CHAPTER NO. I
INTRODUCTION

1.1 GENERAL

Teaching is an activity which is designed and performed for multiple objectives in terms of changes in pupil behaviours. To-day, teaching has acquired the status of a profession. Teacher's responsibilities are not only to impart instructions, they are expected to be responsible for the personal growth of the students, their social development, preparation for national and World Citizenship and for their mastery of academic subjects. To carry out these multiple responsibilities, teachers are required to engage in several professional roles, often simultaneously. Teachers are counsellors, instructional managers, curriculum designers, academic instructors and evaluators of instructions. All these different roles require different teaching strategies.

The impact of philosophical, psychological, sociological and scientific innovations on education are so great that, consequently, changes in educational theories and practices are necessary to readjust these with the changing concepts and growing needs of the nations.

The professional competence in teaching can be increased in two ways: First, by increasing the range of
teaching strategies that the teacher is able to employ; second, by becoming skillfull in the use of each of these strategies.

Experts in the fields of education all over the world are seriously thinking of a variety of approaches to teaching to achieve different instructional objectives.

Experience has shown that there is no one particular way which can be said to be the approach to achieve any instructional objective. Therefore, we may require a number of ways to create right environment for learning. Further we need to do research and find out which is the best one to achieve a particular goal.

To provide all rounded development, we need to design suitable instructional strategies which help our students grow emotionally, physically, socially and intellectually. We need to know how to modify their behaviour so that they function effectively in a changing society. Pupils have multi-dimensional personalities having different learning styles and the teachers have multiple responsibilities and are required to engage in several professional roles. The common implication of both these facts is that the teachers should use different strategies of teaching, matching the objectives of teaching and pupil's learning styles and personality dimensions.
To prepare the teachers for a variety of roles, Bruce Joyce & Marsha Weil have searched and researched on a variety of strategies developed by different learning theorists and designed a number of Models of Teaching. Some are formal and traditional and others are casual and emergent. These are based on theories about how people learn, grow, and develop. Some of these theory based Models of teaching are more appropriate to achieve some objectives than to others. Some are specially tailored to help students grow in self-awareness and strength of self-concept, others are more useful for improving human relations in the classroom and helping students clarify their values. Yet others are more appropriate for the mastery of subject matter, and still other Models of teaching can improve the informational processing capacities of students.

Some philosophies of teacher-education maintain that a teacher should master single Model and utilize it well. However, very few teachers in reality, follow this single Model pattern. A highly skilled performance in teaching blends the variety of Models appropriately and embellishes them. Master teachers create new Models of teaching and test them in the course of their work. Thus, growth in teaching is the increasing mastery of a variety of Models of teaching and the ability to use them effectively. This will certainly ensure the development of intellect which is a primary goal of schooling.
Theories of learning have been the object of attention for several decades. Theories of teaching have received consideration only in the last decade.

We as teachers need a general conception of teaching for organizing our present knowledge about teaching, purposing research which will advance our knowledge, and guiding our teaching practice. Every teacher has at least, a primitive notion of teaching. But, however, we have not developed a systematic conception of teaching to whom we would call a 'Theory of Teaching'. The reason may be as J.P. Decceco (1977) puts it, we are inclined to believe that teaching is something one does, not something one studies. One more apparent reason according to C.H. Patten (1977) for the lack of progress in developing a theory of teaching, has been the emphasis upon learning and a theory of learning as the basis for teaching.

A theory of teaching should answer three questions (Gage, 1963). How do teachers behave? Why do they behave as they do? What are the effects? It should consider the behaviour of teachers, the cause; and the learning of students the effect. Further, it explains predicts and controls the ways in which the behaviour of the teacher affects the learning of the students.
Teaching is a complex activity involving actions such as explaining, demonstrating, guiding, maintaining classroom management, record keeping, assignment making, curriculum planning, testing, and evaluation. In view of this complexity and variety, Gage (1975) has proposed that there are many different potential theories involved in teaching, since no single theory could be adequate.

Thus, like the theories of learning there is no final agreed upon theory of teaching. Stiles and Others (1974) agree that there is no single theory for teaching appropriate for all teachers in every situation and they even doubt that a single theory is possible.

1.3 MODELS OF TEACHING.

Teaching by modelling implies by a teacher in such a way as the learner will try to acquire through imitation. In the layman's terminology, "Model of Teaching" is a blueprint of the teaching activities which is needed to generate an educative environment within the framework of the task in hand and reference to the essential elements of teaching. In other words, models of teaching describe teaching as it ought to be. In the context "Model" does not mean to follow a pattern explicitly but rather to guide one's behaviour by the example of the Model.

The psychologists are of the view that the best substitute for a theory of teaching is a model of
teaching as it explains the various teaching and learning conditions and their relationships.

The Models of teaching are developed by people who worked in different fields. They are based on practical empirical work, theories and researches. Some of the persons whose theories and searches have contributed to the development of different Models, are Ausubel, Bruner, Skinner.

Bruce Joyce and Others developed ways of making the theories operational. Thus each Model has a rationale that justifies it and describes what is good and why. Thus these Models link different skills of teaching to theory. Some educationists have viewed that 'theories of teaching' from their practical perspectives, as a result of which, some Models of Teaching have been developed.

A "Model of Teaching", as we use the term, is a pattern or plan which can be taken up to shape a curriculum or course to select instructional materials and to guide the Teacher's actions.

Silverman differentiates between some of the functions of theories of teaching and Models of Teaching. A theory is a system in which the interactions among actual variables is explained, whereas a Model is an analogy and is evaluated by its utility.
Joyce Bruce and Marsha Weil (1972) have defined the term in their book "Models of Teaching" as follows:

"Teaching Models are just instructional designs. These describe the process of specifying and producing particular environmental situations which cause the students to interact in such a way that specific change occurs in his/her behaviour."

Bruce & Weil (1980) have further clarified the term in their book "Information Processing Models of Teaching". A Model of Teaching consists of guidelines for designing educational activities and environments. It specifies ways of teaching and learning to achieve goals. A Model includes a rationale, a theory that justifies it and describes what it is good for and why; the rationale may be accompanied by empirical evidence that it works.

The models of teaching, which are selected to the pattern of teaching activities have much to say about the kinds of realities which will be admitted to classroom. When a teacher possesses identifiable focus and a frame of reference which rationalises them, we can say that he was a Model for teaching. He may or may not be able to describe what aspects of the students interest him, what aspects of the environment be emphasized. Thus, in the general sense of the term, every teacher has his own Model of teaching.
The main postulate of Teaching Models is that the learning outcomes can be classified into distinctive categories and objectives can be achieved by generating specific situations. The Models of teaching are very useful for teachers for planning and organizing teaching activities. The Teachers can make its use in planning curriculum, student teacher interaction, preparing an outline for guiding student activities and to develop specific teaching aids. These Models are also helpful in formulating, developing and evaluating the theories of teaching.

Teaching Models are based on the following assumptions:

- Teaching is a means for generating an environment of learning. It involves independent variables.

- The content and skill function as an instruction through which students and teachers interact with one another, thus it provides an opportunity to develop physical and social efficiency.

- Different types of teaching objectives are achieved by organizing teaching elements in different ways.

- Teaching models provide learning experience by creating appropriate environment for real behavioural outcomes.
Bruce and Weil has warned that a Model of teaching is not a simple fixed formula for completing a job. It provides definite ideas for creating an environment from which students are likely to learn certain kinds of things, but it has to become a flexible, fluid instrument that is modified to fit different types of subject-matter and that responds to students who are different from one another.

1.4 FUNDAMENTAL ELEMENTS OF MODELS OF TEACHING

A Model of teaching generally consists of six fundamental elements.

(i) Focus.
(ii) Syntax
(iii) Principles of reaction.
(iv) Social System.
(v) Support system
(vi) Evaluation system.

(i) FOCUS:

The term 'Focus' refers to the goal or objective of teaching. The teaching activities of the Model are oriented to achieve some goals which are defined in behavioural terms. It describes the aspects of the environment which are most important in the life of the students.
(ii) SYNTAX:

The Syntax of the Model involves a description or structure of activities. It indicates the 'flow of actions' to be followed in the Model, which specify educational environment relating to each Model. It refers to the presentation aspect of teaching. Each Model has a distinct flow of phases, for example an inductive strategy has a different phase and a different sequence than a deductive one.

(iii) PRINCIPLES OF REACTION:

These principles guide the teacher's responses to the learner. They tell the teacher how to regard the learner and respond to what he or she does. In some models, the teacher overtly tries to shape behaviour by rewarding certain student activities and maintaining a neutral stance towards others; in other models, such as those designed to develop creativity, the teacher tries to maintain a non-evaluative, carefully equal stance so that the learners become self-directing. Principles of reaction (Bruce & O'Neil) 1972 provide the teacher with rules of thumb by which to 'tune in' to the student and select appropriate response to what the student does.

(iv) THE SOCIAL SYSTEM:

It provides a description of student and teacher...
roles and relationship, and the kinds of norms that are encouraged, and student behavior which is rewarded. The leadership roles of the teacher vary greatly from Model to Model. In some Models, the teacher is the center of activity and source of input, some Models provide for relatively equal distribution of activity between teacher and students, whereas other places the student at the center. Thus, some Models are highly structured, others are moderately or less structured from the point of view of the degree of structure in the learning environment.

(v) SUPPORT SYSTEM:

It refers to the additional requirement beyond the usual human skills, capacities and technical facilities necessary to implement a Model. Any additional support in the form of books, films, self-instructional systems, a trained expert, audio-visual aids and other materials. Support requirements are derived from two sources: the role specifications for the teacher, and the substantive demands of the experience.

(vi) EVALUATION SYSTEM:

The evaluation is an indispensable aspect of teaching because it produce evidence about the realization of goals of the teaching Model. Some of the objective type oral tests of Recall and recognition type are
administered to evaluate the knowledge of students.

1.5 TYPES OF MODELS OF TEACHING.

Review of literature of teaching models suggests a variety of sources. Educators psychologists, Sociologists, system analysts, Psychiatrists and many others have all developed theoretical positions about learning and teaching. Philosophers developmental Psychologists, learning theorists, Counsellors and therapists have also developed a large number of approaches to teaching and learning.

John P.Dececco and W.Crawford have discussed the three psychological Models of teaching:

(i) A Basic Model of Teaching by R.Glaser.
(ii) A Computer based teaching Model by L.Stolurow and Daniel Davis.
(iii) An interaction Model by Ned Flanders.

They have also described three historical Models of teaching:

(i) Lecture recitation Model.
(ii) The Montessori Model.
(iii) The Human relation Model.

John Dececco considered the Glaser's Model as the basic Model of teaching and compared all other models with it.
Israel Schefler has described three philosophical Models of teaching such as:

(i) The Impression Model by John Locke.
(ii) Insight Model by Plato.
(iii) The Rule Model by Kant.

Bruce Joyce & Marsha Weil have classified teaching Models under the four families. Each family contains a four group of Models on the basis of their chief emphasis - the ways they approached educational goal and means.

(i) INFORMATION PROCESSING MODELS.

Information processing Models share an orientation towards the information processing capability of students and ways they can improve their ability to master information. Information processing refers to the way people handle stimuli from the environment, organize data, sense problems, generate concepts and solutions to problems and employ verbal and non-verbal symbols.

Some information processing Models are concerned with the ability of the learner to solve problems and thus emphasize productive thinking, others are concerned with general intellectual ability. A large number emphasize concepts and information derived from the academic discipline.

(ii) SOCIAL INTERACTION MODELS:

These models emphasize the relationship of the individual to society. They focus on the process by which
reality is socially negotiated. Consequently, with respect to goals, models from this orientation give priority to the improvement of the individual’s ability to relate to others, to engage in democratic processes and work productively in the society.

(iii) PERSONAL MODELS.

These models share an orientation towards the individual and the development of selfhood. The Models emphasize the processes by which individuals construct and organize their unique reality. Frequently they focus on the emotional life of the individuals. It is expected that the focus on helping individuals to develop a productive relationship with the environment and to view themselves, as capable persons will produce richer interpersonal relations.

(iv) BEHAVIOURAL MODIFICATION MODELS.

These models have evolved from attempts to develop efficient systems for sequencing learning tasks and shaping behaviour by manipulating reinforcement. Exponents of reinforcement theory such as Skinner (1957) have developed these models and operant conditioning as their central mechanism. They are frequently referred to as behaviour modification theorists because they emphasize changing behaviour of the learners and describe them in terms of visible behaviour rather than underlying behaviour. Operant conditioning has been applied to a wide variety of goals in education.
These families of Models are by no means mutually exclusive. The actual prescription for developing the instructional activities and learning environments that emerge from some of them—even those classified in different families are remarkably similar. For example, nearly all models from information processing category are also concerned with social relationship and the development of selfhood. Where as in the case of social interaction models, while social relation is emphasized more than other domains, it is also concerned with the development of the mind and the self, and the learning of academic subjects. Also within the families, Models share many features with respect both to goals and to the kinds of means they recommend.

Bruce Joyce & Marsha Weil have developed more than twenty Models which are grouped on the basis of their chief emphasis—the way they approach educational goals and means. They have organised these Models into the following four families.

I. INFORMATION PROCESSING FAMILY OF MODELS

Model. Major Theorist.

- Inductive thinking Hilda Taba.
Model.


- Concept attainment Model. Jerome Bruner.
II. SOCIAL INTERACTION FAMILY OF MODELS

- Advanced Organiser Model.  
  David Ausuble.
- Developmental Model.  
  Jean Paget, Irving Sigel, Mound Sullivan.

Major Theorists:

- Group investigation Model.  
  Herbert thelen  
  John Dewey.
- Class-room Meeting Model.  
  William Glaser.
- Social Inquiry Model.  
  Burn Massialas  
  Benjamin Cox.
- Laboratory Method Model.  
  (N.I.L.)Bethel, Maine.
- Jurisprudential Model.  
  Donald Oliver.  
  James P. Shaver.
- Role of Playing Model.  
  Fannie Shaftel  
  George Shaftel.
- Social Simulation Model.  
  Serene Boocock.

III. PERSONAL FAMILY OF MODELS

- Non-directive Model.  
  Carl Rogers.
- Awareness Trg. Model  
  Fritz Perls.
- Syneetics Models  
  William Gordon.
- Conceptual System Model.  
  David Hunt.
IV. **BEHAVIOUR MODIFICATION MODEL**

- Operant Conditioning Model  B.P. Skinner.

1.6 **REVIEW OF THE RELATED STUDIES**

Models of teaching have received considerable attention only recently. These are conceived mostly in terms of theories of teaching and theories of learning. Hence very few studies have been conducted on models of teaching as such. However, researches have been conducted on methods of teaching or on various other strategies concerned with teaching learning process.

Oakes (1960) compared conventional method with programmed instruction and reported that no significant difference existed in terms of achievement.

Geller (1963) found no significant difference in achievement between two groups taught through lecture method and programmed material.

Sharma (1963) developed a lesson in Geography on a Programmed Model and compared with Traditional Method of teaching. He reported that there was a considerable gain in teaching by a Programmed Model over Traditional Method of teaching.

Vernon (1965) compared a self-paced programmed instruction and teacher directed non-programmed instruction in problem type-writing. He revealed that the self-paced
programme approach as the basic instructional source, is an effective method for teaching problem type writing in secondary schools.

Houston & Pilliner (1974) studied the effect of verbal teaching style on the attainment of educational objectives in physics. They reported that the pupils taught in an open ended style achieve more complex cognitive educational objectives more rapidly than those taught by other two methods.

Bach, William James (1976) compared selected cognitive and affective outcomes among Lecture, Seminar and Unit Mastry methods of presentation of the psychology adjustment course and concluded that the Unit Mastry Method was superior cognitive outcome, while seminar students liked their method the best and that the method did not produce a differential result on other affective measures.

Hale, Frank Michael (1978) conducted research on problem solving programme's effect on college students transition from concrete to formal thought based on cognitive developmental model. The researcher concluded that experimental group using problem solving model in teaching of biology scored significantly higher than the control group on the post-test on Piagetian concrete formal operational thought, abstract thinking, objective subjective differential reasoning and critical thinking.
Yoder, John Henry (1979) tested a Model of conceptual learning and development constructed by Herbeat Klausmeier on a group of elementary school children in grades, first, third and fifth. Cognitive abilities associated with conceptual development were also examined. The nature and strength of the relationships observed between aptitude and conceptual development were specific to a given grade and I.Q. Group.

Pangotra, N.N. and Kishore Lalit (1982) made study on Mastery Learning instructional plan which indicates that the Mastery Learning plans result in the increment of achievement scores, better retention of subject matter and extensive student participation in their own learning. It has also been found that students prefer Mastery Learning plan to the lecture method of teaching.

Byrness, Marie Stella (1983) investigated the effects of cognitive skills training using the cognitive process instruction-method on the variable measures of reading comprehension. It was concluded that the cognitive process instruction method needs further development before it can be used as an effective instructional method for improving students reading comprehension skills.

June Bringer (1983) designed his study to determine whether a proposed interactive integrated reading model produce increased teacher professionalism and student achievement over the traditional approach to reading.
instruction. The findings offer support for a planned integrated approach.

Roger K. Purser (1983) studied results of two tenth grade Biology teaching procedures. The group whose science curriculum and whose classes were taught using "Learning Cycle" made much greater advances in intellectual development (reasoning) than the group taught with the formal procedure (exposition).

Christian Willie Lee Hasley (1984) made comparison of the effectiveness of three strategies for teaching word problems at the intermediate Algebra level to the college students. The three strategies were:

(i) Cognitive Method
(ii) Guided Solution Method
(iii) The Traditional Method.

Investigators found no significant difference.

Gellewasser, Frank J. (1984) compared Task Analysis and Traditional Developmental Method of teaching upon Achievement and Retention of disadvantaged slow learners in a high school fundamental Mathematics course. The researcher found no significant interaction effects.

Bhouraskar, S. and Joshi, S. (1985) made study on 'Effectiveness of Role Playing techniques and its feasibility in classroom'.

Lajkowicz, Christine (1986) studied that attitude of student nurses toward the elderly can be changed in
positive directions by using teaching techniques that include Lecture/discussion, media depicting normal elderly in their daily activities and aging simulation activities.

Kothari, Ramesh Chandra (1985) made comparative study of Programmed Learning Method, Assignment method and Traditional method. This study revealed that Assignment method is more effective than Programmed Learning method, as well as Traditional method, in terms of achievement of pupils. Both Programmed Learning method and Traditional method are equally effective in terms of achievement of the pupils.

Baum, Barbara B. (1986) studied four methods of teaching minimal encourages, open ended questions and reflective statements and found that Expert Model showed greatest improvement of all groups in use of listening skills and reduction of anxiety.

Neal (1972) found that experimental groups scored significantly higher than the control group in the cognitive dependent variables.

Lorry, D. Yore (1986) made study to see the effects of lesson structure and cognitive style on the science achievement of elementary school children. Results revealed that external structure can not compensate for lack of internal structure of field dependent learners while interfering with internal structure of field independent learners.
Verna, B. P. & Sharma, J. P. (1987) made a study to discover the differences in academic achievement of adolescent students belonging to different learning style groups. Results showed that there were significant differences in the achievement in various subjects and total area of study based on certain learning styles.

Gupta, B. C. (1965) concluded that intelligence and reasoning play an important part in problem solving in Algebra and he reported also that above average intelligent students were better in recognizing relevant and irrelevant facts.

Sodhi, G. S. (1970) studied the relationship between problem solving and intelligence in Physics, and reported that above average students were better in recognizing relevant and irrelevant facts than average and below average students and added also that individuals differ in their thinking patterns.

The findings of the study by Chaudhry (1971) concluded that achievement and intelligence were not significantly and positively related to each other.

Sodhi, G. S. (1976) investigated programmed learning in chemistry in relation to taxonomy of educational objectives, intelligence and personality traits at the higher secondary level and concluded that intelligence acted as a redundant variable so far as overall achievement in various taxonomic categories is concerned.
Anand Bhushan and Goswami, S.K. (1979) investigated the effectiveness of structural communication as compared to Linear Programming when measured at different levels of Bloom's Taxonomy. The results of the study revealed that the general intelligence levels favourably affect average aggregate performance through two instructional strategies.

Yadav (1981) investigated, "The efficiency of teaching strategies in relation to intelligence and sex and discard those teaching strategies which did not affect the achievement, sex of the students, did not interact with teaching, strategies and level of intelligence were found to be ineffective in achievement.

Mohini (1982) conducted a study entitled, "The effect of sex, intelligence, school achievement and self concept on development of Piagetian Operational Comprehension among the school adolescent". She concluded that students who were highly intelligent will not necessarily score high on operative comprehension test. So intelligence is not significantly related to operational comprehension thinking.

Yadav, G.L. (1987) made study to compare the effects of Individualized and Conventional instructions on students' achievement in relation to personality types, intelligence and levels of thinking. Results revealed that Learning Package was found to be superior to conventional method of instructions, and also to the Branching Programme. High intelligence students were found to be having more achievement scores in Mathematics than low intelligence.
students irrespective of mode of instructions, levels of thinking and types of personality. Level of thinking and personality type were found to be redundant factor for achievement in mathematics at high school stage.

Amiya Kumar Basu (1982) made study to find out the relationship among creativity, intelligence and academic achievement. He found that correlation between creativity and achievement was significant and the relationship between intelligence and academic performance was estimated to be significant.

Joseph (1977) developed lessons for elementary school children based upon Ausubel's Advance Organiser Model. He tested its use for the understanding of the casual and logical questioning and reported that the experimental group using the model gained significantly high than the control group not using the model.


Cook, Willie Clance (1980) made study on "The effects negative and positive instances in teaching mathematical concepts to freshmen". The study suggests that providing students both positive and negative instances
may enhance their grasp of algebraic concepts.

Frasch, Clifford Allan (1980) investigated on the concept formation performance of achieving and non achieving readers in the first, second, third and fifth grades and found no statistical difference on the verbal and performance measures of concept formation employed in the investigation.

Brigh, James Ellis (1980) made an exploratory study on teaching the concept of function at the college algebra level. This study provides evidence to support the feasibility of the use of some, or all, of these non-traditional techniques in the teaching of functions whether they are used to introduce the concept or as a review.

Harvery, Francis Aiden (1980) made study on the instruction of Television viewing and experience with manipulate materials in children's science concept development and reported no significant achievement. But study did indicate that properly planned and produced children's television programmes can promote considerable verbal response and T.V. programmes designed to promote children's development of science concepts are more effective if they include both examples and non-examples of the concept being taught.
Gelfer, Jeffrey Ia$ (1981) investigated the significance of using blocks as an art medium to teach young children of three four years of age, selected art concepts through regularly scheduled treatments. It also examined the effect of learning these concepts had on the structures the children built. The study showed the significant results.

Leo H.T. West and Natalie C. Kellet (1981) studied that meaningful learning of skill was enhanced by the addition of Advance Organiser and that this effect was removed if prior teaching in relevant background knowledge was included. Further that Ausukal's theory can be applied to the meaningful learning of intell actual skills.

Noel, Kent L. (1983) made study to investigate the influence of advance organisers in a systematically designed lesson to teach rule using behaviour on transfer of rule learning to problem solving situations. The instruction was systematically designed to teach rule using behaviour to spell words with cie and cel letter sequences. The conclusions from the study indicate that while students benefit from systematically designed instructions to teach rules, Advance Organisers incorporated in that instruction do not necessarily enhance learning transfer.

Richards, Grant Lund (1984) conducted the study to examine the reading comprehension scores of ten sixth-grade students in a classroom setting who were trained to use generative activities. Results show that comprehension scores for seven of the ten students improved by the use of generative activities. The data support Wittrock's Model of generative learning and indicate, it may have practical utility in the classroom.


Katiyal, S. (1985) made study on "How does Inquiry Training Model affect the learning outcomes in comparison to traditional teachers."

Kenneth Tobin (1985) used Teaching Strategy Analysis Models in middle school science education courses and found that strategy analysis enhanced achievement levels above those obtained in conventional settings in an equivalent amount of time.

Willis, Reginald Thomas (1986) studied an Applied Social Process Model of second language acquisition and found that self-perceived listening/speaking competence was found to be a function of objectively measured skills, situational anxiety and acquisitive propensity.
Gaugrde, A. (1986) made a study of Concept Attainment Model (induction type) with Concept Attainment Model (deduction type) in terms of ability to analyze attributes and pupil's reaction.

Budhi Sagar, M. (1987) made study of Development and Comparison of Instructional material developed by using Advance Organiser Model and Operant Conditioning Model for teaching educational psychology to B.Ed. Students. The study revealed a significant effect of Advance Organiser on Achievement of the students.

Smiriti Swarup, Meena et al. (1987) studied the effectiveness of instructional material with Advance Organiser in terms of achievement of students. The study revealed a facilitative effect of Advance Organiser on achievement of the students.
1.7 EMERGENCE OF THE PROBLEM

The previous researches 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. Most of the researchers have compared two or three methods of teaching to acquire some objectives considering a particular subject or topic. Studies by Oaks (1960), Sharma (1963), Vernon (1965), Houston & Pillinor (1974), Bach, William James (1976), Male F.M. (1978), Taylor (1979), Christian, Willie L.H. (1984), Gelbwasser, F.J. (1984), Kenneth Tabin (1985), Thomas (1985), Lajkowicz (1985), James (1987) have compared different methods of teaching. The results of the studies are not consistent. In some studies, it has been found that achievement is not affected by methods of teaching while in others, results show significant gains by different strategies of teaching. Very few studies have been conducted in which two or more strategies developed to teach a particular intellectual skill have been compared.

Out of a large number of information processing models, the investigator has selected for the present study only two models of teaching namely Concept Attainment Model of teaching propounded by Jerome Bruner and Advance Organiser Model of teaching, propounded by David Ausuble. Both these models of teaching have been selected to teach
Language Concepts, to high school students in relation to their Cognitive Style, intelligence and creativity.

1.8 STATEMENT OF THE PROBLEM

"Comparison of Advance Organiser and Reception Strategies for Acquisition of Language Concepts in relation to Cognitive Style, Intelligence and Creativity."

1.9 OBJECTIVES OF THE STUDY.

(i) To know whether acquisition of Concepts is affected by the strategies of teaching or not.

(ii) Whether students possessing different Cognitive Styles differ in acquiring Concepts.

(iii) Whether students having differential intelligence differ in attaining Concepts.

(iv) Whether acquisition of Concepts by a learner and his creativity are independent of each other.

(v) Whether there is any interaction between strategies of teaching Concepts and intelligence level of the learner.

(vi) Whether there is interaction between strategies of teaching concepts and creative level of the learner.

(vii) Whether there is interaction between strategies of teaching and cognitive style of the learner.
In the present study, following hypotheses were listed.

1. There will be a significant difference in the acquisition of concepts by the groups taught through Reception Strategy and the taught through Advance Organiser Strategy.

2. There will be significant difference in the acquisition of concepts by groups having differential cognitive styles.

3. There will be significant difference in the acquisition of concepts by groups having different intelligence levels.

4. There will be significant difference in the acquisition of concepts by groups having different creative levels.

5.(a) There will be a significant interaction between strategies of teaching and intelligence.

5.(b) There will be a significant interaction between strategies of teaching and cognitive styles.

5.(c) There will be no significant interaction between strategies of teaching and creativity.
5(d) No significant interaction will be found between intelligence and creativity.

5(e) There will be a significant interaction between intelligence and cognitive style.

5(f) There will be a significant interaction between creativity and cognitive style.

5(a) There will be a significant interaction among strategy of teaching, intelligence, and creativity.

6(b) There will be a significant interaction among strategy of teaching, intelligence, and Cognitive style.

6(c) There will be a significant interaction among intelligence, creativity, and cognitive style.

6(d) There will be a significant interaction among strategy of teaching, cognitive style, and creativity.

7. There will be no interactional effect in terms of acquisition of Concepts among strategies of teaching, creativity, intelligence, and Cognitive Style.