
Attitude of Undergraduate Students towards Educational Learning Platform

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Abstract

The present study aims to examine the attitude of undergraduate students of Kohima College Kohima, Nagaland, towards the learning platform. A descriptive method was used for the survey. A total of 165 Undergraduate students of the college were the sample population. A snowball technique was adopted to select the students. An attitude scale (Likert type) was structured in Google form for gathering the information, which was circulated for a specific time period. The collected data was analysed for mean, S.D, t-test and post hoc test using Tukeys HSD. Tukeys HSD post hoc analysis showed a highly significant difference between conventional and online teaching platform ($Q=14.2582, p<.01$) as well as between online and a combination platform of conventional and online teaching ($Q=11.5162, p<.01$) method. On the other hand, the attitude of undergraduate students towards conventional and combined platforms of online and conventional methods did not differ significantly ($Q=2.7420$).

Keywords: Online Teaching, Conventional, Undergraduate, Platform, Tukeys HSD.

Introduction

The word 'Education' is derived from the Latin word "Educatum" which means the action of educating or training. Education is a process that facilitates learning or gaining of knowledge, skill, values, and principles at every stage of life. In this sense, the span of education is as wide as that of life itself. To a student, education is usually bound by the four walls of the classroom environment as face to face teaching and learning takes place. However, globalization and advancement of Information Technologies through the use of internet facilities has brought tremendous change in almost every sphere of life, including the process of obtaining education. Though face to face education is still considered the norm, it has experienced a remarkable change in recent times, especially during the Coronavirus pandemic when educational institutions were compelled to switch over to online mode of teaching. A student can now learn a new subject and obtain a degree certificate by sitting at the comfort of his home by enrolling in different online courses provided by various educational institutions. According to Asabere (2012), online learning aims to seek changes in the pattern of the whole academic process. Online learning is known by many names and terms like learning through web, online learning, Instruction through computer assistance. Radha, *et. al.* (2020) pointed out that an online method of learning is best suited for everyone. Many individuals want to train at a suitable moment, based on their availability and comfort. This encourages the learner to view information modified anytime they want it. Some specialists were of the notion that online learning is a way of teaching in which multiple integration of technology are sought while some were of the notion that it is the substitute of distance education, which is facilitated by the application of the internet, considered as an effective way of rapid communications (Berdea, 2009). According to Graham (2006), Prasad (2015) Blended learning, also called hybrid learning or mixed method learning involves both face-to-face classroom style instruction as well as the use of online methods. Ahmad *et. al.* (2018) emphasized that sustainability and performance of E-learning can be boosted by carefully restructuring the technology infrastructure readiness, appropriate learning course design, course flexibility, access control, commitment and user-friendly. Taghizadeh, & Hajhosseini, (2020) discovered that students of TEFL have a positive perception towards blended learning and online learning environments as it helps in improving their skill, knowledge, and other development. It provides an edge to compete at the global level. Also, the world is moving towards the usage of digital tools and technology and this is the right time to upgrade ourselves to be tech-savvy (Raja & Kallarakal, 2021). The learner's goal is to score high in the examination at the end of the course, under a blended method of teaching (Begum, 2019) Therefore, to achieve the purpose of digitization and ICT in education, a balanced approach of traditional and online platforms is to be employed. Hence, a blend of both techniques might be useful (Dikli, 2003). The purpose of this study was to find the right channel of communication between students and teachers through which teaching learning may be made more effective. Based on the above earlier studies it was decided to have the following objectives for the present study.

Objectives

The main objectives of the study are:

- To know the opinion of students towards online teaching based on gender. To understand the preference of teaching platforms based on gender.
- To identify the efficient teaching platform based on post hoc tests. Hypotheses
- H01: There is no significant difference in the opinion towards online teaching based on gender. H02: There is no significant difference in the preference of teaching platforms based on gender. H03: There is no significant difference among the different teaching platform based on preference

Methodology

Descriptive design was used for the data collection. An Online survey technique was employed to gather the information. Google form was used to frame the questionnaires, which was forwarded through whatsapp to different groups that were disabled after a week of circulation. Under graduate Students of Kohima College Kohima studying in 1st Sem, 3rd Sem and 5th Sem were the sample population. The link was initially circulated to a small batch from each semester using the snowball technique (Naderifar *et. al.* 2017). The total target response for the survey was 220 students. The questionnaire was designed employing the Likert scale of 1-5 (varying from Strongly Disagree (SD) to Strongly Agree (SA)). The survey was conducted during September 2021 and the responses were electronically collected and the data transferred to excel spreadsheet. The collected data was analysed using different methods like percentage, mean, standard deviation and t-test. Tukeys HSD Post hoc test technique was employed and analysis done at astatsa.com software application.

Limitations of the study

The survey was restricted to students of Kohima College, Kohima. The result cannot be generalized to other colleges under Kohima district. The data was collected from a limited number of students.

Result and Discussion Profile of the students

The Profile of the respondents is portrayed in Table 1. The survey had a total of 165 student respondents, of which girls (69.10%) respondents was maximum as compared to boys which had only 30.91 percent.

Table 1: Profile of Respondents

Gender		Total
Boys	Girls	
51 (30.91)	114 (69.10)	165 (100)

Numbers under parenthesis indicate percentage.

Opinion of Students towards Online Teaching Based on Gender

The opinion among students towards online teaching was to understand their difference in attitude. Nine statements were framed using the Likert scale of five-point continuum ranging from 1 to 5 (SD) Strongly Disagree, (D) Disagree, (UND) Undecided, (A) Agree, (SA) Strongly Agree.

It can be seen from Table 2 that eight statements were found to have no significant difference in opinion based on gender viz. 'Online teaching is a new platform for teaching learning process' ($t=1.97^{NS}$), 'Students learn better through online mode of teaching' ($t=1.97^{NS}$), 'Online mode provides better platform for students interaction' ($t=1.97^{NS}$), 'Online mode provides better clarity of teachers voice than classroom situation' ($t=1.97^{NS}$), 'Online interactive is compatible and easy to use' ($t=1.97^{NS}$), 'Timing of online class is appropriate' ($t=1.97^{NS}$), 'Teachers of online class are experienced and equipped with skill and pedagogy' ($t=1.97^{NS}$), 'Language used during online class is easy and understandable' ($t=1.97^{NS}$). However, with respect to one statement i.e. "Online teaching should replace the conventional classroom teaching" was found significant ($P<.05$) in opinion between Boys and Girls. Therefore, we reject the Null Hypothesis for this statement that there is no significant difference in the opinion towards online teaching based on gender and thus conclude that the opinion towards online teaching between genders differ for the statement. According to Mitra (2020) the students are unable to understand the concepts through online mode because of the communication gap between the teacher and student and missing out of any live session further creates the problem for them as they don't find any other way to clarify their academic queries. Nagar (2020) found that 64 per cent students strongly approved that online learning lacks interaction between students and teachers. Fandino and Velandia (2020)

indicated in their research that tutors could influence students' motivation to learn if they provide support that is reinforcing through fluid and comprehensive communication. Mpungose (2020) considered that students still need capacity building on the use of learning management systems and other newly adopted online learning software.

Table 2: Opinion of Students towards Online Teaching Based on Gender

Statement	Gender	Mean	SD	t- value
Online teaching is a new platform for teaching learning process	Boys	2.66	1.26	1.97 ^{NS}
	Girls	2.53	1.09	
Online teaching should replace the conventional classroom teaching	Boys	3.98	1.29	1.97*
	Girls	3.15	1.53	
Students learn better through online mode of teaching	Boys	4.25	0.99	1.97 ^{NS}
	Girls	4.09	1.07	
Online mode provides better platform for students interaction	Boys	2.92	1.44	1.97 ^{NS}
	Girls	2.88	1.28	
Online mode provides better clarity of teachers voice than classroom situation	Boys	3.98	1.07	1.97 ^{NS}
	Girls	3.82	1.25	
Online interactive is compatible and easy to use	Boys	2.54	1.04	1.97 ^{NS}
	Girls	2.89	1.78	
Timing of online class is appropriate	Boys	2.56	1.22	1.97 ^{NS}
	Girls	2.58	1.11	
Teachers of online class are experienced and equipped with skill and pedagogy	Boys	2.50	1.12	1.97 ^{NS}
	Girls	2.54	1.01	
Language use during online class is easy and understandable	Boys	2.07	0.98	1.97 ^{NS}
	Girls	2.37	1.01	

Significant at .05 level.

The preference of teaching platform between boys and girls are highlighted in Table 3. It was observed that there was no significant ($t=1.97^{NS}$) difference in the opinion between the genders for the teaching platform to be conducted online. However, in the case with 'conventional teaching platform' and 'combine platform of online and conventional teaching' it was found to be significant ($P<.05$). Therefore, the Null Hypothesis that no significant difference in the preference of teaching platform based on gender is rejected for these cases and concludes that there is difference in preference of teaching platform based on gender. Nagar (2020) during a study also revealed that 69 per cent of students favoured blended learning, that is, a combination of face to face and online learning. Lalit (2020) during a survey found that most of the students are not satisfied with online classes. However, Bali & Liu (2018) after studying the perception of undergraduate students of English Literature, Psychology, and Communication, concluded that face-to-face learning perception was higher than online learning in terms of social presence, social interaction, and satisfaction.

Table 3: Preference of Teaching Platform Based on Gender

Teaching Platform	Gender	Mean	SD	t-value
Conventional teaching platform	Boys	0.392	0.493	1.97*
	Girls	0.767	0.424	
Online teaching platform	Boys	0.019	0.140	1.97 ^{NS}
	Girls	0.061	0.241	
Combine platform of Online and conventional teaching	Boys	0.588	0.497	1.97*
	Girls	0.803	0.400	

Significant at .05 Level

Table 4: Result of one-way ANOVA for Different Teaching Platforms

Source of variation	df	Sum of square	Mean square	F	Level of significant
Between groups	2	20.763	10.38		

Within groups	492	89.236	0.18	57.2	0.01 & 0.05	Significant
Total	494	110		4		

The calculated F-value (57.24) from Table-4 is established to be greater than the critical value of F (4.67 & 3.02) for 2 and 492 df at significance levels of 0.01 and 0.05. It indicates that the attitude towards different teaching platforms among the undergraduate students differ significantly. It is therefore concluded that different teaching platforms have a significant effect on the attitude of undergraduate students towards teaching learning methods. Post hoc comparison (Table 5) using Tukeys HSD was used to determine which pairs of the three teaching platforms differed. The results indicated that there was no significant difference in the case between conventional and combined platforms of online & conventional method (Q=2.7420). However, it was found to be highly significant in the case with Conventional and Online teaching platform Q=14.2582, and the Combined platform of Online & conventional teaching with that of online teaching (Q=11.5162) at $p < .01$. Therefore, we reject the Null Hypothesis and accept that there is difference among the different teaching platforms based on preference.

Table 5: Tukeys HSD Post HOC Results of Different Teaching Platforms

Teaching platform	Tukeys HSD Q	Tukeys HSD p-value	Tukeys HSD Inference
Conventional Vs. Online teaching platform	14.2582	0.0010053	** $p < .01$
Conventional Vs. Combined platform of Online & conventional.	2.7420	0.1289221	insignificant
Online Vs. Combine platform of Online & conventional teaching.	11.5162	0.0010053	** $p < .01$

Significant at 0.01 Level

Conclusion

The present research is carried out to ascertain the attitude of undergraduate students towards different learning platforms in the teaching learning process. The study result shows that the maximum responses were girls (69.10%) out of the 165 students who responded to the query before the dateline of the survey, achieving a feedback response rate of 75 percent from the total 220 students. It was also found that students differed in opinion towards a particular statement that “online teaching should replace the conventional classroom teaching” at $p < .05$ ($t=1.97$). Based on the preference of different teaching platforms between the genders, it was found that there was a difference in opinion with respect to conventional teaching platforms ($p < .05$) and also with the combined platform of online and conventional teaching ($p < .05$). However, in the case of online teaching platforms it showed no significant difference. Therefore, it can be concluded that an online teaching platform blended with conventional teaching in the teaching-learning process can enhance the students' learning process making it more effective. There is also a strong need for an awareness programme about Information Technology in the educational process and it is extremely necessary among the undergraduate students of Kohima college Kohima, Nagaland.

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