Critical Thinking Abilities and Korean Reading Skills: To what extent do they correlate?

Risa Triarisanti, Dwi Bhakti Oktavianto*, Didi Sukyadi

Korean Language Education Study Program, Faculty of Language and Literature Education, Universitas Pendidikan Indonesia
**Corresponding author. Email: bhaktioktavianto@upi.edu*

ABSTRACT

According to the PISA published in 2018, Indonesia ranks third lowest in terms of reading skills, indicating that reading skills among Indonesian learners are still quite inadequate. This is perhaps due to the fact that critical thinking abilities are still lacking in Indonesia as well. Previous literature has highlighted the interplay between reading skills and critical thinking abilities. Hence, this study aims to determine the extent to which critical thinking abilities have a relationship with learners' reading skills of Korean texts. A quantitative approach with a correlation design was used in this study. Sixty-two undergraduate students majoring in Korean language education were involved. Ennis' Theory (as cited in Samsudin & Hardini, 2019) was used to measure critical thinking skills, while Tampubolon's Theory was used to measure reading skills. The instruments used in this study included a critical thinking questionnaire and a reading test. The results showed that the critical thinking abilities of the students were categorized as high. Meanwhile, the students exhibited fairly good reading skills. Furthermore, the correlation between the two variables was found to be not strong enough, with a correlation coefficient of 0.371. The effect of critical thinking abilities on reading skills is 13.7%, with a coefficient of determination (R square) of 0.137. Based on the results, while critical thinking abilities were high, reading skills were not strong enough. It can be concluded that there is a weak correlation between the student's critical thinking abilities and their skills in reading Korean texts.

Keywords: *Critical thinking, Korean students, Korean texts, Reading skills.*

1. INTRODUCTION

In the 4.0 era, critical thinking is one of the required skills that must be taught from an early age. According to Sihotang (2019), critical thinking is the ability to think well and contemplate the process. Ennis (1996, in Samsudin & Hardini, 2019) suggests that critical thinking is an ability to think reflectively, primarily on decision-making patterns about what have to believe, do, and be responsible for. As stated by Tilaar (2011), the ideal goal of critical thinking in education is to prepare the student for future life. It can be seen from the goals of critical thinking. It plays a vital role in education to ensure that students can face their maturity appropriately. Of course, it has to do with the learning process—for instance, its relationship with the reading processes since it stimulates critical thinking. According to Costa (1985), reading activities are the basis of critical thinking activities. According to Ennis (1996 in Samsudin & Hardini, 2019), twelve critical thinking indicators are selected into five elements in critical thinking activities. The five elements of critical thinking activities, namely include: (1) being able to provide a simple explanation, (2) practicing basic skills, (3) summarizing, (4) providing further explanations, and (5) arranging tactics and strategies. This theory argues that critical thinking is essential in academic settings, one of which is in language. The higher someone's critical thinking is, the higher their ability to express main ideas or opinions in both oral and written form. Reading skills are highly significant to critical thinking, which is in line with the opinion expressed by Connolly (2000), Davidson (1998), Davidson and Dunham (1997) (as cited in Liaw, 2007, p. 50). Thus, critical thinking is recognized as an important competence for students to acquire in academic language. Kress (1985, as cited in Liaw, 2007, p. 50) further postulates that "critical thinking is a social practice and is language itself."

Dawson (in Jahrir, 2020) states that practicing language skills means practicing thinking skills. Language skills are early acquired and advanced by

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acquiring further language skills (Tarigan, 1987). Tampubolon (2008) states that reading is one of the four main language components. Since 2003, Indonesia has participated in PISA (Program for International Student Assessment). It is part of the Organization for Economic Co-operation and Development (OECD) which focuses on reading literacy, mathematical literacy, and scientific literacy. As reported on PISA, Indonesian students get 30% for reading proficiency, or Level 2 (OECD average: 77%). In this case, at least students can identify the main ideas in medium to long-length texts, find information based on explicit criteria, and reflect on the purpose and form of the text. In 2015, reading ability in Indonesia increased (397), but in 2018 it fell again (371) to the level in 2001.

The foreign language is helpful to broaden the learners' knowledge. Second language learners have cognitive differences in reading skills. Fraser (in Maluch & Sachse, 2020) states that second language learners have irregular unstructured developmental and fluency and have short-term pattern thought as second language learners. According to the CEFR (Common European Framework of Reference), the student are required to achieve level B2 in reading to decode information, ideas, and opinions from reliable sources in the related studies and comprehend particular articles besides related studied; as long as the student can use a dictionary to verify what they are learning on.

Even in the Korean language, the student, especially in university, must have a language proficiency level according to their grade. In line with what is quoted at the CEFR B2 level, Korean learners should be able to read reports and articles related to contemporary issues where the authors of reports and articles adopt a particular attitude or point of view. In addition, in terms of reading, the learners are expected to comprehend contemporary prose and literature. This research aims to measure how high critical thinking and foreign language reading skills in Korean particularly on the relationship between critical thinking and reading skills.

2. METHOD

The method used in this study is a quantitative method with a correlational design Sugiyono (2013). The purpose of this research is to measure the relationship between critical thinking and reading skills. Also, this research also measures how big the correlation of critical thinking skills and reading skills is. The participants in this research were 62 respondents. Instruments that are used in this study are critical thinking questionnaires and Korean reading skill tests. The guidelines for the critical thinking questionnaires are based on the theory by Ennis (1996, p. 2, in Samsudin & Hardini, 2019) who argue that there are 5 (five) steps in critical thinking activity, which are: (1) providing basic explanation, (2) constructing primary skills, (3) concluding, (4) giving advance explanation, and (5) arranging strategies and tactics. Meanwhile the guidelines for reading test is by using devices such as questions to check the results of the text that had been read by using the Tampubolon theory (2008, pp. 241-243) who stated that (1) language skill, (2) formulating the information in advance, (3) reading strategy, and (4) reading interest, as the main purpose to achieve reading skill. Texts that are given are essays by Lee Tae Ho in Korean essay anthology with title *"20 人의 詩 수필 선집" (isibine si suphil seonjib)* [An Anthology of 20 essay].

The critical thinking questionnaire was designed to have 30 questions with indicators of providing primary explanations three (3) items, constructing primary skills nine (9) items, concluding eight (8) items, giving advance explanations five (5) items, and arranging strategies and tactics four (4) items. The critical thinking questionnaires were calculated using a 4-scale Likert scale. Meanwhile the reading skill tests used objective essay questions. The use of objective essay questions in this research is because the answers received might be different but they would still generate relatively similar scores or results. Also, the essay questions are calculated by using interpretation scores ranging from 1-10. The reading skill tests have 10 essay questions including indicators of language skills two (2) questions, formulating the information in advance three (3) questions, reading strategy four (4) questions and reading interest one (1) question.

The analysis that was used are validity test and reliability test. The validity test was carried out on the 30-statement items questionnaire that had been made. While the questions in reading skill tests are 10 questions. This reliability test is using Alpha Cronbach formula. The result of this reliability test on a critical thinking questionnaire is 0.906 and categorized as very high reliability. While the result for the reading skill test is 0.836 and categorized as high reliability. Before the hypothesis test, the researcher is going to do a data normality test by using Kolmogrov Smirnov formula in which, if the sig. value or significance or probability value >0.05, then the distribution is normal (Riduwan & Akdon, 2007). Simple regression analysis is a measurement device that can also be used to measure the existence of the correlation between each variable (Sugiyono, 2013, p. 184).

3. FINDING AND DISCUSSION

3.1. Critical Thinking Abilities

The overall average results for the critical thinking skill questionnaire is 52.10 and can be interpreted as 'good' (see Table 1). This is due to the average value of the overall indicators being interpreted as 'high' so that the respondent's critical thinking level is regarded as

Tabel 1. Result of critical thinking

No	Indicator of Critical Thinking Skills	Average Value
1	Provide basic explanation	5.58
2	Construct primary skills	13.65
3	Conclude	19.17
4	Give advance explanation	10.86
5	Arranging strategies and tactics	2.85
Total average		**52.10**

'good'. Below is further explanation for the result of five critical thinking skills indicators.

The critical thinking level of the respondents in this study is good, which relates to providing simple explanations, building basic skills, concluding, providing more explanations, and building strategies and tactics. These results are interpreted with the average value that has been calculated as a whole. Thus, the respondents' critical thinking level is said to be good.

The first indicator, which is providing simple explanations to respondents, is high. The different results of the average of the indicators are not significant because the items that were tested resulted as 'high'. It can be concluded that the respondents answered the given questions very well and in accordance with the content. Also, the respondents identified the conclusion of the text that had been read, very well.

Then, the second indicator, which is constructing primary skills, achieves a significant average result. Furthermore, the items "I can provide clearly the explanations regarding the evidence, reason, and information from the text that I have read in Korean." and items "I carefully answer the questions that are given on the text that I have read." have a significantly different result in the average question items. It can be concluded that while reading, the respondents have clearly explained the evidence, reason and information in Korean very well. While the respondents have been very careful answering the questions that were given by the researcher very well.

Next, the third indicator, which is concluding, gained an average result that is interpreted as 'high'. However, one of the items "I can conclude in detail the text that I have read in Korean." is categorized as 'low' because the result of this item is 2.44. Within the same indicators but different categories, it can be concluded that the skill to conclude in detail in Korean is really low. While the conclusion that is written logically by the writer, according to the reader or the respondent, is really high.

Fourth indicator, which is giving advanced explanations, gained a 'high' result. This indicator doesn't have so much significance in the calculated average result. The conclusion that, the indicator with the lowest value, is that the respondents had read clearly the diction that constructs the sentence in the given text. While the highest value is that the respondents have understood the context of the text in Korean that had been read, really well.

Lastly, the fifth indicator, arranging strategies and tactics are interpreted as 'high'. It can be concluded that the respondents had identified the problem within the text that had been read, really well. This indicator is to decide which action that can define a problem, select, and formulate alternative answers, decide things that will be done tentatively and do review. The critical thinking level of the respondents in this study is high, which relates to providing simple explanations, building basic skills, concluding, providing more explanations, and building strategies and tactics. These results are interpreted with the average value that has been calculated as a whole. Thus, the respondents' critical thinking level is said to be good.

3.2. Korean Reading Skills

The average score of the overall reading skills test obtained is 38.23 and can be interpreted as 'enough' (see Table 2).

This is because the average score of all indicators contains 3 indicators that are interpreted as 'good enough' and 1 indicator that is interpreted as 'good'. In other words, the respondents' reading skills are interpreted as 'good enough'. Below is an explanation of the results of each reading skill indicator. The results of this study on the Korean language argumentative text reading skills are 38.23 and can interpret as 'enough.' This is because the four indicators theory from Tampubolon (2008, pp. 241-243) is interpreted quite well, and one indicator is interpreted well.

Tabel 2. Reading skills

No.	Achievement Indicators	Reading Skills	Average Score
1	Able to explain the content	Reading interest	5.40
2	Able to explain the text with the sources listed	Formulate information in advance	6.18
3	Able to comprehend the given vocabulary	Language skill	9.76
4	Able to perceive the arguments about the text	Reading strategy	10.29
5	Able to analyze the text	Reading strategy	6.50
Average score			**38.23**

The first indicator relates to language skills. Respondents were required to comprehend the vocabulary given. The words used were '임자' (*Imja*) and '이구동성' (*Igudongseo*). The word '임자' (*Imja*) refers to the person who owns an item or a thing. The word '이구동성' (*Igudongseo*) means that one group with the same decision. There is a significant difference in the results of these two words. The word '임자' (*Imja*) got 3.63 as the result, which is interpreted as 'not good' compared to '이구동성' (*Igudongseo*), which got 6.13 as the result with 'good' as the interpretation. So, the results of the vocabulary understanding can be said to be 'good enough'.

The second indicator is the ability to formulate the information from the text in advance. Respondents were required to formulate the information in advance, which aimed as an initial preparation to answer the questions given. The average score for this indicator is 6.18 which refers to 'good'. Thus, it can be concluded that the respondents were able to formulate the information from the text in advance properly.

Furthermore, the third indicator refers to the reading strategy. There are two factors that are said as reading strategies—first, the strategy to find the required information. The second is a reading strategy that is in accordance with the condition of each respondent's ability. The average score obtained from this indicator is 5.597, which is interpreted as 'good enough'. Therefore, from the average score, it can be concluded that the respondents can analyze the text quite well, as well as provide the arguments according to the text appropriately.

The fourth indicator is reading interest. After reading the text, the respondents were required to explain the contents using language clearly and concisely. In this indicator, the average result obtained is 'good enough'. It can be concluded that the respondents have a good interest in reading. The results of this study on the Korean language argumentative text reading skills are 38.23 and can interpret as 'enough.' This is because the four indicators theory from Tampubolon (2008, pp. 241-243) is interpreted quite well, and one indicator is interpreted well.

3.3. The Relation between Critical Thinking Skills and Reading Skills

As seen in Table 3, after calculating the data through SPSS version 25, the correlation results obtained is 0.371.

The value of 0.20 to 0.3.99 is said to be a low correlation. In other words, the correlation in this study indicates a low correlation. If the value obtained is >rtable, it can be said to have a correlation. However, it the value obtained is <rtable, then it can be said to have no correlation. In the table above, it can be seen that there

Tabel 3. Result of relation between critical thinking skills and reading skills

Model Summary[b]

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.371[a]	.137	.123	15.093

a. Predictors: (Constant), Critical Thinking

b. Dependent Variable: Reading Skills

ANOVA[a]

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	2176.258	1	2176.258	9.553	.003[b]
	Residual	13668.710	60	227.812		
	Total	15844.968	61			

a. Dependent Variable: Reading Skills

b. Predictors: (Constant), Critical Thinking

is no negative sign (-) in the overall result. The correlation value between the two variables indicates positive. The rtable, according to the total number of respondents, is 0.2108. Therefore, it can be inferred that the Pearson correlation is 0.371 > 0.2108, which means that there is a correlation between these two variables. The first table indicates that the correlation value (R) is 0.371. This correlation value has a coefficient of determination (R Square) of 0.137, which means that the independent variable (critical thinking) affects the dependent variable (reading skills) by 13.7%.

Value obtained being 0.003. So, the result of Sig. value obtained, which is 0.003 < 0.05, can be used to predict the critical thinking variable. In other words, there is an effect of the Critical Thinking variable (X) on the Reading Skills variable (Y). Ha was accepted because the results showed a clear correlation between critical thinking skills and Korean language argumentative text reading skills. On the contrary, H0 was rejected because the correlation between the level of critical thinking and reading skills was accepted. From this study, it can be inferred that there is a positive correlation between critical reading skills and reading skills. This is in line with previous research stating that the correlation between critical thinking and reading skills is positive. The variables of each study that distinguish critical thinking skills can affect reading skills. According to Wijayanti, Sutarsyah, and Huzairin (2015), a person's reading ability could be influenced by his critical thinking skills. Reading skills are the basic capital in conducting critical thinking activities.

4. CONCLUSION

The purpose of this study was to determine the relationship between critical thinking skills and reading skills, especially in the activity of reading Korean language texts for Korean Language Education students'

batch 2019. The results of the analysis showed that the respondents' critical thinking skills were categorized as good. Then, the reading skills of the respondents were categorized as quite good. Furthermore, the relationship between critical thinking skills and reading skills in Korean was positively correlated with the low category. With regards to the research results and conclusions that have been stated above, there are several implications that need to be considered in improving critical thinking skills and text reading skills in Korean. This can be a challenge for Korean language teachers at the university level. In an effort to improve students' critical thinking skills, Korean language teachers can provide cognitive questions. This is intended so that a person's critical thinking ability can be assessed on personal self-efficacy by giving cognitive questions in Korean. In an effort to improve students' reading skills, Korean language teachers can provide essays and articles that are currently being discussed. It is intended that the understanding of new vocabulary and the delivery of meaning conveyed by the text writer can be well-absorbed by students. For further research, it is necessary to improve on the factors that influence critical thinking activities and reading skills, especially in foreign languages. In addition, in a different research approach, such as a qualitative approach, this approach is aimed to find out the factors of critical thinking ability more carefully and in-depth. Furthermore, if the researcher uses the same approach, namely a quantitative approach, the measurement of variables is not perceptual or conditional but substantively so that it is developed to obtain an accurate illustration and understanding.

REFERENCES

Costa, A. L. (1985). *Developing minds: A resource book for teaching thinking*. Association for Supervision and Curriculum Development, 225 N. Washington St., Alexandria, VA 22314.

Jahrir, A. S. (2020). *Membaca [Reading]*. Jakarta: CV Amanda Ihsan Ilmiah.

Liaw, M. L. (2007). Content-based reading and writing for critical thinking skills in an EFL context. *English Teaching and Learning, 31*(2), 45-87.

Maluch, J. T., & Sachse, K. A. (2020). Reading in developing L2 learners: The interrelated factors of speed, comprehension and efficiency across proficiency levels. *TESL-EJ, 24*(1), n1.

Programme for International Student Assessment (PISA). (2018). Retrieved from Country Note: https://www.oecd.org/pisa/

Riduwan, A., & Akdon, A. (2007). *Rumus dan data dalam analisis statistika [Formulas and data in statistical analysis]*. Bandung: Alfabeta.

Samsudin, D., & Hardini, T. (2019). The influence of learning styles and metacognitive skills on students' critical thinking in the context of student creativity program. *International Journal of Education, 11*(2), 117-124.

Sihotang, K. (2019). *Berpikir kritis: Kecakapan hidup di era digital [Critical thinking: Proficiency living in the digital age]*. Yogyakarta: PT Kanisius.

Sugiyono. (2013). *Metode penelitian kuantitatif kualitatif dan R&D [Quantitative research methods qualitative and R&D]*. Bandung: Alfabeta.

Tarigan, H. G. (1987). *Berbicara sebagai suatu keterampilan berbahasa [Speaking as a language skill]*. Angkasa: Bandung.

Tilaar, H. A. R. (2011). *Pedagogik kritis [Critical Pedagogy]*. Jakarta: Rineka Cipta.

Tampubolon, D. P. (2008). *Kemampuan membaca teknik membaca efektif dan efisien [Ability to read effective and efficient reading techniques]*. Bandung: Angkasa.

Wijayanti, E., Sutarsyah, C., & Huzairin, H. (2015). *The correlation between students critical thinking and their reading comprehension ability,* (Doctoral dissertation, Lampung University).