



The Study on Classroom Preferences of Mukah Polytechnic Students

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Abstract

This study aims to investigate the students' classroom preferences, and whether or not a classroom physical appearance and environment in Mukah Polytechnic plays a significant role to participants' learning attitude and learning performance. The sample consisted of 338 samples from a population of 2746 active students of Mukah Polytechnic according to June 2017 session. The questionnaires were adapted from (Pat, n.d.). This study utilized a few common statistical tools to analyse the data. SPSS Version 21 was used for this purpose. The reliability tests on the identified variables for this study were found to be acceptable and reliable as the Cronbach's Alpha values for all the variables are 0.847. The finding shows that classroom physical appearance does affect emotions of Polytechnic Mukah Sarawak students, and the length of time does not affect learning performance in classrooms. The findings have important implications to the institution so they could work on creating the best preferred classroom physical environment for the students to boost their learning outcome and better result in their assessments.

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Key-word: - Classroom, environment, physical appearance, preferences.

1.0 INTRODUCTION

Mukah Polytechnic is a higher learning institution where learning process of different areas of expertise are held. The polytechnic offers nine diplomas and one pre-diploma from five main departments and two supporting departments. All lessons require different classroom appearance and environment in order to achieve the lesson goals from technical subjects, Information Technology, language and other classroom activities. A classroom is a room in which classes are held, lessons given and knowledge are shared. Classrooms are found in educational institutions of all levels, from preschools to universities, and may also be found in other places where education or training is provided, such as corporations, religious and humanitarian organizations. Classroom environment encompasses a broad range of educational concepts, including the physical setting, the psychological environment created through social contexts, and numerous instructional components related to teacher characteristics and behaviors (Fraser, 1986). This study is held to find out the best classroom preferences by the students in Mukah Polytechnic.

Many classroom layouts are created with various purpose of the classroom to create an effective, comfortable and conducive learning environment, hoping to get a good learning outcome. The classroom attempts to provide a space where learning can take place uninterrupted by outside distractions. In order to meet the needs of all students, it is very important to have a classroom that comply all learners. Students react differently to these environments. The types of classroom varies from language laboratories, workshop classes, lecture halls, multimedia and computer laboratories and the basic square classrooms with desks, chairs, and whiteboard – you name it as it prepared and equipped with different furniture and equipment according to the needs of classes held in it. Hence, some students actually have their own preference as the classroom environment plays a big role in their learning outcome.

Mukah Polytechnic is an institution where the majority of students are taking courses in engineering, therefore, the physical characteristics and the environment of the rooms where lesson took place are very important especially the safety in the lab where practical classes are held. In addition, the environment can also affect the students' attitude towards learning. If they feel the classroom is in physically bad or poor condition, they most probably to feel discouraged and upset and less willing to learn. In a well-designed special education classroom, the classroom activities that are to take place and the needs of the students must be considered when planning the arrangement of the classroom furniture and where instructional areas will be located. Defining and clarifying the physical space of the classroom enables students to anticipate the activity that will be held in each area, thereby increasing their participation and improving their behavior (Leifson, 1951).

Physical appearance is simply the physical characteristics of the rooms. The size of the room, the lighting inside the room which might contribute to the room temperature, and whether it has carpeting or just concrete, must be considered in physical characteristics of a classroom. The major importance of the physical environment is that it can affect students' comfort and to some extent, their ability to learn. Students who are uncomfortable are unlikely to learn as well as those who are comfortable. Physical appearance of the classroom is a main concern before everything else about a lesson in a classroom as the setting sets the mood of students to learn, but this is not only limited to the classroom size, arrangement of desks and chairs, bulletin boards, temperature, number of students in the classroom, windows, colors on the walls, acoustics, lighting, and organization, but also the sizes of the desks and chairs, the appliances provided, and the cleanliness of the classroom. The physical appearance of the classroom is very important to student success. Landy & Sigall (2012) concluded that physical appearance not only affects the way in which others react to a person, it also affects the way in which they react to a person's accomplishments.

Rosenthal & Jacobson (1968) argued that teachers' expectations influence student's academic performance, and there is a Pygmalion effect in classroom - teachers tend to expect higher achievements from attractive students, and students fulfill these implicit expectations. Therefore, facilities and materials for teachers and students can be showed as factors for a classroom. Students will be more comfortable to learn and function most when they are feeling the environment is supportive and auxiliary. The government in Malaysia is very much aware and supportive on the matter of physical appearance of the workplace and classrooms of all levels of education institutions through practices like 5S and recently EKSA (Public Sector Conducive Ecosystem). For a higher learning institution like Mukah Polytechnic, the goal is to make the learning environment a motivating and fun place for students to learn.

Thus, the objective of this study aimed at investigating whether or not a classroom physical appearance and environment in Mukah Polytechnic plays a significant role to participants' learning attitude and learning performance. This is so that the institution could work on creating the best preferred classroom physical environment for the students to boost their learning outcome. Furthermore the findings of the study will be beneficial for lecturers, the board of Mukah Polytechnic management and even ministry of higher education because it will explore the effectiveness of classroom physical appearance and environment on the students' achievement at a higher institution like Mukah Polytechnic.

2.0 LITERATURE REVIEW

The studies on classroom physical appearance and classroom environment have been widely argued around the world. Physical environment refers to physical characteristics of the room. Physical classroom environment is a combination of different things i.e., lighting, temperature, ventilation system, size of the room, floor, walls, desks, chairs, rugs, whiteboards, computers etc. Teacher and students are considered the main elements of the classroom environment. Favorable physical environment has a significant positive effect on the efficiency of any organization and acts as catalyzing agent to provide a straight way for achieving predetermined objectives of an organization. To ensure a favorable classroom environment, it should be well equipped and facilitated. The classroom physical arrangement provides students with effective instruction and promotes smooth teaching learning process. Physical facilities should be provided as they are helpful in improving the overall performance of the school (Suleman, Aslam, & Hussain, 2014). Furniture arrangement in the classroom influences how comfortable students feel and the amount of interaction with other students and with the teacher (Burgess & Kaya, 2007; Cheryan et al. 7 Martin, 2002). Different arrangements may achieve these goals for different people. increasing achievement for all students may require different environmental interventions than reducing achievement gaps between students. Because structural inadequacies of classrooms are often directly tied to school and district resources, they will often affect most or all students in a school, with a possible greater impact on students with disabilities. Symbolic features may similarly affect all students (e.g., when the symbols are distracting) or be more limited to certain groups within a school setting (e.g., girls in a science classroom) (Cheryan, Ziegler, Plaut, & Meltzoff, 2014). Researchers have investigated the relationship between the classroom environment, student behavior, and academic engagement (Hood-Smith & Leffingwell, 1983; Visser, 2001). A well-organized classroom permits more positive interactions between teachers and children, reducing the probability that challenging behaviors will occur (Martella, Nelson, & Marchand-Martella, 2003).

Additionally, modifying the classroom environment may serve as a direct intervention for children who demonstrate ongoing disruptive behavior (Conroy, Davis, Fox, and Brown, 2002). Although the well-designed classroom has proven benefits, there is little research on the impact environmental modifications have on behavior and learning (Guardino, 2009; Schilling & Shwartz, 2004).

3.0 RESEARCH DESIGN AND METHODOLOGY

This study deployed a survey method to obtain data. The questionnaire instrument contained two sections which was adapted from (Pat, n.d.). The first section focused on obtaining respondents’ demographic profiles such as age, semester, gender and department of the students. The second section consists of 21 items of two mainly focussed variables which are the classroom physical appearance and classroom environment. For these 21 statements, this study used a 4-points Likert scale of 1 for “strongly agree” to 4 for “strongly disagree”. The questionnaire was developed in English.

The authors have personally distributed the questionnaires randomly to 338 students of Polytechnic Mukah in July 2017. The sample was taken according to the *Table for Determining Sample Size from a given Population* by Krejcie and Morgan (1970), according to Mukah Polytechnic students’ population in June 2017 Session at 2746 students. This study utilized a few common statistical tools to analyse the data. SPSS Version 21 was used for this purpose. The reliability tests on the identified variables for this study were found to be acceptable and reliable as the Cronbach’s Alpha values for all the variables are 0.847 above the accepted value of 0.60 as shown in Table 1 below.

Table 1 Reliability Statistic

Cronbach’s Alpha	N of Items
.847	21

Table 2 Respondents’ Demographic Profiles

	Characteristics	N	(%)
Gender	Male	172	50.9
	Female	166	49.1
	Total	338	100.0
Age	17-18	28	8.3
	18-20	207	61.2
	>21	103	30.5
	Total	338	100.0
Semester	1	21	6.2
	2	85	25.1
	3	74	21.9
	4	7	2.1
	5	83	24.6
	6	60	17.8
	Others (Semester 7 & Above)	8	2.4
	Total	338	100.0
Department	Commerce Department	103	30.5
	It Department	62	18.3
	Civil Department	79	23.4
	Mechanical Department	48	14.2
	Electrical Department	46	13.6
	Total	338	100.0

A total of 338 respondents had participated in this survey. The survey response rate is 100%. Table 2 presents the respondents’ demographic profiles. As shown, the majority of our respondents were male (50.9%) and female (49.1%). This include semester 1 (6.2%), semester 2 (25.1%), semester 3 (21.9%), semester 4 (2.1%), semester 5 (24.6%), semester 6 (17.8%) and other semesters is at (2.4%). Overall, about (8.35%) of the respondents are at the age between 17 until 18 years old, followed by 18 until 20 years old (61.2%) and (30.5%) age up to 21 years old. Commerce Department students sums up the majority of the respondents of our research with (30.5%), followed by Civil Engineering Department with (23.4%), Information Technology and Communication Department at (18.3%), Mechanical Engineering Department (14.2%) and the lowest is Electrical Engineering Department at (13.6%).

4.0 RESULTS AND DISCUSSION

In this study, we further performed descriptive test to examine the perception of the study of classroom physical appearance and environment effects on Polytechnic Mukah students learning outcome. Table 3 presents the data on mean and standard deviation values for all 21 items in this study.

Table 3 Mean and Standard Deviation (SD) of attitude of participants to classroom appearance and classroom environment.

Item	Mean	SD
Classroom Physical Appearance		
Classroom physical appearance affects course preference.	2.165	1.332
Classroom physical appearance affects learning performance.	2.035	0.757
Classroom physical appearance affects state of mind.	2.038	0.767
Size of tables and chairs used in learning are important in classrooms	1.991	0.798
Beauty of classrooms does not affect learning performance or learning attitude.	2.334	1.394
Classroom physical appearance does affect emotions.	2.387	1.780
Brightness of lighting affects learning performance.	2.074	0.799
Classroom designing is important for studying in classrooms.	1.946	0.820
Location of classrooms affects learning performance.	2.124	1.374
Seat placement in classrooms affects learning performance in classrooms.	2.062	0.850
Size of table and chairs used in writing affects learning performance.	2.159	1.351
You prefer a regular classroom using individual fold-out desks.	2.186	0.897
You prefer the classrooms of which provides big shared tables.	2.153	0.840
Learning by using big shared tables increases learning performance more than by individual fold-out desks.	2.065	0.830
Classroom Environment		
Classroom atmosphere does not affect desire of study.	2.233	1.919
State of mind affects learning performance.	1.946	0.772
Technology is more important in classrooms.	2.014	0.802
The number of classmates affects learning performance.	2.106	0.878
Length of learning time affects learning performance in classrooms.	1.923	0.815
Technology leads to forming attitude to the course.	2.038	0.797
Eye contact between teachers and students are not important in the learning process.	2.331	0.941

As shown in Table 3, on the first variable on the classroom physical appearance, to examine the perception of the study of classroom physical appearance does affect emotions of Polytechnic Mukah Sarawak students was moderately high with the mean values at (2.387). Meanwhile for the same variable, the lowest mean value at (1.946) refers to the importance of classroom design for studying. As for the second variable for the classroom environment, the highest mean at (2.331) goes to the eye contact between teachers and students are not important in the learning process, and the lowest mean (1.923) is for the length of time affects learning performance in classrooms.

Among the variables with lower mean below 2.0 are, 'Size of tables and chairs used in learning are important in classrooms' at 1.991, 'Classroom designing is important for studying in classrooms' at 1.946, 'State of mind affects learning performance' at 1.946, and 'Length of learning time affects learning performance in classrooms' at 1.923. The first one is resulting from the ergonomic issues where the students feel more comfortable with decent size of chairs and tables where they would have ample space to do their work and doing the necessary movement. Many students are not comfortable with the fold-out desks and preferred a big shared table which makes group activities and discussions more convenient. The design of the classroom is important too as it brings the learning mood to the students. Interesting, ergonomic, comfortable and beautiful classroom would make the students feel more motivated to learn. This study also finds that the students state of mind need to be at the present of the learning time and not worrying or wandering elsewhere. Lastly, length of learning time for a typical class is between two to three hours can be weary and usually lecturers would have short breaks in between the hours and that help the students to feel refreshed.

5.0 CONCLUSION

The study has successfully investigated whether or not a classroom physical appearance and environment in Mukah Polytechnic plays a significant role to participants' learning attitude and learning performance. We find out that a classroom physical appearance and environment plays a big role in the students learning preferences other than good lecturers and subjects. Classroom with good, interesting appearances added with good lighting, suitable size of furniture and arrangements are highly preferred as it creates the students learning desire while maintaining a good relationship between lecturer and students.

6.0 RECOMMENDATION

It is recommended that the study expand its scope to the lecturers' perspective in the future. The same area of study could also be narrowed down to a particular subject to learn how students learn best according to the classroom physical appearance and environment for a particular subject. We also recommend that the institution could work on creating the best preferred classroom physical environment for the students to boost their learning outcome and better result in their assessments.

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