A Study of Effectiveness of Teaching through E-content on The Educational Achievement of the Students in Social Science Subject

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Abstract:

The aim of the Present Study Was to assess the effectiveness of teaching through E-content as Compared classroom teaching. In this study, teaching method was selected as independent variable which was of two types such as in one type teaching method through E-content and in the second type if was traditional method for the Present research the experimental method was used in Which the students of the experimental group wear taught by E-content teaching method and those of controlled group were taught through the traditional method of classroom teaching. In both the experiments were carried out on two different areas in order to increase the comprehensiveness of the experiment. Experiment-1 was carried out on the students of Standard-x of the urban School and Experiment-2 was carried out on the students of STANDARD-x of the rural School. In both the experiments the effect of the independent variable was observed on two dependent variable. Achievement in social science and retention were the dependent variables. In experimental one, two equal groups were formed by administering the self constructed test of social science based on STANDARD-viii and ix in two classes of standard x of the selected secondary school of urban area and on the basis of the obtained scores by one to one pair out of this groups, one was considered as controlled group and the other as the experimental group. And teaching work was undertaken by two different methods as mentioned above. For teaching through E-content the teaching-learning material was prepared. For this the teaching programme through E-content was prepared for two selected units of social science of standard.10. In experimental group, teaching was carried out by E-content and in control group by traditional classroom teaching, For experiment-2,in selected rural school, two groups of standard 10 were formed by the method as mentioned above and teaching was carried on both groups-Experimental and controlled group. In both the experiments the researcher implemented the experimental design namely 'Two equal group only post test'. At the end of the teaching work in both the groups of both the experiments post test was administered same post test was administered after four weeks again as the Retention test. Thus scores were obtained for both the dependent variables: Achievements in Social Science test and Retention. And with the help of these scores for testing hypotheses suitable statistical techniques were used.

Keywords: *E-content and Achievement*

1. Introduction

In the process of education, the fundamental changes are occurring continuously and along with that the roles of the teacher and taught also change. Till yesterday, the teachers were imparting education directly, but due to the emergence of computer and other audio-video media the student has started to get education at his own time. Thus, in order to satisfy the needs of the students in some matters the improvements have become necessary in these media. The researches related to computer such as CAL, CAI, web based learning, E-content have been undertaken in foreign countries, India and Gujarat. The investigator has undertaken the present research study with the purpose to know the effect on the achievement of the students in the subject of social science while teaching through E-content as it is his subject.

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2. Objectives of the study
Following are the objectives of the study :
1. To construct the E-content learning material on two units of the selected content of social science subject of standard. X.
2. To prepare the E-content programme by collecting the E-content material.
3. To construct the sef-made post test to assess the effect of E-content programme.
4. To assess the effect on Educational Achievement of the students of standard. X of teaching through E-content as compared to traditional class room teaching.
5. To assess the effect on Educaitonal Achievement of the students of standard. X of Teaching through E-content as compared to traditional class room teaching in context to area.
6. To assess the effect of retention on Educational Achievement of the students of standard. X of teaching through e-learning.

3. Hypotheses of the Study
Hypotheses of the present study are as follows:
1. Ho1 There will not be the significant difference between the mean scores of Achievement test of social science subject of the students getting traditional teaching and of those getting Teaching through E-content in schools of urban area.
2. Ho2 There will not be the significant difference between the mean scores of Achievement test of social science subject of the students getting traditional teaching and of those getting teaching through in schools of Rural area.
3. Ho3 There will not be any significant difference between the mean scores of the difference between the scores of the post test and those of the retension test of social science subject of the students getting traditional teaching and of those getting teaching through E-content in schools of urban area.
4. Ho4 There will not be any significant difference between the mean scores of the difference between the scores of the post test and those of the retension test of social science subject of the students getting traditional teaching and of those getting teaching through E-content in schools of Rural area.

4. Method of the study
As the relation of the present study was with the future situation, the experimental method was used for the research work.

5. Experimental Design
In the present study, two equal groups controlled group and experimental group were formed on the basis of the obtained scores on a test of social science subject of standard. VIII and IX. In the present research 'Two groups only post test Equal Group' design was used.

6. Population and Sample Selection
In the present study, the students of standard X of the secondary schools of Gujarati medium of middle Gujarat of year 2007-08 were included as population. Group selection In the present study the test of social science subject of standard. 8 and 9 was administered to the students of standard. 10 and on the basis of Mean, S.D. the equal groups were formed for the experiment. Two equal groups were formed in two experiments as shown in Table 1.

Table 1: Number of students of both the groups of the schools of both the areas

Experiment No.	Area	Controlled Group. No. of students	Exp. Group. No. of students	Total No. of students.
1	Rural	31	30	61
2	Urban	32	33	65
Total		63	63	126

7. Preparation of E-content based Teaching Programme
E-content based teaching programme was based on two units of Indian cultural Heritage of social science subject of standard. X.

8. Construction of Tools
The investigator constructed the (final) complied test based on two units of social science subject of standard. X.

9. Data Collection
In the present study, at the end of the experiment, the students were given the compiled test of the social science and the scores were obtained. In order to assess the memory of long period (retention) after four weeks, the same test was administered to the same students and the scores were obtained. The difference of scores of these two tests was also obtained.

10. Classification and Analysis of Data
In the present study statistical techniques like Mean (M), standard deviation (SD) and standard error were calculated, Area wise and Group-wise scores of post test and Retention test. Moreover critical Ratio (CR) was used to compare the mean scores of post test and retention test administered area wise and group wise. Hypotheses were tested in the present study as follows:

Table 2: Testing of Hypotheses

No.	Hypothesis	t-value	Level of Significance	Acceptance or Non-Acceptance
1	Ho1 There will not be the significant difference between the mean scores of Achievement test of social science subject of the students getting traditional teaching and of those getting Teaching through E-content in schools of urban area. .	2.88	0.01 Significant	Not Accepted
2	Ho2 There will not be the significant difference between the mean scores of Achievement test of social science subject of the students getting traditional teaching and of those getting teaching through E-content in schools of Rural area	2.62	0.01 Significant	Not Accepted
3	Ho3 There will not be any significant difference between the mean scores of the difference between the scores of the post test and those of the retentions test of social science subject of the students getting traditional teaching and of those getting teaching through E-content in schools of urban area	0.44	0.01 Not Significant	Accepted

4	Ho4 There will not be any significant difference between the mean scores of the difference between the scores of the post test and those of the retentions test of social science subject of the students getting traditional teaching and of those getting teaching through E-content in schools of Rural area	0.86	0.01 Not Significant	Accepted

11. Findings or Conclusions

The findings of the present study are as follows

1. There is significant difference between the mean scores obtained in post test by the students of experimental group and controlled group of urban area and this difference is in favour of the experimental group. It means that teaching method through E-content is superior to traditional classroom teaching.
2. There is significant difference between the mean scores obtained in post test by the students of experimental group and controlled groups of rural area. And this difference is in favour of the experimental group. It means that teaching method through E-content is superior to traditional classroom teaching.
3. There is no significant difference between the mean scores of retention of the students of teaching through E-content group and traditional classroom Teaching group of urban and rural area.

12. Conclusion

In the present study the effect of teaching through E-content on the educational achievement of social science subject of the students. Though from the point of view of the content, looking at the few units and less no. of students, the results of the experiment cannot be applied generally. Even though, this study of teaching through E-content will motivate the subject teachers, students and Interested people in various subjects. The investigator has undertaken the study with a hope that this small effort will be useful.

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