

Awareness and Attitude Towards Massive Open Online Courses (MOOC) Among Under Graduate Students

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ABSTRACT

A quantitative research approach with descriptive research design was used for this study. MOOCs are widely seen as a major part of a larger disruptive innovation taking place in higher education. The possibility for MOOCs to deliver high-quality and contextualized learning content in the most under-served regions of the world is only recently being explored.

Objectives: To assess the awareness and attitude towards massive open online courses among under graduate nursing students and to associate the awareness and attitude towards massive open online courses among under graduate nursing students with selected demographic variables.

Methodology: Non-probability purposive sampling technique was used for sample selection. Data was collected from 89 undergraduate students using structured questionnaire for assessing awareness and Likert scale to assess attitude towards MOOC. Data collection was done using Google forms and analysed using descriptive and inferential statistics.

Result: Majority (71.9%) were found in the age group of 19-21 years, (77.5%) had never enrolled for any massive open online course before. Mostly (50.56%) had poor awareness regarding massive open online course and (53.9%) had satisfactory attitude towards MOOC. There is no significant association between awareness and attitude of students who have enrolled for MOOC prior.

Conclusion: The study reveals that mostly undergraduate students have poor awareness and satisfactory attitude towards MOOC.

Keywords: MOOC: massive open online courses, awareness, attitude, undergraduate students.

INTRODUCTION

"If you are not willing to learn, no one can help you. If you are determined to learn, no one can stop you." - Zig Ziglar

The term MOOCs was originally coined by Dave Cormier of the University of Prince Edward Island in 2008 for a large online class taught by George Siemens of Athabasca University and Stephen Downes of Canada's National Research Council Canada. [1] A massive open online course (MOOC) or an open online course is an online course aimed at unlimited participation and open access via the Web. [2] In addition to traditional course materials, such as filmed lectures, readings, and problem sets, many MOOCs provide interactive courses with user forums or social media discussions to support community interactions among students, professors, and teaching assistants, as well as immediate feedback to quick quizzes and assignments. [3]

MOOCs are a widely researched development in distance education, first introduced in 2008, that emerged as a popular mode of learning in 2012. [4]

MOOCs have a much more traditional course structure. [5] They are characterized by a specified aim of completing the course obtaining certain knowledge certification of the subject matter. [5] They are presented typically with a clearly specified syllabus of recorded lectures and self-test problems. However, some providers require paid subscriptions for acquiring graded materials and certificates. [5]

A range of courses have emerged; "There was a real question of whether this would work for humanities and social science" However, psychology and philosophy courses are among Coursera's most popular. [6] Student feedback and completion rates suggest that they are as successful as math and science courses even though the corresponding completion rates are lower. [6] More than 1.5 million people had registered for classes through Coursera, Udemy or edX. [7]

Many MOOCs use video lectures, employing the old form of teaching (lecturing) using a new technology. [8] MOOC "courses are 'designed to be challenges,' not lectures, and the amount of data generated from these assessments can be evaluated 'massively using machine learning. [9] Some view the videos and other material produced by the MOOC as the next form of the textbook. "MOOC is the new textbook", according to David Finegold of Rutgers University. [10] Some traditional schools blend online and offline learning, sometimes called flipped classrooms. Students watch lectures online at home and work on projects and interact with faculty while in class. Such hybrids can even improve student performance in traditional in-person classes. [11]

When searching for the desired course, the courses are usually organized by "most popular" or a "topical scheme". Courses planned for synchronous learning are structured as an exact organizational scheme called a chronological scheme, Courses planned for asynchronous learning are also presented as a chronological scheme, but the order the information is learned as a hybrid

scheme. In this way it can be harder to understand the course content and complete, because they are not based on an existing mental model. [12]

MOOCs are widely seen as a major part of a larger disruptive innovation taking place in higher education. [13] In particular, the many services offered under traditional university business models are predicted to become unbundled and sold to students individually or in newly formed bundles. [14] These services include research, curriculum design, content generation (such as textbooks), teaching, assessment and certification (such as granting degrees) and student placement. [14] MOOCs threaten existing business models by potentially selling teaching, assessment, or placement separately from the current package of services. [14]

Background of study

Covid-19 pandemic has brought significant change in pattern of education for all including under graduate students. Massive Open Online Courses is a new concept of bringing education on your screen. Various studies have been conducted to evaluate the effectiveness of online training programs and it has increased rapidly since lockdown. In comparison with traditional teaching method it provides a great opportunity for students to pursue their interest and seek education of their choice which will help them to build incredible career ahead. [15]

Swayam is one of the MOOCs launched by Indian government until now it is not well known and has not achieved that reach. Eventually, by creating awareness among under graduate students will aid in promoting Swayam and also help students to gain knowledge and skills. There are also Udemy, edX, Coursera are the platforms where MOOC are available. These platforms provide students to opt courses of their choice and explore various subjects of their interest. Students get certified on these platforms which enables them to gain credit at their present university or institution. [15]

Recent estimates indicate that the number of universities and course offerings has grown considerably since 2012, climbing to over 400 institutions hosting more than 2,400 MOOCs in 13 languages. However, the possibility for MOOCs to deliver high-quality and contextualized learning content in the most under-served regions of the world is only recently being explored. [16]

Need of the study

Massive open online course has been latest, learner centered, well designed, affordable, easily accessible, flexible and meaningful online learning platform. Massive open online courses have set a new benchmark in online learning environment. Massive open online courses have developed worldwide in all the sectors of learning and helps to find any course that facilitates advanced learning modalities. In comparison with traditional teaching method, it provides a great opportunity for students to pursue their interest and seek education of their choice which will help them to build incredible career ahead. [15]

Professionals engaged in variety of fields are attracted by MOOC. This study attempts to determine, the awareness of undergraduate students regarding MOOC and how it will benefit their future and help them build strong and confident personality. [15]

Teachers must learn how to educate in the digital age and reimagine their roles in technology-based education. "Online learning is the process of education i.e., learning, teaching obtaining knowledge and skill through internet". The internet serves as a means of communication, interaction, entertainment, health, trade, and commerce. In addition to downloading the information they need, students can visit websites to ask questions, solve puzzles, and receive information from teachers via online education. This allows them to learn specific skills for a job or field of study without having to physically attend any classes. [16]

MATERIALS AND METHODS

For the present study quantitative research approach is used in descriptive design. Setting of the study: MGM New Bombay College of nursing. Population is all under graduate nursing students. Target population are all under graduate nursing students of Navi Mumbai. In this study the accessible population are all under graduate nursing students of MGM New Bombay college of Nursing available during time of data collection. The samples are 1st year, 2nd year, 3rd year and 4th year students of MGM New Bombay college of Nursing. 89 undergraduate nursing students filled the google form which was shared by a link via mail. Non-probability purposive sampling technique was used to select sample. The survey was executed using online questionnaire. The data collection instrument prepared for the study was structured questionnaire in which multiple choice question was used to assess the awareness and Likert scale for assessing attitude of under graduate students. A Google form was created which involved structured questionnaire to assess the awareness and attitudes regarding massive open online course among under graduate students. The tool was prepared in English since the study dealt with the under graduate students.

Tool has three sections

Section A: consists of demographic variables of the under graduate students to be participated in the study age, gender etc.

Section B: consist of structured questionnaire, multiple choice questions to assess the awareness towards massive open online courses among under graduate students.

Section C: consist of structured questionnaire, Likert scale for assessing attitude towards massive open online courses among under graduate students.

STATISTICAL METHOD

The data was analysed using descriptive and inferential statistics analysis was based on the objectives of the study. Items of structured questionnaire were marked one for right response and zero was incorrect response.

Scoring and interpretation of the tools:

Section A: consists of demographic variables of the under graduate students to be participated in the study age, gender etc....

Section B: consist of ten multiple choice structured questionnaire to assess the awareness towards massive open online courses among under graduate students.

Section C: consist of ten structured questionnaire in form of Likert scale assess attitude towards massive open online courses among under graduate students.

Association of awareness and attitude towards massive open online courses among under graduate nursing students with selected demographic variables was done by chi square test.

RESULTS

The data was retrieved from Google form sheet for tabulation and statistical processing. The analysis of the data is organized and presented under the following section

SECTION A: Distribution of nursing students based on demographic data using frequency and percentage.

SECTION B: Analysis of awareness regarding massive open online courses among under graduate nursing students.

SECTION C: Analysis of attitude towards massive open online courses among under graduate nursing students.

Table 1: Distribution of sample based on demographic variables. n = 89

Sr. No.	Demographic Data	Frequency	Percentage
1.	Age		
	16 years to 18 years	1	1.1%
	19 years to 21 years	64	71.9%
	22 years to 24 years	24	27%
2.	Gender		
	Male	7	7.9%
	Female	82	92.1%
3.	Year		
	First year	3	3.4%
	Second year	16	18%
	Third year	27	30.3%
	Fourth year	43	48.3%
4.	Have you enrolled for MOOC		
	Yes	20	22.5%
	No	69	77.5%

Table 1 depicts that majority of students participated in the study belong to age group of 19 years to 21 years with (71.9%), from 22 years to 24 years with (27%) and 16 years to 18 years with (1.1%). (92.1%) females and (7.9%) male subjects participated. Mostly fourth year students actively took part with (48.3%), (30.3%) third year, (18%) second year and (3.4%) first year. (77.5%) students have never enrolled for MOOC and (22.5%) of students have enrolled for MOOC.

Analysis of awareness regarding massive open online courses among under graduate nursing students.

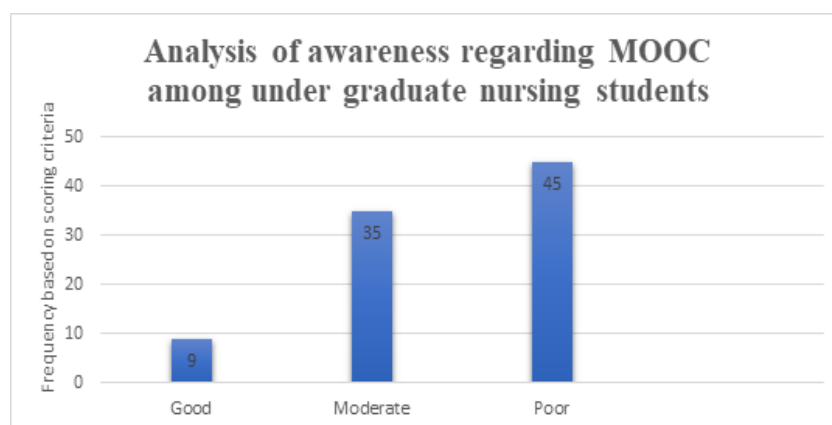


Figure 1: The above bar graph represents awareness regarding MOOC among under graduate nursing students.

Analysis of attitude towards massive open online courses among under graduate nursing students

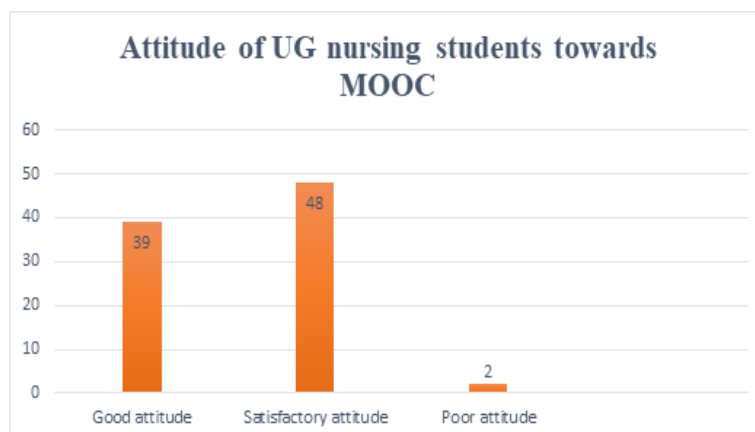


Figure 2: The above bar graph represents attitude regarding MOOC among under graduate nursing students.

Association of awareness and attitude towards massive open online courses among under graduate nursing students with selected demographic variables.

Table 4: Association of awareness and attitude towards massive open online courses among under graduate nursing students with selected demographic variables.

Sr. No.	Demographic Variable	Level of awareness			Chi square value
		Good F	Moderate F	Poor F	
1.	Age 16 years-18 years 19 years-21 years 22 years- 24 years	0	1	0	0.540321114 P=9.49 NS
		9	25	30	
		0	8	15	
2.	Gender Male Female	1	2	3	0.856603829 P=5.99 NS
		8	32	42	
3.	Year First year Second year Third year Fourth year	1	2	0	0.073216377 P=12.59 NS
		3	9	4	
		4	8	15	
		1	15	26	
4.	Have you ever enrolled for MOOC Yes No	1	3	5	0.141 P=5.99 NS
		8	32	40	

S-significant (*significant at 5% level) NS-non significant.

Table 4 shows that there is no significant association between awareness and attitude towards massive open online course with demographic variables. Data is categorised on basis of good awareness, moderate awareness and poor awareness. The p value is greater than the calculated value thus null hypothesis is accepted which signifies that there is no significant association between awareness and attitude with demographic variable regarding massive open online courses among undergraduate students.

DISCUSSION

In the present study, out of 89 under graduate nursing students, majority (50.56%) had poor awareness regarding massive open online course followed by (39.32%) had moderate awareness regarding massive open online course, and (10.11%) had good awareness regarding massive open online courses.

A study conducted in 2021 at Assam University regarding awareness of MOOC among post graduate students revealed that (69.4%) are not aware of MOOCs, and only

(30.6%) respondents are aware of MOOCs. The study depicts that most of the respondents (85.7%) have not done/doing MOOCs and only (14.3%) respondents have done/doing MOOCs out of 91 respondents. The maximum no of respondents (74.7%) is not aware of MOOCs given weightage as Open Course, whereas only (25.3%) are aware. [21]

This signifies that majority of students are not aware of massive open online courses. Thus, more awareness must be created.

Regarding attitude towards massive open online courses majority (53.9%) had satisfactory attitude towards massive open online courses followed by (43.82%) had good attitude towards massive open online courses, and (2.24%) had poor attitude towards massive open online courses.

A study conducted in 2021 at Assam University regarding awareness of MOOC among post graduate students. The majority of the respondents (38.5%) preferred 50% Face to Face and 50% Online. [21]

Hence, most of the students have satisfactory attitude towards massive open online courses. If they get to know what all benefits they will get once they start accessing MOOC then there might be an improvement in attitude towards massive open online courses.

The association between awareness and attitude with students who have enrolled for MOOC. The result indicates that there is no significant association between those who have enrolled for MOOC with awareness and attitude ($\chi^2 = 0.141$) as ($p < 5.99$)

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CONCLUSION

The study was to assess the awareness and attitude towards massive open online course among under graduate nursing students. The data was collected from 89 under graduate

nursing students from MGM New Bombay College of nursing through the Google form. From this study, we came to understand that majority (50.56%) were having poor awareness regarding massive open online courses. Thus, the attitude towards massive open online course was satisfactory it was assessed using Likert scale. The present study revealed that there is no significant association between awareness and attitude regarding massive open online course with demographic variables such as age, gender, year and students enrolled for MOOC. Recommendations offered for the future studies are the following: Similar studies can be taken for further studies with a large group of samples, a comparative study can be performed with the experimental and non-experimental groups.

Conflict of Interest: None

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