Effectiveness Of Computer Assisted Learning In Tamil Grammar

Dr.G.Singaravelu, Associate Professor, UGC-Academic Staff College, & HOD/i/c Department of Education (SDE)
Bharathiar University, Coimbatore-641 046. Tamilnadu Email: singaravelu.bu@gmail.com

ABSTRACT

The study illuminates the effectiveness of Computer Assisted Learning in Tamil Grammar for the learners at standard VIII. Computer Assisted Learning is particularly beneficial for any student learning a language. It promotes peer interaction, which helps the development of language and the learning of concepts with content. It is important to assign TLL (Tamil Language Learners) to different teams so that they can benefit from Tamil language role models. Vasu Renganathan (2009) supported enhancing the Process of Learning Tamil with Synchronised Media and he recommended the Computer Assisted Learning in enhancing Tamil grammar learning. Objectives of the study:

1. To diagnose the problems of the learners in learning Tamil Grammar through conventional methods.
2. To find out the significant difference in achievement mean score between the pre test of control group and post test of control group.
3. To find out the significant difference in achievement mean score between the pre test of Experimental group and post test of Experimental group.
4. To find out the significant difference in achievement mean score between the post test of controlled group and the second post test of treatment given controlled group.
5. To find out the impact of Computer Assisted Learning in learning Tamil Grammar.

Methodology:
Rotational group Experimental method was adopted in the study. Participants: Sixty students of studying in standard VIII from Maruthamalai Higher Secondary school, Vadavalli were selected as sample for the study. Instrumentation: Researcher’s self-made achievement test was used as instrumentation for the study. Findings: Computer Assisted Learning is more effective than traditional methods in learning Tamil Grammar for the learners at standard VIII. Educational implications: It can be implemented in other levels and all other the languages learning.

Key words: Computer Assisted Learning, Treatment given controlled group and Experimental group. CALL-Computer Assisted Language Learning.

INTRODUCTION

Grammar is the basic of all languages and it may confirm that backbone of any language. Learning Tamil is difficult due to more letters in Tamil but English language has 26 letters. Remembering all the letters and learning grammar in Tamil is difficult to the learners of Tamil. Learning grammar is indispensable for learning Tamil language perfectly. Without understanding the grammar, the usage will not give clear meaning of sentences. Learning grammar from primary level is important for error free usage in Tamil. Even if Tamil is mother tongue of the many young learners, they commit mistakes in usage of spoken and written. Attractive methods of teaching grammar are the way to eliminate the problems of the learners in learning Tamil. Nowadays technology oriented learning attract the young learners. Maximum learners are engaging themselves by using Mobile, computer and internet for learning the language of Tamil. Learning by using computer bewitches the minds of learners as well as enthusiasm of the learners.

NEED AND SIGNIFICANCE OF THE STUDY

Parents encourage their children to study in medium of instruction in English. Teaching of Tamil in upper primary level was hurdle due to negligent of learning Tamil by the learners. Learners can talk Tamil less error free causes of unknown the grammatical rules. Another main reason of the less error free usage is conventional methods adopted in the classroom transaction. Hence the researcher prepared some activities through Computer Assisted Language Learning to learn Tamil Grammar.

OBJECTIVES

1. To diagnose the problems of the learners in learning Tamil Grammar through conventional methods.
2. To find out the significant difference in achievement mean score between the pre test of control group and the post test of control group.
3. To find out the significant difference in achievement mean score between the pre test of Experimental group and the post test of Experimental group.
4. To find out the significant difference in achievement mean score between the post test of controlled group and the second post test of treatment given controlled group.
5. To find out the impact of Computer Assisted Learning in learning Tamil Grammar

HYPOTHESES

1. Students of standard VIII have problems in learning Tamil Grammar through conventional methods.
2. There is no significant difference in achievement mean score between the pre test of control group and the post test of control group.
3. There is no significant difference in achievement mean score between the pre test of Experimental group and the post test of Experimental group.
4. There is no significant difference in achievement mean score between the post test of controlled group and the second post test of treatment given controlled group.
5. Computer Assisted Learning is more effective than conventional methods in learning Tamil Grammar

REVIEW OF LITERATURE

Lee, Cynthia (2013) investigated the effort to add to computer-Assisted language learning by extending a study on an essay critiquing system (ECS) feedback to secondary school language learners' writing. The study compared two groups of participants' performance, namely the treatment group which received both the system feedback and teacher feedback (i.e., blended learning mode), and the control group which received teacher feedback only. The study was conducted in a secondary school in Hong Kong in the form of an extra-curricular activity after school. Fifty-three students from the ages of 16 to 17 with different argumentative writing experience participated in a series of five writing workshops once a month voluntarily. The participants were assigned to a treatment and a control group based on the stratification approach. Their scores were compared and an interview with the treatment group was conducted. Analysing the total and content and organisation scores of the two groups, it was found that both groups demonstrated statistical significant gains. Nevertheless, the treatment group's gain appears to be more meaningful than the control group's in view of its group composition. The blended learning mode contributes to the encouraging results as revealed through the treatment group's scores, high rating and positive comments on both system and teacher feedback in the survey and interviews. The analysis also implies the need to improve the system feedback on paragraph coherence, workshop design and grading criteria.

VARIABLES

The independent variables namely Computer Assisted Learning and the dependent variable namely achievement test score were used in this study.

METHODOLOGY

Rotational Equivalent group Experimental method was adopted in the study. Pre test-treatment-Post test was used to perform the study. Computer Assisted Learning attracts the young students. Using computer in learning Grammar simplified the learning.

Sample

Sixty students of studying in standard VIII from Maruthamalai Higher Secondary school, Vadavalli were selected as sample for the study. Thirty students were considered as Controlled group and another thirty were considered as Experimental group.

Tool

Researcher's self-made achievement test was used as a tool for the study. Validity of the tool was established by the opinion of the juries. Reliability of the tool was established by the test-retest method.
Construction of tool:

The investigator's self made Achievement test was used for the pretests and post tests of both control groups and experimental groups. The same question was used for both pre and post tests to evaluate the effectiveness of Computer Assisted Learning in learning in Tamil through objective types of question which carried one mark for each question and contained 50 marks.

Reliability of the tool

Reliability had been computed using test-retest method and the calculated value was 0.89. The value was quite significant and implied that the tools adopted were reliable. Hence the reliability was established for the study.

Validity of the tool

Subject experts and experienced teachers were requested to analyse the tool. Their opinions indicated that the tool had content validity.

Procedure of the study

1. Identification of the problem in conventional method by administering pre-test to the both groups.
3. Preparation of Activities.
5. Preparation of Achievement test.
6. Administering Pretests for the both control group and Experimental group.
7. Post tests for the both groups.
8. Treatment is given for both control group and Experimental group
10. Data Analysis.
11. Findings and Interpretations.
12. Educational Implications.

Procuring Data

The researcher got permission from the management of the school and administered pretest to the students with the help of a teacher. The question paper was given to the individual student and evaluated learning obstacles of the students were identified by the pretest. The causes of low achievement by unsuitable methods were found out. Computer Assisted Learning was used in the classroom for eliminating the problems of learning grammar for one week. The posttest was administered and the effectiveness of the Computer Assisted Learning was found out. Treatment was given for the both groups.

Statistical technique

ttest was computed for the study.

RESULT

Hypothesis :1

Students of standard VIII have problems in learning Tamil Grammar through conventional methods.

In the post-test Experimental group, students of standard VIII scored 70% of marks but in the pre-test Experimental group students scored 30% of marks in the conventional method. Hence Students of standard VIII have problems in learning Tamil Grammar through conventional methods.

Hypothesis : 2

There is no significant difference in achievement mean score between the pre test of control group and the post test of control group.
### Stages and Mean Scores

<table>
<thead>
<tr>
<th>Stages</th>
<th>N</th>
<th>Mean</th>
<th>S.D</th>
<th>df</th>
<th>t-value</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pretest control group</td>
<td>30</td>
<td>10.48</td>
<td>2.85</td>
<td>58</td>
<td>0.38</td>
<td>Insignificant at 0.05 level</td>
</tr>
<tr>
<td>Post test control group</td>
<td>30</td>
<td>10.78</td>
<td>3.12</td>
<td>58</td>
<td>0.38</td>
<td>Insignificant at 0.05 level</td>
</tr>
</tbody>
</table>

The table showing achievement mean scores between pre test of control group and posttest of Control group.

The calculated "t' value is (0.38) less than table value (2.00). Hence null hypothesis is accepted at 0.05 levels. Hence there is no significant difference between the pre test of control group and post test of control group in achievement mean scores of the students in learning Tamil Grammar through conventional method at standard VIII.

**Hypothesis:3**

There is no significant difference in achievement mean score between the pre test of Experimental group and post test of Experimental group

<table>
<thead>
<tr>
<th>Stages</th>
<th>N</th>
<th>Mean</th>
<th>S.D</th>
<th>df</th>
<th>t-value</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pretest experimental group</td>
<td>30</td>
<td>12.70</td>
<td>3.21</td>
<td>58</td>
<td>5.99</td>
<td>Significant at 0.05 level S</td>
</tr>
<tr>
<td>Post test experimental group</td>
<td>30</td>
<td>17.70</td>
<td>3.25</td>
<td>58</td>
<td>5.99</td>
<td>Significant at 0.05 level S</td>
</tr>
</tbody>
</table>

The table showing achievement mean scores between pretest of Experimental group and posttest of Experimental group.

The calculated 't' value is (5.99) greater than table value (2.00). Hence null hypothesis is rejected at 0.05 level. Hence there is significant difference between the pre test of Experimental group and post test experimental group in achievement mean scores of the students in learning Tamil Grammar through CALL at standard VIII.

**Hypothesis:4**

There is no significant difference in achievement mean score between the post test of controlled group and the second post test of treatment given to controlled group

<table>
<thead>
<tr>
<th>Stages</th>
<th>N</th>
<th>Mean</th>
<th>S.D</th>
<th>df</th>
<th>t-value</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Post test Control group</td>
<td>30</td>
<td>10.78</td>
<td>3.12</td>
<td>58</td>
<td>6.771</td>
<td>Significant at 0.05 level S</td>
</tr>
<tr>
<td>Post test Control group after treatment</td>
<td>30</td>
<td>16.35</td>
<td>3.25</td>
<td>58</td>
<td>6.771</td>
<td>Significant at 0.05 level S</td>
</tr>
</tbody>
</table>

The table showing achievement mean scores between Post test of control group and second post test of treatment given controlled group.
The calculated 't' value is (6.77) greater than table value (2.00). Hence null hypothesis is rejected at 0.05 level. Hence there is significant difference between the pre test of Post test of control group and post test of treatment given to the control group in achievement mean scores of the students in learning Tamil Grammar.

**Hypothesis :5**

Computer Assisted Learning is more effective than conventional methods in learning Tamil Grammar

Achievement mean scores of the learners in post-test of control group is 10.78 and the achievement mean scores of the learners post test of control group after treatment of using CALL is 16.35. Score of the post test of Experimental group (17.70) is greater than Pre test of Experimental group (12.70). Above both assure that acquiring the skill of learning Tamil Grammar by using CALL is more effective than conventional methods.

**FINDINGS**

1. In the post-test, students scored 70% of marks and the trainees scored 30% of marks in the conventional method.
2. There is no significant difference between the Pret test of control group and post test of control group in achievement mean scores.
3. There is significant difference in achievement mean score between the pre test of Experimental group and post test of Experimental group.
4. There is significant difference in achievement mean score between the post test of controlled group and the second post test of treatment given controlled group.
5. Computer Assisted Language Learning is more effective than existing methods in learning Tamil grammar.

**EDUCATIONAL IMPLICATIONS**

1. CALL in Tamil grammar can be extended to primary level, secondary level and higher secondary level.
2. It can be encouraged to implement to use in adult education.
3. It may be activated in teachers education also.
4. It can be used in the classroom of Tamil as a second language learners.

**References**

- Chapelle Co (1997) "CALL in the Year 2000: still in search of research paradigms?" Language Learning & Technology 1, 1: 19-43
- Chapelle Co (1998) "Multimedia CALL: lessons to be learned from research on instructed SLA", Language Learning & Technology 2, 1: 22-34