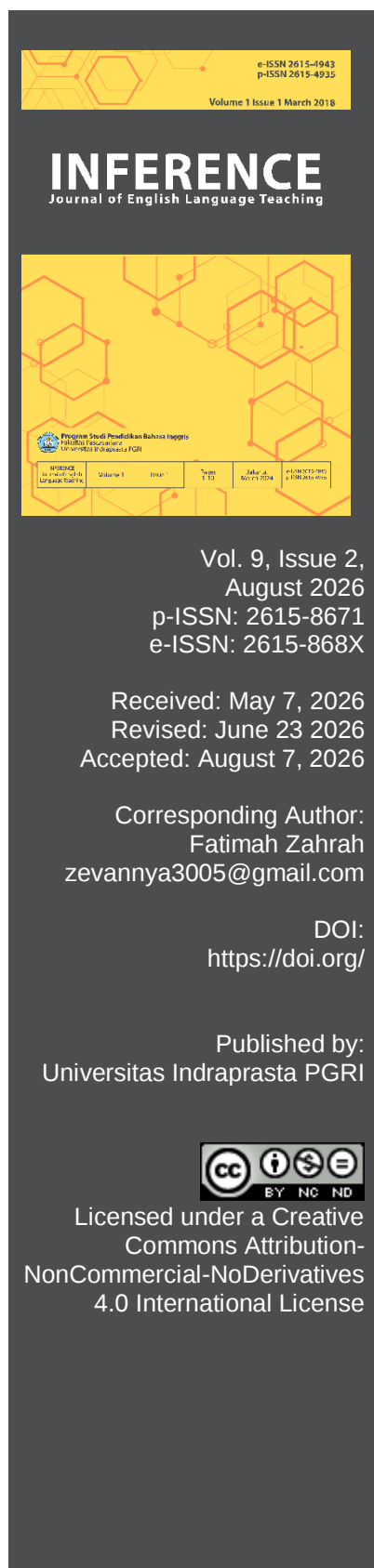




RESEARCH ARTICLE

THE EFFECTS OF PERCEPTIONS ON LEARNING METHODS AND CRITICAL THINKING TOWARDS STUDENTS' SPEAKING SKILLS

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Abstract: This study aims to examine: (1) the effects of perceptions on learning methods and critical thinking on students' speaking skills, (2) the effect of perceptions on learning methods toward speaking skills, and (3) the effect of critical thinking on speaking skills. The research was conducted at private junior high schools in East Jakarta using a survey method with multiple regression analysis. The population consisted of 550 eighth-grade students, and a sample of 61 students was randomly selected. The study was carried out from March to July 2025. The findings revealed that perceptions of learning methods and critical thinking jointly had a significant effect on students' speaking skills (Sig. = 0.000 < 0.05; F = 18.418), with a determination coefficient of 0.388, indicating a 38.8% contribution. Perceptions of learning methods alone significantly influenced speaking skills (Sig. = 0.012 < 0.05; t = 2.588), and critical thinking also had a significant effect (Sig. = 0.000 < 0.05; t = 5.432).

Keywords: Students Speaking Skills, English, The Effect of Perceptions on Learning Methods, Critical Thinking.

Pengaruh Persepsi atas Metode Pembelajaran dan Berpikir Kritis Terhadap Keterampilan Berbicara Bahasa Inggris

Abstrak: Penelitian ini bertujuan untuk menganalisis: (1) pengaruh persepsi terhadap metode pembelajaran dan berpikir kritis terhadap keterampilan berbicara siswa, (2) pengaruh persepsi terhadap metode pembelajaran terhadap keterampilan berbicara, dan (3) pengaruh berpikir kritis terhadap keterampilan berbicara. Penelitian ini dilaksanakan pada siswa SMP swasta di Jakarta Timur dengan menggunakan metode survei dan analisis regresi berganda. Populasi penelitian berjumlah 550 siswa kelas VIII, dengan sampel sebanyak 61 siswa yang dipilih secara acak. Penelitian dilaksanakan pada Maret hingga Juli 2025. Hasil penelitian menunjukkan bahwa persepsi terhadap metode pembelajaran dan berpikir kritis secara bersama-sama berpengaruh signifikan terhadap keterampilan berbicara siswa (Sig. = 0,000 < 0,05; F = 18,418), dengan koefisien determinasi 0,388 yang berarti kontribusinya sebesar 38,8%. Persepsi terhadap metode pembelajaran secara parsial berpengaruh signifikan (Sig. = 0,012 < 0,05; t = 2,588), dan berpikir kritis juga memberikan pengaruh signifikan (Sig. = 0,000 < 0,05; t = 5,432).

Kata kunci: Keterampilan Berbicara; Bahasa Inggris; Pengaruh persepsi atas metode pembelajaran; Berpikir Kritis

INTRODUCTION

English has been recognized as the global language of communication, serving as a bridge for international business, academic collaboration, science, and technology. In the context of English as a Foreign Language (EFL), mastery of the four language skills—listening, speaking, reading, and writing—is essential. Among these, speaking is often regarded as the most crucial yet challenging skill to acquire because it requires learners to use language spontaneously and accurately in real-time interaction (Brown, 2007; Harmer, 2007). For Indonesian students, the ability to speak English fluently and confidently remains a persistent problem despite its inclusion in the national curriculum at junior and senior secondary levels. Data from the EF English Proficiency Index (2023) shows that Indonesia ranks relatively low compared to neighboring countries, highlighting ongoing struggles in oral communication competence.

The challenges in developing speaking skills are multidimensional. Pedagogically, many classrooms in Indonesia still rely on traditional, teacher-centered methods that prioritize grammar drills, translation, and written exercises. While such methods may help learners build vocabulary and grammatical knowledge, they provide limited opportunities for authentic oral practice, which is vital for fluency and communicative competence (Richards, 2008). Psychologically, students frequently experience language anxiety, fear of making mistakes, and low confidence, which further inhibit their willingness to participate in speaking activities (Horwitz, Horwitz, & Cope, 1986). Addressing these challenges requires an integrated approach that considers both instructional strategies and learners' cognitive dispositions. Two critical factors that influence students' success in speaking are their perceptions of learning methods and their level of critical thinking ability.

Perceptions of learning methods refer to students' views, attitudes, and interpretations of the instructional strategies used by their teachers. A positive perception indicates that students find the methods engaging, effective, and supportive of their learning process, which in turn enhances motivation and participation (Robbins & Judge, 2022). Conversely, negative perceptions may lead to disengagement, lack of motivation, and reduced performance. In the context of language learning, when students perceive learning methods as communicative, interactive, and meaningful, they are more likely to take risks in speaking, practice actively, and persist despite difficulties. Previous studies have confirmed that positive perceptions of methods such as cooperative learning, task-based instruction, or communicative language teaching correlate strongly with improved speaking outcomes (Sari & Pratama, 2021; Hidayati, 2022). Therefore, understanding how students perceive different teaching approaches is fundamental for designing effective classroom practices that support oral proficiency.

Alongside perceptions of learning methods, critical thinking has emerged as a significant cognitive factor influencing language learning and speaking development. Critical thinking, defined as the ability to analyze, evaluate, and synthesize information logically and reflectively (Ennis, 2011), empowers students to organize ideas, construct arguments, and communicate meaning effectively. In speaking, critical thinkers can articulate opinions with clarity, respond to questions with coherence, and adapt language use to different contexts. Research has shown that students with higher critical thinking ability perform better in oral communication tasks, as they are more capable of structuring discourse, using evidence, and engaging in interactive exchanges (Lai, 2011; Facione, 2020). Moreover, in the context of 21st-century education, critical thinking is recognized as one of the core competencies alongside communication, collaboration, and creativity, making it highly relevant to EFL instruction (Trilling & Fadel, 2009).

Despite the well-documented importance of perceptions of learning methods and critical thinking, empirical studies exploring their combined effect on speaking skills are limited, especially in the Indonesian context. Previous research has often examined these factors separately. For instance, Rahmawati (2020) found that students' positive perceptions of communicative teaching methods significantly improved their speaking fluency. Meanwhile, Yusuf and Pratiwi (2021) demonstrated that critical thinking ability contributed positively to students' ability to engage in

classroom discussions. However, very few studies have investigated how both perceptions of learning methods and critical thinking simultaneously influence speaking skills, particularly among senior high school students in urban areas such as South Jakarta. This gap provides an opportunity to contribute to the literature by examining the interaction between instructional perceptions and cognitive dispositions in shaping oral communication competence.

South Jakarta represents a unique context for this research. As a metropolitan area, its schools are characterized by diverse student populations, exposure to technological resources, and varying teaching practices. Students often encounter different methods of instruction, ranging from traditional lectures to more innovative project-based or genre-based approaches. At the same time, the demands of urban life and the influence of global culture require students to possess strong critical thinking and communication skills. Investigating how students' perceptions of these methods and their level of critical thinking affect their speaking performance in this setting can provide valuable insights for educators and policymakers. It can also inform the design of teaching practices that are responsive to learners' needs and aligned with the competencies required in the 21st century.

Based on the background above, this study aims to address three research objectives:

1. To determine the effect of students' perceptions of learning methods on their speaking skills.
2. To examine the effect of students' critical thinking on their speaking skills.
3. To investigate the simultaneous effect of perceptions of learning methods and critical thinking on students' speaking skills.

Theoretically, this research contributes to the growing body of literature on EFL learning by highlighting the interplay between perceptions of instructional methods and cognitive abilities in determining speaking outcomes. Practically, the findings provide guidance for teachers to select and implement learning methods that are perceived positively by students while also fostering critical thinking skills. For curriculum developers and policymakers, the study emphasizes the importance of designing English instruction that not only enhances linguistic knowledge but also cultivates higher-order thinking and communication skills. Ultimately, the study underscores that successful development of speaking competence requires attention to both the external instructional environment and the internal cognitive resources of learners.

RESEARCH METHOD

Research Design

This study employed a quantitative research design with a survey approach to investigate the effects of students' perceptions of learning methods and critical thinking on their speaking skills. The survey method was chosen because it enables the researcher to collect data from a relatively large sample and to analyze the relationships among variables using statistical techniques (Creswell, 2014). The design combined descriptive and correlational elements: descriptive in portraying the levels of perception, critical thinking, and speaking skills, and correlational in examining the strength and direction of their relationships

Location and Time of the Research

The participants in this study were junior high school students enrolled in a private junior high school in East Jakarta, Indonesia. The sampling method used was purposive sampling, targeting students who had been exposed to perception on learning methods. Inclusion criteria involved students currently enrolled in English speaking classes, while exclusion criteria ruled out students who had not received instruction related to perception on learning methods. Demographic details, such as age and grade level, were documented to support analysis.

Population and Sample

The population consisted of all eighth-grade students from the two participating schools, totaling 550 students (288 from Private Junior High School X and 262 from Private Junior High School Y). To determine the appropriate sample size, the Arikunto's opinion formula with a 10-15% or 20-25% margin of error was applied, yielding this study used a sample of 11%, namely 61 students as research respondents. Random sampling was employed to ensure that each student in the population had an equal chance of being selected, thereby improving representativeness and reducing bias (Abadiyah, 2016).

Table 1

Count of Population

No	School Name	Count of Population
1	Private Junior High School X	288
2	Private Junior High School Y	262
	Total	550

Data Collection Instrument

Three main instruments were developed to collect the data:

a. Speaking Skills Test (Y)

Speaking skills were assessed through a performance-based oral test in which students delivered short monologues and participated in dialogues. The scoring rubric was adapted from Hughes (2003), covering five criteria: grammar, vocabulary, pronunciation, fluency, and comprehensibility. Each criterion was rated on a 4-point scale, producing a composite score that represented overall speaking ability. Two raters were involved in scoring to ensure reliability.

b. Perception of Learning Methods Questionnaire (X1)

A structured questionnaire was designed to measure students' perceptions of learning methods used by their teachers. It consisted of 40 items distributed across indicators such as clarity of instruction, engagement, relevance, effectiveness, and motivation. Responses were measured using a five-point Likert scale, ranging from "Strongly Disagree" (1) to "Strongly Agree" (5). Validity testing using Pearson Product Moment correlation confirmed that all items had r-values above the critical r-table (0.361), indicating validity. Reliability testing using Cronbach's Alpha yielded a coefficient greater than 0.70, demonstrating strong internal consistency.

c. Critical Thinking Questionnaire (X2)

Critical thinking was measured through a 40-item questionnaire adapted from Ennis (2011) and Facione (2020). The questionnaire assessed skills such as interpretation, analysis, evaluation, inference, and reasoning. Similar to the perception questionnaire, a five-point Likert scale was used. Validity testing indicated that all items were valid, while reliability analysis produced a Cronbach's Alpha value above 0.70, confirming reliability.

Data Collection Procedure

Prior to data collection, permission was obtained from the school principals and English teachers. The students were informed about the purpose of the study, assured of confidentiality, and asked to provide informed consent. The questionnaires were administered in classrooms under the supervision of the researcher, with clear instructions provided to ensure accurate responses. The speaking test was conducted individually and recorded for further evaluation by two raters to minimize subjectivity and enhance inter-rater reliability.

The research procedure consisted of several steps:

1. Preparation: The researcher obtained permission from the school principal and English teachers, explained the research objectives, and secured informed consent from students.
2. Administration of Questionnaires: The perception and critical thinking questionnaires were distributed in classrooms under the researcher's supervision to ensure clarity and accuracy in responses.
3. Speaking Test: Students were assessed individually. Their performances were recorded and later scored by two raters to enhance inter-rater reliability.
4. Data Compilation: All responses and scores were coded and inputted into SPSS version 25 for analysis.

Data Analysis Techniques

The collected data were analyzed using SPSS version 25. The steps included:

- a. Descriptive Statistics
- b. To describe the distribution of students' scores on each variable, mean, standard deviation, minimum, and maximum values were calculated. Frequency distributions and histograms were also produced.
- c. Assumption Testing
Prior to hypothesis testing, statistical assumptions were checked. These included:
 1. Normality Test, using the Kolmogorov-Smirnov test.
 2. Linearity Test, to verify the linear relationship between independent and dependent variables.
 3. Multicollinearity Test, using Variance Inflation Factor (VIF) to ensure that the independent variables were not highly correlated.
 4. Heteroscedasticity Test, to confirm that the variance of residuals was constant across predicted values.
- d. Hypothesis Testing
Multiple regression analysis was applied to test three hypotheses:
 1. H1: There is a significant effect of perception of learning media on speaking skills.
 2. H2: There is a significant effect of self-efficacy on speaking skills.
 3. H3: There is a significant simultaneous effect of perception of learning media and self-efficacy on speaking skills.

The level of significance was set at $\alpha = 0.05$. A variable was considered significant if its p-value was below 0.05

RESULTS AND DISCUSSION

Results

Descriptive Statistics

The descriptive analysis provided a general overview of students' perceptions of learning methods, critical thinking ability, and speaking skills. Table 2 summarizes the statistical distribution of each variable.

Table 2

Research Data Description

		Statistics		
		Learning Method	Critical Thinking	Speaking
N	Valid	61	61	61
	Missing	0	0	0
Mean		71.95	73.75	78.77
Median		73.00	73.00	80.00
Mode		73	73	80
Std. Deviation		8.032	10.852	9.472
Range		47	45	35
Minimum		37	53	60
Maximum		84	98	95
Sum		4389	4499	4805

The results indicate that students generally demonstrated moderately positive perceptions of the learning methods used in English classrooms, moderate to high levels of critical thinking ability, and speaking performance that was above the average threshold. However, the standard deviation suggests considerable variation in all three variables, implying that not all students equally benefited from classroom methods or possessed similar levels of critical thinking.

Assumption Testing

Prior to regression analysis, several statistical assumptions were tested.

1. Normality Test: The Kolmogorov-Smirnov test revealed significance values greater than 0.05 for all variables, confirming normal distribution of the data.
2. Linearity Test: Both X1–Y and X2–Y relationships showed linear patterns, as indicated by significance values below 0.05.
3. Multicollinearity Test: Variance Inflation Factor (VIF) values were below 10, indicating no multicollinearity between independent variables.
4. Heteroscedasticity Test: The scatterplot of residuals showed random distribution, confirming homoscedasticity.

These results validated the use of multiple regression analysis for hypothesis testing

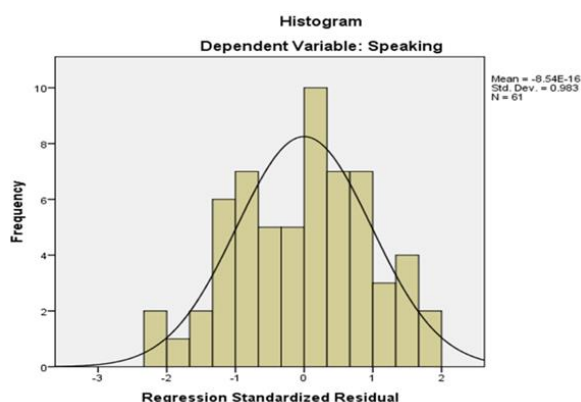


Figure 1

Histogram of Descriptive Speaking Skills Scores

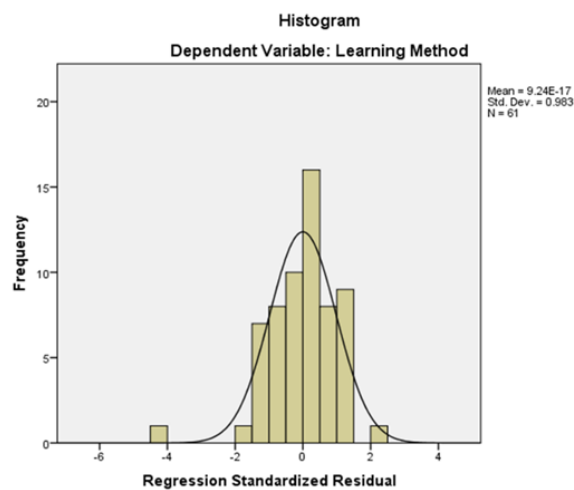


Figure 2
Histogram of Descriptive Perception on Learning Methods

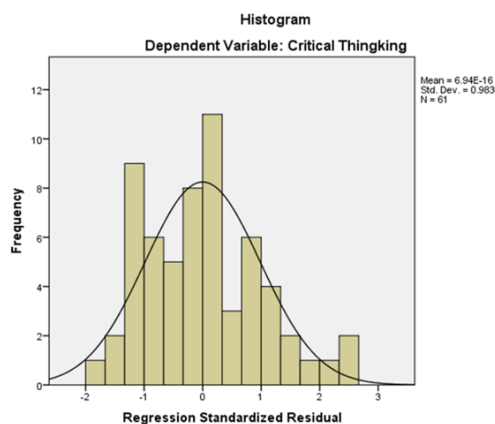


Figure 3
Histogram of Descriptive Critical Thinking

Hypothesis Testing

1. The Effect of Perceptions of Learning Methods on Speaking Skills

Regression analysis revealed that perceptions of learning methods significantly influenced speaking performance, with a t-value of 2.588 and a sig of 0.012 (< 0.05). This means that students who positively perceived classroom teaching methods performed better in oral communication tasks.

2. The Effect of Critical Thinking on Speaking Skills

The results also indicated a significant influence of critical thinking on speaking ability, with a t-value of 5.432 and a sig of 0.000 (< 0.05). Students with higher levels of critical thinking showed better performance in constructing coherent speech and engaging in dialogue.

3. The Simultaneous Effect of Perceptions of Learning Methods and Critical Thinking on Speaking Skills

The simultaneous regression analysis showed an F-value of 18.418 and a sig of 0.000 (< 0.05). This confirms that both perception of learning media and self-efficacy jointly contributed to improvements in speaking skills.

Table 3

Model Summary of Multiple Correlation

Model Summary^b

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.623 ^a	.388	.367	7.534

a. Predictors: (Constant), Critical Thinking, Learning Method

b. Dependent Variable: Speaking

Table 4

Recapitulation of the Calculation Results of the Significance Test of the Regression Coefficients for the Influence of Variables X1 and X2 on Variable Y

ANOVA^a

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	2090.796	2	1045.398	18.418	.000 ^b
	Residual	3291.991	58	56.758		
	Total	5382.787	60			

a. Dependent Variable: Speaking Skills

b. Predictors: (Constant), Self-Efficacy, Perception on Learning Media

Table 5

Recapitulation of the Calculation Results of the Regression Line Equation for the Influence of Students' Perception of Perception on Learning Media (X1) and Self-Efficacy (X2) on Speaking Skills (Y)

Coefficients^a

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	65.404	11.095		5.895	.000
	Learning Method	.313	.121	.266	2.588	.012
	Critical	.487	.090	.558	5.432	.000

a. Dependent Variable: Speaking

Discussion

The Effect of Perception of Learning Methods on Speaking Skills

The findings of this study indicate that students' perceptions of learning methods have a significant impact on their speaking ability. When students perceive classroom methods as clear, engaging, and effective, they are more motivated to participate in speaking activities, which leads to better performance. This result is consistent with the view that learners' attitudes and perceptions shape their willingness to communicate and their level of engagement in language learning (Richards, 2008).

In the context of East Jakarta Private junior high schools, students encounter various instructional approaches, such as task-based activities, group discussions, and presentations. Those who view these methods positively tend to engage actively, practice consistently, and take risks in oral communication. Conversely, students with negative perceptions may feel demotivated, passive, and reluctant to speak. This finding aligns with Hidayati (2022), who reported that positive student

perceptions of communicative approaches led to higher speaking fluency and confidence. It also supports Robbins and Judge's (2022) assertion that perceptions significantly influence behavior and performance in learning environments.

The Effect of Critical Thinking on Speaking Skills

Critical thinking emerged as another significant factor affecting speaking skills. Students with higher critical thinking abilities demonstrated better organization of ideas, logical argumentation, and clarity in expressing opinions. This outcome corroborates Ennis's (2011) definition of critical thinking as the ability to reason, analyze, and evaluate information systematically.

Previous studies have similarly highlighted the role of critical thinking in language learning. Yusuf and Pratiwi (2021) found that critical thinking positively correlated with students' participation in classroom discussions, while Lai (2011) noted that critical thinkers were more effective in handling communicative tasks. In this study, critical thinking allowed students to structure their responses coherently, use evidence to support arguments, and adapt language to various contexts. This cognitive readiness made them more capable of handling spontaneous communication, leading to improved speaking performance.

The implication is that speaking is not merely a linguistic skill but also a cognitive process that requires the ability to evaluate ideas, respond logically, and communicate persuasively. Thus, the integration of critical thinking development in EFL instruction is essential for improving oral proficiency.

a. The Simultaneous Effect of Perception of Learning Methods and Critical Thinking on Speaking Skills

The most significant finding of this study is the simultaneous effect of perceptions of learning methods and critical thinking on speaking skills. This suggests that instructional perceptions and cognitive abilities do not operate in isolation but rather interact to shape students' speaking performance. Students who both perceive learning methods positively and possess strong critical thinking ability are better positioned to succeed in oral communication.

This result is consistent with the socio-cognitive view of language learning, which posits that effective communication requires both supportive instructional environments and active cognitive engagement (Lantolf & Thorne, 2006). Positive perceptions encourage participation, while critical thinking ensures that participation is meaningful, logical, and coherent. The synergy of these two factors fosters greater fluency, accuracy, and confidence in speaking.

In practical terms, teachers should be aware that improving speaking ability involves more than selecting appropriate methods. It also requires cultivating students' critical thinking through tasks that demand analysis, evaluation, and reasoning. For example, debate activities, problem-solving discussions, and project-based tasks can simultaneously promote positive perceptions of learning methods and stimulate critical thinking, resulting in better speaking outcomes.

b. Implications for Practice

The findings of this study carry several important implications:

1. For Teachers: Teachers should select instructional methods that are not only pedagogically sound but also perceived positively by students. Furthermore, they should integrate tasks that promote higher-order thinking to strengthen students' cognitive engagement in speaking.
2. For Curriculum Developers: English curricula should balance linguistic knowledge with critical thinking development. Speaking tasks should encourage students to analyze issues, justify opinions, and communicate ideas clearly.
3. For Policymakers: Investment in teacher training is necessary to ensure that educators are equipped to implement communicative and cognitively challenging methods. Policymakers

should also support curricula that align with 21st-century skills, emphasizing communication, critical thinking, and creativity.

CONCLUSIONS

This study examined the effects of students' perceptions of learning methods and critical thinking on their speaking skills at a vocational high school in South Jakarta. Using a quantitative survey design with a sample of 61 eleventh-grade students, the research provided empirical evidence of how instructional perceptions and cognitive dispositions shape oral communication performance.

Three main findings were obtained. First, perceptions of learning methods significantly influenced speaking skills. Students who viewed classroom methods positively—perceiving them as clear, engaging, and effective—demonstrated higher fluency, accuracy, and participation in oral tasks. This highlights the importance of ensuring that teaching approaches are not only pedagogically appropriate but also perceived as supportive and motivating by learners.

Second, critical thinking was found to significantly affect speaking skills. Students with stronger analytical, evaluative, and reasoning abilities performed better in structuring discourse, articulating arguments, and adapting language to communicative contexts. This confirms that speaking is not solely a linguistic skill but also a cognitive process that requires logical organization and reflective judgment.

Third, perceptions of learning methods and critical thinking simultaneously influenced speaking performance. The interaction between positive instructional perceptions and strong cognitive abilities produced the most favorable outcomes, reinforcing the socio-cognitive view that effective speaking requires both external support and internal readiness.

The findings carry important implications. Teachers should adopt communicative and interactive methods that students perceive positively, while embedding activities that foster critical thinking, such as debates, problem-solving tasks, and discussions. Curriculum designers are encouraged to integrate both linguistic and cognitive objectives into English instruction. Policymakers should prioritize professional development programs that train teachers to implement pedagogies promoting both engagement and higher-order thinking.

Despite its contributions, the study has limitations. The sample was limited to a single vocational high school in South Jakarta, restricting the generalizability of the findings. Future research could expand to multiple schools and regions, use longitudinal designs to capture changes over time, or combine quantitative and qualitative methods for deeper insights.

In conclusion, the study underscores that successful development of students' speaking competence requires attention to both **perceptions of learning methods** and **critical thinking skills**. By aligning teaching approaches with learners' positive perceptions and cultivating their cognitive capacities, educators can create more effective conditions for improving speaking proficiency in the Indonesian EFL context.

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