

THE ANALYSIS OF CALL, DISCUSSION AND LECTURE METHOD TOWARD STUDENTS' SPEAKING SKILLS

Tekat Sukomardojo

Jayapura Aviation Polytechnic, Papua, Indonesia

Email: sukomardojo@gmail.com

ARTICLE INFO

Date received : August 30, 2022
Revision date : September 18, 2022
Date received : September 28, 2022

Keywords:

CALL; discussion method; lecturing method; speaking skills

ABSTRACT

Technology and education is rapidly expanding and cannot be separated to each other. One of them is computer-assisted language learning (CALL), which is used to learn English. CALL is a computer-aided learning media used in education that is simple to access, disseminate, and save. Following that, this study attempted to determine the impact of CALL media with lecture technique and discussion on the cadets' English-speaking skills. This study employed a quantitative approach and descriptive quantitative analysis to uncover issues that arose during English learning. By reviewing the learning process, which involved 50 cadets from both classes A and B, statistical analysis was used. The results revealed a substantial difference in the use of CALL media in the lecture style and the discussion on English speaking skill.

INTRODUCTION

Surabaya Merchant Marine Polytechnic, in the field of education, is one of the vocational universities that continuously improves its graduates' abilities to meet the demands of industries such as shipping companies, port authorities, and all persons engaged in the maritime industry both at home and abroad. The ability to speak in English is one of the skills that should be enhanced. The role of attitudinal elements in second or foreign language learning are deeply embedded in the psyche of the kids. Teachers and scholars have universally regarded motivation as one of the important elements influencing the rate and success of foreign language learning (Ghazvini & Khajehpour, 2011). Moreover, all educational institutions should implement and standardize the management quality (Sallis, 2006). The willingness to communicate is the possibility of engaging in communication; it is the willingness to speak in a second or foreign language (Aliakbari et al., 2016). For example, in educational institutions that promote long-term quality programs and the ability to communicate in English in order to meet the demands of the worldwide maritime business. Learning a foreign language is essential at all educational levels, therefore communicating in English has become a significant competency that should be practiced in all academic settings (Fandiño et al., 2019).

Education cannot be separated from technological developments, especially in higher education to support learning (Sadiman & Rahardjo, 2002). The development of educational technology produces various concepts and educational practices that use the media as a source of learning (Sudjana & Rivai, 2009). The use of ICT tools in EFL classes can enhance student learning; additionally, there is a correlation between students' high motivation and the

perceived need for CALL, and students enjoy and appreciate their computer-based learning (Meshkat & Hassani, 2012). For example, it was discovered that obtaining grammar points given via e-mail can be beneficial in boosting learners' grammar scores using a computer as a tool and e-mail as an application (Pirasteh, 2014). This creates the impression that educational technology is comparable to media. However, this view is actually paradoxical because the media's role is just to deliver the lesson's substance or material. In education system, technology has role to support curriculum development, including design, development, and implementation (Sukomardojo & Ratnaningsih, 2022). Surabaya Merchant Marine Polytechnic itself has a wide range of computer labs and simulators to support learning activities.

In connection with English learning, Computer Assisted Language Learning or CALL is used. It is a computer-aided learning media which easy to access, to spread, and to stored (Levy & Hubbard, 2005). CALL could improve Indonesian EFL learners' motivation (Adara & Haqiyah, 2021). Language education has also experienced improvements in digital technology during the last two decades, which have made substantial contributions to computer-assisted language learning (CALL) along similar lines (Shahriarpour, 2014). Meanwhile, according to Levy (1997), CALL is more succinctly and more broadly as a search for study of applications of the computer in language teaching and learning. CALL is thought to be a computer application for language acquisition. However, based on observations, the majority of classroom learning activities continue to rely on debate and lecturing. According to the assessment, cadets' oral test results and practice were still below average. Aside from test scores, the length of time spent speaking and expressing things, such as picking vocabulary, was frequently problematic. Furthermore, the speech is slow and lacks the bravery to initiate conversation with lecturers or students. As a result, with the availability of a language laboratory equipped with computers and the same total number of cadets in one class, Computer Assisted Language Learning (CALL) using the approach of discussion and lectures is projected to increase English speaking skills (Hashmi, 2016). Hence, the aim of this study is to know how much the influence of Computer Assisted Language Learning (CALL) combined with the discussion and lecturing method on the students' English-speaking skill.

The test scores covered the length of time spent speaking during Q&A and explaining their ideas or ideas, the difficulty in picking terminology, the duration of speaking is also slow, and the lack of bravery to begin talking to the lecturer or classmates. The average outcomes of the capacity to speak English to as many as 60 cadets before taking action with CALL media were less than 60% of the projected results, which were 80%. The sample's aspects of speaking skills had a value of 40% for fluency of speech (fluency), 50% for grammar (structure), 50% for pronunciation (pronunciation), 50% for tone of voice and pause (intonation and pitch), and 60% for understanding of spoken material (comprehension). As a result, with the availability of a language that is equipped with a computer and the same number of cadets in one class, it is believed that computer-assisted language learning (CALL) with discussion and lecture approaches can increase speaking skills in English.

METHOD

The study used quantitative study. Quantitative research is concerned with numbers, reasoning, and an objective viewpoint. Quantitative research focuses on numerical and unchangeable facts, as well as thorough, convergent thinking rather than divergent reasoning such as the spontaneous, free-flowing creation of a variety of ideas concerning a study subject (Creswell, 2012). To find out if the application of this study was either successful or not, there were 20 cadets in the Class II Nautica used as samples. The study used a quantitative approach with experimental quasi-experiments (Arikunto, 2013). Data retrieval by comparing initial ability

with after taking the initial test (pre-test) and final test (post-test). This study took on The Surabaya Voyagers Second Class.

In this study there are two variables of free or variable x (independent variable) and variable bound or variable y (variable). The free variable was the study of vocabulary using games. This variable can be manipulated and controlled by researchers. Whereas the fixed variable was the ability of the SMCP of the English maritime language of the cadets.

This variable can be manipulated and controlled by the researcher. While the dependent variable is the SMCP vocabulary ability in maritime English of the cadets. The location used in this study is the Surabaya Merchant Marine Polytechnic class Nautica C semester II.

Whereas the fixed variable was the ability of the SMCP of the English maritime language of the cadets.

- 1) The methods of data collection used in the study are those of tests and the questionnaire. Test method testing methods are used for data retrieval, (pre-test) for treatment before treatment and post-test, after treatment is administered.
- 2) Method of observation (observation) Observation methods are used to identify any or no obstacles to the implementation of the game games "catch, play ball," "scavenger hunt," and "quiz show" at vocabulary class.

RESULTS AND DISCUSSION

This session discussed some matters related to the processing of data for research, starting with: Presentation of data, analysis presentation, hypothetical testing, and research results. As for more details, as follows: Starting and final tests are analysed with the following steps:

- 1) Determining assessment criteria given to cadets and tabulating frequencies according to assessment category
- 2) Based on the data tabulations, the percentage of each according to the margin.
- 3) The sum deduction of each data is derived from the small percentage.
- 4) In this data analysis, it's searched for a percentage of the extent of SMCP Maritime English vocabulary proficiency on initial and final tests to find out the improvement in vocabulary proficiency. Pre-test value data from 20 cadets were obtained and shown with the following descriptive statistics:

Table 1
Maritime English Pre-test Scores

N Valid	20
Missing	0
Mean	62.1000
Median	68.0000
Mode	60.00
Std. Deviation	4.37547
Minimum	38.00
Maximum	92.00
Sum	1242.00

Based on Table 1 above, the value of the average (mean) is 62.10, the minimum on which the cadet gets is 38 and the maximum value of 92 and The Frequent mode or score of 60.

Table 2
Distribution of The Frequency of Maritime English Achievement Value

Valid	Frequency	Precent	Valid Precent	Cumulative Precent
38.00	1	5.0	5.0	5.0
48.00	3	15.0	15.0	20.0
50.00	1	5.0	5.0	25.0
54.00	1	5.0	5.0	30.0
60.00	4	20.00	20.00	50.0
62.00	3	15.0	15.0	65.0
68.00	1	5.0	5.0	70.0
70.00	1	5.0	5.0	75.0
72.00	1	5.0	5.0	80.0
74.00	1	5.0	5.0	85.0
76.00	1	5.0	5.0	90.0
78.00	1	5.0	5.0	95.0
92.00	1	5.0	5.0	100.0
Total	20	100.0	100.0	

Based on Table 2, it shows that the most common value is 60 with the number of cadets as many as 4 or 20% of the number. Whereas the least of which appears is 38.50,54.68.70,72,74,778 and 90 of the remaining 30.

Maritime English Post-Test value data presentation of 20 cadets is obtained with descriptive statistics as follows:

Table 3
Maritime English post-tests scores

N	Valid
	20
	Missing
Mean	0
Median	80.2000
Mode	80.0000
Std. Deviation	82.00
Minimum	8.0786842
Maximum	60.00
Sum	94.00
	1604.00

Based on Table 3 above, the average value (mean) for 80.20 minimum value cadets get is 60 and the maximum value they reach is as high as 94. Frequent score of 82.

Table 4
Distribution of English Post-Test Value Frequency Maritime

Valid	Frequency	Precent	Valid Precent	Cumulative Precent
60.00	1	5.0	5.0	5.0
70.00	1	5.0	5.0	10.0
72.00	2	10.0	10.0	20.0
74.00	2	5.0	10.0	30.0
78.00	1	10.0	5.00	35.0
80.00	2	20.0	10.0	45.0
82.00	4	5.0	20.0	65.0
84.00	1	10.0	5.0	70.0

Valid	Frequency	Precent	Valid Precent	Cumulative Precent
86.00	2	10.0	10.0	80.0
88.00	2	5.0	10.0	90.0
90.00	1	5.0	5.0	95.0
94.00	1	5.0	5.0	
Total	20	100.0	100.0	100.0

Based on Table 4, it appears that the frequently appear value is 82 with a total of 4 or 20% of the number of cadets. While at least 60, 70, 78, 84, 90 and 94 in the number of 1 person.

In the maritime English vocabulary test instrument, given a value of 1 for the correct answer and vice versa given the number 0, then the processing is carried out using validated analysis of the Pearson Correlation Method obtained the following calculations:

Table 5
Pearson Correlation's calculations for the validity test

No	The Points	Conclusions
1.	.691**	Valid
2.	.642**	Valid
3.	.826**	Valid
4.	.848**	Valid
5.	.738**	Valid
6.	.681**	Valid
7.	.426**	Valid
8.	.756**	Valid
9.	.384**	Valid
10.	.419**	Valid
11.	.443**	Valid
12.	.515**	Valid
13.	.632**	Valid
14.	.496**	Valid
15.	.361**	Valid
16.	.657**	Valid
17.	.427**	Valid
18.	.350*	Valid
19.	.509**	Valid
20.	.661*	Valid

Based on Table 5, that maritime English test instruments have 20 problems with different things. By comparison with table 5% (n =20) by 0356, it is decided that the English assessment is valid because t calculating > table. As to know the reliability of the English maritime test, it can be calculated using a version of the SPSS program 17.0 and obtained the following results.

Table 6
Table of calculating Reliability Test Case Processing Summary

	N	%
Cases Valid	20 0	100.0
Excluded Total	20	.0
		100.0

Listwise deletion based on all variables in the procedure

Table 7
Reliability Statistics

Cronbach's Alpha	Cronbach's Alpha Based On Standardized Items	N of items
.755	.743	20

Based on Table 7, they obtained a host of technical analyses with the value of Cronbach alpha 0.755, which is more than an alpha religious requirement of the amount, 0.6, so that the test instrument was restated reliable or when re-examined the latter at later time, it obtained no different results. The usage of the independent test first sample is to find out if there's a difference between pre-test and post-test scores. The meaning of the word independent is free, which means no relation between two samples or two values will be tested. To perform the test, it requires a preliminary hypothesis as follows.

The two groups come from different classes. To perform the T-test, the following initial hypothesis is needed:

H0: There is no significant effect in the use of Computer Assisted Language Learning (CALL) media using discussion and lecture methods on English speaking skills.

H1: There is a significant influence in the use of Computer Assisted Language Learning (CALL) media using the discussion and lecture method on English speaking skills. Obtained the following results.

Table 8
Computer Assisted Language Learning (CALL) using discussion and lecture methods on English speaking skills

Group	Mean	T arithmetic	Df
CALL & discussiom	19.0	0,501	59
CALL & presentation	18,5		

Based on Table 8. It can be seen that the value of the T arithmetic has a probability of 0.501. Because the probability is > 0.05 , then H0 is rejected, or in other words, there is a difference between the pre-test results of the CALL group with the discussion method and the CALL group with the lecture method.

CALL group post-tests data with discussion. In this group, they bound teaching and learning activities with maritime English subjects and computer-assisted media or Computer Assisted Language Learning (CALL) which are also the same as the discussion method. Before the post test, lecturers and cadets were asked to demonstrate their ability to speak in English by means of roleplay, namely communicating using a ship in an emergency and asking for help immediately. Another cadet. Act as another ship that responds and will provide assistance. After this activity was completed, in this study speaking skills are studied only in three categories: grammar, fluency and comprehension. were immediately discussed in the form of questions and answers, especially in overcoming obstacles or problems encountered such as pronunciation errors, grammar, and others. After that, the post-tests were done.

Table 9
Descriptive Statistics Post-test CALL with Discussion Group Method

N	Valid	25
	Missing	0
Mean		80.0689
Median		88.0000
Mode		80.0000
Std. Deviation		4.2329
Minimum		77
Mximum		92

Based on Table 9, it is known that from 25 cadets, the value or score of speaking has an average (mean of 80.06%. While the number of middle (median) is 88 and the mode or value that often appears is 88. For the lowest value is 77 and the highest value is 92. Then for the distribution of data, the value of 77 appears, the value of 78 is 6, and the value of 80 is 8, the value of 88 is 6, and the value of 92 is 1.

Table 10
Frequency of Distributed Post-test CALL with Discussion Group Method

	Frequency	Percent	Valid Percent	Comulative Percent
Valid	4	16.0	16.0	16.0
77	6	24.0	24.0	40.0
78	8	32.0	32.0	72.0
80	6	24.0	24.0	96.0
88	1	4.0	4.0	100.0
92				

In Table 10, they bound teaching and learning activities with maritime English subjects and computer-assisted media or Computer Assisted Language Learning (CALL) which are also the same as the discussion method. Before the post-test, lecturers and cadets were asked to demonstrate their ability to speak in English by means of roleplay, namely communicating using a ship in an emergency and asking for help immediately. Another cadet. Act as another ship that responds and will provide assistance. After this activity was completed, in this study speaking skills are studied only in three categories: grammar, fluency and comprehension. were immediately discussed in the form of questions and answers, especially in overcoming obstacles or problems encountered such as pronunciation errors, grammar, and others. After that, the post-tests were done.

Table 11
Descriptive Statistics Post-test CALL with Discussion Group Method

N	25
Valid	0
Missing Mean	71.3200
Median Mode	70.000
Std.Deviation	4.2329
Minimum	65
Maximum	80

Based on Table 11, the data processing in table 11 above, it is known that of the 25 cadets, the score for speaking has an average of 71.32. While the number of the median is 70 and the mode or value that often appears is 70. The lowest value is 65 and the highest value is

80. Then for the distribution of data, the value of 65 is 2, the value of 70 is 13, and the value of 73 is 6, the value of 75 is 3 and the value of 80 is 1.

Table 12
Frequency of Distributed Post-test CALL with Discussion Group Method

	Frequency	Percent	Valid Percent	Comulative Percent
Valid	2	8.0	8.0	8.0
65	13	52.0	52.0	60.0
70	6	32.0	32.0	82.0
73	3	24.0	12.0	96.0
75	1	4.0	4.0	100.0
80				

Table 13
Post-test test results between the CALL Group with Discussion Group Method

Group	Mean	Calculated T
CALL & Discussion	21.48	1.301
CALL & Lecturer	19	49

Regarding Table 12, the calculated t value has a probability of 1.301. Because the probability is > 0.05 , then H_0 is a difference. Between the post-tests results from the CALL group with the discussion method and the CALL group with the lecture method.

Table 14
The difference between the results of the pre-test and post-test between groups CALL with Discussion Group Method

Group	Mean	Difference Amount
Pre-test group CALL with discussion	19.0	+248
Pre-test group CALL with discussion	21.48	+248
Pre-test group CALL with discussion group	18.5	+0,5
Pre-test group CALL with discussion group	19	+0,5

Based on Table 14, the results of the hypothesis test used T-test, we can find that there is a significant difference using Computer Assisted Language Learning (CALL) with discussion and lecture methods on English speaking skills. It's clear from the results of hypothesis testing which shows the calculated T is greater than the T-table at a significant level of 5%, thus it can be concluded that the use of Computer Assisted Language Learning (CALL) media using diction and lecture methods on English speaking skills resulted in indifference. The final results in the two groups although higher results were achieved by the group CALL with the discussion method. This can be seen in all the difference amount by the CALL group with discussion compared to the call group with lectures, namely $21.48 > 1$.

CONCLUSION

The study's findings and discussion of research data indicate that there is a substantial difference in the usage of computer-assisted language learning (CALL) media employing dialogues and lectures on English speaking skills. The results of hypothesis testing show that the calculated T is greater than the T-table at a significant level of 5%, so it can be concluded that the use of Computer Assisted Language Learning (CALL) media using diction and lecture methods on English speaking skills resulted in indifference final results in both groups, though

the group using CALL with the discussion method achieved higher results than the group using CALL with the lecture method.

REFERENCES

- Adara, R. A., & Haqiyah, A. (2021). Improving Indonesian EFL learners' motivation through computer assisted learning (CALL). *Journal of English Language Studies*, 6(1), 110–121. [Google Scholar](#)
- Aliakbari, M., Kamangar, M., & Khany, R. (2016). Willingness to Communicate in English among Iranian EFL Students. *English Language Teaching*, 9(5), 33–45. [Google Scholar](#)
- Arikunto, S. (2013). *Prosedur penelitian suatu pendekatan praktik*. [Google Scholar](#)
- Creswell, J. W. (2012). *Educational research: Planning conducting and evaluating quantitative and qualitative research (4th ad.)*. Boston, MA. [Google Scholar](#)
- Fandiño, F. G. E., Muñoz, L. D., & Velandia, A. J. S. (2019). Motivation and E-Learning English as a foreign language: A qualitative study. *Heliyon*, 5(9), e02394. [Scopus](#)
- Ghazvini, S. D., & Khajehpour, M. (2011). Attitudes and motivation in learning English as second language in high school students. *Procedia-Social and Behavioral Sciences*, 15, 1209–1213. [Scopus](#)
- Hashmi, N. A. (2016). Computer-assisted language learning (CALL) in the EFL classroom and its impact on effective teaching-learning process in Saudi Arabia. *International Journal of Applied Linguistics and English Literature*, 5(2), 202–206. [Google Scholar](#)
- Levy, M. (1997). *Computer-assisted language learning: Context and conceptualization*. Oxford University Press. [Google Scholar](#)
- Levy, M., & Hubbard, P. (2005). Why call call "CALL"? *Computer Assisted Language Learning*, 18(3), 143–149. [Google Scholar](#)
- Meshkat, M., & Hassani, M. (2012). Demotivating factors in learning English: The case of Iran. *Procedia-Social and Behavioral Sciences*, 31, 745–749. [Google Scholar](#)
- Pirasteh, P. (2014). The effectiveness of computer-assisted language learning (CALL) on learning grammar by Iranian EFL learners. *Procedia-Social and Behavioral Sciences*, 98, 1422–1427. [Scopus](#)
- Sadiman, A., & Rahardjo, R. (2002). *Media pendidikan: Pengertian, pengembangan, dan pemanfaatan*. Jakarta: PT Raja Grafindo Persada. [Google Scholar](#)
- Sallis, E. (2006). *Total Quality Management in Education: Manajemen Mutu Pendidikan*, terj. Ahmad Ali Riyadi, et. Al., Cetakan Ke IV. Yogyakarta: IRCiSoD. [Google Scholar](#)
- Shahriarpour, N. (2014). On the effect of playing digital games on Iranian intermediate EFL learners' motivation toward learning English vocabularies. *Procedia-Social and Behavioral Sciences*, 98, 1738–1743. [Scopus](#)
- Sudjana, & Rivai. (2009). *Teknologi Pembelajaran*. CV. Sinar Baru.

Sukomardojo, T., & Ratnaningsih, D. (2022). The Influence Of Computer Assisted Language Learning (CALL) Medium User With Discussion And Lecture Method For English Speaking Skills. *International Conference of Business and Social Sciences*, 962–970. [Google Scholar](#)

Copyright holder:

Tekat Sukomardojo (2022)

First publication right:

Journal of Social Science

This article is licensed under:

