CHAPTER-V

FINDINGS, CONCLUSIONS

EDUCATIONAL IMPLICATIONS AND

SUGGESTIONS FOR FURTHER

RESEARCH

- Findings of the Study
- Conclusions
- Educational Implications of the Study
- Suggestions for Further Research
CHAPTER-V

FINDINGS, CONCLUSIONS, EDUCATIONAL IMPLICATIONS AND SUGGESTIONS FOR FURTHER RESEARCH

In the previous chapter the data analysis, interpretation and discussion of the results have been presented. In this chapter an attempt has been made to highlight the major outcomes of the study. Hence, in the light of these outcomes the conclusion will be presented under three subsections. That is findings of the study, educational implication of the findings and suggestions for further research.

5.0.0 FINDINGS OF THE STUDY

On the basis of the present study the investigator has drawn following findings regarding the effectiveness of Concept Attainment and Advance Organizer Models on students' achievement in Economics:

1. No significant difference was found in the mean achievement scores, on criterion achievement test in Economics, of two groups of students, one taught Economics with Concept Attainment Model and the other with Conventional Method of teaching, at pre-test stage.

2. The group of students taught Economics through Concept Attainment Model has scored significantly higher on the criterion achievement test than the group of students taught Economics through conventional method, at post-test stage.

3. The group of students taught Economics through Concept Attainment Model has scored significantly higher gain on the criterion achievement test than the group of students taught Economics through conventional method, at post-test stage.

4. No significant difference was found in the mean achievement scores, on criterion achievement test in Economics, of two groups of students,
one taught Economics with Advance Organizer Model and the other with Conventional Method of teaching, at pre-test stage.

5. The group of students taught Economics through Advance Organizer Model has scored significantly higher on the criterion achievement test than the group of students taught Economics through conventional Method, at post-test stage.

6. The group of students taught Economics through Advance Organizer Model has scored significantly higher gain on the criterion achievement test than the group of students taught Economics through conventional method, at post-test stage.

7. No significant difference was found in the mean achievement scores, on criterion achievement test in Economics, of two groups of students, one taught Economics with Concept Attainment Model and the other with Advance Organizer Model, at pre-test stage.

8. The group of students taught Economics through Concept Attainment Model has scored significantly higher on the criterion achievement test than the group of students taught Economics through Advance Organizer Model, at post-test stage.

9. The group of students taught Economics through Concept Attainment Model has scored significantly higher gain on the criterion achievement test than the group of students taught Economics through Advance Organizer Model, at post-test stage.

5.1.0 CONCLUSIONS

On the basis of findings the following conclusions have been drawn by the investigator:

This study shows that the post-test achievement means scores of the experimental and control groups, controlling for intelligence and socio-economic status, differ significantly in favour of the experimental groups. This implies that the students who were taught Economics through Concept Attainment Model and Advance Organizer Model have shown significant improvement in their achievement in Economics than the students who were
taught through Conventional method. This suggests that Concept Attainment Model and Advance Organizer Model contribute in raising the achievement of students.

The group of students taught Economics through Concept Attainment Model has shown significantly higher achievement than the group of students taught Economics through Advance Organizer Model as well as through Conventional Method. Also, the group of students taught Economics with Concept Attainment Model has shown significantly higher gain scores than that of those who were taught with Advance Organizer Model as well as with Conventional Method of teaching. So, it can be said that CAM is better than AOM and Conventional Method of teaching as far as the achievement in Economics in concerned.

The group of students taught Economics through Advance Organizer Model has shown significantly higher achievement and also significantly higher gain scores than the group of students taught Economics with Conventional Method of teaching. So, it can be stated that Advance Organizer Model is better than Conventional Method of teaching.

5.2.0 EDUCATIONAL IMPLICATIONS OF THE STUDY

The different methods or techniques for imparting instruction in a formal classroom setting have been continuously changing in which the old ones are replaced by the new ones. This activity has not come to an end. But the researchers in the field of pedagogy of teaching have established beyond doubt that no single method is suitable to teach all subjects, all topics or even a particular topic. Although certain teaching methods are better than others, there is not any specific type which may be termed as good-teaching that fits universally. It shows that different methods are required to teach different subjects and to teach students with different capabilities. Various theories have accumulated in different fields of knowledge with the passage of time. Learning by individuals means learning of some of the theories in one or more fields, but these theories are nothing except correlation between two or more concepts. Learning of concepts form a major component of the learning
process. In the recent past, various principles were theorised regarding concept learning. Recently some models have been developed as structures on these theories. These models sketch a sequence of various activities involved in teaching-learning process. This sequence facilitates learning by individuals.

In the present study, Bruner's Concept Attainment Model and Ausubel's Advance Organizer Model were used. Both these models facilitate learning of concepts through different strategies. Bruner's Concept Attainment Model facilitates learning by reducing the stimuli, coming from the environment, into various categories. Ausubel's Advance Organizer Model makes the process of learning more effective and meaningful. The models helps in developing the interest of the learners to understand the concepts very well and also to help the learner to discriminate the new concepts from previously learnt concepts. In this way, Ausubel's Model makes new learning easier by linking up the new information with the previously existing relevant material in the minds of the learners through "Advance Organizers", that is, through introductory notes. It is therefore, helpful to recall the learnt material quickly and correctly. On the other hand, Concept Attainment Model helps in making each and every concept very clear in the mind of learner. It enhances learning by understanding instead of rote memory. Logical thinking of learner can be developed with the help of CAM.

The present study, undertaken to determine the effect of the two models from the information processing family of models, is significant in giving us tried and established models of teaching to be followed in the teaching/learning process of concepts.

The conclusions emanating from the study have important implications for day to day class room teaching:

(1) The results indicate that models approach to the teaching of Economics may be introduced for the benefit of the students.

(2) The text books of Economics, should also be modified accordingly.

(3) It is further implied that pre-service and in-service teacher training programmes should include training in models of teaching also.
(4) The models approach can be used in day to day teaching to achieve various objectives. It makes the teaching-learning process interactive, lively and interesting.

(5) Both these models, Bruner's Concept Attainment Model and Ausubel's Advance Organizer Model, aim at improving the teaching method and teaching learning process. They do so because they incorporate the essentials of verbal conditioning, that is, feedback or reinforcement which have since been found to be very effective in teaching, as well as, learning. As such, the two models should be included in the B.Ed. curriculum so that the teacher trainees are made fully conversant with the use of these Models.

(6) The findings of the present study amply demonstrates that the students taught through Concept Attainment Model and Advance Organizer Model achieve significantly higher than the students taught through conventional method. One of the major implication of the findings is that equality and clarity of learning outcome can be a goal of education. In order to achieve this goal of education, it becomes imperative for the teacher to make each and every new concept clear and understandable to the students. Linking the new knowledge with the previous one is also necessary. Usually, there involved some extra expenditure time and hardwork but at the last all this is compensated in terms of high achievement of students.

(7) Since both CAM and AOM are group-based teacher-paced instructional strategy, the significant role of teacher cannot be underestimated if these models are to be used effectively in actual classroom conditions. It, therefore, become essential the teacher-educators should incorporate the theoretical and practical aspect of these strategies in teacher-training courses as well refresher/orientation courses at all levels.

(8) Even after providing necessary training to teachers in the use of these models and allowing them some freedom in organizing their classes and resources, it is mere impracticable ideal to expect
teachers to prepare and provide all the necessary material to the students. It is, therefore, necessary that curriculum developers should prepare packages of instructional material which may be used by teachers in their actual working conditions with minor adaptations, if necessary.

(9) To enhance the effectiveness of teaching, planners and makers of curriculum should provide detailed and practicable guidelines to the teachers regarding the selection and use of material to suit the requirements of their students. The courses should be constructed keeping in view hierarchical relationships in the units to be taught.

(10) The results of this study, in conjunction with those of others researches conducted in India, indicate that Concept Attainment and Advance Organizer Models, if adopted suitably to Indian conditions, can offer answer to many of the problems and challenges besetting our educational scene. Teaching through proper strategy enhances students' achievement and cultivates in them a sense of confidence and a desire to learn more. This can prove very effective in controlling and even reducing the rate of drop outs in our schools. The rate of drop-outs is really staggering in our country. This results in huge wastage of human resources, money and efforts which a developing country like India cannot afford.

(11) To meet the requirements of our society in modern times of rapid development of liberalization privatization and globalisation (LPG), people with actual knowledge and talent in the field of Economics are required. A society like ours which needs the proper utilization of limited resources as well as competent people can ill-afford to depend only on selection methods for finding suitable talent. It must gear up its educational system to develop them relatively early and to educate such talents in a systematic and logical way over relatively long periods of time.
(12) Teaching through models can prove relevant and effective in tackling some of the other socio-economic problems afflicting our society. Any observer of Indian educational system and society can easily notice the gap which exists in the quality of education being imparted to the students of the upper class and to those coming from the lower strata of our society. Students coming from the educated and well off families get intensive and efficient coaching even outside the class. But those students whose parents cannot afford expensive schools or extra private coaching for their children find themselves at a disadvantageous position. This gap in the quality of education tends to perpetuate the social and economic disparities. Since systematic teaching through model holds out the promise of developing the cognitive outcome of a vast majority of students within the classroom facilities, it can bring the students of socially and economically backward sections to the level of achievement where they can complete with the boys and girls of the most fortunate sections of our society.

(13) It is evident from the conclusions of this study that the students who are taught through Concept Attainment Model and the students who are taught through Advance Organizer Model tend to show significantly higher improvement in achievement than the students taught through conventional method. The students involvement increases when they are taught through these teaching models. They become active learners instead of passive-listeners. The classroom environment becomes more cooperative. In other words we can say that the instructional objectives can be properly achieved with the help of these teaching models.

5.3.0 SUGGESTIONS FOR FURTHER RESEARCH

In this age of development, competition and complexity the role of education has assumed a central crucial significance all over the world. It is, therefore, not only desirable but absolutely necessary to find and develop ways
and means to make our educational system fully responsive to the emerging needs of today. The present study has been a modest attempt at testing the effectiveness of Concept Attainment Model and Advance Organizer Model in coping with pressures and challenges being confronted in our country. This study, however, does not pretend to offer the final word on the effectiveness of CAM and AOM. In order to supplement the outcomes of the present endeavour, more researches related to CAM and AOM are warranted so as to develop a body of vital knowledge of how to optimise students' learning.

(1) The present study was confirmed to an experimental treatment of sixteen weeks only. It is, therefore, reasonable to avoid wide and sweeping generalizations about its outcomes particularly the long term consequences of Concept Attainment Model and Advance Organizer Model. Hence, detailed longitudinal studies that follow students and teachers over a period of several years, particularly through continued application of CAM learning procedure are required in order to arrive at still more reliable and precise results of this model.

(2) Relative effectiveness of the two treatments may be researched further at macro level for learners of different age groups, subject areas, ability levels, learning disabilities and socio-economic status.

(3) Experiments may also be conducted on the students of Hindi medium and also on student of convent schools to evaluate the efficacy of the two models.

(4) Further study may be conducted involving other affective variables like study habits, creativity, achievement motivation, level of aspiration, self-concept, self-efficacy, test anxiety and other personality traits.

(5) Experiments should be conducted to evaluate the efficacy of the other two variations of Bruner's Concept Attainment Model, namely, Selection Oriented Model and Unorganized/Mixed Material Model.

(6) More studies should be undertaken to investigate the effect of different dimensions of Advance Organizer viz. meaningful reception learning
i.e. Derivative subsumption, correlative subsumption, superordinate learning and combinational learning in relation to schema theory.

(7) Other dimensions of Parental involvement, like consistency of management at home, work habits, cognitive styles of parents, helping the child to differentiate and become aware of himself improving nature of discipline, should be explored for their impact on achievement and self-efficacy.

(8) Students' pre-requisites, their initial abilities to learn and management of time and learning task influence a great deal in the outcomes of CAM and AOM learning classes. An investigation into how time and learning task can be best managed to achieve the optimum results and how initial abilities of students affect their achievement can prove to be a rewarding area for research.

(9) Another area for potential research is provided by the effects of using CAM and/or AOM on the teacher and his role in his class.

(10) Another exciting and useful area for further research is to investigate how students taught with these models develop their learning skills. How the transfer of learning takes place in such students.

(11) Research can be conducted particularly in the teaching of languages of South India to the students of Hindi speaking areas and vice-versa.

(12) Another promising field for further research can be found in the psycho-motor area. No such study has been conducted in India so far. With increasing importance of vocational education, industrial training and sports coaching, it may be worthwhile to investigate the effects CAM and AOM on psycho-motor outcomes.

(13) Different Socio-economic and cultural backgrounds have a casual relationship with students' achievements. Since the present study was conducted on a sample taken from schools situated in urban area, studies are warranted in schools located in rural areas, urban slum and on students of scheduled castes and schedule tribes. Such studies can provide useful information about how to make CAM and AOM more effective and efficient in the conditions under which students of
socially economically and culturally backward sections of our society have to work.

(14) CAM can offer an effective instructional procedure to help students needing special care and attention. In this context emotionally disturbed, habitually truant, mentally retarded and physically and visually handicapped students and their problems offer challenging and fruitful area of research to investigate.

(15) Effectiveness of CAM and AOM may be researched at large scale for learners of both sexes to find out whether there is any difference in achievement on the basis of sex.