11 Provision of cross ventilation 1.162 High level of privacy 24 (13%) 42 (22%) 49 (26%) 44 (23%) 30 (16%) 3.07 1.265 61 (32%) 48 (25%) 39 (21%) 27 (14%) 14 (7%) 2.39 1.274 Net on windows Provision of cooling/heating 53 (28%) 52 (27%) 34 (18%) 36 (19%) 14 (7%) 2.50 1.283

Table 2.1: Perception of International students' on study bedroom (Field survey, 2014)

59 respondents, Moreover. representing31% neither agree nor disagree with the provision of cross ventilation. 49 respondents, representing 26% also neither agree nor disagree that there is a high level of privacy in the bedroom, while 61 respondents, representing 32% disagree that there is a *net on windows*, also 53 respondents representing 28% disagree with the provision of cooling/heating facilities. From the data analysis, the descriptive statistics provides more summary information of the findings on students' with study bedroom. findings indicates that the vast majority of user's has negative perception with the net provision of on windows, cooling/heating facilities and the furniture provided. (Refer to Table 2.1 above).

Perception of International students' on building layout

As illustrated Table 2.2 below, 68out of 189 respondents, representing 36% has neither agree nor disagree with the architectural design of the students housing, whilst 32respondents, representing 62% neither agree nor disagree that the study bedrooms are well design. Moreover, 74 respondents representing 38% also neither agree, nor disagree with the conducive environment. On the other hand. representing 39% respondents agree that there is a convenient walkway in the student housing. Whilst, 79 representing respondents has agree that there is a provision of emergency exit in case of fire. Similarly, 85respondents, representing 42% respondent's experience agree firefighting equipment's were provided in the students' housing, whilst 70 of 189 representing 37% respondents perception also agree that there is a green space in the students' housing. In addition, 85

respondents, representing 45% also agree with a good drainage system in the students'

housing.

Table 2.2: Perception of International students on the building layout (Field survey, 2014)

Building Layout	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		Dev.
There is good architectural design of the	33 (18%)	35 (19%)	68 (36%)	41 (22%)	12 (6%)	2.81	1.151
residential college							
The rooms are well design	21 (11%)	53 (28%)	62 (32%)	47 (25%)	6 (3%)	2.81	1.034
Conducive living environment	15 (8%)	26 (14%)	74 (39%)	64 (34%)	11 (6%)	3.16	1.003
There is a convenient walkway	12 (6%)	35 (19%)	53 (28%)	74 (39%)	15 (8%)	3.24	1.048
Provision of emergency exit in case of fire	19 (10%)	33 (18%)	36 (19%)	76 (40%)	25 (13%)	3.29	1.196
There is provision of firefighting	16 (9%)	24 (13%)	40 (21%)	79 (42%)	30 (16%)	3.44	1.154
equipment's							
Provision of green space area	18 (10%)	28 (15%)	50 (27%)	70 (37%)	(12%)	3.28	1.148
There is a good drainage system	11 (6%)	27 (14%)	41 (22%)	85 (45%)	25 (13%)	3.46	1.074

As can be seen, the vast majority of respondents, neither agree nor disagree with the architectural design of the students' housing, study bedroom design and conducive living environment (Refer to Table 5.14 above). One should note that more attention is needed to improve these elements.

Perception of International students on toilet/bathroom

As shown in Table 2.3 below, 76 out of 189 respondents, representing 40% has agree that, there is a provision of toilet facilities in the students' housing, whilst 64 respondents, representing 34% also agree with the toilet location. Similarly, 69 respondents, representing 37% also agree that the number of user's sharing toilet/bathroom is adequate. 72 respondents representing 38%, agree that the cleanliness of toilet/bathroom is to standard.

 $Table\ 2.3:\ Perception\ of\ International\ students\ on\ toilet/bathroom\ (Field\ survey,\ 2014)$

Toilet Location	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		Dev.
There is provision of toilet facilities	23 (12%)	32 (17%)	36 (19%)	76 (40%)	22 (12%)	3.22	1.217
The toilet/bathroom is located in	25 (13%)	31 (16%)	50 (26%)	64 (34%)	19 (10%)	3.11	1.195
appropriate place							
The number of people sharing	16 (9%)	43 (23%)	46 (24%)	66 (35%)	18 (10%)	3.14	1.133
toilet/bathroom is adequate							
The cleanliness of toilet/bathroom	21 (11%)	34 (18%)	38 (20%)	72 (38%)	24 (13%)	3.23	1.211
is to standard							

As shown in Table 2.3 above, the findings indicate that, the majority of respondents, simply agree with the provision of toilet

facilities, location, number of people sharing toilet and the toilet cleanliness.

Table 2.4: Perception of International students on the study area (Field survey, 2014)

Study area	Strongly disagree	Disagree	Neither agree nor disagree	Agree	Strongly agree	Mean	Std. Dev.
There is a provision of study area in your residential college	18 (10%)	31 (16%)	38 (20%)	75 (40%)	27 (14%)	3.33	1.189
The study area is accessible always	13 (7%)	30 (16%)	43 (23%)	66 (35%)	37 (20%)	3.44	1.173
There is a provision of internet facility in the study area	33 (18%)	25 (13%)	39 (21%)	69 (37%)	23 (12%)	3.13	1.294
The connectivity of internet is highly efficient	49 (26%)	39 (21%)	41 (22%)	40 (21%)	10 (11%)	2.70	1.340
Study area is arrange with good furniture	29 (15%)	41 (22%)	45 (24%)	49 (26%)	25 (13%)	3.00	1.276

Perception of International students on study area

large percentage of 40% representing 75 out of 189 respondents has agree that there is a provision of study area in the students' housing, whilst 35%, representing 66 respondents also agree that the study room is always accessible. Moreover. 37% representing, respondents, also agree that there is a provision of internet facilities in the study area. 26% representing 49 respondents, disagree that the internet strongly connectivity is highly efficient as shown in Table 2.4.

From the analysis above, the findings reveals that respondents has agree with the provision of study area, accessibility, provision of internet facility and the furniture provided in the study room, whilst

on the other hand, they *strongly disagree* with the *efficiency of internet connectivity* in the study area. (Refer to Table 2.4 above).

Perception International students on the student's housing location

As highlighted in Table 2.5 below, 66 representing 27% of respondents simply agree that there is proximity from the students' housing to the university, another 66 representing 29% of respondents also agree with the proximity of students' housing to health facilities. On the other hand, 63 representing 32% of respondents agree with the proximity of the students' housinge to public transportation, 65 representing 39% of respondents also agree with the proximity of the students' housing to restaurants.

Table 2.5: Perception of International students on students' housing location (Field survey, 2014)

Location	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		dev.
Proximity to university	22 (12%)	31(16%)	44 (23%)	66 (35%)	26 (14%)	3.23	1.219
Proximity to health facilities	15 (8%)	35 (19%)	54 (29%)	66 (35%)	20 (10%)	3.21	1.104
Proximity to public transportation	19 (10%)	27 (14%)	60 (32%)	63 (33%)	20 (11%)	3.20	1.126
Proximity to restaurants	21 (11%)	29 (15%)	48 (25%)	65 (34%)	26 (14%)	3.24	1.200
Proximity to ATM machine	25 (13%)	48 (25%)	41 (21%)	49 (26%)	26 (14%)	3.02	1.265
Proximity to market	19 (10%)	42 (22%)	60 (32%)	51 (27%)	17 (9%)	3.03	1.122
Proximity to recreational centers	24 (13%)	40 (21%)	60 (32%)	48 (25%)	17(9%)	2.97	1.157
Proximity to waste collection centers	19 (10%)	32 (17%)	52 (28%)	63 (33%)	23 (12%)	3.21	1.165
Proximity to local shops	12 (6%)	31 (16%)	43 (23%)	81 (43%)	22 (11%)	3.37	1.087

Moreover, 49 representing 26% respondents simply agree with the proximity of students' housing to ATM machine. On the other hand 60 representing 32% of respondents neither agree nor disagree with the proximity of students' housing to market, similarly, 60 representing 32% of respondents, also neither agree nor disagree with the proximity of students' housing to recreational centres, while 63 representing 33% of the respondents agree with the

proximity of students' housing to waste collection centres, also 81 presenting 28% of the respondents agree with the proximity of students' housing to local shops. It can be said here that, the vast majority of user's has negative experience with the proximity of students' housing to recreational centre, proximity to ATM and proximity to market.

Perception of International students' on transportation services

As shown in Table 2.6 below, 29out of 189 respondents, representing 55% has agree that, there is transportation link from the students' housing to the university and city centre, whilst 52 respondents, representing 28% neither agree nor disagree

with the efficiency of transportation service from the students' housing to the university. Similarly, 46 respondents, representing 24% strongly disagree that the bus service operates in weekends and holidays.

Table 2.6: Perception of International students on the transportation services (Field survey, 2014).

Transportation Services	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std. Dev.
	disagree		nor disagree		agree		
Transportation links to	38 (20%)	20 (11%)	51 (27%)	55 (29%)	25 (13%)	3.05	1.318
university and city center							
Efficiency of transportation	36 (19%)	37 (20%)	52 (28%)	40 (21%)	24 (13%)	2.89	1.294
service (Bus)							
Operation of bus services in	46 (24%)	43 (23%)	43 (23%)	35 (19%)	22 (12%)	2.70	1.332
weekends							

The findings indicate that, international students has negative perceptions on the efficiency of transportation service and the operation of bus service during weekends and holidays (Refer to Table 2.6 above).

Perception of International students' on Mosque

As illustrated in Table 2.7 below, 75 out of 189 respondents, representing 40%

has agree that, the Mosque is located in appropriate place, whilst 67 respondents, representing 35% agree that there is adequate space to accommodate all the worshippers in the Mosque. Similarly, 64 respondents, representing 34% also agree that the Mosque was provided with all good amenities. 78 representing 41% respondents agree that the Mosque was always kept clean.

Table 2.7: Perception of International students on Mosque (Field survey, 2014)

Mosque	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		Dev.
Location of the Mosque	12 (6%)	16 (9%)	29 (15%)	75 (40%)	57 (30%)	3.79	1.152
Adequate space to accommodate	9 (5%)	10 (5%)	46 (24%)	67 (35%)	57 (30%)	3.81	1.075
all worshipers							
Good amenities	8 (4%)	18	48 (25%)	64 (34%)	51 (27%)	3.70	1.096
		(10%)					
The Mosque is always kept clean	7 (4%)	11 (6%)	34 (18%)	78 (41%)	59 (31%)	3.90	1.027

From the descriptive statistics shown in Table 2.7 above, majority of respondents have simply agree with the location, adequate space, good amenities and the cleanliness of the Mosque. This indicates positive perception by the international students.

Perception of International students on security provision

As shown in Table 2.8, large percentage of 46% representing 86 out of

189 respondents has agree that the environment is safe for living, whilst 41%, representing 77 respondents also agree that there is a security guards in the students' housing college. Moreover, 40% representing, 75 respondents, also agree that there is building security in the students' housing. 33% representing 63 respondents, agree that there is perimeter fence in the students' housing, another 59 representing 31% neither agree nor disagree with the burglary proof in the students' housing.

Table 2.8: Perception of International studentson security (Field survey, 2014)

Security	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		Dev.
Safe living environment	13 (7%)	18 (10%)	25 (13%)	86 (46%)	47 (25%)	3.72	1.144
Security guards	7 (4%)	12 (6%)	41 (22%)	77 (41%)	52 (28%)	3.82	1.026
Building security	8 (4%)	16 (9%)	45 (24%)	75 (40%)	45 (24%)	3.70	1.055
There is a perimeter fence	8 (4%)	25 (13%)	54 (29%)	63 (33%)	39 (21%)	3.53	1.089
There is burglary proof	17 (9%)	27 (14%)	59 (31%)	53 (28%)	33 (18%)	3.31	1.181

It is clear from the result as shown in Table 2.8 above, majority of respondents were fairly impressed with the security provided in the student housing, but they disagree with the provision of burglary proof, therefore more attention is needed in that area.

Perception of International students' on other support services

As illustrated in table 2.10 below, 60 respondents, representing 32% neither agree nor disagree that there is enough parking space in the students' housing, also 70 respondents, representing 37% agree that the parking facilities are. On the other hand 50 respondents, representing 27% strongly disagree that the internet connectivity is

highly efficient, 53 respondents, representing 28% neither agree nor disagree with the availability of sport facilities in the students housing.

Moreover, 50 respondents, representing 27% neither agree nor disagree that there is good directional signage in the students' housing. 59 respondents, representing31% also neither agree nor disagree that directional signage are written language, international while respondents, representing 53% disagree that the important announcement communicating, 69 also respondents representing 37% agree that there is adequate waste disposal in the students' housing.

Table 2.10: Perception of International studentson other support services (Field Survey, 2014)

Other support services	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
	disagree		nor disagree		agree		Dev.
There is enough parking space	21(11%)	38 (20%)	60 (32%)	52 (28%)	18 (10%)	3.04	1.143
The parking facilities are secured	12 (6%)	28 (15%)	54 (29%)	70 (37%)	25 (13%)	3.36	1.086
The internet connectivity is highly efficient	50 (27%)	46 (24%)	39 (21%)	37 (20%)	17 (9%)	2.60	1.307
Availability of sport facilities	33 (18%)	37 (20%)	53 (28%)	48 (25%)	18 (10%)	2.90	1.236
There is good directional signage	31(16%)	47 (25%)	50 (27%)	46 (24%)	15 (8%)	2.83	1.201
The directional signage are written in international language	47 (25%)	55 (29%)	59 (31%)	25 (13%)	3 (2%)	2.38	1.048
The important announcement are communicating	35 (19%)	53 (28%)	42 (22%)	46 (24%)	13 (7%)	2.73	1.214
Adequate waste disposal	13 (7%)	21 (11%)	54 (29%)	69 (37%)	32 (17%)	3.46	1.108
There is provision for cafeteria and mini market	26 (14%)	46 (24%)	59 (31%)	40 (21%)	18 (10%)	2.88	1.175
Laundry facilities are provided	21 (11%)	22 (12%)	49 (26%)	68 (36%)	29 (15%)	3.33	1.198
There is a provision for pantry/kitchen	48 (25%)	45 (24%)	44 (23%)	35 (19%)	17 (9%)	2.62	1.289
Adequate cleaning services	25 (13%)	20 (11%)	41 (22%)	73 (39%)	30 (16%)	3.33	1.246

However, 59 respondents, representing 31% neither agree nor disagree with the provision of cafeteria and mini

market in the residential college, whilst 68 respondents, representing 36% agree that laundry facilities are provided in the

students' housing. Similarly, 48 respondents, representing 25% strongly disagree that there is a provision for pantry/kitchen in the students' housing. 73 representing 39% respondents agree that there is adequate cleaning service in the students' housing.

From the descriptive statistics shown in Table 2.10 above, majority of respondents were strongly disagree that directional signage are written in international language, internet connectivity is highly efficient and the provision for pantry/kitchen. This indicates a negative perception by international students.

Perception of International students' on students housing administrators

As shown in Table 2.11 below, 40% representing 76 respondents indicated that

they simply agreed that students' housing administrators were approachable, 36% representing 68 respondents agreed that students' housing administrators were Polite. whilst 66% representing respondents also agreed that the students' housing administrators were friendly and helpful. Moreover, 37% representing 69 respondents agreed that students' housing administrators were knowledgeable about their services, 33% respondents, representing 66 respondents, also agreed that students' administrators understand housing international student's service needs. similarly 33% respondents, representing 66 respondents agreed that there is prompt response to the international student's request.

Table 2.11: Perception of International students on students housing administrators (Field survey, 2014)

Students' housing	Strongly	Disagree	Neither agree	Agree	Strongly	Mean	Std.
administrators	disagree		nor disagree		agree		Dev.
Approachable	24 (13%)	20 (11%)	41 (22)	76 (40%)	32 (17%)	3.39	1.240
Polite	18 (10%)	20 (11%)	42 (22%)	68 (36%)	41 (22%)	3.50	1.214
Friendly and helpful	18 (10%)	26 (14%)	36 (19%)	66 (35%)	43 (23%)	3.48	1.249
Knowledgeable about their	17 (9%)	23 (12%)	41 (21%)	69 (37%)	39 (21)	3.48	1.205
services							
Understand international	17 (9%)	37 (20%)	45 (24%)	63 (33%)	27 (14%)	3.24	1.187
students' service needs							
prompt response to the	27 (14%)	29 (15%)	45 (24%)	63 (33%)	26 (14%)	3.18	1.250
international students' request							

The results obtained from all the sub sections of the question reveal that, respondents agreed that the students' housing administrators were approachable, polite, friendly, knowledgeable about their services and understand international students' service needs, but the numbers are not sufficient to show that UTHM students' housing has moved towards the excellent service delivery (Refer to Table 2.11 above).

CONCLUSIONS

In order for the Facilities management Service providers to sustain surviving in the ever-turbulent condition,

they need to act more like an integrated business, by paying close attention to all constructs in a holistic method. Service providers must realize that good and services are no longer sufficient, people seek experience. This will accelerate the move in to a new era where the service is designed around the students' needs, rather than the needs of the students being forced to fit around the service already provided. If the intent is to deliver and sustain service excellence within organizations around the need of the students, obtaining feedback from them and taking account of their views and priorities is necessary for bringing about

improvements in the quality of service delivery which will help the universities to move from service quality level to service excellence level. The need to deliver service excellence in students' housing from organizational perspective has been identified; this paper has recognized the need for service providers to support and add value to the delivery of facility management services by engaging all stakeholders to better respond to the service user's demand.

Moreover, most of the positive views related to the respondents' perceptions were rated 'agree' instead of 'strongly agree'. Therefore, this is not sufficient if the UTHM students' housing, intent to achieve positive perceptions from the international students. In conclusion, this study explores the most important physical and demographic attributes that influence service user's experience on the facilities provision at the students' housing. This will benefit the university management, residential college administrators, facility and service managers in improving the method of service delivery and service quality on students' housing facilities as they advanced to improve from service quality level to service excellence level. Further study should explore the major functional and technical elements of performance on students' housing, which will help in continually improving the design, construction, performance, maintenance of students' housing.

REFERENCES

- 1. Hasan, HishamuddinFitri Abu, A. Ilias, Abd R. Rahman, and M. Z. Razak. "A. Service quality and student satisfaction: a case study at private higher education institutions." *International Business Research* (2008); 1(3) 163-175.
- Shekarchizadeh, Ahmadreza, Amran Rasli, and Huam Hon-Tat. "SERVQUAL in Malaysian universities: perspectives of international

- students." *Business Process Management Journal* (2011); 17(1) 67-81
- 3. Sirat, Morshidi Bin. "Strategic planning directions of Malaysia's higher education: University autonomy in the midst of political uncertainties." *Higher Education* (2010): 59(4) 461-473.
- 4. Abdullah, NurAnisah, and Shukran Abdul Rahman. "Making Strategy at a Malaysian Higher Education Institution." *International Proceedings of Economics Development & Research* (2011): 22, 193–198.
- Ministry of Higher Education Malaysia, (2011). *Internationalization Policy For Higher Education Malaysia*, 2011, 2013. Retrieved May, 14,2013 via http://www.mohe.gov.my
- 6. Ministry of Higher Education Malaysia, (2013). *Data of Public Education Enrollment as at December 2011*, 2013. Retrieved May, 14,2013 via http://www.mohe.gov.my
- 7. Njie, Baboucarr, Soaib Asimiran, and Roselan Baki. "Perceptions of international students on service quality delivery in a Malaysian public university." *Quality Assurance in Education* (2012); 20(2) 153-163.
- 8. Waheed, Zehra, and Scott Fernie. Knowledge based facilities management. *Facilities*, 2009; 27(7/8), 258–266.
- 9. Drion, Bernard, FransMelissen, and Roy Wood. "Facilities management: lost, or regained?." *Facilities* (2012); 30(5/6) 254-261.
- 10. Bashir, Shahid, IrshadHussainSarki, and JuhariSamidi. "Students' perception on the service quality of Malaysian universities' hostel accommodation. "International Journal of Business and Social Science (2012); 3(15) 213-222.
- 11. Shah, Sunil. Sustainable practice for the facilities manager. John Wiley & Sons, 2008.
- 12. Martin, David M. The AZ of facilities and property management. Thorogood Publishing,2007.

- 13. Booty, Frank, ed. Facilities management handbook. Routledge, 2009.
- 14. Atkin, Brian, and Adrian Brooks. Total facilities management. John Wiley & Sons, 2009.
- 15. Coenen, Christian, Keith Alexander, and Herman Kok. "Facility management value dimensions from a demand perspective." *Journal of Facilities Management* (2013); *11*(4) 339-353.
- 16. Ikediashi, Dubem I., Stephen O. Ogunlana, Prince Boateng, and Onuwa Okwuashi. "Analysis of risks associated with facilities management outsourcing: a multivariate approach." *Journal of Facilities Management* (2012); 10(4) 301-316.
- 17. Rafidee Bin Hasbollah, Hasif, and David Baldry. "Conserving cultural values of heritage buildings from the facilities management perspective in Malaysia." *Journal of Facilities Management* (2014);12(2)172-183.
- 18. Fraser, Kym. "Facilities management: the strategic selection of a maintenance system." *Journal of Facilities Management* (2014);*12*(1)18-37.
- 19. Price, Samantha, Michael Pitt, and Matthew Tucker. "Implications of a sustainability policy for facilities management organisations." *Facilities* (2011); 9(10) 391-410.
- 20. Aishah Kamarazaly, Myzatul, Jasper Mbachu, and Robyn Phipps. "Challenges faced by facilities managers in the Australasian universities." *Journal of Facilities Management* (2013);*11*(2)136-151.
- 21. Khozaei, Fatemeh, Nadia Ayub, Ahmad Sanusi Hassan, and Zahra Khozaei. "The factors predicting students' satisfaction with university hostels, case study, universitisains Malaysia." *Asian Culture and History.* (2010); 2(2) p148.
- 22. Hassanain, Mohammad A. "On the performance evaluation of sustainable student housing facilities." *Journal of Facilities Management* (2008); 6(3) 212-225.

- 23. Winston Jr, Roger B. Student Housing and Residential Life: A Handbook for Professionals Committed to Student Development Goals. The Jossey-Bass Higher and Adult Education Series. Jossey-Bass, Inc., Publishers, 350 Sansome Street, San Francisco, 1993.
- 24. Najib, Nurul'UlyaniMohd, and Zulkifli Osman Nor'Aini Yusof. "The Influence of Socio-Economic Backgrounds towards Satisfaction with Student Housing Facilities." 2011; 478-483.
- 25. Muslim, Muhammad Hilmy, Hafazah Abdul Karim, and IshakChe Abdullah. "Satisfaction of Students' Living Environment between On-Campus and Off-Campus Settings: A Conceptual Overview." *Procedia-Social and Behavioral Sciences* (2012) 68, 601-614.
- 26. Khozaei, Fatemeh, T. Ramayah, and Ahmad Sanusi Hassan. "A Shorter Version of Student Accommodation Preferences Index (SAPI)." *American Transactions on Engineering & Applied Sciences* (2012); 1(3) 195-211.
- 27. Kasim, Rozilah and Abubakar, Musa Alkali and Ishiyaku,Bala (2014). Assess ment of service user's experience on the facilities provision at UTHM Students' Residential Colleges. In: 7th International Real Estate Research Symposium (IRERS 2014), 29-30 April 2014, National Institute of Valuation (INSPEN), Putrajaya.
- 28. Chambati, Ronald, and OlawaleFatoki. "A consumer analysis of service provision offered by a university to its resident students in South Africa." *African Journal of Business Management* (2011);5(7)3001-3011.
- Foubert, J. D., Tepper, R. & Morrison, D. (1998). Predictors of student satisfaction in university residence halls. The Journal of College and University Student Housing, 27(1), 41-46.
- 30. Preiser, W. F. & Vischer, J. C. Assessing Building Performance. Routledge. (2005)

- 31. Amole, Dolapo. "Residential satisfaction and levels of environment in students' residences." *Environment and Behavior.* 2008; *41*(6), 866–879.
- 32. Najib, Nurul 'UlyaniMohd, and Norazmawati Md Sani. "The Effects of Students' Socio-Physical Backgrounds onto Satisfaction with Student Housing Facilities." *Procedia-Social and Behavioral Sciences*, 2012;(62) 64-74.
- 33. Khozaei, Fatemeh, Ahmad Sanusi Hassan, and NordinAbdRazak.
 "Development and validation of the student accommodation preferences

- instrument (SAPI)." *Journal of Building Appraisal* 2011; 6(3).299-313.
- 34. Abubakar, Musa Alkali, Rozilah Kasim, and Matthew Mamman. "Students' Residential College Assessment through User Experience as a Component of Service Excellence." International Journal of Scientific and Research Publications. 2015; 5(2)
- 35. Creswell, J.W. Educational Research: Planning, Conducting and Evaluating Quantitative and Qualitative Research (4th Ed), Boston: Pearson. (2012).

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