

The effectiveness of Concept Attainment Model in teaching Social Science subject

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Abstract:

Now a day it is very important to clear the basic concept of the particular word for the students. So, it is very important to do teaching-learning process through any teaching-learning material or by using any teaching model. So, the present study is planned to study the effectiveness of Concept Attainment Model over traditional teaching to teach Social Science to class IX students of Gujarati medium school. The study is the implementation of prepared lesson plans based on concept attainment model and traditional teaching standard for the students. The Experimental research simplifies what will happen after conducting the experiment. So, the researcher, has selected Experimental research method for the present study. The result of this study explains that the teaching model is proved very helpful and effective for the achievement of the students.

Keywords: Effectiveness, Concept attainment Model

1. Intoduction

Positive teacher-student relationships promote a sense of school belonging and encourage students to participate cooperatively. Students develop the confidence to experiment and succeed in an environment where they are restricted by the fear of failure.

The most recent concept of teaching is to teach the child to learn, how to discover, how to think, and how to inquire. The emphasis is upon, 'know how' rather than 'know what'. In the modern world, knowledge increase at a terrific pace and social change are very rapid. Education can no longer be taken as the preparation of a finished product. During the last two decades, many new methods of teaching and training have been developed, tested, modified and adapted to different kinds of teaching-learning situations. Model of education is an innovative method of teaching. There is need to direct efforts towards transformation of teaching methods right up to the development of science and technology, as we are living in the high-tech era curriculum and material research along with teacher orientation to receive attention. The ultimate responsibility of information processing has been enshrined by the society in teachers. Thus, a theory of teaching meteded learner behaviour, intellectual developments and acquisition of knowledge and specific mental processes like, reasoning, logical thinking, deductive reasoning and scientific creativity be primary concerns for effective and efficient information processing.

A variety of teaching approaches have been evolved to design instruction but which approach/ model of teaching is most appropriate having a better impact, active, efficient and exciting can only be answered through research keeping each model's instructional nurturing effects in view.

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2. Statement of the Problem

The researcher has decided to undertake the study with the objective of testing the effectiveness of Concept Attainment Model in teaching Social Science to students of class 9th where studying of the subject of Soial Science is considered to be difficult and understanding of students in the subject is also very low. Therefore, The Statement of the Problem is 'The effectiveness of Concept Attainment Model in teaching Social Science subject'

3. Definition of the Terms

The researcher elaborated the conceptual and operational definitions of important words of the research problem as follows:

3.1 Concept Attainment Model

3.1.1 Dictionary Definition

It is designed to clarify ideas and to introduce the aspects of content. It engages students in formulating the concept through the use of efficient examples.

3.1.2 Operational Definition

The prepared lesson plan of selected items based on the syntax of is called concept attainment model.

4. Objectives

The objectives of the present study were as follows

1.To study about the comparative results of Concept attainment model method and traditional teaching method in Social Science of standard 9th with reference to academic achievement.

5. Hypothesis

The researcher has proposed to conduct his research work on the basis of the following hypothesis.

Ho₁ There is no significant difference between the Mean score of Achievement's post test between experimental and controlled group.

6. Research Method

The present study is planned to study the effectiveness of Concept Attainment Model over traditional teaching to teach Social Science to class IX students of Gujarati medium school. The study is the implementation of prepared lesson plans based on concept attainment model and traditional teaching method to selected Social Science topics to Gujarati medium students for teaching standard 9th students. The Experimental research simplifies what will happen after conducting the experiment. So, the researcher, has selected Experimental research method for the present study.

In the present study, pre-test and post-test was employed. It involved two groups of students, one experimental group and one control group. The Experimental Group was taught some topics of Social Science through Concept Attainment Model and the Control Group was taught through Traditional Teaching Method. The design comprised three stages. The first stage involved pre-testing of all the students of two groups on achievement in Social Science. The second stage involved treatment of one week. The experimental method consisted of teaching of Social Science through Concept Attainment Model to Experimental Group, and through Traditional Teaching Method to Control Group. In the third stage, the students were post tested on achievement in Social Science.

7. Experimental Research:

In the simplest form, experimental research involves comparing two groups on one outcome measure to test some hypothesis regarding causation. It helps in identifying the basic relationship between the variables under controlled conditions. It establishes a systematic and logical association between manipulated factors and observed effects. The researcher defines a problem and proposes tentative

answer or hypothesis. The researcher formulates the hypothesis and accepts or rejects it in the light of controlled variable relationship he/she has observed.

8. Population

All the students studying in standard 9th in Visavadar city is the population of this study.

9. Sampling Method and Sample

By Rendom and Cluster sample method, the students of Sardar Patel Vidhya Mandir, Kalsari, Visavadar has been selected for experimental and control group respectively. In order to present a picture of the school that were selected for the present study, some of its features are listed below:

- 1. The sample size should be optimal.
- 2. The sample size should be small enough to permit a focused study of the area under investigation.

In present, study the researcher has takn students of class 9th from Sardar Patel Vidhya Mandir, Kalsari, Visavadar as a Sample selected for the study consists of group of 80(40+40) students of standard 9th. In this way 40 students selected for experimental and 40 for the control group.

10. Limitation

The limitations and delimitations of the present study are given below.

- 1. In the present study, the researcher has formulated the concept attainment model in Social Science subject only for the students of class 9th
- 2. The present study is delimited to selected concepts of Social Science in particularly Geography.
- 3. The present test is delimited to only Gujarati medium students.

11. Research Tool for Data Collection

The researcher will prepare following tools for accomplishment of the research.

- 1. Lesson transcript based on Concept Attainment Model.
- 2. Lesson transcript based on Traditional Teaching Method.
- 3. Pre-Test for the lesson, was prepared by the researcher to understand the intelligence level of the students about the topic.
- 4. Post Test for the lesson was prepared by the researcher to understand the knowledge attained by the students about the topic taught through Concept Attainment Model.

12. Procedure for data collection

Researcher has followed following procedure for data collection First of all Students selected for sample was divided in two equal groups according to their IQ test which are given below:

- 1. CAM Method First Group
- 2. TT Method Second Group

Researcher, had first conducted Pre-Test for both groups, following which an Introduction to the Topic-Major Rivers of India was highlighted to children, for both the groups. The very next day, difference between Himalayan rivers and Peninsular rivers was taught following different rivers originating from Himalaya was taught i.e., River Ganga and Tributaries, River Brahmaputra, River Indus and Tributaries were taught in detail to both the groups. Next day, researcher took the topic of Peninsular Rivers and the major Rivers originating in the region i.e., River Krishna, River Kaveri, River Godavari, River Mahanadi was briefed to both the groups. Following day researcher went up to take the entire revision of the topics taught and also clarified the doubts of the students from both the groups. Finally, Post Test was conducted for both the groups.

The researcher, has also prepared the lesson plan for the topics conducted in both the methods

2. Traditional teaching Method

13. Procedure for Data Analysis and Statistical Measures

After the completion of the data collection, all the answer sheets were checked by the researcher. Collected Data were classified according to variables and frequency distributions were also prepared for different groups. Based on the frequency distribution of each group, statistical measurements as below were carried out.

- Mean, Standard Deviation.
- Significance of difference of means between groups (t-Value).
- Presentation of graphs as required per group.

14. Testing of Hypothesis

Ho1 There is no significant difference between the Mean score of Achievement's post test between experimental and controlled group.

For testing this hypothesis, the critical ratio was obtained from the mean score of the students of standard 9th of Experimental and Controlled group shown in table 1 Statistical Calculation of Score on Post-test of Students of Experimental Group and Controlled Group

Table 1: Critical Ratio (CR) on the basis of Scores of Students in teaching based on Experimental
& Controlled basis

Group	Number	Mean	Variance	SED	Mean Diff	Critical Ratio	Significant or not
Experimental	40	28.03	1.27	2.44	4.98	2.035	Significant
Controlled	40	23.05	4.70	2.44	4.90	2.033	Significant

As shown in table 1 the Critical Ratio scores of students of standard 9th of Experimental and Controlled group is 2.035 which is more than the expected value of 1.96 at 0.05 level of significance therefore the null hypothesis "There is no significant difference between mean score of students of Experimental and Controlled group so the null hypothesis is rejected.

It refers that the mean score of Experimental group is 28.03 and the mean score of Controlled group is 23.05. Thus, there is a significant difference in Post-test between the Experimental and Controlled group of students of 9th standard of CBSE board. Hence, learning of students of standard 9th of Experimental group is higher than Controlled group.

15. Findings of study

From the interpretation of the data, the researcher has established following findings:

• The students of experimental group have more academic achievement than students of controlled group.

16. Implications of the study

The educational implications of the present research have been given as under.

- The present study will be helpful to the teachers who want to teach concepts through concept attainment model.
- The present study will be helpful to the teachers to prepare the material based on the concept attainment model.
- It will be helpful to the lecturers of the college to make the student teachers prepare lesson plans based on concept attainment model.

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- The present study will be helpful to teach Social Science subjects by using concept attainment model.
- The present study will be helpful to teach certain topic of Social Science subject by using concept attainment model.
- The present study will be helpful to improve achievement level of student in Social Science subject by using concept attainment model.
- The present study will be helpful to improve interest of student in Social Science subject by using concept attainment model.

17. Future Recommendations

This problem has broad scope. To broaden the scope of the present study, certain other areas can be considered.

- To Study of Effectiveness of Concept Attainment Model with Reference To intelligence in the Hindi Subject.
- To Study of Effectiveness of Concept Attainment Model with Reference To intelligence in the Maths Subject.
- To compare the Effectiveness of Concept Attainment Model and Advance Organization Model in the Science Subject.
- To compare the Effectiveness of Concept Attainment Model and Advance Organization Model in the English Subject.

18. Conclusion

Finally, we can conclude that teaching through CAM was more effective than the Traditional Teaching Method for selected topic of Social Science Subject. This study helps to reaffirm the proven fact that experimental methods of teaching are mostly superior to traditional methods. So, such type of studies should be encouraged in future. The whole experience was made memorable for researcher by the help & support extended by the school, the students, the teachers and the experts. And not to forget the most precise and invaluable guidance provided by the respected guide.

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