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A COMPARATIVE STUDY BETWEEN CLASSROOM AND ONLINE TEACHING

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ABSTRACT

Teaching is an art, and it is a beautiful one. Not everybody can be a successful teacher. One should have a flair and dedication for teaching. Teaching has undergone plenty of changes over time. It was Gurukulam, then Classroom and now it is both Classroom as well as online teaching. Dr. A.P.J. Abdul Kalam was able to recollect his school days and specifically his science teacher's methods of teaching science. This alone speaks volumes about the importance of teaching.

Teacher creates a taste for learning in students. Even a worse and disinterested student changes his/her attitude and shows admirable progress in knowledge acquisition if only he/she comes to a good and dedicated teacher. The compulsions of time has brought in a new method of teaching, i.e. online teaching. This method has its own advantages and also disadvantages besides limitations. This study will revolve around both the classroom as well as online teaching and will be a comparative study between both methods.

The author of this study will have a clear 3/4 objectives for his/her study. The objectives will be such, that towards the end of the study, he/she would have arrived at meaningful findings to his/her formulated objectives. The author proposes to first conduct a study by using primary data. Data will be collected through a questionnaire. The size of the data collected will be around 75 questionnaire. The author will use statistical tools/test and analyze the data collected. A couple of generic tools as well as a slightly sophisticated test is proposed to be used in the study.

After completion of the data based statistical analysis, the findings and limitations to the study will belisted separately. Scope for further study will also find a place in the article opening up chances for further study.

The study manifested through the article will serve its purpose of throwing sufficient light on the existing as well as emerging trends in the area of teaching.

Keywords: Teaching Methodologies, Classroom Teaching, Online Teaching, Comparative Study, Teaching Effectiveness, Student Learning, Teacher Commitment, Learning Outcomes, Educational Technology, Primary Data, Questionnaire Survey, Statistical Analysis, Student Perception, Traditional Education, Digital Education.

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INTRODUCTION

Teaching is a pious profession and a sacred art. Great men who have succeeded in their careers and life have recounted their teachers at schools, colleges and have asserted that they owe a lot to their teachers who have mentored them. The influence of teachers on students have produced very many classic people in all spheres of life. One relationship that never gets spoiled is student – teacher relationship. It stands for the entire life time of both students as well as teachers.

Teaching as a profession has undergone plenty of changes in the last twenty years of time and unimaginable changes have occurred during the last three to five years. Covid-19, the Pandemic brought in some useful changes. Classroom teaching gave way to Online teaching during Covid-19 years. Though many students and teachers still favour classroom teaching, the imperatives of times have made them accept Online teaching methods.

Need for the Study

Covid-19 took its toll on almost all the spheres of human activity. Education was a sphere which was very badly affected. School / Colleges / Universities remained closed continuously for a very long period of time. Students were confined to their homes. This gave room to a new method of teaching which was not practiced before in a big way i.e. online teaching. Being a new method of teaching which was more or less a compulsion of Covid times, it arouse many eye-brows as to how for this online method of engaging students community will be effective in delivering the needs of the community. Much has been talked as written about online teaching, its advantages and disadvantages as well as limitations. This study can therefore be considered as a compulsion of Covid times.

REVIEW OF LITERATURE

Wai Kit Wong and PohKiat Ng in their article ‘An Empirical Study on E-Learning versus Traditional Learning among Electronics Engineering Students’ states the difference between e learning and traditional learning focusing on electronic engineering students. The study is descriptively empirically investigated. According to author many institutes still follow traditional learning method. The sample for the research were first year students and they participated in the survey. Data analysed using normality, reliability and ANOVA test. The result was shown that e learner had importantly different results from traditional learner. They also exhibited good performance and agreeability in the quiz and survey respectively.

Ryan R. Otter, Scott Seipel, Tim Graeff, Becky Alexander, Carol Boraiko, Joey Gray, Karen Petersen and Kim Sadler in their article on ‘Comparing Student and Faculty Perceptions of Online and Traditional Courses’ has compared online and traditional courses through student and faculty perception. Nowadays uses of online teaching mode has been increased in college campus. Author developed two separate surveys and did comparison between them. In this paper student

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and faculty who delivered courses using both the online and traditional mode and on student feedback author used same series of 7-point Likert scales. Both surveys measured: perceptions of online versus traditional courses, perceptions of students who take online courses and students' motivations for taking online courses, perceptions of faculty members who teach online courses; and demographic characteristics. Analysis of data included the comparison of mean values between faculty and students and Pearson correlation analysis to determine relationships between questions. 25 questions were measured in this study. The author reacheda conclusion that in online method students feels disconnected from teacher and their friends the same opinion found by faculty. Faculty found online teaching mode is more challenging and complicated compared to traditional learning.

Nahid Khalil Elfaki, ItedalAbdul Raheem and RashidaAbdulrahim in their article on 'Impact of E-Learning vs Traditional Learning on Student's Performance and Attitude' states that nowadays with the rapid increase in the internet technology, the e-learning has become extremely important system and up to the minuet essence that is largely used and put into effect by many educational institutes globally. In this research author is studying the impact of e-learning on the students' academic performance. Author has obtained samples from Najran University College of nursing during the period from January to August 2019. The sample size is around 80 nursing undergraduate students. A self-administered questionnaire was used for collecting data. The result showed that compared to traditional learner, online learner scored more in final exam. That means online learner performance is better.

Falih M. Alsaaty, Ella Carter, David Abrahams and FalehAlshameri in their paper on 'Traditional versus Online Learning in Institutions of Higher Education: Minority Business Students' Perceptions' has mentioned that for past ten years, professor have discussed which mode of education is higher level. Some declare that online is superior and others arguing that online is less successful and effective than traditional classroom teaching courses. Still others propose that the hybrid mode (e.g. online blended with face-to-face lectures) is the most crave and fruitful content delivery method for students.

Objectives of the Study

The following objectives are framed for the study

1. To estimate the contribution of demographic profile of the respondents to the questionnaire formulated for the study.
2. To evaluate the reasons ascribed for considering classroom teaching as a superior method
3. To evaluate the reasons behind students preferring online teaching methods

Research Methodology

The following research methodology has been adopted for the study

Type of data: Primary data

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Nature of Instrument: Questionnaire

Sampling method: Non probability sampling

Sampling type: Convenience sampling

Sample size: 82

Tools / Test used for the data analysis:

Data Analysis: Table No. 1: Age wise break up of respondents

Age	Frequency	Percent	Cumulative Percent
Upto to 25years	54	65.9	65.9
26 to 40 years	20	24.4	90.2
41 to 55 years	8	9.8	100.0
Total	82	100.0	

(Source: Primary data)

It can be observed from the above table that, in the chosen sample, 54 respondents (65.9% of the total sample size of 82) are up to 25 years of age, 20 respondents (24.4% of the total sample) are between 26 to 40 years of age) while 8 respondents (9.8% of the total sample) are between 41-55 years of age.

Table – 2: Education wise break up of respondents

Education	Frequency	Percent	Cumulative Percent
Upto school level	4	4.9	4.9
Undergraduate level	50	61.0	65.9
Post graduate level	16	19.5	85.4
Above Post graduate level	12	14.6	100.0
Total	82	100.0	

(Source: Primary data)

It can be seen from the above table that in the chosen sample, 4 respondents (4.9% of the total sample size of 82) are educated upto school level, 50 respondents (61% of the total sample) are educated up to Undergraduate level, 16 respondents (19.5% of the total sample) are educated upto Post graduate level while 12 respondents (14.6% of the total sample) are educated above Post Graduate level

Table – 3: Annual income wise break up of respondents

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Annual Income	Frequency	Percent	Cumulative Percent
Upto 2 lakhs	50	61.0	61.0
Rs. 2 to 5 lakhs	18	22.0	82.9
Rs. 5 to 10 lakhs	11	13.4	96.3
Above Rs. 10 lakhs	3	3.7	100.0
Total	82	100.0	

(Source: Primary data)

It can understood from the above table that in the chosen sample, 50 respondents (61% of the total sample size of 82) are having annual income upto 2 lakhs, 18 respondents (22% of the total sample) are having annual income between Rs. 2 – 5 lakhs, 11 respondents (13.4% of the total sample) are having annual income between Rs. 5 – 10 lakhs while 3 respondents (3.7% of the total sample) are having annual income above 10 lakhs.

Table – 4: Experience wise break up of respondents

Experience	Frequency	Percent	Cumulative Percent
Up to 5 years	57	69.5	69.5
5 – 10 years	13	15.9	85.4
Above 10 years	12	14.6	100.0
Total	82	100.0	

(Source: Primary data)

It can be seen that in the selected sample 57 respondents (69.5% of the total sample size of 82) are having experience up to 5 years, 13 respondents (15.9% of the total sample) are having experience between 5 – 10 years while 12 respondents (14.6% of the total sample) are having experience above 10 years.

Table – 5: Students preference can be ascertained before allotting them for either online or classroom sessions

	Frequency	Percent	Cumulative Percent
Yes	69	84.1	84.1
No	13	15.9	100.0
Total	82	100.0	

(Source: Primary data)

It can be seen from the above table that 69 respondents (84.1% of the total sample size of 82) are say Yes to ascertainment of students preference before allotting them for either online or

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classroom sessions while 13 respondents (15.9% of the total sample) say No to ascertainment of students preference before allotting them for either online or classroom sessions.

Table – 6: Descriptive Statistics for the eight variables on the superiority of classroom teaching

	Variables	N	Mean		Std. Deviation
		Statistic	Statistic	Std. Error	Statistic
Directly connect the teacher to the student	V5	82	4.46	.090	.819
No external disturbance during classroom sessions	V6	82	4.10	.091	.826
Extra knowledge acquisition occurs through the teacher	V7	82	4.27	.097	.876
It is a disciplined way learning	V8	82	4.26	.099	.900
This method of learning has been practiced since time immemorial and found to be a successful one through times	V9	82	4.23	.105	.947
Opportunities to have practical exposures are available in classroom sessions	V10	82	4.21	.111	1.003
Doubts clearance and seeking extra learning materials are possible instantaneously	V11	82	4.27	.090	.817
Continuous assessment of students and hence timely correction of erring students happens in a classroom environment	V12	82	4.18	.109	.983
Valid N (list wise)	82				

(Source: Computed Data)

The above table 5 gives the descriptive statistics for the eight variables taken under the major variable “Superiority of Classroom Teaching”. It can be understood from the above table that the variable “V5” has the maximum mean value of 4.46 with a standard error of .09 and standard deviation of 0.819. This shows that the variable “V5” is strongly agreed by al the 82 respondents. Similarly it can also be seen that the variables “V6, V7, V8, V9, V10, V11, V12” have mean values 4.10, 4.27, 4.26, 4.23, 4.21, 4.27 and 4.18 with different standard error and standard deviation. This shows that the variables “V6 to V12” are just agreeable to the respondents.

Table – 7: Online teaching is preferred today

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	Variables	N	Mean		Std. Deviation
		Statistic	Statistic	Std. Error	Statistic
Convenience of time is available	V13	82	4.33	.097	.876
Discrimination between students do not exist	V14	82	4.02	.111	1.006
Technology is used totally for this method of teaching	V15	82	4.22	.090	.817
Less expensive	V16	82	4.01	.105	.949
Services of experts in any academic field can be availed easily	V17	82	4.15	.110	.995
Online assessment can be done in speedier manner	V18	82	4.23	.097	.879
Satisfactory clearance of doubts by students is difficult	V19	82	4.02	.108	.981
Interaction between other student participants is very less thereby teaching time is put to optimum use	V20	82	4.13	.095	.857
Valid N (list wise)		82			

(Source: Computed data)

The above table 5 gives the descriptive statistics for the eight variables taken under the major variable "Superiority of Classroom Teaching". It can be understood from the above table that the variable "V13" has the maximum mean value of 4.33 with a standard error of 0.097 and standard deviation of 0.876. This shows that the variable "V13" is just agreeable by all the 82 respondents. Similarly it can also be seen that the variables "V14, V15, V16, V17 V18, V19 and V20" have mean values 4.02, 4.22, 4.01, 4.15, 4.23, 4.02 and 4.13 with different standard error and standard deviation. This shows that the variables "V14 to V20" are also just agreeable to the respondents.

Chi Square test between Education of respondents and teachers preference for classroom teaching

Table – 8: Null Hypothesis: There is no association between education of the respondents and teachers preference for class room teaching

	Teachers' Prefer class room teaching methods		Total
	Yes	No	

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Upto school level	2	2	4
UG level	47	3	50
PG Level	14	2	16
Above PG level	10	2	12
Total	73	9	82

Table – 9

	Value	df	Asymp. Sig. (2-sided)	Monte Carlo Sig. (2-sided)			Monte Carlo Sig. (1-sided)		
				Sig.	95% Confidence Interval		Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound		Lower Bound	Upper Bound
Pearson Chi-square	7.937[a]	3	.047	.063[b]	.058	.068			
Likelihood Ratio	5.633	3	.131	.153[b]	1.46	.160			
Fisher's Exact Test	6.817			.041[b]	.037	.045			
Linear-by-Linear Association	.000[c]	1	.983	1.000[b]	1.000	1.000	.567[b]	.557	.576
N of Valid Cases	82								

It can be seen from the above table that the Chi-square value is 7.937 with 3 degrees of freedom and p value 0.047. Therefore, the null hypothesis is rejected and alternative hypothesis is accepted i.e. the education of the respondents has influence on the teachers preference for classroom teaching. The teachers' preference for classroom teaching is dependent on the education of the respondents.

Chi square test between Annual Income of respondents and teachers preference for classroom teaching

Null Hypothesis: There is no association between annual income of the respondents and teachers preference for classroom teaching methods

Table – 10

	Teachers' Prefer class room teaching methods	Total

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	Yes	No	
Up to 2 lacs	45	5	50
2 to 5 lacs	17	1	18
5 to 10 lacs	10	1	11
Above 10 lacs	1	2	3
Total	73	9	82

Table – 11

	Value	df	Asymp. Sig. (2-sided)	Monte Carlo Sig. (2-sided)			Monte Carlo Sig. (1-sided)		
				Sig.	95% Confidence Interval		Sig.	95% Confidence Interval	
					Lower Bound	Upper Bound		Lower Bound	Upper Bound
Pearson Chi-square	10.152[a]	3	.017	.037[b]	.033	.040			
Likelihood Ratio	5.991	3	.112	.120[b]	.114	.127			
Fisher's Exact Test	6.472			.059[b]	.054	.064			
Linear-by-Linear Association	2.221[c]	1	.136	.147[b]	.140	.154	.105[b]	.099	.111
N of Valid Cases	82								

It can be seen from the above table that the Chi-square value is 10.152 with 3 degrees of freedom and p value 0.017. Therefore, the null hypothesis is rejected and alternative hypothesis is accepted i.e. the Annual income of the respondents has influence on the teachers preference for classroom teaching. The teachers preference for classroom teaching is dependent on the annual income of the respondents.

Table – 12: Chi-square values / p values of different cross tabulations

Variables	Chi-square value	P value	Degrees of freedom	Dependent or independent
Age Vs. Online Teaching is becoming the order of the day	2.954	.228	2	Independent
Age Vs. Teachers' Prefer class room teaching methods	5.668	.059	2	Independent

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Age Vs. Students' prefer online classes as they do not want to continue themselves in the classes	4.749	.093	2	Independent
Age Vs. Talented students can be taught on Online sessions while average students can be made to attend classroom sessions	5.880	.053	2	Independent
Education Vs. Online Teaching is becoming the order of the day	7.201	.066	3	Independent
Education Vs Students' prefer online classes as they do not want to continue themselves in the classes	3.998	.262	3	Independent
Education Vs. Talented students can be taught on Online sessions while average students can be made to attend classroom sessions	4.326	.228	3	Independent
Annual Income Vs Online Teaching is becoming the order of the day	4.060	.255	3	Independent
Annual income Vs Students' prefer online classes as they do not want to continue themselves in the classes	7.257	.064	3	Independent
Annual Income Vs. Talented students can be taught on Online sessions while average students can be made to attend classroom sessions	1.887	.596	3	Independent
Experience Vs. Online Teaching is becoming the order of the day	.729	.695	2	Independent
Experience Vs. Teachers' Prefer class room teaching methods	.940	.625	2	Independent
Experience Vs. Students' prefer online classes as they do not want to continue themselves in the classes	1.347	.510	2	Independent
Experience Vs. Talented students can be taught on Online sessions while average students can be made to attend classroom sessions	2.110	.348	2	Independent

The above table gives the chi-square values of fourteen cross tabulations. All the chi-square values clearly shows that the variables used in cross tabulation are Independent of each other.

Exploratory Factor Analysis for the variable "Class room teaching is superior than online methods"

Directly connect the teacher to the student	V5
No external disturbance during classroom sessions	V6
Extra knowledge acquisition occurs through the teacher	V7
It is a disciplined way learning	V8

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This method of learning has been practiced since time immemorial and found to be a successful one through times	V9
Opportunities to have practical exposures are available in classroom sessions	V10
Doubts clearance and seeking extra learning materials are possible instantaneously	V11
Continuous assessment of students and hence timely correction of erring students happens in a classroom environment	V12

It can be seen from the following table that Exploratory Factor Analysis has been applied for the major variable class room teaching is superior than online teaching and the KMO and Bartlett's test values are as under.

KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling	.897
Adequacy	373.822
Approx. Chi-Square	28
Bartlett's Test of SphericityDf Sig.	.000

The communalities values for the eight different sub variables under the major variable has been reported in the following table.

Communalities

	Initial	Extraction
Directly connect the teacher to the student	1.000	.711
No external disturbance during classroom sessions	1.000	.679
Extra knowledge acquisition occurs through the teacher	1.000	.706
It is a disciplined way learning	1.000	.706
This method of learning has been practiced since time immemorial and found to be a successful one through times	1.000	.823
Opportunities to have practical exposures are available in classroom sessions	1.000	.676
Doubts clearance and seeking extra learning materials are possible instantaneously	1.000	.657
Continuous assessment of students and hence timely correction of erring students happens in a classroom environment	1.000	.668

The variance explained by the eight sub variables (Initial Eigen values as well as Extraction sums of Squared Loadings and Rotation sums of Squared Loadings) have been brought in the following table.

Total Variance Explained

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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	4.977	62.208	62.208	4.977	62.208	62.208	2.817	35.207	35.207
2	.650	8.124	70.332	.650	8.124	70.332	2.810	35.125	70.332
3	.616	7.701	78.033						
4	.543	6.790	84.823						
5	.411	5.139	89.962						
6	.314	3.924	93.886						
7	.292	3.653	97.538						
8	.197	2.462	100.00						

The following is the rotated component matrix for the eight sub variables which produced two factors.

Rotated Component Matrix

	Component	
	1	2
Directly connect the teacher to the student	.730	.422
No external disturbance during classroom sessions	.788	.243
Extra knowledge acquisition occurs through the teacher	.363	.758
It is a disciplined way learning	.398	.740
This method of learning has been practiced since time immemorial and found to be a successful one through times	.808	.412
Opportunities to have practical exposures are available in classroom sessions	.265	.788
Doubts clearance and seeking extra learning materials are possible instantaneously	.377	.718
Continuous assessment of students and hence timely correction of erring students happens in a classroom environment	.713	.400

Sub Variable No	Factor 1	Factor 2
Directly connect the teacher to the student	0.730	
No external disturbance during classroom sessions	0.788	
Extra Knowledge acquisition occurs through the teacher		0.758
It is a disciplined way learning		0.740
This method of learning has been practiced since time immemorial and found to be a successful one through times	0.808	
		0.778

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Opportunities to have practical exposures are available in classroom sessions		0.718
Doubts clearance and seeking extra learning materials are possible instantaneously	0.713	
Continuous assessment of students and hence timely correction of erring students happens in classroom environment		

From the above table it can be seen that the first factor accommodates four sub variables and the second factor also accommodates four sub variables.

Taking into consideration the sub variables V5, V6, V9, V12 which go into the first factor, this factor has been named as "Merits of teacher student relationship". Similarly, taking into consideration the sub variables V7, V8, V10, V11 which go into the second factor, this factor has been named as "Benefits of classroom teaching methods" factor.

Exploratory Factor Analysis for the variable "Online teaching is preferred today"

Convenience of time available	V13
Discrimination between students do not exist	V14
Technology is used totally for this method of teaching	V15
Less expensive	V16
Services of experts in any academic field can be availed easily	V17
Online assessment can be done in speedier manner	V18
Satisfactory clearance of doubts by students is difficult	V19
Interaction between other student participants is very less thereby teaching time is put to optimum use.	V20

It can be seen from the following table that Exploratory Factor Analysis has been applied for the major variable online teaching is preferred today and the KMO and Bartlett's test values are as under.

KMO and Bartlett's Test

Kaiser-Meyer-Olkin Measure of Sampling Adequacy	.888
Bartlett's Test of Sphericity Approx. Chi-Square	301.672
Df	28
Sig.	.000

The communalities values for the eight different sub variables under the major variable has been reported in the following table.

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	Initial	Extraction
Convenience of time is available	1.000	.567
Discrimination between students do not exist	1.000	.701
Technology is used totally for this method of teaching	1.000	.711
Less expensive	1.000	.573
Service of experts in any academic field can be availed easily	1.000	.621
Online assessment can be done in speedier manner	1.000	.736
Satisfactory clearance of doubts by students is difficult	1.000	.776
Interaction between other student participants is very less thereby teaching time is put to optimum use	1.000	.579

The variance explained by the eight sub variables (Initial Eigen values as well as Extraction sums of Squared Loadings and Rotation sums of Squared Loadings) have been brought in the following table.

Total Variance Explained

Component	Initial Eigen values			Extraction Sums of Squared Loadings			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
1	4.560	57.006	57.006	4.560	57.006	57.006	3.267	40.844	40.844
2	.704	8.803	65.809	.704	8.803	65.809	1.997	24.965	65.809
3	.661	8.258	74.067						
4	.605	7.558	81.625						
5	.496	6.197	87.821						
6	.395	4.936	92.758						
7	.342	4.273	97.031						
8	.238	2.969	100.000						

The following is the rotated component matrix for the eight sub variables which produced two factors.

Rotated Component Matrix[a]

	Component	
	1	**2**
Convenience of time is available	.725	.203
Discrimination between students do not exist	.651	.527
Technology is used totally for this method of teaching	.818	.203

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Less expensive	.667	.358
Service of experts in any academic field can be availed easily	.706	.351
Online assessment can be done in speedier manner	.411	.754
Satisfactory clearance of doubts by students is difficult	.196	.859
Interaction between other student participants is very less thereby teaching time is put to optimum use	.706	.284

Sub Variable No	**Factor 1**	**Factor 2**
Convenience of time is available	0.725	
Discrimination between students do not exist	0.651	
Technology is used totally for this method of teaching	0.818	
Less expensive	0.667	
Service of experts in any academic field can be availed easily	0.706	
Online assessment can be done in speedier manner		0.754
Satisfactory clearance of doubts by students is difficult		0.859
Interaction between other student participants is very less thereby teaching time is put to optimum use	0.706	

From the above table it can be seen that the first factor accommodates six sub variables and the second factor accommodates two sub variables.

Taking into consideration the sub variables V13, V14, V15, V16, V17 & V20 which go into the first factor, this factor has been named as “Benefits of Online teaching” factor. Similarly, taking into consideration the sub variables V18, V19 which go into the second factor, this factor has been named as “Mixed benefits of online teaching method” factor.

Findings of the Study

The following are the findings of the study undertaken.

1. 54 respondents (65.9% of the total sample size of 82) are up to 25 years of age, 20 respondents (24.4% of the total sample) are between 26 to 40 years of age) while 8 respondents (9.8% of the total sample) are between 41-55 years of age.

2. 4 respondents (4.9% of the total sample size of 82) are educated upto school level, 50 respondents (61% of the total sample) are educated up to Undergraduate level, 16 respondents (19.5% of the total sample) are educated upto Post graduate level while 12 respondents (14.6% of the total sample) are educated above Post Graduate level

3. 50 respondents (61% of the total sample size of 82) are having annual income upto 2 lakhs, 18 respondents (22% of the total sample) are having annual income between Rs. 2 – 5 lakhs, 11 respondents (13.4% of the total sample) are having annual income between Rs. 5

– 10 lakhs while 3 respondents (3.7% of the total sample) are having annual income above 10 lakhs.

4. 57 respondents (69.5% of the total sample size of 82) are having experience up to 5 years, 13respondents (15.9% of the total sample) are having experience between 5 – 10 years while 12 respondents (14.6% of the total sample) are having experience above 10 years.

5. 69 respondents (84.1% of the total sample size of 82) are say Yes to ascertainment of students preference before allotting them for either online or classroom sessions while 13 respondents (15.9% of the total sample) say No to ascertainment of students preference before allotting them for either online or classroom sessions.

6. Eight variables have been taken under the major variable "Superiority of Classroom Teaching". The variable "V5" has the maximum mean value of 4.46 with a standard error of .09 and standard deviation of 0.819. This shows that the variable "Classroom teaching is superior because" is strongly agreed by al the 82 respondents. Similarly it can also be seen that the variables "V6, V7, V8, V9, V10, V11, V12" have mean values 4.10, 4.27, 4.26, 4.23, 4.21, 4.27 and 4.18 with different standard error and standard deviation. This shows that the variables "V6 to V12" are just agreeable to the respondents.

7. Eight variables have been taken under the major variable "Superiority of Classroom Teaching". The variable "V13" has the maximum mean value of 4.33 with a standard error of 0.097 and standard deviation of 0.876. This shows that the variable "V13" is just agreeable by all the 82 respondents. Similarly it can also be seen that the variables "V14, V15, V16, V17 V18, V19 and V20" have mean values 4.02, 4.22, 4.01, 4.15, 4.23, 4.02 and 4.13 with different standard error and standard deviation. This shows that the variables "V14 to V20" are also just agreeable to the respondents.

8. The teachers preference for classroom teaching is dependent on the education of the respondents.

9. The teachers' preference for classroom teaching is dependent on the annual income of the respondents.

10. Exploratory Factor Analysis applied for the first major variable "Superiority of Classroom Teaching" gets broken into two factors.

11. Exploratory Factor Analysis applied for the second major variable "Online teaching is preferred by students" also gets broken into two factors.

Limitations of the Study

1. A good sample size still cannot be considered as a best sample size because the study focusses on a new area.

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2. A serious limitation to the study is that the responses have been taken from people belonging to all walks of life (not only student community and academic fraternity).
3. Respondents have given their opinions with their limited exposure to online teaching methods as such a method started only during the just manifested Covid times.

Scope for further research

1. Only two variables viz., superiority of classroom teaching methods, students preference for online teaching methods have been considered in this study. Some more relevant variables can be identified and included in some fresh studies in the same area.
2. Another new study where only opinions of academic teaching fraternity and students community matter can be tried.

Conclusion:

Class room teaching methods have withstood the test of time. Online teaching methods will take some more time to settle-down. It is difficult to come to a finite conclusion as to which method is superior to the other. But time can answer this question clearly. Till then it is our bounden duty to run both online teaching methods as well as classroom teaching practices. Time will be the best decider on which is superior to the other and whether the existing practices should continue or else, they need some fine tuning. Till then it is always better for everyone involved to continue with both Class room as well as online teaching methods.

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