

“Impact of multimedia and e-education on the academic performance of school going children”

**SUMMARY SUBMITTED TO
BABASAHEB BHIMRAO AMBEDKAR UNIVERSITY
(A CENTRAL UNIVERSITY)
LUCKNOW**



**FOR THE AWARD OF THE DEGREE OF DOCTOR OF PHILOSOPHY IN
HOME SCIENCE**

(HUMAN DEVELOPMENT AND FAMILY STUDIES)

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2018

SUMMARY

Technology is also changing the life of schools—it plays an increasingly important role in teaching and learning. The media has shown possibly significant impacts, both positive and negative, on children's subjective, social, behavioral and cognitive development. Multimedia & e-education has become an increasingly popular learning approach in education due to the rapid development of information and communication technologies (ICT). Its quick development has been encouraged by the Internet and massive opportunities in worldwide education. Multimedia is the integration of numerous types of media. This incorporates text, graphics, sound, video, and so on.

The media has shown possibly significant impacts, both positive and negative, on children's subjective, social, behavioral and cognitive development. Multimedia & e-education has become an increasingly popular learning approach in education due to the rapid development of information and communication technologies (ICT). Its quick development has been encouraged by the Internet and massive opportunities in worldwide education. Multimedia is the integration of numerous types of media. This incorporates text, graphics, sound, video, and so on.

The word multimedia originates from the Latin word "multus" which means "numerous" and media which means "middle" and "center". Multimedia in general sense therefore means "multiple intermediaries" between sources and sink of information or multiple means by which information is stored, transmitted, presented and perceived. Multimedia is communication that uses any combination of various media, it may or may not involve computers.

E-education is electronic mode of information sharing and transmission which may not really include physical contact among educator and instructor. The term "e-education" refers to the application of Internet technology to the delivery of learning encounters. E-education takes place in formal electronic classrooms, on corporate intranets utilized for just-in-time training, sound and video teleconferencing and in a variety of other technology mediated learning spaces. E-education can be instituted as 'the utilization of new Multimedia Technologies and the Internet to enhance the quality of learning by facilitating access to resources and services'.

Furthermore, e-education also represents the facilitated remote exchanges of thoughts and ideas. Multimedia can be interpreted as diverse electronic medium, for example, sound, video, movement, content and designs. Multimedia and e-education opens up the whole universe of knowledge and information and allows learning to take place beyond the conventional limits and assets of the school.

The main focus of this study is effects on multimedia tools and their support the e-education environment. The present study about the role and impact of multimedia & e-education in children's educational performance an analysis on the collected data has been made to find out the advantages of multimedia and e-education resources and their impact on educational development of the school going children's. The study planned on the basis of various objectives-

- To explore the use of multimedia method and e-education in schools of lucknow city.
- To asses the impact of multimedia methods & e-education provided by the schools on the academic performance of the students.
- To assess the attitude of teachers & students towards e-education & use of multimedia in their studies.
- To compare the multimedia methods & e-education facilities provided by the different schools (including CBSE, ICSC, UP board).
- Software for students on "How to make the use of multimedia & e-education more effective for learning students.

Chapter 1 dealt with the introduction part it includes the multimedia, multimedia Learning, multimedia Instruction ,e-education, theoretical framework of the study ,hypothesis and rational of the study.

Chapter 2 dealt with the review and writing of the investigation, the distinctive perspectives of writers about the examination was separated in different areas.

- The role of multimedia method and e-education
- The role of using multimedia methods & e-education
- Attitudes towards e-education & use of multimedia
- Impact of multimedia methods & e-education
- Comparison of multimedia facilities vs. traditional mode facilities

Chapter 3 dealt with material and method proposed in the synopsis a study on, “Impact of multimedia and e-education on the academic performance of school going children” was conducted for gaining the overall information about the study. The study encompassed total 450 respondents to be originally targeted for the study. Following this division 300 students and 150 teachers from different schools were selected in this study. The schools were divided from ICSE board, CBSE board and UP board in Lucknow .

Chapter 4 dealt with the result and discussion of the study, Statistical Analysis was done through frequency, percentage, ANOVA test, chi square, correlation and regression.

TESTING OF HYPOTHESIS OF THE STUDY

Ho1: There is no significance relationship between categories of board across gender

It was observed that there was no statistically significant relationship with category of boards and gender. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

Ho1: There is no significance relationship between categories of board across age

It was observed that there was no statistically significant relationship with category of boards and class. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

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H0 1: There is no significant relationship between awareness and gender

It was observed that there was no statistically significant relationship with awareness gender. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

H0 1: There is no significant relationship between productivity and gender

It was observed that there was no statistically significant relationship with productivity and gender. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

H0 1: There is no significant relationship between learning process and gender

It was observed that there was no statistically significant relationship with learning process gender. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

H0 1: There is no significant relationship between awareness and board

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H0 1: There is no significant relationship between learning process and board

It was observed that there was statistically significant relationship with learning process and board. So, we can say that null hypothesis rejected and alternative hypothesis was accepted and simultaneously proven.

H01: There is no correlation between Awareness, Productivity & Learning Process and academic performance.

It was observed that there was statistically significant relationship with three dimensions-Awareness, Productivity & Learning Process and Academic Performance. So, we can say that null hypothesis rejected and alternative hypothesis was accepted and simultaneously proven.

H01: There is no significant relationship between awareness, and academic performance.

It was observed that there was no statistically significant relationship with dependent variable. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven.

H01: There is no significant relationship between productivity and academic performance.

It was observed that there was statistically significant relationship with dependent variable. So, we can say that null hypothesis rejected and alternative hypothesis was accepted and simultaneously proven.

H01: There is no significant relationship between learning Process and academic performance.

It was observed that there was no statistically significant relationship with dependent variable. So, we can say that alternate hypothesis rejected and null hypothesis was accepted and simultaneously proven

MAJOR FINDINGS OF THE RESEARCH

- It was found that the number of total respondents was 300 in which (59.3%) respondents were Boys and (40.7%) respondents were Girls.
- The findings of the study show that majority of students (45.2%) were 11-12 year old and (53.8%) were 13-14 year old.
- It was found that the number of total respondents were 300 in which 100 (33.3%) respondents were from ICSE board, 100 (33.3%) respondents were from CBSE board and 100 (33.3%) respondents were from UP board.
- The findings also show that (38.3 %) respondents were from 7th Class and (29.4%) were from 8th. Class and (31.4 %%) respondents were from 9th Class.
- The findings of the study show that majority of teachers (48.7%) were males and (51.3%) were females.
- The findings also show that (33.3%) respondents were from ICSE board schools, (33.3%) were from CBSE board schools & (33.3%) were from UP board schools.
- Regarding availability computer In ICSE board (58.0%) respondents said 'available' and (42.0%) respondents said 'not available'. In CBSE board (62.0%) respondents said 'available' and (38.0%) respondents said 'not available'. In UP board (16.0%) respondents said 'available' and (84.0%) respondents said 'not available'.
- Regarding availability of projector In ICSE board (92.0%) respondents said 'available' and (8.0%)0 respondents said 'not available'. In CBSE board (100.0%) respondents said 'available' and (0.0%) respondents said 'not available'. In UP board (60.0%) respondents said 'available' and (40.0%) respondents said 'not available'.
- Regarding availability of smart classroom In ICSE board 36.0% respondents said 'available' and 64.0% respondents said 'not available'. In CBSE board 44.0% respondents said 'available' and 56.0% respondents said 'not available'. In UP board 8.0% respondents said 'available' and 92.0% respondents said 'not available'.

- Regarding usability of Multimedia presentation In ICSE board 92.0% respondents said 'yes' and 8.0% respondents said 'no'. In CBSE board 100.0% respondents said 'yes' and 0.0% respondents said 'no'. In UP board 34.0% respondents said 'yes' and 66.0% respondents said 'no'.
- Regarding usability of Multimedia presentation (PPTs, PPS, Poster, Collage etc.) In ICSE board 92.0% respondents said 'yes' and 8.0% respondents said 'no'. In CBSE board 100.0% respondents said 'yes' and 0.0% respondents said 'no'. In UP board 34.0% respondents said 'yes' and 66.0% respondents said 'no'.
- Regarding category of board (29.7%) of the boys and (39.0%) of girls were ICSE board While (36.8%) of boys and (28.0%) of girls were CBSE board and (33.5%) boy and (33.1%) girls were UP board.
- Regarding category of board (26.3%) respondents belonging to age of 11-12 years and (39.3%) respondents belonging to age group of 13-14 years were ICSE board While (41.6%) respondents belonging to age of 11-12 years and (26.4%) respondents belonging to age group of 13-14 years were CBSE board While (32.1%) respondents belonging to age of 11-12 years and (34.4%) respondents belonging to age group of 13-14 years were UP board.
- Regarding category of board (25.9%) respondents were from 7th class, (50.0%) respondents were from 8th class and (37.9%) were from 9th class in ICSE board while (50.0%) respondents were from 7th class, (30.0%) respondents were from 8th class and (15.8%) were from 9th class in CBSE board while (24.1%) respondents were from 7th class, (31.5%) respondents were from 8th class and (46.3%) were from 9th class in UP board.
- It was found that there is no significant difference between gender for the variables of awareness, productivity and learning process on the academic performance of school going children; as the value of significance comes out to be more than 0.05.
- It was found that there is significant difference among Boards (ICSE, CBSE & UP Board) for the variables of awareness, productivity and learning process having impact on the academic performance of school going children; as the value of significance comes out to be less than 0.05.

- It was revealed that gender was a factor that influenced the academic performance. Majority (59.3 percent) of respondent those who were male while the majority (40.7 percent) of those who were female having impact on the academic performance. It can be concluded that there is no significant difference between groups (Boys and Girls) for all the variables of multimedia and e-education having impact on the academic performance of school going children.
- It was revealed that (59.3%) respondents were Boys and 122 (40.7%) respondents were Girls. It can be concluded that there is significant difference among groups (Boards: ICSE, CBSE & UP Board) for all the variables of multimedia and e-education having impact on the academic performance of school going children.
- On comparing the study correlation among Awareness, Productivity & Learning Process (Independent variables) indicates that there was a significant and positive correlation with one another also.

CONCLUSION

In this study highlights the impact of multimedia and e-education learning on the academic performance of children's. Many students are not well ready to take the challenge of studying through multimedia and e-education learning, because of the unexpected complexities of the information and communication technologies.

A major contribution of this study was to identify the major factors of the impact of multimedia and e-education learning on the academic performance of school going children. It can be concluded that, multimedia and e-Education related learning methods have contributed to the enhancement of the academic performance of students at the school levels. It can be concluded that with the help of Multimedia and e-Education learning has the great positive influence on the quality of education.

As the analysis of data gathered on four hundred fifty people, has shown that, It can be said that multimedia and e-education related learning methods have contributed to the enhancement of the academic performance of students at the schools levels.

RECOMMENDATION FOR FURTHER RESEARCH

This research study analyzed a number of various extraordinary purposes of perspectives about the effect of multimedia and e-education on academic performance of school going children. In spite of the fact that it was found that specific issues have not yet been properly addressed to multimedia and e-education usage forms, as the prime focal point of the research socio demographic characteristics, attitude and perception of student and teacher and impact of the multimedia methods and e-education in schools The following are the recommendations of this study:

- i.** Critical factors, for example, institutional issue, administration issue, educational variables, mechanical issue, interface configuration issue, assessment issue, and resource support issue and the factors within each issue have not yet been investigated with detail coverage.

- ii.** The need to do detail research including contextual investigations based on surveys questionnaire including different learning organizations which will ultimately give a better understanding of impact of multimedia and e-education aspects within implementation process.