

The Correlation between Learning Style and English Learning Outcome at First Grade Students SMA PGRI 2 Jambi in Academic Year 2018/2019

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ABSTRACT

This study aimed to investigate the correlation between learning style and English learning outcome ay first grade students SMA PGRI 2 Jambi in academic year 2018/2019. This study had 28 students as participants in this current research and they were taken from 5 classes (X MIA 1, X MIA 2, X IIS 1, X IIS 2 and X IIS 3). This study uses survey method by using questionnaire which is adopted from The Barsch Learning Style Inventory as cited from NZESEI (2015) as the instrument of the research. The questionnaire itself consists of 24 statements containing 3 sub variables of learning strategies known as VAK (Visual, Auditory and Kinesthetic respectively). The coefficient correlation was analyzed by using SPSS 16 program. The result of this study found out that there was a negative correlation between learning strategies and learning outcome ($r=-.417, p<0.05$). From the three parallel constructs, there were none them correlated with English learning achievement; auditory ($r=-.383, p<0.05$), kinesthetic ($r=-.411, p<0.05$), while for visual did not correlate (at $p<0.05$) with English learning achievement. Therefore, it can be concluded that there was no correlation between students' learning strategies and the English learning outcome itself among the first graders at SMA PGRI 2 Jambi in academic year 2017/2018. For the sake of more varied results, it is suggested for the future related research to use different data collection technique (e.g: using, interview, observation and etc.) and has a bigger number sample. Next, since this present study is not done in such a long time, so further and future research can be conducted in a relatively longer time.

Key words: *Learning Style, Learning Outcome, English Learning Achievement.*

INTRODUCTION

Learning English is important to help people to compete in this globalization era. It can help people to look for the job, continue the study abroad, get a higher working position, read and get knowledge from a wide range of books. Since most books are printed in English and it obviously can help people to communicate better with other people from all over the world. It is because English is an international language that can connect people with one another. Here, of course learning style is playing important role to grant the success in learning English. If we can choose the best learning style as our preference, it can boost our English capacity.

Ardhana and Willis, (1989:4) defines that learning style as a cognitive, affective and psychomotorist characteristic, as a relatively stable indicator of action for learners to feel interconnected and react to the learning environment. While learning outcomes is described as the measurable skills, abilities, knowledge, or values that students should have amassed upon finishing a program.

These recent decades, the studies concerning learning style and learning achievement are increasing to find out whether those two things are correlated significantly or not. Most of those studies are done in secondary or senior high school level because in this stage the learners are starting to decide

their future major in the university (Cimermanová; 2018)

THE BASIC CONCEPT OF LEARNING

Learning is a process of experiencing to study something which emphasizes what occurs during the lesson in getting knowledge or skill of something and learning emphasizes a particular critical aspect of studying such as motivation, memory retention and transfer. It all makes someone be affected behaviorally (Nzesei; 2015, p. 14).

Learning is the key role of students' achievement while following their studies at education level. Learning is the basic requirement of learning style. Learning is also defined as a process of getting know something; knowledge or skills by experiencing, studying or by being taught. Lachman as cited in Nzesei (2015) claimed that in most textbook, learning is defined as a relatively permanent changing of behavioral attitude throughout experiencing. Learning is about a change: the change brought about by developing a new comprehension and skill, understanding a scientific thing, changing behavior relatively intentionally. The change is not merely uncounciously done or natural in the way that our appearance changes as we get older for instance, when we are set attending a school, following the studies requirement, doing a presentation, holding a group discussion. We are all set out to learn from that experience. But we also need to point out not every learning process is done intentionally. It can be done without any preparation by facing and experiencing tasks and problems.

However, to make this clearer, we need to know the basic concepts of learning. In 1979, Roger Säljö stated that there are 5 primary basic concepts of student's learning process: 1) Learning as a process of the enhancing a knowledge or skill. 2) Learning as a

process of memorizing. 3) Learning as the acquisition of facts, procedures etcetera, which can be retained in a real life as the practical form. 4) Learning as a making meaning process. 5) Learning as an interpretative process which aims to get know the world better

LEARNING STYLES

Based on theoretical definition of learning above, therefore, learning style is described as the characteristic cognitive, effective, and psychosocial behaviors that serve as relatively stable indicators of how learners perceive, interact with, and respond to the learning environment (Keefe, as cited in Nzesei (2015)). Learning style is a stable and consistent way of someone dealing with how she/he learns and comprehends the information in common.

Since each human is gifted with different intelligence, it is clear that we might have different preference of learning style to absorb the knowledge and skill at best. Those who have kinesthetic intelligence may be best at learning by tactile and directly experience the subject being learned. Those who are good at visualizing something may most likely to learn though seeing and gazing. So each person will have different learning style preferences.

There are numerous of learning styles theory made and developed by researchers. One of the most famous learning style theory comes from Neil Fleming. He suggested that there are three kinds of learning styles. There are visual, auditory and kinesthetic style. As a teacher, he said that someone can have only one learning style as their preference and they are best to comprehend and learn the information by the learning style that they like the most. But, there are some others who are in mixed learning styles preferences. It means they are somehow balance in those three types.

Another same type of learning styles come from Bobbie DePorter (2000). She stated that there are 3 types of learning styles. Her theory of learning style is called is VAK learning styles. It consists of visual, auditory and kinesthetic. First, visual, the characteristics are the learner tend to be best to learn through seeing and observing, they are likely to view the image rather than read out, and they often capture the information detail by remembering what they have seen. Second, auditory, the characteristic is the students learn best by listening. So they tend to like listening the verbal lectures. Third, kinesthetic, the characteristics are They usually respond the things by doing physical actions students can remember the things better by movement, coordination, rhythm, emotional response and physical comfort.

LEARNING OUTCOMES

According to Steve (2000), learning outcome is different from academic performance. Learning outcome is obtained in long-term period while academic performance is measurable at any point in time. Learning outcome is the result of someone's effort though learning process. The outcome is coming from assessment form from the tutor or teacher or instructor who has the capacity to score and asses the learners. The outcome itself does not merely come from the assessors' perception or assumption. They asses the learner based on the criteria set in a particular education level or institution.

The outcome itself can be set in form of alphabet (A, B, C, D, E, F) or in set of numbers ranging from 0-10, 0-100, or 0-4 in GPA. It is all based on the education institution that defines their own criteria. Furthermore, the process that can make the students get their outcome can be done through some learning or tests process like by

oral/written test, presentation, group discussion, project, product, portfolio, report, etc. Again and again, it is all based on how the institution creates and defines their learning curriculum and learning activities.

RESEARCH METHODOLOGY

Because this study is trying to investigate the correlation between learning style and their English scores. Johnson and Christensen (2008, p. 38), stated that correlational research refers to "a form of nonexperimental research in which the primary independent variable of interest is a quantitative variable." Additionally, correlational research mainly deals with getting a deeper understanding about the complexity of phenomena in depth or, in the matter of behavioral and educational research by researching the correlation between the variables involved in a particular study (Cohen, Manion & Marison, 2005, p.199). This study is to be conducted by using quantitative design. Quantitative research is a kind of research which is done by collecting numerical data which is then analyzed using mathematical methods. In analyzing the data, this research will use correlational computation research to encounter the result from the investigation.

The population of this study is the first graders of SMA PGRI 2 Jambi City. This grade consists five classes (X MIA 1, X MIA 2, X IIS 1, X IIS 2, X IIS 3). The total number of the population is 166. The researcher decided to choose this stage because the researcher perceived that the students have already had their own learning style while they were in previous education levels; elementary and junior high school level. The writer is going to see how their current learning's style has an effect toward their learning achievement. Here is the detail of the population.

Table 1. The Population of the Study

Class	Number of Population
X MIA 1	31
X MIA 2	28
X IIS 1	30
X IIS 2	24
X IIS 3	30
Total	143

(Source : SMA PGRI 2 data)

The sampling technique used in this study is proportionate stratified random sampling. Sugiyono (2010:56) stated that stratified random sampling is a sampling technique procedure which attempts to restrict the possible samples to those which are "less extreme" by ensuring that all parts of the population are represented in the sample in order to increase the efficiency (that is to decrease the error in the estimation).

Table 1. The Sample of the Study

No	Class	Total
1	X MIA 1	6
2	X MIA 2	6
3	X IIS 1	6
4	X IIS 2	5
5	X IIS 3	5
Total sample		28 students

This study used the questionnaire as the instrument of the research. The questionnaire is about their perception during their learning style throughout their experience while learning for their whole life habit as a student. The instrument used in this study is The Barsch Learning Style Inventory (BLSI). The BLSI was made by Barsch to find out learners' learning style in 3 areas (Visual, Auditory and Kinesthetic). The questionnaire consists of 24 items with 4 likert-scale, ranging from "strongly disagree" (1 point) to "strongly agree" (4 points). Here is the detail

Table 3. Specification of the Questionnaire

	Visual	Auditory	Kinesthetic
Number of item	2	1	4
	3	5	6
	7	8	9
	10	11	12
	14	13	15
	16	18	17
	19	21	20
	22	24	23
	Total item: 8	Total item: 8	Total item: 8

Source ((adopted from The Barsch Learning Style Inventory (BLSI) as cited in NZESEI (2015))

Table 4. The Interpretation of English Learning Outcome

Interpretation	Score
A	90-100
B	80-89
C	70-79
D	61-69
E	50-59

Data collection technique meant in this research is some steps in how the researchers will conduct some completion process toward this study. In carrying this research, the researcher will do some steps, namely: 1) Give the explanation about the purposes of this research to the participants. 2) Distribute and try out the questionnaire. 3) Test reliability of the questionnaire by using SPSS 16.0. 4) Distribute the questionnaires to the participants of this research. 5) Calculating the data from questionnaire

In interpreting the data, the researcher will do some steps as follows: first, the researcher collects the filled out questionnaire by the students, then, the researcher calculates the score of each item in the questionnaires. The data will be computed quantitatively and investigated by using the Pearson's product moment correlation. The

researcher will use liker scale to make the students easier in choosing their answers as responses toward the questionnaire here are the specifications of the 5-point likert scale: Strongly agree (5 points), Agree (4 points), Neutral (3 points), Disagree (2 points) Strongly Disagree (1 point). Last, after calculating the scores of questionnaire, the researcher will analyze the correlation between the two variables by using product moment pearson correlation with the formula:

$$r_{xy} = \frac{n \sum XY - \sum X \sum Y}{\sqrt{[n \sum X^2 - (\sum X)^2][n \sum Y^2 - (\sum Y)^2]}}$$

r= pearson r correlation coefficient

n= total of the sample.

FINDINGS

Learning Strategies

Before examining the correlation among the two variables in this study, descriptive analysis of *The Barsch Learning Style Inventory (BLSI)* shows the mean scores and standard deviation of language anxiety.

As what was demonstrated in the table below, the mean score across items for visual learning style $X=3.67$ ($s=.64377$), for auditory yielded mean score $X=3.48$ ($s=.63800$), for kinesthetic yielded mean score $X=3.2458$ ($s=.55465$). Clearly, it can be inferred that the participants reported the most used learning strategies was visual.

Measure	Possible Range	Items	Std. Deviation per item	Mean (Item)
Visual	1-40	8	.64377	3.6750
Auditory	1-40	8	.63800	3.4833
Kinesthetic	1-40	8	.55465	3.2458
Overall	28-140	28	.44845	3.4681

Learning Outcomes

In this next table, the mean score of learning achievement is presented. Class X MIA 1 obtained mean score $X=74.8333$ ($s=2.92689$) while class X MIA 2 obtained mean score $X=79.1667$ ($s=3.43026$), X IIS 1 yielded mean score $X=80.1667$ ($s=6.40052$), X IIS 2 yielded mean score $X=76.8000$ ($s=5.06952$), X IIS 3 yielded mean score $X=83.2000$ ($s=3.27109$), and for overall the scores yielded mean score $X=78.7500$ ($s=5.00093$).

Class	Possible Range	Mean	Std.Deviation
X MIA 1	0-100	74.8333	2.92689
X MIA 2	0-100	79.1667	3.43026
X IIS 1	0-100	80.1667	6.40052
X IIS 2	0-100	76.8000	5.06952
X IIS 3	0-100	83.2000	3.27109
Overall	0-100	78.7500	5.00093

The Relationship between Learning Styles and Learning Achievement

The table below is the detail of score collected based on participants' responses in filling out the questionnaires and the average of their English learning outcomes. The data came out from the 5 classes; X MIA 1, X MIA 2, X IIS 1, X IIS 2, X IIS 3 (N=28).

No	Name	Class	Score on BLSI	English Score
1	001	XIPA1	81.0	76.0
2	002	XIPA1	78.0	70.0
3	003	XIPA1	84.0	78.0
4	004	XIPA1	106.0	75.0
5	005	XIPA1	97.0	77.0
6	006	XIPA1	104.0	73.0
7	007	XIPA2	80.0	85.0
8	008	XIPA2	84.0	78.0
9	009	XIPA2	87.0	78.0
10	010	XIPA2	74.0	75.0
11	011	XIPA2	90.0	81.0

1	012	XIPA2	91.0	78.0
2				
1	013	XIIS1	95.0	82.0
3				
1	014	XIIS1	67.0	92.0
4				
1	015	XIIS1	72.0	76.0
5				
1	016	XIIS1	86.0	78.0
6				
1	017	XIIS1	80.0	74.0
7				
1	018	XIIS1	69.0	79.0
8				
1	019	XIIS2	73.0	80.0
9				
2	020	XIIS2	88.0	79.0
0				
2	021	XIIS2	92.0	82.0
1				
2	022	XIIS2	93.0	70.0
2				
2	023	XIIS2	93.0	73.0
3				
2	024	XIIS3	84.0	83.0
4				
2	025	XIIS3	65.0	84.0
5				
2	026	XIIS3	66.0	78.0
6				
2	027	XIIS3	73.0	87.0
7				
2	028	XIIS3	75.0	84.0
8				
	Average		78.75	83.10

From the table above it is found out that the mean score of responses on BLSI is 78.75 and 83.10 for the average of speaking achievement. Then, if we try to look at the data available, some participants who have high scores on BLSI have low scores for their learning outcomes, but there are some others who have high scores on BLSI have high scores for their learning outcomes. Furthermore, there are some participants who have low scores on BLSI also have low scores for their English learning outcomes and others who have low scores on BLSI have high scores on English learning achievement. So it seems that there is no correlation between learning strategies and learning outcomes at tenth graders of SMA PGRI 2 Jambi academic year 2018/2019.

To support the argument that has just been discussed, the researcher did the statistical calculation by using SPSS program. Here, in this table below, the overall correlation between learning strategies and English learning achievement is presented.

Correlation of Learning Strategies and English Learning Outcomes (N=33) (Overall)	
Language Strategies	English Learning Achievement
Visual	-.157
Auditory	-.383*
Kinesthetic	-.411*
Overall	-.417*
Note. * $p < .05$. ** $p < .01$. *** $p < .001$	

DISCUSSIONS

Based on the findings above, the result indicated that English learning achievement negatively correlated with overall anxiety ($r = -.417$, $p < .05$). From the three parallel constructs, there were none them correlated with English learning achievement; auditory ($r = -.383$, $p < .05$), kinesthetic ($r = -.411$, $p < .05$), while for visual did not correlate (at $p < .05$) with English learning achievement. Therefore, it can be concluded that the null hypotheses (H_0) was confirmed with overall learning strategy, visual and kinesthetic.

In line with the finding for the overall sample in this present research, there were actually some other previous research which led negative correlation between learning strategies and english speaking achievement. For example, there is one research conducted by Mite, at.al (2016) in their work namely "Correlation between Learning Style and Learning Outcome of Senior High School Students' Based on Difference Score in Biology Learning Implementing Group Investigation (GI) Learning in Malang" which was done at a particular vocational high school in

Malang, Indonesia. The research found out that there is no correlation between learning strategies and learning outcome.

This means that every learning strategy that are owned by students have the same possibility to reach a good learning achievement. As what have been stated by DePorter, et.al (2005), in this real life, human have 3 learning styles; visual, audio and kinesthetic, but there is only one which dominates of all. It can't be denied that people are usually often using only one of them as the most common one. But it is important to know that no matter what learning style that oneself chooses, all students have the same possibility to get the best result. It all depends on how students can maintain their effort on it. Thus, the researcher thinks that this case makes the reason why actually in the site there is no positive correlation among variables.

CONCLUSIONS AND SUGGESTIONS

From the quantitative analysis on chapter 4, it shows that learning strategies has negative correlation with English learning achievement for the majority of the first graders at SMA PGRI 2 Jambi academic year 2018/2019. ($r = -.417, p < .05$). According to Salkind (1991, p. 210) if the correlation coefficient is between .4 and .6 it can be said the correlation between the variables is in the "neutral" level and so is for the negative correlation. Behind those data, from the three parallel constructs, there were none them correlated with English learning achievement; auditory ($r = -.383, p < .05$), kinesthetic ($r = -.411, p < .05$), while for visual did not correlate (at $p < .05$) with English learning achievement. Therefore, it can be concluded that the null hypotheses (H_0) was confirmed with overall learning strategy, visual and kinesthetic. This might happen because other variables distracted this case; it

could be from the students' background of knowledge, the exposure to English language itself, the condition of their learning environment, etc. or even the condition in which students were not really serious in the strategies used or the students themselves did not really know what strategies fitted them best which were unfortunately not revealed in this study since the concern of this study is only about correlation. Therefore, it is suggested that there might be overriding variables that affected both students' learning strategies and their learning outcome.

Although the majority results of the research finding reveals learning strategies has no correlation with English learning achievement, it is still important to let our students know kinds of learning strategies. Teachers need to introduce to every single learning strategy in hoping that students can consider in what ways that they can learn best. It is because there is a possibility where students do not really take into account to their learning strategies while following classes. But as teachers, it is also obviously important to get the students know whatever the learning strategies that they have or like, they can still get the best result as long as they put their effort on it. Additionally, it is important for students to focus and concentrate while following classes or not to get distracted with any other things outside of the lesson and classroom. Students do need to know their own learning style and optimize it. For teachers, they have to invite the students knowing their learning styles and even to encourage them how to do best in their own learning style. Teachers are required to use some varieties of learning method in order to be able to manage differences in students' learning styles.

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