# MOBILE LEARNING TO ENRICH VOCABULARY IN ENGLISH

By

#### G. SINGARAVELU

Reader, UGC-Academic Staff College, Bharathiar University, Colmbatore.

#### **ABSTRACT**

The study enlightens the impact of Mobile learning in enriching the vocabulary in English at standard VIII. Objectives of the study: To find out the problems in enriching vocabulary in English at standard VIII. 2. To find out the impact of Mobile learning in enriching vocabulary in English. Hypothesis: There is no significant difference in achievement mean score between the pre test of experimental group and post-test of experimental group in enriching vocabulary. Variables: Mobile Learning and achievement mean scores were used as the variables in the study. Methodology: Equivalent group experimental method was adopted in the study. Sample: Seventy students (35 control group+35 experimental group) were selected as sample for the study. Tool: An achievement test was made by the researcher. Pilot study was administered towards the ten students. Validity: Validity was established by the juries' opinion. Reliability was established by the test-retest method. Statistical technique: 't' test was used as statistical technique in the study. Finding: Mobile Learning is more effective than conventional methods in learning vocabulary in English at standard VIII. Educational implications: Mobile learning may be used to eliminate the problems and increase scores in other subjects also.

Keywords: Mobile Learning, Multimedia package, Decoder and Communicative Skills.

#### INTRODUCTION

English language is to be developed among the younger learners to enrich the understanding and the culture of different countries, acquiring the competency in various disciplines and promoting the wisdom to stand on the platform of globalization. Oral skills and written skills are to be revamped to acquire and achieve the expected competency of the learners in English language. Vocabulary has unique place to acquire skills in a language and it should be ameliorated for using appropriate contextual words for better understanding of the concept. Learners of English as a second language of standard VIII should possess 2000 vocabularies which assist to carry the appropriate communications of the learners to the decoders. Vocabulary is a backbone of English language. Maximum learners endeavour to use active vocabulary instead of passive vocabulary due to poor acquisition of vocabularies. Since learning English is very popular in non-English speaking countries, developing modern assisted-learning tools that support effective teaching of English solves the critical issues in the English-language education. Most of the second language English learners involve memorization practice on acquiring a large number of vocabularies and numerous grammatical structures. Such practices and methods were not fruitful for the different types of learners. Vocabulary learning is a principal issue for English learning because vocabulary comprises the basic building blocks of English sentences. Many studies have attempted to improve the efficiency and performance when learning English vocabulary. With the accelerated growth in wireless and mobile technologies, mobile learning using mobile cell phones has gradually become effective because it inherits all the advantages of e-learning and overcomes limitations of learning time and space that limit web-based learning systems. Hence, this study presents learning English vocabulary through mobile. Theory and learning memory cycle, recommends appropriate English vocabulary for learning according to individual learner vocabulary ability and memory cycle. Chih-Ming in his Personalized mobile English vocabulary learning system based on item response theory and learning memory cycle) suggested that the Mobile learning could obviously promote the learning performances and interests of learners due to effective and flexible learning mode for English vocabulary

learning (Volume 51, Issue 2 (September 2008) Pages 624-645 Year of Publication: 2008 ISSN:0360-1315. Barrett Hazeltine recommends in his review that Ubi-learning involves ubiquitous computing and mobile technologies, which are useful in designing innovative learning experiences. Mobile learning with cell phones offers a unique response to this need. Timothy.G Collins (2005) advocates in the study that mobile phones can support many kinds of learning, including language learning. This article explores the emerging technologies available for mobile language learning, and provides a model for integrating research-based pedagogy with available and emerging technologies to develop learning objects for effective, engaging mobile language learning. Nokia Director of Mobile education, Peter Zhang, said: "As a new interactive learning tool, Mobile education makes learning possible anywhere and any time, and that is why it has been very popular in the market.

# Need of the Study

Learners as well as teachers are using very limited vocabulary at primary level due to the failure of reading habits. Acquiring more vocabulary becomes easy by adopting innovative methods instead of advocating conventional methods such as rote memory of vocabulary. Today maximum young learners are attracted by the video-games and mobile-games. Mobile phone is an interesting tool to ameliorate the vocabulary in English. M-learning is convenient in the sense that it is accessible from virtually anywhere, which provides access to all the different learning materials available. It is also collaborative; sharing is almost instantaneous among everyone using the same content, which leads to the reception of instant feedback and tips. M-Learning also brings strong portability by replacing books and notes with small RAMs, filled with tailored learning contents. In addition, this kind of learning is engaging and fun. It is simple to utilize mobile learning for a more effective and entertaining experience. Hence the researcher selected the Mobile learning to eliminate the problems of the learners of standard VIII in learning vocabulary in English.

#### **Review Related Studies**

Yong Liu, Jun Liu, Shengquan Yu(2008) suggested that in recent years there was an incremental amount of mobile learning experiments for the purpose of implementing mobile ICTs into mainstream education. However, the adoption of mobile learning in basic education primary and secondary schools, is still disappointingly slow, rather than exponential. This case study portrays a unique and novel education concept derived from the Chinese mobile learning industry, in which Noah Education Holding Co., Ltd (Noah) acts as a premier provider of mobile learning services and devices. In China, mobile learning has already formed a booming market. In 2008, six million educational electronic devices are predicted to be sold which digital learning devices (DLDs) appear to be leading the trend. Astonishingly, these devices are not mobile phones and the vast majority of them can't even connect to wireless networks. However, they embrace a wide range of new technologies and are widely accepted by students and teachers in particular. As a result, the success of Noah challenges the popular understanding of mobile learning and offers an alternative to implement mobile ICTs into the basic education.

Jones and Issroff (2007) point out the value of mobile technologies in supporting informal learning. They advocate that mobile technologies are potentially very valuable, especially in developing countries, because of their swift take-up rate. Minges (cited in Moon 2007) claims that in Sub-Saharan Africa digital communication technologies are spreading rapidly and that Africa has the fastest growing telecommunication sectors in the world. Moon speculates that within less than a decade widespread connectivity will become commonplace in even the most remote part of Sub-Saharan Africa (2007: 19). His view is strongly supported by Atkins, Seely-Brown and Hammond who maintain that wireless cellular phone technologies offer new opportunities for OER [open educational resource] access, especially in the developing world(2007).

Pask (1976), Conversation theory describes effective learning occurs when people can converse with each

other, by interrogating and sharing their descriptions of the world.

A mobile learning device can assist conversational learning by integrating learning descriptions across different locations, for example by making connections between exhibits in a museum, and by holding the results of learning actions for later retrieval and reflection. It can also provide tools to support learning in context, such as electronic measuring instruments, maps and reference guides.

Sharples, M. (1976), Disruptive devices: mobile technology for conversational learning. There is a specific focus on the use of mobile technologies to promote, facilitate and enhance interactions and collaborations between students. Both the capabilities of mobile devices and their wide context of use contribute to their propensity to foster collaboration. Mobile devices can easily communicate with other devices of the same or similar type, enabling learners to share data, files and messages. They can also be connected to a shared data network, further enhancing possibilities for communication. These devices are also typically used in a group setting, and so interactions and collaboration will tend to take place not just through the devices but also at and around them as well.

#### Objectives

The researcher has framed the following objectives of study:

- To identify the problems of the young learners in using the present methods of learning Vocabulary in English at standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore.
- To find out the significant difference between the post-test of control group and post-test of Experimental group in achievement mean scores of the pupils in learning English vocabulary.
- To find out the significant difference between the pretest of Experimental group and post-test of Experimental group in achievement mean scores of the pupils in learning English vocabulary.

4. To assess the impact of Mobile learning in learning English vocabulary.

# Hypotheses

The researcher has framed the following hypotheses:

- Students of standard VIII have problems in learning Vocabulary in English at Maruthamalai Devasthanam Higher Secondary School, Coimbatore.
- There is no significant difference between the post test of control group and post test experimental group in achievement mean scores of the pupil of standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore.
- 3. There is no significant difference between the pre test of Experimental group and post test of Experimental group in achievement mean scores of the pupils.
- 4. Learning English Vocabulary by using Mobile is more effective than existing conventional methods.

#### **Variables**

The independent variable namely Mobile Learning and the dependent variable namely achievement score were used in the study.

## Delimitations of the Study

The responsibility of the researcher is to see that the study is conducted with maximum care in order to be reliable. However, the following delimitations could not be avoided in the present study.

- The study is confined to 60 students of standard VIII studying in Maruthamalai Devasthanam Higher Secondary school, Coimbatore.
- 2. The study is confined to learning English vocabulary of the state board text book.

# **Operational Definitions**

Mobile learning could obviously promote the learning performances and interests of learners due to effective and flexible learning mode for English vocabulary learning

## Method of Study

Experimental method (control group and experimental

method) was adopted for the study.

# Sample design

Sixty pupils of standard VIII Maruthamalai Devasthanam Higher Secondary school, Coimbatore were selected as sample for the study.

### Tool used for the Study

The investigator has made use of self-made achievement test as the tool for conducting the study.

#### Construction of tools

The investigator's self made Achievement test was used for the pre-tests and post-tests of both control groups and experimental groups. The same question paper was used for both pre- and post-tests to evaluate the pupils' skills of vocabulary in English through objective types of question which carried one mark for each question and contained 25 marks.

### Pilot study

A pilot study had been undertaken in order to ascertain the feasibility of the proposed research and also the adequacy of the proposed tools for the study. During the pilot study the problem under study had been finely tuned. Sufficient number of model question papers were prepared and distributed to 10 students of standard VIII in Maruthamalai Devasthanam Higher Secondary school, Coimbatore for the pilot study. The exercise was repeated twice over two sets of 10 students each. The clarification raised by the students were cleared then and there and the filled answer scripts were collected by the researcher. The selected students were not part of either the control group or experimental group.

# Reliability of the tool

A test is reliable if it can be repeated with a similar data set and yields a similar outcome. The expectation of a good research is that it would be reliable. It refers to the trustworthiness or consistency of measurement of a tool whatever it measures. Under this study the reliability had been computed using test-retest method and the calculated value was found to be 0.84. The value is quite significant and implies that the tools adopted were reliable. Hence the reliability was established for the study.

# Validity of the tool

The concept of validity is fundamental to a research result. A result is internally valid if an appropriate methodology has been followed in order to yield that result. A test is said to be valid if it measures what it intends to measure. The expert opinion of the co-staff was obtained before freezing the design of the tools. Subject experts and experienced teachers were requested to analyse the tool. Their opinions indicated that the tool had content validity.

# Final Study

Sufficient copies of the revised tool were prepared and distributed to the selected sample of students of standard VIII for control group as well as experimental group.

# Procedures of the study

*Phase 1:* Identification of the problems of the learners of standard VIII in learning vocabulary in English through existing methods.

*Phase 2:* The problem of the learners in learning Vocabulary in English was discussed with the class teachers.

Phase 3: Discussion about available educational technology in the school.

Phase 4: Preparation of the tool with the help of the class teacher.

*Phase 5:* Administrating pre-tests to both groups of the children in English vocabulary and evaluating the test.

*Phase 6:* Preparation of activities for learning vocabulary through mobile learning.

- a. Dividing the class in to small groups.
- b. Two mobile phones were given to two groups.
- c. One group coined one word and sent it as SMS to another group.
- d. Another group sent synonyms to the word.
- e. One group coined ten words and presented through cell phone.
- f. One group sent some fill up the blanks.
- h. Another group sent reply with missed letters through SMS.

- Providing dictionary to correct the spelling in the class room.
- j. Teacher is a facilitator of the teaching learning process.

Phase 7: Practicing the new methods in the classroom.

Phase9: Evaluating the new method.

*Phase 10:* Administering the post test towards the learners of Mobile learning.

# Data collection

The researcher administered pretest to the pupils with the help of the teachers. The question paper and response sheets given to the individual learners were collected and evaluated for the learning obstacles of the learners identified by the pre-test. The causes of low achievement by unsuitable methods were found out. Thirty Mobiles were used in the classroom for learning vocabulary for one week. The post-test was administered and the effectiveness of the Mobile learning was found.

# Data analysis

Statistical technique 't' was applied for the study.

#### Hypothesis Testing

# Hypothesis 1

Students of standard VIII have problems in learning Vocabulary in English at Maruthamalai Devasthanam Higher Secondary School, Coimbatore.

In the pre-test, students scored 33% marks in learning English vocabulary through conventional method and the Experimental group students scored 67% marks. It shows that Students of standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore had problems in learning English vocabulary through conventional method.

# Hypothesis 2

There is no significant difference between the post test of control group and post test of experimental group in achievement mean scores of the pupils in learning Vocabulary in English at standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore

The calculated 't' value is (9.64) (Table 1) greater than

Stages	N	Mean	S.D.	df	"rvalue	Level of significance
Post-test control group	30	10.70	3.23	58	9.64	P>0.05
Post-test Experimental group	30	17.62	3.21	50		

Table 1. Showing achievement mean scores between post-test of control group and post-test of Experimental group.

Stages	N	Mean	S.D.	df	t-value	Level of significance
Pre-test Experimental group	30	13.70	3.24	58	8.60	P>0.05
Post-test Experimental group	30	17.62	3.21			

Table 2. Showing achievement mean scores between pre-test of Experimental group and post-test of Experimental group.

table value (2.00). Hence null hypothesis is rejected at 0.05 levels.

Hence there is significant difference between the posttest of control group and post-test of experimental group in achievement mean scores of the learners in learning vocabulary in English.

### Hypothesis 3

There is no significant difference between the pre-test of Experimental group and post-test of Experimental group in achievement mean scores of the pupils in learning vocabulary in English.

The calculated 't' value is (8.60) (Table 2) greater than Table value (2.00). Hence null hypothesis is rejected at 0.05 levels. Hence there is significant difference between the pre-test of Experimental group and post-test of Experimental group in achievement mean scores of the learners of English vocabulary.

#### Hypothesis 4

Learning vocabulary by using mobile is more effective than existing methods.

Achievement mean scores of the learners in post-test of control group is 10.70 and the achievement mean scores of the learners of post-test of Experimental group is 17.62. It shows that learning vocabulary by using mobile is more effective than conventional methods.

#### **Findings**

In the pre-test, students scored 33% marks in learning

English vocabulary through conventional method and the Experimental group students scored 67% marks. It shows that Students of standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore had problems in learning English vocabulary through conventional method.

There is significant difference between the post test of control group and post test of Experimental group in achievement mean scores of the pupil of standard VIII in learning vocabulary through Mobile phones in Maruthamalai Devasthanam Higher Secondary School, Coimbatore.

There is significant difference between the pre test of Experimental group and post test of Experimental group in achievement mean scores of the pupils in learning English vocabulary.

Learning vocabulary in English by using Mobile phone gave significant improvement.

### Suggestions

- 1. Mobile learning 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 implemented in teacher education.
- 4. It may be implemented in alternative schools.
- 5. Slow learners can be improved by using it.
- 6. It may be more supportive to promote Sarva Siksha Abhiyan in grass root level.

#### Conclusion

The study reveals that Students of standard VIII in Maruthamalai Devasthanam Higher Secondary School, Coimbatore had problems in learning English vocabulary through conventional method which is not learner friendly

and the learners failed to achieve expected competency. Students are more enthusiastic to handle the mobile for acquiring more vocabulary with play way activities and mutual interaction of the young learners. There is a significant difference between the pre test of Experimental group and post test of Experimental group in achievement mean scores of the pupils in learning English vocabulary. It is confirmed that learning vocabulary in English through Mobile learning is more effective than conventional methods. Hence it will be more supportive to enrich vocabulary in English at upper primary education.

#### References

- [1]. **Jones and Issroff (2007)**. A Project on mobile learning in South Africa.
- [2].Minges (Moon 2007). Saharan Africa digital communication, a case study. Ubi-learning involves ubiquitous computing and mobile technologies, which are useful in designing innovative learning experiences.
- [3]. Pask (1976). Conversation theory on mobile learning.
- [4].Ray, William, S.(1960). An introduction of experimental design: The Macmillan company: New York.
- [5]. Sharples, M. (1976). Disruptive devices: mobile technology for conversational learning.
- [6]. Singaravelu. G (June 2007). Recent Trends in Educational Technology, *i-manager's Journal on School Educational Technology*, Vol. 3, No. 1, pp. 44-46.
- [7]. Timothy.g Collins (2005) English Class on the Air: Mobile Language Learning with Cell Phones
- [8]. Yong Liu, Jun Liu, Shengquan Yu(2008). A Case Study on Mobile Learning Implementation in Basic Education, *CSSE*, Vol. 5, pp.593-597, 2008 International Conference on Computer Science and Software Engineering.

## ABOUT THE AUTHOR

Dr. G. Singaravelu is working as a Reader in UGC-Academic Staff College, Bharathiar University, Coimbatore and Co-ordinator of B.Ed programme of Bharathiar University. He is specialized in primary Education, Secondary Education and Teacher Education. He has served as a State resource person for DIET faculties. He has published 40 research articles, participated in 30 seminars and published 3 Books. NCERT'S meritorious National award crowned him for introducing innovative gadget at Primary Education.

