A Review of Service User's Experience on the Facilities Provision with Physical and Demographic Attributes at **UTHM** Student's Residential Colleges

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Abstract—**Presently higher institutions of learning are trying to attract more number of students in their own programs and employing various strategies to maintain their students. Malaysia has two (2) percent of the world's international student population, as of 2009 and was ranked the world's 11th most preferred study destination. The country has therefore become a strong force in international education and thus they need to examine and understand how these students fit into and perceive the services delivered in the residential colleges of their higher institutions of learning. Therefore the aim of the study is to assess the service user's experience on the physical and demographic attributes at UTHM students' residential colleges. The study intends to explore the most important physical and demographic factors that influence the service user's experience in the study area as well as measure the value of the physical and demographic attributes that influence service user's experience in the study area. This study intends to use mixed method, and a sample population of 189 international students will be involved. 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' residential colleges. Conversely the study will also serve as a yardstick in measuring the key element of facilities that are more users centered for UTHM students' residential colleges.**

Keywords—service user experience; students' residential colleges; physical attributes; demographic attributes; international students

I.   **Introduction**

In today's higher learning arena, international students have been described as a special asset, and some nations like Australia, the United States and Britain has put in place some techniques which aimed at attracting them [1]. However, some Asian countries have expressed their intention of becoming education hubs of higher learning in the region, and leading the initiative are countries in the East Asia region, specifically Malaysia, Singapore, and Hong Kong [2]. The total enrolment of international students in public and private higher learning institutions have increased from 40,525 in the year 2005, to 80,750 students, in the year 2009 [3]. 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 [4]. However, 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. Moreover, these facilities need to be aligned from time to time to ensure that student satisfaction is achieved [5].

User experience refers to different areas of relationship with user including experience with the quality of a product or service, experience with ongoing business relationship, experience with the performance ratio of a service and experience because a service met users expectation [6]. Understanding the entire structure of user needs and requirements are the most important part in problem solving. The needs of user must be examined independently. In FM, full users' complaints or requests must be recorded accordingly into an integrated maintenance schedule which is transparent, dependable and reliable. FM service providers should be proactive in finding out the users' needs and wants. Here, communication is a very important aspect in achieving that goal. [7] Opined that the users' needs should be fully incorporated into the design and development of products and services, especially in students' residential colleges.

Student residential college is a supervised living-learning accommodation consisting of shared residential amenities and facilities for the community of residents, which is constructed on-or off campus, and owned or rented by higher institution of learning. It provides low-cost chargeable rooms, and administered to accommodate the undergraduate or postgraduate students [8]. According to

[9] student residential colleges 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. Student residential colleges has been described for long as an essential component of the facilities provided by the higher institutions of learning in helping students to expand their intellectual competence [10]. Physical factors of residential college, such as architectural design, bedroom size, floor level and density can influence students experience in residential colleges. However, demographic factors, such as gender, age, socio-economic status, religion and race can influence students' residential experience as well [8].

The main objective of this study is to explore the most important physical and demographic attributes that influence service users' experience on facilities provisions at the study area. The overall aim is to assess service user's experience on physical and demographic attributes of the facilities provided at five UTHM students' residential colleges 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.

II.   **The Service Concept**

As services and products are becoming more similar and as it becomes easier for organizations to copy others' they may choose to compete through something that exceeds their service offering. The service concept, relates with the characteristics of the service offered to the target market [11]. They further described the service concept as the bundle of goods and services sold to users. The dominant view is that, the service concept can be seen as a package made up of a set of intangible and tangible elements. In other words, service is defined in terms of its constituent parts and the most common way of classifying the service concept relates to the degree of customization of these elements [12]. The evolution of service concepts involved two important dimensions; commoditization and customization as shown in Figure 1. Customization means producing in response to a particular user desires. Customization handles the individual user request. Organizations should tailor product and services to meet the exceptional needs of individual service users in such a way that nearly all can find exactly what they want at a reasonable price through a new mind-set, one of creating service user unique value, while commoditization on the other hand, refers to the regulation process, that is, it prescribes whether the service delivery has been executed to the needs of every individual user. It refers to the description process of a service, where it describes the steps to be followed so that a particular service gets delivered. It also deals with the way in which the request of the individual user is packaged [13].

Furthermore, the service concept delivers the benefits and value provided to users. Many researchers have raised some observation with regard to service quality, for instance, from the observations of [14] cited that, service quality is a difference between users' expectation and perceived service. They further explained that, if performed service is less than the expectations of a user, then the user might get dissatisfied with the service quality. The dimension of service quality has been identified through the pioneering research of [15]. Their research identified five specific dimensions of service quality that apply across a variety of service contexts. The dimensions are reliability, responsiveness, assurance, empathy, and tangibles.

Conceptual models are required for empowering the management to determine "quality" shortfalls and arrange the launch of a "strategic quality improvement" programme. Service quality models have tried to show the relationships that exist between salient variables. It is a simplified description of the actuality [16]. The main aims of the models are to help the management to improve the "quality" of the organization and its offering in a systematic manner. Six conceptual service quality models were identified. Each of them is representative of a different point of view. The models are constructed to emphasize the particular bias; they are Nordic Model, Parasuraman's model, Lovelock model, multilevel model and Hierarchical model.

Higher institutions of learning struggle to deliver high-quality service throughout their educational curriculums and administrative processes. In order to do so, these institutions must consider students as their primary clients and seek to maximize their satisfaction based on educational services rendered [17]. There is a substantial body of evidence in higher education literature suggesting that the SERVQUAL tool is effective in measuring service quality in the higher education environment and is useful in offering guidance for changing weaknesses to strengths [18].
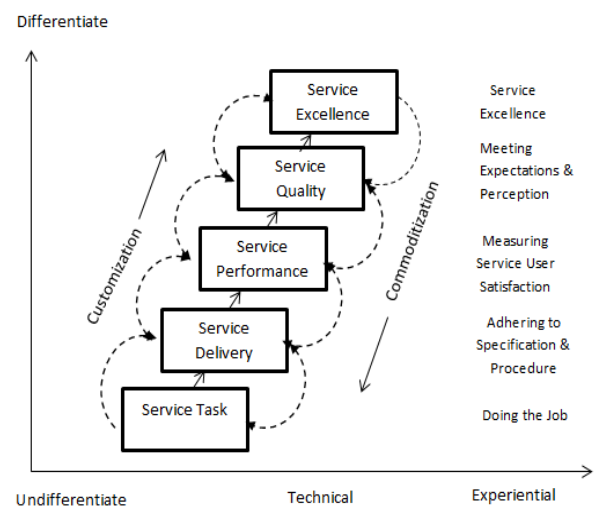

Fig. 1. The Evolution of Service Concept (Adapted from Pine & Gilmore, 1999)

III. Factors Affecting Service User Experience

Service user experience has been described as an internal and subjective response, users encounter to any contact, direct or indirect with an organization. User experience is a holistic concept that encompasses every aspect of organization's offering [19].

In the study [20] described students' residential colleges, as a densely building with many rooms in which each room contain several beds. Thus students residential colleges provides sleeping and living quarters, usually without private baths, for a large number of students and such residential college is furnished and rented by bed. However, provision of student residential facilities is one of the major issue students will consider in choosing a higher institution of learning [8]. Consequently, if Higher Institutions of Learning fail to provide adequate and suitable residential facilities for students, students may face increase pressure, and lack of affordable off-campus residential colleges may create a significant inconvenience. Therefore, students will give high priority to institutions that provide suitable and adequate facilities in their residential colleges. Students residential 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.

Factors affecting service user experience may include convenience, choice, age, value adding and life, speed of service delivery, quality and technology. However some of these factors may not necessarily apply to all higher institutions, even though some common factors can be shared [21]. There are various factors that influence students experience with their residential colleges, which include physical and, demographic attributes [22].

A. Physical Attributes

Physical attributes of residential college, such as architectural design, bedroom size, floor level and density, building layout, Bathroom, laundry room, study area, internet facilities and security guards can influence students experience in residential colleges [7]. More so, [18] opined that physical factors in residential college, such as architectural design, support services; space and location on campus also have impact on students' experience with their residential college. He further added that light, temperature, noise and air quality also has powerful influence over experience with residential college. Moreover excessive noise has been rated as a significant detractor from student experience. According to [19] prolonged exposure to noise and very high noise level during sleep may cause hearing loss, mental stress and irritation. Quietness is the most important requirement in any residential college. Some of the physical attributes that influence service users' experience are discussed as follows:

- Study Bedroom: the study-bedroom has to facilitate some number of functions in a relatively small area; these functions include sleeping, studying, relaxing, socializing and eating. The room must give out a sense of privacy and security, with good lighting and ventilation, and a reasonable view, more so, student should be able to control his internal environment such as heating, cooling, lighting, and should be able to impose his own personality in the room without causing any damage [24].

- Density: density is defined as the number of person per structure and is identified as another physical factor that influence students experience with residential college [20]. They further added that, users of triples shows greater feelings of crowding and perceive less control over room activities, expressed more negative inter personal attitudes and experience more negative room atmosphere.

- Floor Level: [25] on students' residential college settings, opined that students living at the upper floors, perceived larger rooms and found them not crowded compared with those on the lower floor. Floor level could influence students' satisfaction and friend formation. Users of single-story residence hall were significantly more satisfied and establish more residence base friendship than Users of multi-storey residence hall.

- Privacy: According to [25] increase in the level of students' satisfaction with residential college, depends on the students' perception of their privacy. [26] Opined that female students were most likely to stay in shared residential facilities while their male counterpart preferred to stay in more private place.

B. Demograhic Attributes

Demographic attributes of an individual for example, duration of staying, ethnicity, sense of sharing, gender, economic status, relationship with students, and individual's home experience are also essential, therefore could not be ignored and will obviously influence students experience with the residential college [8]. Some of the demographic attributes that influence service users' experience are discussed as follows:

- Gender: females talks more than males, they like making friends and entertaining visitors in their rooms, while male students use their rooms as sleeping place and relaxation. Satisfaction with

student residential college experiences is higher among female compared to male [27].

- Socio-economic status: personal income level of students plays a significant role in determining student residential experience. With good economic back ground, student may aspire to live enjoyable lives [27].

- Duration: duration of staying due to temporary nature of occupancy at universities' students' residential colleges, residential experience can be determined through the duration of stay. [22] affirmed that satisfied students' would stay again in that residential college for the next semester.

- Sense of sharing: opined that female students were most likely to stay in shared facilities, while male students usually preferred to stay in more private spaces.

- Ethnicity: some researchers predicted that ethnicity has positive and negative effect on student residential experience. [10] Testified that discrimination of different races will cause residential dissatisfaction.

IV. **Methodology**

The study intends to use mixed method, in which a questionnaire and semi-structured interview will be used. The target population for the study comprised all the international students in UTHM, which is 455, who were sampled using stratified random sampling. They were stratified according to five residential colleges, which are Taman University, Taman Kelisa, Malewar, Perwira and Tun syed Naseer. The sample of this study will be 189 international students. The respondents are limited to those who are staying only at the students' residential colleges.

V. **Conclusions**

In conclusion, this study seeks to explore the most important physical and demographic attributes that influence service user's experience on the facilities provision at the students' residential colleges. This is imperative because it will benefit the university management, residential college administrators, facility and service managers in improving the method of service delivery and service quality on students' residential facilities as they advanced to improve from service quality level to service excellence level. Further study should explore the major technical and functional elements of performance on student students' residential colleges, which will help in continually improving the performance, design, construction, and maintenance.

References

[1]. Pandit, K. (2007) The importance of international students on our campuses, yearbook of the Association of Pacific Coast Geographers.

[2]. Ministry of Higher Education Malaysia, (2013). *Operational Framework for International Student Management,* 2013. Retrieved May, 14,2013 via http://www.mohe.gov.my.

[3]. 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

[4]. Njie, B., Asimiran, S., & Baki, R. (2012). Perceptions of international students on service quality delivery in a Malaysian public university. *Quality Assurance in Education*, *20*(2), 153–163.

[5]. Rajab, A., Rahman, H. A., Panatik, S. A., & Shaari, R. (2012). Education Service : International Students ' Perception, *1*(2), 1–10.

[6]. Hui, E. C. M. (2013). Facilities management service and customer satisfaction in shopping mall sector. *Facilities*, *31*(5), 194–207.

[7]. Goldman, H. H. (2005). The origins and development of quality initiatives in American business. *The TQM Magazine*, 17(3), 217-225.

[8]. Najib, N. U., Yusof, N. A., & Osman, Z. (2011). The Influence of Socio-Economic Backgrounds towards Satisfaction with Student Housing Facilities, 478–483.

[9]. Winston Jr, R. B. (1993). *Student Housing and Residential Life*: A Handbook for Professionals Committed to Student Development Goals. Jossey-Bass, Inc., Publishers, 350 Sansome Street, San Francisco.

[10]. Najib, N. U., Yusof, N. A., & Abidin, N. Z. (2011). Student residential satisfaction in research universities. *Journal of Facilities Management*, *9*(3), 200–212.

[11]. Ponsignon, F., Smart, P. a., & Maull, R. S. (2011). Service delivery system design: characteristics and contingencies. *International Journal of Operations & Production Management*, *31*(3).

[12]. Johnston, R., & Clark, G. (2005). *Service Operations Management*: Improving Service Delivery (2nd Ed). Prentice Hall.

[13]. Pine II, B.J., & Gilmore, J. H. (2011). *The experience economy*: work is theatre and every business a stage. Harvard Business Press, Boston, Massachusetts.

[14]. Parasuraman, A., Zeithaml, V. A. & Berry, L. L. (1985). Problems and strategies in services marketing. *The Journal of Marketing*, 33-46.

[15]. Parasuraman, A., Zeithaml, V. A. & Berry, L. L. (1988). Servqual. *Journal of retailing*, 64(1), 12-40.

[16]. Zeithaml, V. A., Bitner, M. J., & Gremler, D. D. (2009). *Services marketing: Integrating customer focus across the firm*. New York: McGraw Hill.

[17]. Katircioglu, S. T. (2012). Service quality and university students' satisfaction on the travel agencies: An empirical investigation from Northern Cyprus. *International Journal of Quality and Service Sciences*, *4*(3), 299–311.

[18]. Ahmed, I. (2011). Student ' s Perspective of Service Quality in Higher Learning Institutions ; An evidence Based Approach, *2*(11), 159–164.

[19]. Teixeira, J., Patrício, L., Nunes, N. J., Nóbrega, L., Fisk, R. P., & Constantine, L. (2012). Customer experience modeling: from customer experience to service design. *Journal of Service Management*, *23*(3), 362–376.

[20]. Khozaei, F., Ramayah, T., & Hassan, A. S. (2012). American Transactions on Engineering & Applied Sciences A Shorter Version of Student Accommodation Preferences Index (SAPI), *1*(3), 195–21118.

[21]. Rowley, J., (1999). Measuring total customer experience in museums, *International Journal of Contemporary Hospitality Management*, 11(6), pp. 303-308.

[22]. Foubert, J. D. (1998). Predictors of student satisfaction in university residence halls .

[23]. Preiser, W. F., & Vischer, J. C. (Eds.). (2005). *Assessing building performance*. Routledge.

[24]. Olufunke, A., & Adedoyin, O. (2012). User's Satisfaction With Residential Facilities In Nigerian Private Universities : A Study Of Covenant University Izobo-Martins Oladunni Oluwatoyin, *2*(11).

[25] Kaya, N., & Erkip, F. (2001) Satisfaction in a dormitory Building: The Effect of Floor Height on the Perception of Room Size and Crowding. *Enviroment and Behaviour,* 34-43.

[26]. Amole, D. (2008). Residential Satisfaction and Levels of Environment in Students' Residences. *Environment and Behavior*, *41*(6), 866–879.

[27]. Najib, N. U., Yusof, N. A., & Md Sani, N. (2012) The Effect of Students' socio-Physical Backgrounds onto Satisfaction with Student Housing Facilities. *Social and Behavioural Sciences*, 64-74.