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TESTING THE EFFECT OF TEACHING ENGLISH THROUGH MIND MAPS ON THE CONCEPT FORMATION OF SECONDARY SCHOOL STUDENTS

Ms. Swasti Dhar
Assistant Professor,
Pillai College of Education & Research-Chembur

Dr. SunitaWadikar
Principal,
Pillai College of Education & Research-Chembur

Abstract

Concepts are essential for the cognitive development of a student and languages have a prime position in enhancing the concepts that a child attains. It is wrongly thought that no concepts are taught in the teaching of the English subject and students are unable to clearly express the various concepts inherent in the English subject. The traditional teaching methods used to transact the English subject still do not cater to this and concepts are either very superficially or ignored completely. Mind Maps cater to the radiant thinking ability of the brain and use colours, images and spiral visual techniques to help a child learn and understand better. This research uses the quasi-experimental design and the researcher used self designed learning modules to transact the curriculum prescribes in the VIIth standard of the SSC curriculum. The effect on concept formation was tested and the effect was tested and evaluated.

Any genuine teaching will result, if successful, in someone's knowing how to bring about a better condition of things than existed earlier.(John Dewey)

The National Curriculum Framework (NCF) helps determine the syllabi, the text books and the teaching practices to be followed in schools throughout India. The NCF 2005, suggests that

`We need to give our children some taste of understanding, following which they would be able to learn and create their own versions of knowledge as they go out to meet the world of bits, images and transactions of life.

In most schools, the teachers stick to the textbook and very little, if any, information is provided outside the scope of what is provided in the textbooks. The learning experiences are focussed towards the year end annual examinations and rote learning is the norm. Children are not encouraged to develop their cognition and freewill is almost absent in the classrooms. This is true not only in case of subjects such as Mathematics, Sciences and the Social Science subjects, but sadly this mindset is also seen when it comes to the teaching of languages.

It cannot be overemphasised that the language is not only the medium of instructions but also the basis of thinking, understanding, remembering, concept formation in short, the entire cognitive development of a child.

The objectives set out in the NCF 2005 are exemplary but the final outcome depend mainly on how the curriculum is transacted in the classrooms. This is where newer ways of transacting the curriculum need to be sought. One such method which can prove to be very effective is the use of Mind Maps.

What are Mind Maps?

A mind map is a powerful graphic technique cum tool which provides a universal key to unlock the potential of the brain. It harnesses the full range of cortical skills word, image, number, logic, rhythm, colour and spatial awareness in a single, uniquely powerful manner. In so doing, it gives one the freedom to roam the infinite expanses of one's brain. The mind map can be applied to every aspect of life where improved learning and clearer thinking will enhance human performance.

The term "mind map" was first popularized by author and television personality Tony Buzan when BBC TV ran a series hosted by Buzan called Use Your Head. In this show, and companion book series, Buzan (Druce, 2009)promoted his conception of radial tree, diagramming key words in a colourful, radiant, tree-like structure.

Radiant Thinking- Why a mind map is effective?

Minds do not naturally work in straight lines. Rather they consist of associations radiating out (or in) from many different connection points. Many connections in many different directions connect items together. Thus the mind is simply a network of connections or associations.

We can see this in the layout of the brain. The brain is not the mind, but it can be seen as a physical reflection of the structure of the mind. The brain consists of billions of neurons that each extend hundreds of dendrites that connect with other neurons. It is an association machine with an astronomical number of possible associations.

The mind works in a similar fashion. One naturally thinks in radiant associations. No matter what one thinks of, there would be associations going off in a multitude of directions from it.

Creativity and problem solving will flow most smoothly when allowed to work freely and radiantly.

Minds are freed up by expanding what was limited, by connecting up what was separate, by providing many options where there were few, by letting flow what was stuck.

Concept, Concept Formation and a child's linguistic abilities

A concept, according to Good's dictionary of education, is an idea/representation of common elements on attributes by which groups or classes may be distinguished. A concept is essentially a symbol which holds a large number of particular ideas together. The formation of a concept has many levels and the linguistic abilities of a child has a tremendous impact of the ability to form concepts and then build upon it to form more complex concepts.

Development of Concept Formationthrough Traditional Learning Methods (TLM)

The traditional learning methods (TLM) used in schools today do little to develop a learner's concepts and aid concept formation especially in the field of teaching of languages. Except during the teaching of grammar, in case it is separately taught, there is little or no effort in developing the concepts present in the syllabus. Both the teacher and the textbooks present the curriculum in a linear fashion with the objective of clearing the year end examinations. The textbooks, too, present the curriculum in a visually unappealing manner, with hardly any images and colour. Thus the TLMhardly aids the development of concept formation in the English language and students are assessed more for their rote-learning abilities rather than on active cognitive abilities.

RATIONALE OF THE STUDY

There is a lot of scope to use newer methodologies in the field of teaching English. In this study, Mind Maps were used to transact the curriculum.

AIMS AND OBJECTIVES OF THE STUDY

1. To prepare learning package based on Mind Maps in the English subject for development of concepts of secondary school students of Maharashtra

2. To study the effectiveness of teaching English through mind maps on the concepts formed by the students

METHODOLOGY OF THE STUDY

Research Design The study used the **quasi-experimental method** and the Pre-test, Post-test Re-test model. Modules were created based on the English syllabus of the secondary schools in the state of Maharashtra in order to study whether curriculum imparted by the mindmapping technique promote better concept formation among secondary school students?

Sample of the study:

The sample consisted of 200 students (100 boys and 100 girls) studying in Class VII in an Unaided SSC school.

Sampling Technique:

A three step sampling technique was used. Step One was purposive in nature and consisted of identification of schools which fell within the delimited area and followed the chosen criteria of being an established English medium co-ed school teaching SSC curriculum. Step Two was to randomise the sections to take one as the control group and another as the Experimental group. Step Three was to randomise and choose 50 boys and 50 girls whose pre-test, post-test and retest scores were analysed and compared

DELIMITATIONS OF THE STUDY

The study was delimited to VIIth standard students studying in the SSC Board Curriculum through English medium schools in Mumbai.

FINDINGS OF THE STUDY

It is apparent that the methodology of teaching has a tremendous impact on the achievement scores of the students. The table below gives an overview od the Pre-test and Post-test scores of the Experimental group and the Control group.

	Experimental group		Control Group	
	Mean	**SD**	**Mean**	**SD**
Pre-Test	6.0	3.10	4.32	1.7
Post-Test	**17.1**	4.16	4.02	1.6

As the table above clearly shows, the post-test scores of the experimental group is almost three times higher than the pre-test scores of the same group and is much higher that the pre as well as post test scores of the control group.

Thus concepts of a syllable, what constitutes a poem and understanding of figures of speech which were tested were much better understood using the Mind Map based modules.

DISCUSSION

The traditional method does touch upon the topics which were taken up but it is done in a very superficial manner. The intricacies of what constitutes a poem is never explained to a student and hence they are not able to identify the nuances of rhyme and rhythm which are so important to differentiating between a prose and a poetic text. Even 'figures of speech' which is a topic taught in grammar is touched

upon only while the teaching of a poem and ignored in the prose texts. Only the basics are understood and explored, the concepts become much clearer and the students were able to identify poetic structure even when it was written out as a paragraph.

CONCLUSION

Newer methodologies such as the use of Mind Map modules help develop concets in English more effectively than the traditional methods being used in schools.

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