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Student Perception Regarding Online Learning During Pandemic

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ABSTRACT

The COVID19 pandemic has disrupted the normal functioning of various activities across the world, including learning and education. The shift towards online education during the pandemic of COVID19 has led many studies to focus on perceived learning outcomes and student satisfaction in this new learning environment. This study is a collective case study consisting of analysis of students' perceptions of their online learning during the pandemic. The data was collected from one hundred twenty-two through convenience sampling. The recorded perceptions are in terms of course design, learner – instructor interaction, effectiveness and IT ability. The results were then summarized into tables and narrative descriptions. The study found that factors- course design, learner – instructor interaction, effectiveness and IT ability are positively influencing the student's perception and satisfaction regarding e learning during pandemic.

Keywords: Learning, Student perception, COVID19, E-learning.

INTRODUCTION

With the COVID – 19 a novel disease spreading across the globe, many countries have ordered closure of all educational institutes. In the beginning of February 2020, schools in India and other affected countries were closed due to the proliferating contamination. However, by mid-march nearly 75 countries have implemented or announced closure of educational institutes. As on 10th march school and university closures globally due to COVID – 19. According to UNESCO by the end of April 2020, 186 countries have implemented nationwide closures, affecting about 73.8 % of the total enrolled learners.

As the school and colleges are shut for an indefinite period, both educational institutions and students are experimenting with a way to complete their prescribed syllabi in the stipulated time frame in line with the academic calendar. These measures have certainly caused a degree of inconvenience, but they have also prompted new examples of educational renovation using digital intervention.

Educational institutions in India have transitioned to an online teaching environment soon after the union government' s decision to impose nationwide lockdown for 21 days from 20th march 2020 which was later extended from 19 more days. However, the major concern is about the quality of learning which is closely related with how well the content is designed and executed.

Concept of learning

Learning occupies a very important place in our life. Most of what we do and not do is influenced by what we learn and how we learn it. Learning, therefore, provides a key to the structure of our personality and

behaviour. Broadly speaking, the term learning stands for all those changes and modifications in the behaviour of an individual which he undergoes during his lifetime.

Definition of learning

"The term learning covers every modification in behaviour to meet environmental requirements. "
Gardner murphy (1968)
"Learning is an acquisition of habits, knowledge and attitudes. It involves new ways of doing things, and it operates in individuals' attempts to overcome obstacles or to adjust to new situations. It represents a progressive change in behaviour. It enables him to satisfy interest to attain goals "
Crow and Crow (1973)
(Source : http://webcache.googleusercontent.com/search?q=cache:http://kkhsou.in/main/education/learning.html&gws_rd=cr&ei=O530WO7IBMfbvgScn4XQ)

History of distance learning:

Historically, distance education can be tracked back to the 18th century, to the beginning of print-based correspondence study in the US. In the mid-19th century correspondence education started to spread in Europe and the United States. Isaac Pitman, the English inventor of shorthand, is generally recognized as the first person to use correspondence courses.
By the late 1960's and 1970's significant changes in distance learning occurred due to development of new media technologies and delivery systems. The open university (OU) in Great Britain became the first autonomous institution to offer college degrees through distance education. The OU now uses all possible forms of technology to deliver learning to students.
Open and distance learning in India dates back to the 1960s. By the 1980s there were 34 universities offering distance education through departments designed for that purpose. The first single mode open university was established in Andhra Pradesh in 1982, followed by the Indira Gandhi National Open University (IGNOU), and subsequently in Bihar, Rajasthan and Maharashtra, Madhya Pradesh, Gujrat, Karnataka, West Bengal, and Uttar Pradesh (established throughout 1980s and 1990s.
The establishment of these single mode distance education universities was stimulated by the government's intention to democratize education and make it lifelong. The year 1995 witnessed the enrolment of 200,000 students in open and distance learning, accounting for 3% of total higher education enrolment. Correspondence courses continued as the main vehicle for distance education. Instruction was primarily print based, although audiotapes or laboratory kits occasionally supplemented the written materials. However, new development in communications technologies, particularly radio and television broadcast, led to the emergence of non-print-based distance education systems.
In the late 1980s, and early 1990s the development of the fibre optic communication systems, in other word the use of networking and internet, allowed for the expansion of live, two-way, high-quality audio and video systems and the new concept of electronic learning came into education. According to Tompkins (1993), the initial cost of the fibre optic system may have been high, the long-term savings and benefits of the technology balancing the initial cost.
A range of factors including emerging information and communication technologies (ICTs), liberation, privatization and globalization have enlarged the demand for open and distance learning. While the

government is responsible for more than 90% of open and distance learning funding, plans are underway to involve the private sectors more closely.

Definition and concept of E-learning:

A learning system based on formalised teaching but with the help of electronic resources is known as E-learning. While teaching can be based in or out of the classrooms, the use of computers and the internet forms the major component of E-learning. E-learning can also be termed as a network enabled transfer of skills and knowledge, and the delivery of education is made to a large number of recipients at the same or different times. Earlier, it was not accepted wholeheartedly as it was assumed that this system lacked the human element required in learning.

The term E- learning means Electronic Learning and it is basically the online delivery of information communication, training and learning. E-learning is electronic learning, but the 'E' in the E-learning has a number of other implications:

Exploration – E-learners use the web as an exploratory tool to access lots of information and resources.

Experience – The web offers E-learners a total learning experience, from synchronous learning to threaded discussions to self-paced study.

Engagement – The web attracts learners by enabling creative approaches to learning that promote collaboration and a sense of community. 9

Ease of use – Not only is the web easy to use for learners, but to learning providers across all technical platforms (windows, UNIX. etc)

Empowerment – The web puts learners with a set of tools that enables the content and allows learners to choose the way in which they learn best.

(source : http://economictimes.indiatimes.com/definition/e-learning)

Need of the study

Advances in technology since the 1990s have given rise to an increased use of web-based tools in distance education. We investigate the relations among several variables that may impact the degree of students' satisfaction with online-learning experiences and perceived quality. Early identification of relevant variables could provide the means to increase the likelihood of positive online -learning experiences. This project is a part of the study and focuses on factors affecting students' perception towards online courses.

Objectives of the study

Every survey is carried out keeping some objectives in mind. Similarly, the present study focuses on following objectives:

1. To study the overall satisfaction of students toward online courses.
2. To study the benefits of online mode of learning from the perspective of students.
3. To analyse the student's perception of e-learning during COVID-19 period.

CHAPTER -2

REVIEW OF LITERATURE

This chapter contains the previous year studies by different authors.

Burns (2013) studied the perception of students towards online courses in a graduate adolescence program. The author proposed that there is a significant difference between groups (online and tradition)

on the comparison of perception of online and face to face. Data was collected from 93 respondents. Mixed-mode approach combining web-based and mail surveys was used. Series of chi-square tests was performed. Results indicated that online students had positive experiences, though the online courses are not always up to their expectations. It was concluded that both the traditional learners and online learners perceive online learning as convenient though not necessarily conducive to learning.

Huss & Eastep (2013) studied the perception of students towards online learning at Midwestern University. The objective of this study was to gather as much information as possible about the diversity of the online phenomenon at university. Huss & Eastep gathered the E-mail address of 4695 students at university who opted for online courses. Electronic survey was a research-generated instrument, which blended a quantitative component in form of 23 fixed response items with qualitative elements accomplished through 2 narrative response questions.

Results indicated that 68% students rated their comfort level with online courses or learning in 8-10 range in scale where 10 was most comfortable. Results indicated that students have definite perception about online courses which they believe to be necessary components for their success in the environment.

Fedynich & Bradley (2015) studied the perception of graduate students towards online courses. The objective of the study was to identify the factors that affect the student's satisfaction in online courses. Data was collected from 249 graduate students to identify positive components that led to their satisfaction and perceived challenges that inhibited it. This descriptive study involved an analysis of a survey of graduate students regarding their perspective on online learning. This survey was completed online. The results indicated that interaction between students and with the instructor has a major impact on their satisfaction. The instructor's role was identified as being virtually important to student satisfaction. Other challenges identified were sufficient learner support that linked to campus resources and the need for varying instructional design and delivery to facilitate student's desire to learn.

Gillingham & Molinari (2012) studied the preference of students towards online and traditional courses. The purpose of this study was to capture perception and attitudes towards online and collaborative learning experience.

Sample of 174 students was selected. Online survey was conducted. The questions were posted online using the ultimate survey. Invitation to participate in the survey was emailed to all students. The results showed that respondents highly valued the flexibility of online format and access to online assessment tools. In terms of collaborative learning relationships, respondents rated their interaction with their instructor more favourably than their peer interaction. It was concluded that collaborative and online learning require that faculty must reassess their roles as well as those of students.

Smart & Chappel - did a comparative study regarding perception of students towards online courses. The purpose of this study was to examine student's perception of integrating online components in two undergraduate business courses where students complete online modules prior to class discussion. 40 students enrolled in the required course and 26 students enrolled in the elective course. 36 from required courses and 18 from elective courses completed the survey successfully. T-test or chi-square tests were applied to test the significance between the variance measures in this study. Two-open ended survey questions were also included to solicit respondent's opinion about online courses. Chi-square test revealed that subjects in the elective course had great awareness. There were no significant differences between subjects in two courses based on gender, student rank & prior experience completing a web-based course at the site.

It was concluded that this study provides clues on how online components and strategies might be implemented to enhance teaching and learning in the 21st century.

Guillot - examined the thoughts & beliefs of teachers and students at south-eastern Louisiana University (SLU) involved in online teaching & learning. There were two sequences of data collection: first consisted of two surveys sent to online teachers and another to students enrolled in online courses in three academic colleges. The second sequence of interviews with nine experienced online teachers. Quantitative analysis of interviews was accomplished. Survey findings revealed that faculty and students agreed that giving effective feedback and providing clearly stated guidelines are important. Survey with nine experienced online teachers revealed that methods and strategies were employed by online teachers in SUL within and across disciplines.

Rodriguez, Ooms & Montanez (2016) studied the student's perception of online learning quality. The purpose was to find out what do students report regarding comfort with technology, satisfaction with online learning experiences and motivation to learn computer-based technology skills. A survey of 700 students was analysed. Factor analysis, score variables were the methods applied. The results showed that most students appreciated the flexibility of study time and less need to go to campus. On the other hand, students least like limited face to face interaction.

Nwanko (2015) studied the student's learning experience and perception of online course content and interaction. The purpose of this study was to find out how the students describe their interaction with their instructor and other students who have completed at least 12 credits of online coursework. They were notified by electronic mail regarding the objective of study. The results showed that learner-course content interaction was the strongest predictor of student's perception and learning experience with their online courses.

Shi et al. (2017) studied the perception of students towards online v/s traditional face to face college courses. The purpose was to study the students' attitude towards studying online v/s traditional classroom instruction in a large, private south new England University. A random sample of 34 undergraduate and 66 graduate students were administered for the purpose. 33% of the sample was male and 67% was female. Results of the survey indicated that 56% reported having positive experience towards online education and yet only 22% actually would take an online course if given the opportunity. Time management and flexibility were given as prime reasons for taking an online course. Although all students use the internet very much in their daily life, the results showed that students still seem to prefer the traditional classroom environment for their education.

Glover & Lewis (2012) studied the students' perception for traditional v/s online courses. The purpose of the study was

to explore the participant's preference for taking online v/s traditional face to face courses and to determine some reasons for their preferences. The study explored the preference of 152 college students. Results indicated that students who have already taken a good number of online courses tend to prefer online courses and desire more online course offerings from their institution. Although online course quality remains questionable, online courses are considered either more difficult or equivalent in difficulty to face-to-face courses.

Lopez (2011) – This study looked at student support particularly in the course context, focusing mainly on guidance provided to students within a course. A total of 110 students completed an online survey on student perception. The result showed perceived support was significantly related to their overall satisfaction of the online course.

CHAPTER – 3
RESEARCH METHODOLOGY

Research methodology is a way to systematically solve the research problem. The research methodology includes various methods and techniques for conducting research. Research specifies the information required to address the issues, design the method for collection of information, manage and implement the data collection process and communicate the finding and their implication.

This chapter gives a vivid explanation of the research process followed during the present studies. An attempt has been made here in this chapter to explain the preliminary content of the research objective, research plan and data analysis techniques.

Every research project has a specified framework for conducting the collection of data and is known as research design. Any research should involve

- Deciding which approach should be used in research design and area coverage.
- Deciding what type of data will be available.
- Identifying the probable sources of data.

TYPE OF RESEARCH

The research is exploratory in nature and is based on a descriptive approach that is in the form of a survey. Research has been conducted by way of questionnaires which are carefully designed after taking into consideration.

DATA SOURCE

For the purpose of study both primary and secondary data has been used.

- Primary data
- Secondary data

PRIMARY DATA

Primary data is the data which is collected by the researcher himself/herself for the purpose of study from the respondent. It has been collected by way of a structured questionnaire. Questions were kept short in simple language. The questions included in the questionnaire are close ended and multiple choice.

SECONDARY DATA

The secondary data is collected from various websites, research papers, journals and various research studies which were previously conducted on this subject.

RESEARCH INSTRUMENTS

Questionnaires have been prepared and used as a research instrument. The questionnaire is designed to identify the student's perception toward online learning during pandemic.

Questions are designed in such a way that they can fulfil the objective of the study.

SAMPLING

Convenience samples were taken from 122 students.

TECHNIQUES USED FOR DATA ANALYSIS

Data analysis is a set of methods that help to study facts, detect patterns and develop explanations. Data collected from the survey are analyse through

- **Percentage method** – this method is used in almost all the tables. The formula used is Percentage = responses for a question / total no. of respondents.
- **Factor analysis** – factor analysis is a statistical instrument used to draw out the connection among various numbers of variables and to explain these variables in the terms of common underlying dimensions (factor). This instrument helps in reducing the larger number of variables into smaller sets of dimensions with minimum loss of information.

STEPS FOR CONDUCTING FACTOR ANALYSIS ARE AS FOLLOWS:

- Data gathering and generating co- relation.
- Extraction of beginning factor solution.
- Rotation and interpretation.
- Construction of scales or components scores to use in analysis.

CHAPTER – 4

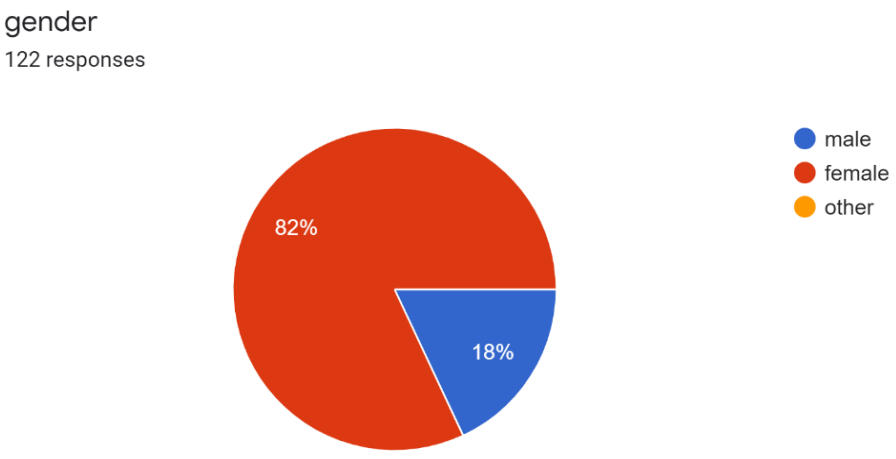
DATA ANALYSIS AND INTERPRETATION

Section A- Demographic Profile

1. Gender

Table no. 1. Gender

Gender	No. of respondents	Percentage of respondents
Male	22	18%
Female	100	82%
Other		
TOTAL	122	100%

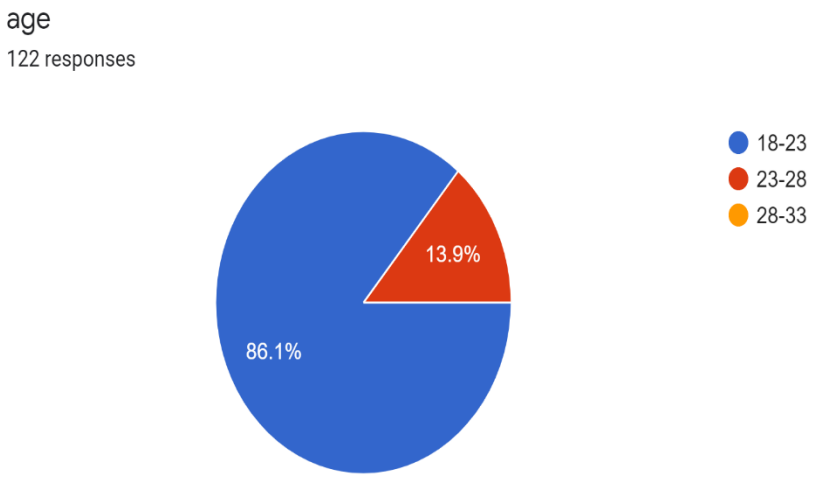


INTERPRETATION- out of 122 respondents ,18% are males and 82% are female.

2. Age (in years)

Table no.2

Age	No. of respondents	Percentage of respondents
18-23	105	86.1%
23-28	17	13.9%
28-33		
TOTAL	122	100

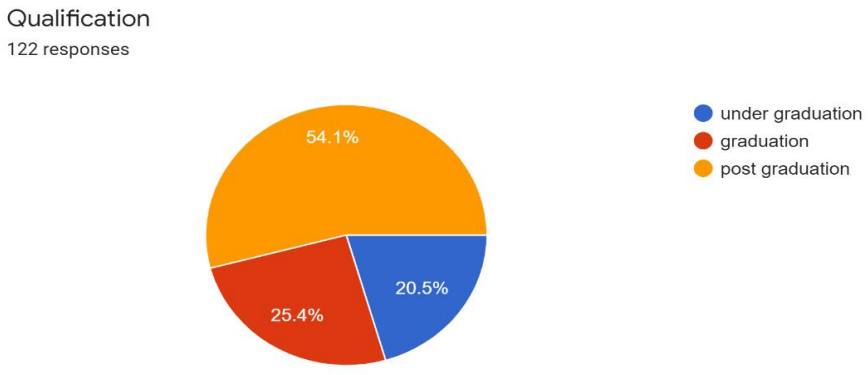


INTERPRETATION- out of 122 respondents ,86.1% are from the 18-23 age group followed by 13.9% are from the 23-28 age group.

3. Qualification

Table no. 3

Qualification	No. of respondents	Percentage of respondents
Under graduation	25	20.5%
graduation	31	25.4%
Post graduation	66	54.1%
TOTAL	122	100

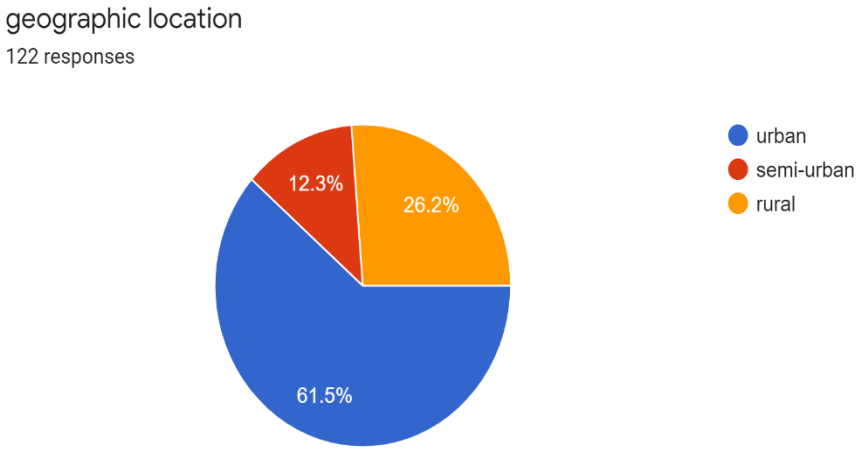


INTERPRETATION- out of 122 respondents ,20.5% are from under graduation,25.4% are from graduation,54.1% are from post-graduation.

4. Geographic location

Table no. 4

	No. of respondents	Percentage of respondents
urban	75	61.5%
Semi urban	15	12.3%
rural	32	26.2%
TOTAL	122	100

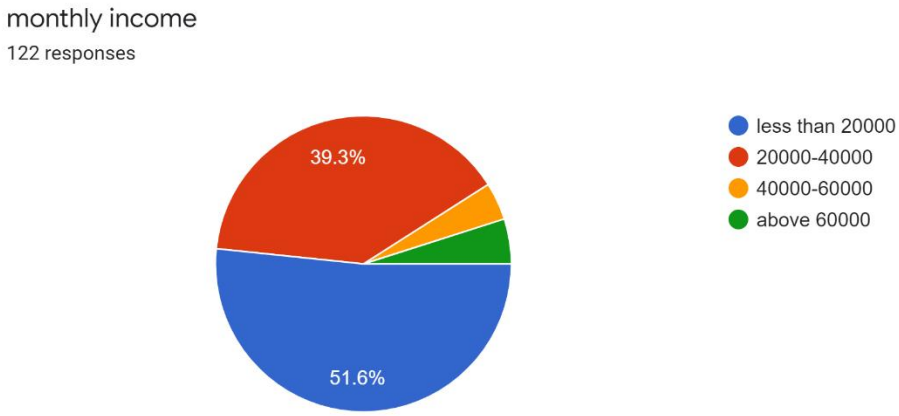


INTERPRETATION-out of 122 respondents, data has been largely collected from urban respondents i.e.61.5%, followed by rural respondents i.e.26.2%and semi urban respondents i.e.12.3%.

5. Monthly income

Table no. 5

	No. of respondents	Percentage of respondents
Less than 20000	63	51.6%
20000-40000	48	39.3%
40000-60000	6	4.9%
Above 60000	5	4%
TOTAL	122	



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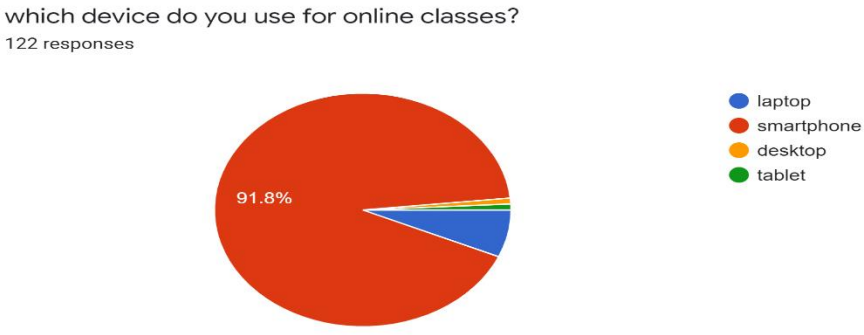
INTERPRETATION- a large amount of data has been collected from respondents with monthly income less than 20000 i.e.51.6%, followed by the respondents with monthly income between 20000-40000 i.e.39.3%, followed by the respondents with monthly income between 40000-60000 i.e.4.9% and by respondents with monthly income above 60000 i.e.4%.

SECTION -B

6. Which device do you use for online classes?

Table no. 6

	No. of respondents	Percentage of respondents
Laptop	8	6.5%
Smartphone	112	91.8%
Desktop	1	0.8%
tablet	1	0.8%
TOTAL	122	

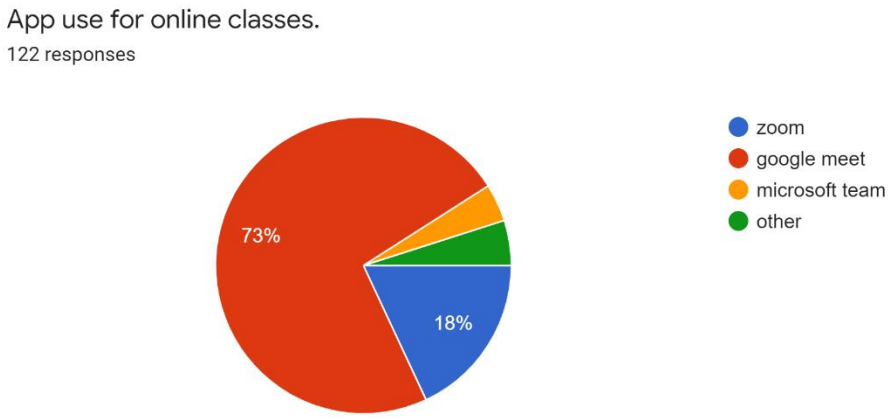


INTERPRETATION – out of 122 respondents ,91.8% respondents use smartphones ,6.5% respondents use laptop, 0.8 % respondents use desktop and tablet.

7. Apps used for online classes.

Table no. 7

	No. of respondents	Percentage of respondents
Zoom	22	18%
Google meet	89	73%
Microsoft team	5	4%
other	6	4.9%
TOTAL	122	100



INTERPRETATION – out of 122 respondents,73% respondents use google meet, 18% respondents use zoom app ,4% respondents use Microsoft team and 4.9% respondents use other apps.

8. Estimated number of hours you spend in a day online class.

Table no. 8

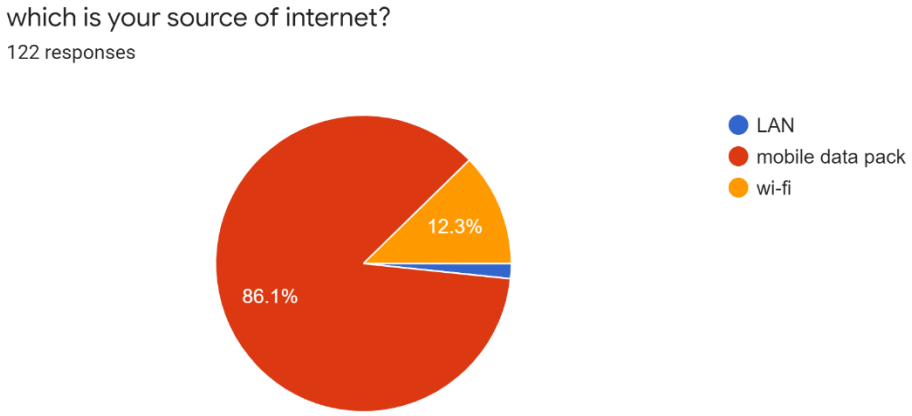
	No. of respondents	Percentage of respondents
Less than 1	5	4%
1-5	109	89.3%
6-10	6	4.9%
More than 10	2	1.6%
TOTAL	122	100

INTERPRETATION- out of 122 respondents ,89.3% respondents spent 1-5 hours in a day for educational purposes, followed by 4.9% who spent 6-10 hours in a day ,4% who spent less than 1 hour in a day and 1.6% who spent more than 10 hours.

9. Which is your source of internet?

Table no. 9

	No. of respondents	Percentage of respondents
LAN	2	1.6%
Mobile data pack	105	86.1%
Wi-fi	15	12.3%
TOTAL	122	100



INTERPRETATION- out of 122 respondents, 1.6% respondents use LAN network,86.1% respondents use mobile data pack and 12.3% respondents use wi-fi.

SECTION- C

FACTOR ANALYSIS

The respondents were asked to give their opinion on a 5-point Likert scale ranging from strongly agree (1) to strongly disagree (5)

1. KMO & BARTLETT'S TEST

KMO and Bartlett's Test		
Kaiser-Meyer-Olkin Measure of Sampling Adequacy.		.903
Bartlett's Test of Sphericity	Approx. Chi-Square	1655.996
	df	325
	Sig.	.000

The above table shows that KMO is > 0.5 i.e.0.903 which shows that sample size is adequate. Thus, data is fit for factor analysis.

BARTLETT 'S TEST

Bartlett tests show the correlation in the data. The null hypothesis is that there is no correlation in the data.

However, P value =0.000 i.e. less than 0.05, so null hypothesis is rejected meaning that there is correlation in the data and the data is appropriate for running the factor analysis.

2. TOTAL VARIANCE EXPLAINED

Total Variance Explained									
Component	Initial Eigenvalues			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	9.997	38.450	38.450	9.997	38.450	38.450	5.115	19.674	19.674
2	2.260	8.694	47.144	2.260	8.694	47.144	4.380	16.846	36.519
3	1.436	5.521	52.665	1.436	5.521	52.665	3.165	12.173	48.693
4	1.329	5.111	57.776	1.329	5.111	57.776	1.733	6.666667	55.360
5	1.077	4.143	61.919	1.077	4.143	61.919	1.705	6.559	61.919
6	.961	3.695	65.614						
7	.911	3.506	69.119						
8	.821	3.157	72.276						
9	.768	2.954	75.230						
10	.675	2.597	77.827						
11	.635	2.441	80.268						
12	.611	2.351	82.619						
13	.555	2.135	84.754						
14	.487	1.874	86.628						

15	.446	1.714	88.342						
16	.389	1.496	89.838						
17	.374	1.440	91.278						
18	.351	1.351	92.628						
19	.338	1.300	93.929						
20	.295	1.134	95.063						
21	.288	1.107	96.170						
22	.230	.885	97.055						
23	.224	.862	97.916						
24	.203	.780	98.696						
25	.181	.696	99.392						
26	.158	.608	100.000						
Extraction Method: Principal Component Analysis.									

From the above table 5 factors have been extracted and total variance explained by these factors is 61.919.

3. ROTATED COMPONENT MATRIX

Rotated Component Matrix[a]					
	Component				
	1	2	3	4	5
i feel confident while using e learning	.580				
Online courses are attractive due to easy updates of learning content.					.745
online course provide multiple activities for student to develop critical thinking	.616				

multimedia effects in online courses increase student attention.	.687				
i believe e - learning platform is user friendly.					
it is easy for me to find necessary information while using an e learning platform					
i believe that using e - learning service can simplify the learning process	.560				
the set of e- learning system is compatible with way i learn		.680			
studying through e -learning mode provide flexibility to the study at the time convenient to the learner	.680				
e -learning can enable people to study irrespective where they are located in the world					
there are technologies available to enable one to take test and submit assignments electronically	.809				
there are electronic tool available to enable interactive communication between instructor and student without meeting face to face	.643				
during courses student are able to get help as needed			.613		
the instructor stimulates interest in subject matter		.537			
the instructor in online course has clear expectation of the course		.600			
online course enhance interaction with peer and instructor					
online instructor provide explanatory feedback			.528		

The online course provides sufficient resources and contact information to instructors.	.697				
The use of the internet reduces the interest of students for educational activities inside the classroom.				.792	
The instructor communicates effectively during and after the class.					
The course content is easily understandable in online courses.		.805			
I feel satisfied about the design of online teaching materials.					
i feel satisfied about the guiding mode of course activity,			.560		
I feel satisfied about the efficiency for interactive discussion of course.			.537		
i feel satisfied about the function of platform (including the network quality)			.770		
i feel satisfied about the whole learning management of teaching activity.		.542			
Extraction Method: Principal Component Analysis. Rotation Method: Varimax with Kaiser Normalization.					
a. Rotation converged in 7 iterations.					

From the rotated component matrix interpretation of the factor is done. Interpretation is done by identifying the variable that has loadings on the factor. The factor can be interpreted in terms of variables that have high loadings. In the rotated component matrix, following factors are interpreted.

Factors	Factor statement	Factor loading
Course design	● I feel confident while using e learning ● Online courses are attractive due to easy updates of learning content. ● Online courses provide multiple activities for students to develop critical thinking. ● Multimedia effect in online course increase student attention	0.580 0.745

	● I believe that using an e learning service can simplify the learning process.	0.616 0.687 0.560
Learner- instructor interaction	● Studying through e learning mode provides flexibility to study at the time. ● There are technologies available to enable one to take tests and submit assignments electronically. ● There are electronic tools available to enable interactive communication between instructor and student without meeting face to face. ● During course content students are able to get help as needed.	0.680 0.809 0.643 0.613
Interest	● The instructor stimulates interest in subject matter. ● The instructor in the online course has clear expectations of the course. ● Online instructors provide explanatory feedback. ● Online courses provide sufficient resource and contact information to instructor.	0.537 0.600 0.528 0.697
IT ability	● The use of the internet reduces the interest of students for educational activities inside the classroom. ● The course content is easily understandable in online class.	0.792

		0.805
Effectiveness	● I feel satisfied about the guiding mode of course activity. ● I feel satisfied about the efficiency for interactive discussion of course. ● I feel satisfied about the function of platform (including the network quality) ● I feel satisfied about the whole learning management of teaching activity	0.560 0.537 0.780 0.542

CHAPTER-5
FINDINGS AND CONCLUSION
FINDINGS

This chapter contains the major findings of the study and its conclusion. The main objective of the research is to study the perception of students toward online learning. A structured questionnaire was distributed to the respondents. Percentage, factor analysis has been used for analysing the data.

1. From the study it was found that most of the respondents are female (82%) and the rest are male (18%).
2. It was found in research that most of the respondents are from the age group 18-23 (86.1%).
3. It was found that most of the respondents have qualification post-graduation (54.1%).
4. It was found that most of the respondents are from urban areas (61.5%).
5. It was found that most of the respondents have monthly income (51.6%).
6. It was found that most of the respondents use smartphones for online classes (91.8%).
7. It was found that most of the respondents use google meet app for online classes (73%).
8. It was found that most of the respondents spent 1-5 hours in a day for online classes i.e. (89.3%).
9. It was found that most of the respondents use mobile data packs for online classes i.e. (86.1%).
10. From the research, it was found that
    respondents prefer to take online courses.

CONCLUSION

In total, this study confirmed and expanded upon findings that students have definite perceptions about online education and what they believe to be necessary components for their success in the environment. The quality and quantity of learner – instructor interaction depend on the instructional design and selection of learning activities. Instructors need to plan learning activities that maximize the impact of interaction with students. As student interaction is highly valued by students,

Instructors need to consider ways to integrate online learning activities that promote interaction and enhance learning. Understanding the elements of a successful online program can offer suggestions for instructor and student to facilitate improved online learning experience.

Results of this study indicate that course design, learner – instructor interaction, effectiveness and IT ability all determine learner satisfaction and success in an online learning environment. Participants would

like to see improved course design and delivery methods including instructor training to give immediate and unambiguous feedback.

Limitation

1. During the survey, some respondents did not have a serious attitude toward the questionnaire. Hence their response provides different shades to the real picture.
2. As the analysis is based on primary data, there is a possibility of unauthorized information.
3. Most of the respondents are reluctant to give true information.
4. Scope of the study is limited to Amritsar city only. so, the result of the study may not be accurate.
5. This study is based on the assumption that responses are true although it may not be so.

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