

Indonesian language learning model based on critical and collaborative thinking in Law Study Program

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ABSTRACT

This study aims to develop a model for teaching Indonesian language based on critical and collaborative thinking in the Law Study Program. This research is classified as R&D development research. The development research model used is the R2D2 development model, which has three important stages, namely: (1) *define focus*, (2) *design and development*, and (3) *disseminate*. The subjects of this study were students who were taking Indonesian language courses in the Law Study Program, Faculty of Law, Ahmad Dahlan University Yogyakarta and Muhammadiyah University Purwokerto. The data analysis techniques used were descriptive qualitative and descriptive quantitative data analysis. The results of this study are as follows: (1) there is a need to develop a learning model that attracts students' interest in Indonesian language courses in the Law Study Program; (2) the model development has succeeded in developing a critical and collaborative thinking-based learning model for Indonesian language courses in the Law Study Program; (3) The pretest analysis results obtained a p-value of 0.855, which is known to be p-value > 0.05, so H_0 is rejected. Thus, it can be concluded that the level of student thinking after treatment between the control and experimental groups was significantly different.

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Introduction

Learning is one of the efforts in the teaching process for students. Learning at the higher education level truly requires a deep-thinking process in every course taught (Mahanal et al., 2019; Himawan et al., 2023). Deep thinking, also known as critical thinking, is closely related to Higher Order Thinking Skills (HOTS). Bloom's Taxonomy, refined by Anderson & Krathwohl (2001), consists of the following abilities: knowing-C1, understanding-C2, applying-C3, analyzing-C4, evaluating-C5, and creating-C6. HOTS questions generally measure the ability to analyze (analyze-C4), evaluate (evaluate-C5), and create (create-C6) (Dafit & Mustika, 2021; Sari & Atmojo, 2021; Widana, 2020).

Angelo (1995) views critical thinking as an intelligent and disciplined process of conceptualizing, applying, analyzing, synthesizing, and evaluating information obtained from observation, experience, reflection, reasoning, or communication as a guide for beliefs and actions (Syafitri et al., 2021; Widodo, 2017; Ilmudinulloh, 2022).

The basic philosophy of the impactful policies issued by the Ministry of Education, Culture, Research, and Technology—particularly in the transformation of learning in higher education—is rooted in the constructivist approach. In this approach, students are given the space to build and strengthen their knowledge and conceptual understanding through direct engagement with real issues faced by their society

or community (Muhmidayeli, 2013). This concept can only be implemented effectively if the process of transferring knowledge, theories, and concepts takes place in a measurable and structured manner. In line with this, Joyce et al. (2009) emphasize that constructivism encourages learners to develop knowledge through social interaction and cooperation, which in turn forms meaningful and productive intellectual relationships. The learning model built on this foundation not only instills academic concepts but also strengthens a culture of critical thinking and personal meaning-making in learning.

Furthermore, the impact of Kemendikisaintek also provides ample space for the development of collaborative skills in higher education environments. Students are encouraged to work together in heterogeneous groups, appreciate differences in abilities and perspectives, and utilize this diversity as a collective strength to solve complex problems (Krishnapatria, 2021; Febrianto, Maureen, & Bachri, 2023).

In this context, collaborative skills are not merely about working together, but reflect learning strategies that enable knowledge exchange, the formation of new ideas, and the improvement of academic social skills. As explained by Apriono (2013), effective collaboration encourages the creation of healthy group dynamics, where each individual's contribution is valued and developed into a team strength. When linked to the principles of constructivism, this approach reinforces the essence of higher education as a space for the growth of reflective, collaborative, and solution-oriented thinking in response to social challenges.

Collaborative learning is an educational innovation phenomenon and model that describes a learning approach in which students work together in groups or teams to achieve common learning goals (Munfiatik, 2023). Collaborative learning emphasizes a learning process that requires the integration of joint activities between intellectual, social, and emotional dynamics, both on the part of students and teachers. This is closely related to the theory that states that students must be active in the learning process (Ervilia & Fauzi, 2024; Marhamah et al., 2017; Umamah & Muassomah, 2020). This approach is suitable for learning Indonesian in law study programs that require the development of legal knowledge and the ability to work with others.

The benefits of critical and collaborative thinking for law faculty students can be used as a bridge in facing new challenges as graduates of law study programs. In this case, the process of critical and collaborative thinking needs to be linked to learning strategies. One such strategy is the cooperative strategy, which is a learning strategy that activates learners and directs them to collaborate with other participants. In cooperative learning, students can develop understanding and attitudes in working together; increasing motivation and learning outcomes. Slavin (1995; 2020) argues that students must work together and motivate each other to get maximum results. Cooperative learning strategies have various methods, namely the STAD (student achievement divisions) method, *think-pair-share*, jigsaw, and others.

The steps of STAD are as follows: students are divided into heterogeneous groups of 4-5 people; each member studies the legal text; each individual evaluates one another to determine their level of mastery of the legal register; and assessment is based on the level of mastery of the material (Yang et al., 2023; Ghufro et al., 2023).

Think-pair-share (TPS) involves the lecturer asking questions related to the learning material; students pair up and discuss; then the results of the discussion are presented to the class (Alsmadi et al., 2022; Saputra et al., 2023). The jigsaw step is quite interesting because there are large and small groups. Students are divided into heterogeneous groups of 4-5 people. The material is given to each group, and each group studies the same material. Each small group discusses the agreed-upon material. After that, each individual evaluates the material that has been studied (Huda, 2013; Chen et al., 2023; Ahmad & Zainal, 2023).

Currently, the curriculum in higher education is regulated through the Regulation of the Minister of Education and Culture of the Republic of Indonesia Number 73 of 2013 (Regulation of the Minister of Education and Culture of the Republic of Indonesia, 2013) concerning the implementation of KKNI and SN Permendikbud Number 3 of 2020: SN-Dikti- Dikti with the OBE paradigm. In its implementation, undergraduate programs are equivalent to level 6, where learning materials are more focused on theoretical studies and the learning process emphasizes student activities. Based on the KKNI, every educational institution is required to meet educational management quality standards.

A model is a pattern of something that will be organized and produced. Subyantoro (2013) states that models are used in various ways. Things related to teaching models are interpreted as a collection of strategy components. A teaching model must show several different aspects of the teaching process in order to achieve the best desired results under the expected conditions. Joice et al. (2009) state that a teaching model is a description of the learning environment, which also includes teacher behavior when the model is applied. Madusari et al. (2009) state that a learning model is a form of learning that is described from start to finish, which is usually presented by teachers in the classroom. Learning models contain strategies to achieve student competence through learning approaches, methods, and techniques.

Similarly, Arend (in Trianto, 2023) explains that a learning model refers to the learning approach used, including learning objectives, stages of learning activities, learning environment, and classroom management. A learning model is a form of learning that is described from the beginning to the end of the process, presented in a distinctive way by educators, supported by a system, and has an instructional impact.

According to Joice et al. (2009), there are four groups of learning models: information processing models, social teaching models, personal teaching models, and behavioral system models. Arend (in Trianto 2012) selected six types of teaching models that are frequently and practically used by teachers in the learning process. These models are: (1) presentation, (2) direct instruction, (3) concept teaching, (4) cooperative learning, (5) problem-based teaching, and (6) class discussion. In teaching certain concepts or materials, no one teaching model is better than another. Each model must be adapted to the appropriate concept and can be combined with other learning methods to improve learning outcomes. Therefore, in choosing a learning model, various factors must be considered, including: subject matter, class time, students' cognitive development level, learning environment, and available supporting facilities.

Joice et al. (2009) also describe various learning models by explaining teaching structures, social systems, teacher roles or tasks, support systems, and instructional and accompanying impacts. Therefore, based on this explanation, it can be concluded that the components of a learning model include teaching structures, social systems, teacher roles or tasks, support systems, and instructional and accompanying impacts.

Rochmiyati (2021) also proposes that there are five elements of the model, namely learning syntax, social systems in the form of the atmosphere and norms that apply in learning, reaction principles in the form of ways of handling and responding to students, support systems in the form of methods, materials, and tools that support the learning process, as well as instructional impacts in the form of learning outcomes obtained, and coaching as a complementary impact.

Based on this description, this study will attempt to develop an Indonesian language learning model based on critical and collaborative thinking in higher education. In line with its objectives, this research is relevant and has been previously conducted by (Marhamah et al., 2017; Himawan et al., 2024; Riti et al., 2021; Widodo, 2017; Ilmudinulloh, 2022; Rahayu & Suryadi, 2022; Rahayu & Suryadi, 2019). Overall, these studies contribute to the theory of analysis and assessment steps as a basis for processing research data. This study is a continuation of several of these studies, which attempt to complement some of the weaknesses of previous studies to form a basis for conducting further research, especially on the topic of learning model development. Learning models play an important role in determining the effectiveness of the teaching and learning process. According to Joyce et al. (2009), learning models can be classified into four main groups, namely information processing models, social teaching models, personal teaching models, and behavioral system models. Each model has a different teaching structure, social system, teacher role, support system, and instructional and accompanying impact. Meanwhile, emphasizes that in practice, teachers tend to use the six most frequently applied models, namely presentation, direct teaching, concept teaching, cooperative learning, problem-based learning, and class discussion (Arends et al., 2012).

Thus, there is no single model that is universal or superior for all learning contexts. The selection of a model must consider the characteristics of the material, the time available, the cognitive abilities of the students, the learning environment, and the supporting facilities (Joyce et al., 2009; Arends et al., 2012). This confirms that the effectiveness of learning is greatly influenced by the compatibility between the characteristics of the model and the learning needs.

Furthermore, Rochmiyati (2021) argues that a learning model must have at least five main elements, namely: (1) syntax or learning steps; (2) a social system in the form of norms and interactions that develop in the classroom; (3) reaction principles, namely patterns of teacher responses to student behavior; (4) a support system that includes methods, materials, and learning media; and (5) instructional and accompanying impacts that arise from the learning process. This structure shows that learning models are not merely teaching strategies, but rather a complete and interconnected system.

However, relevant and earlier studies show that the application of learning models, especially in higher education, is often still partial and does not systematically integrate critical and collaborative thinking aspects. Research by Marhamah et al. (2017) highlights that language learning in higher education is still dominated by a conventional approach that is oriented towards products rather than critical thinking processes. Meanwhile, a study by Riti et al. (2021) shows that collaboration among students can increase motivation and engagement in learning, but critical thinking has not been the main focus in the design of learning models. On the other hand, research by Widodo (2017) and Rahayu & Suryadi (2019, 2022) emphasizes the importance of integrating higher-order thinking skills (HOTS) with collaborative activities in improving the quality of language learning.

From these findings, there is a research gap in developing an Indonesian language learning model that is capable of integrating critical and collaborative thinking conceptually and practically. Most previous studies have focused on the application of specific learning strategies or the measurement of learning outcomes, rather than on the construction of a comprehensive learning model based on a strong learning theory.

Based on previous research studies, this study constructs a conceptual framework that places critical and collaborative thinking skills at the core of the development of Indonesian language learning models in higher education. The model to be developed seeks to synergize the main elements of the learning model as proposed by Joyce et al. (2009) and Rochmiyati (2021), including learning syntax, social systems, reaction principles, support systems, and instructional and accompanying impacts. This framework is expected to be a strong rational basis for producing adaptive, participatory, and contextual learning models, in line with the demands of 21st-century learning. In this regard, this study aims to develop a critical and collaborative thinking-based Indonesian language learning model in higher education as a response to the need for pedagogical innovation and as an improvement on previous studies.

Method

This research is classified as R&D development research. The research development model used is the R2D2 development model (Willis, 1995), which has three important stages, namely: (1) *determining the focus*, (2) *designing and developing*, and (3) *disseminating*. The development research design was chosen because it is reflective and collaborative (Syamsi et al., 2013), thus providing ample opportunity to develop a product in the form of a language learning model based on critical and collaborative thinking in higher education.

Research Stages

The first stage of the research was business definition. This stage was used to understand issues related to contextual product needs. Next was the planning and development stage, which involved designing and developing the product in accordance with the results of the needs analysis that had been carried out. Finally, dissemination was carried out by compiling the final product in accordance with the context. The feasibility assessment of the media by experts was used to assess the suitability of the learning model through the RPS developed with several aspects of expert assessment, the suitability of the RPS with the sub-CPMK (c) feasibility test and trial to 20 students; (d) conducting experimental tests to determine the effectiveness of the developed learning media, on 2 Indonesian language classes, each consisting of 30 students with control and experimental groups.

Research Subject

The research subjects were students taking Indonesian language courses at the Law Study Program, Faculty of Law, Ahmad Dahlan University Yogyakarta and Muhammadiyah University Purwokerto. After conducting several feasibility and effectiveness tests. Next, the results of these tests were calculated using the Aiken V formula (Retnawati, 2015) and a *pretest* and *posttest control group* design (Zubaidah et al., 2018). The final stage was to conduct an evaluation as a reflection on the development of an Indonesian language learning model based on critical and collaborative thinking.

Research Instruments

The main instruments used in this study included observation guidelines, questionnaires for students, and expert review questionnaires for the developed products. The observation guide was systematically compiled with clear performance indicators to record and analyze field conditions in the learning model development process. This instrument became a strong empirical basis for mapping learning needs and formulating relevant learning model characteristics (Ardiansyah et al., 2023; Syarif, 2023). The student questionnaire was designed with closed and open formats to measure responses to the product, while the expert questionnaire was used to assess the content validity, practice, and feasibility of the product from an expert perspective. This instrument validation method has been proven effective in various modern R&D studies (Oktariani et al., 2021).

The concept of using these instruments is supported by recent studies on R&D research and assessment instruments. Structured observations and questionnaires play an important role in data collection, especially when they are designed based on relevant theories and indicators and have undergone expert validation (Arifin, 2012; Syarif, 2023). In addition, the development of instruments for expert and student assessment should also involve content validity and construct reliability tests to ensure the reliability of the data collected. Thus, the use of this combination of instruments enables research to produce learning models that are valid, practical, and responsive to academic needs.

Data Analysis Techniques

The data analysis techniques in this study used two approaches, namely qualitative descriptive and quantitative descriptive. The qualitative descriptive approach was used to describe the results of the needs

analysis as the basis for developing a critical and collaborative thinking-based Indonesian language learning model in the law study program. The data analyzed included the results of observations of the learning situation in the classroom, reviews of documents such as the Semester Learning Plan (RPS) and teaching materials, and the results of in-depth interviews with lecturers and students. This technique was used to interpret the data contextually and explore the meaning behind the field findings (Creswell, 2014; Moleong, 2019). The analysis process was carried out by reducing the data, presenting the data systematically, and drawing preliminary conclusions that were used to design a relevant learning model (Miles et al., 2014).

Meanwhile, a quantitative descriptive approach was used to analyze the results of product trials, which included feasibility tests by experts, student response tests, and implementation model effectiveness tests. Data were collected through a questionnaire instrument designed based on indicators of validity, acceptability, and effectiveness of the learning product (Sugiyono, 2018; Nieveen, 2013). The data obtained were analyzed quantitatively using descriptive statistics to determine the trends in scores, percentages, and assessment categories. The results of this analysis became the basis for revising and refining the product to suit user needs and the learning context in higher education, particularly in Indonesian language learning in law study programs (Borg & Gall, 2003; Plomp & Nieveen, 2010).

Results and Discussion

The development of an Indonesian language learning model based on critical and collaborative thinking in law study programs includes the results of initial product development, product testing, product revision, final product review, and research limitations. The initial product development results were based on a needs analysis obtained from interviews with lecturers and students of the law study programs at Ahmad Dahlan University and Muhammadiyah University Purwokerto. The needs analysis was conducted in the form of a literature review, classroom observation, and interviews with users. The literature review aimed to find theories related to Indonesian language learning materials in higher education.

Define Focus

The initial step in the needs analysis stage was conducted through observation of the learning conditions in classrooms at Ahmad Dahlan University (UAD) and Muhammadiyah University Purwokerto (UMP). The results of the observation showed that the classrooms at both universities were spacious and equipped with learning support facilities such as LCD projectors, loudspeakers, whiteboards, and ergonomically designed chairs. Air circulation and lighting in the classrooms were adequate, supported by air conditioning. Each class had 50 to 60 students, and there was a practice of separating male and female students. This resulted in the formation of groups that tended to be homogeneous based on gender.

In addition to observation, interviews were conducted with lecturers and students involved in Indonesian language lectures. At UAD, Indonesian language courses carry a credit load of 2 credits and are taught in the first semester. The teaching materials are compiled based on the Semester Learning Plan (RPS) designed by the course team and are uniform for all study programs. The material provided focuses on the skills of writing scientific papers and official letters, with the main book entitled *Mahir Berbahasa Indonesia* by Rahayu, et al. In the law study program, first-semester students are divided into seven parallel classes. Various active learning models have been implemented by lecturers, but student motivation in attending lectures varies greatly. The media used in learning includes PowerPoint and main textbooks, while student worksheets are displayed through presentations and distributed via WhatsApp.

Meanwhile, interviews at UMP showed that the Indonesian Language course also carries a weight of 2 credits and is taught in the first semester with material compiled based on the university's RPS. The material is uniform for all study programs, covering writing skills, scientific writing, and science-based popular articles. However, the existing material does not fully guide students towards the development of critical and collaborative thinking. The main reference book used is *Kemahiran Bahasa Indonesia (Indonesian Language Proficiency)*. First-semester law students are divided into two parallel classes and are still in the transition period from secondary to higher education. The learning media used is dominated by PowerPoint, and lecturers have implemented various learning models that emphasize student activity.

Design and Development

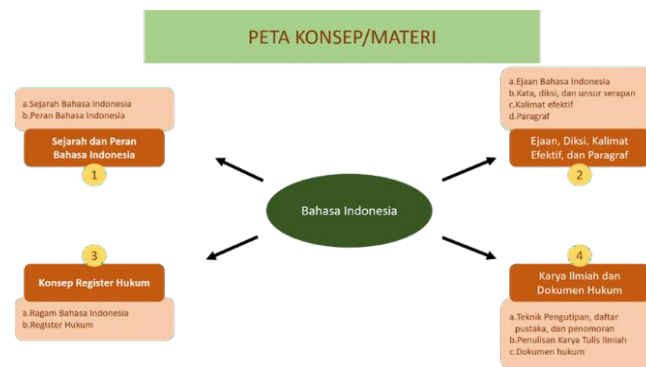


Fig. 1. The Figure title should be placed here

The initial product development stage, namely the creation of learning aids. In accordance with the Minister of Research, Technology, and Higher Education Regulation Number 44 of 2015 concerning Guidelines for Curriculum Development in Higher Education in the Era of Industry 4.0 in 2020, The Outcome-Based Education (OBE) Curriculum Plan (RPS) includes elements of the Indonesian Language course identity, learning outcomes in the form of SLOs which are broken down into CPMK and sub-CPMK. The Indonesian Language course aims to equip students with the ability to understand and use Indonesian in scientific written communication in the field of law.

This course teaches students about various forms of standard written communication, namely Enhanced Spelling. The ultimate goal of this course is for students to be able to write various forms of standard written communication, especially scientific papers in the field of law. The RPS follows the syntax of the think-pair-share, STAD, and jigsaw learning methods (RPS, teaching materials, LKM, media, and evaluation). The learning model is complemented by the "Guidelines for Using the Register-Based Indonesian Language Learning Model in Law Study Programs" (the model syntax is written in each meeting).

The syntax in the learning model with cooperative learning strategies will be seen in each meeting. Meetings 1 to 3 use the think pair share (TPS) method, while meetings 4 to 7 use the student team achievement divisions (STAD) method. After that, meeting 8 is used for the midterm exam. Meetings 9 and 10 use the jigsaw method, meetings 11 and 12 use STAD, and meetings 13, 14, and 15 apply the TPS method. The 16th meeting is held for the final exam. In the learning process, lecturers can develop existing syntax in each meeting and can add ice breakers, trigger questions, and ways to motivate learning.

The expert feasibility test in this study was conducted to determine the suitability of the developed learning model with several aspects of the material in Indonesian language courses in higher education. The feasibility test of the register-based Indonesian language learning model was assessed by learning experts, legal experts, and legal practitioners. The results of the RPS feasibility assessment in the feasible category were continued in a limited trial.

This was based on the assessment results, in which 87.5% were declared valid and 12.5% required improvement based on suggestions and input. It was recommended that the SSP be based on OBE so that it could be useful in further learning; sub-CLOs should not be too numerous so that evaluation would be easy and effective; and syntax should be explained in detail to make it easier for lecturers to carry out the learning process. The RPS has been revised based on feedback. Based on the assessment results, 93% of the learning models were considered appropriate and 7% needed improvement, so it can be concluded that the learning models in the category of feasible to continue in limited trials.

Based on the needs analysis, an OBE-based RPS, critical and collaborative thinking-based teaching materials, LKM, evaluation, and learning media were developed. First, the model was tested in a limited trial in the law study programs at UAD and UMP. Based on the above trial, the model was revised again and the final product was reviewed.

The results of the normality test of pre-test and post-test data used Kolmogorov-Smirnov can be seen in Table 1. The results of the normality test of pre-test data in the control class at Ahmad Dahlan University showed a significance value of $0.178 > 0.05$, while in the experimental class it showed a significance value of $0.136 > 0.05$. Then, the results of the normality test of the post-test data in the control

class obtained a significance value of $0.073 > 0.05$, while in the experimental class it showed a significance value of $0.105 > 0.05$.

Table 1. Normality Test

<i>Hasil Belajar Mahasiswa</i>	<i>Kelas</i>	<i>Kolmogorov-Smirnov Statistic</i>	<i>df</i>	<i>Sig.</i>	<i>Shapiro-Wilk Statistic</i>	<i>df</i>	<i>Sig.</i>
	Pretest eksperimen	.117	46	.136	.967	46	.215
	Posttest eksperimen	.119	46	.105	.963	46	.147
	Pretest kontrol	.113	46	.178	.937	46	.015
	Posttest kontrol	.124	46	.073	.960	46	.120

These results indicate that the pre-test and post-test data in the control and experimental classes are normally distributed can be seen in Table 2.

Table 2. Results of Homogeneity Test with SPSS Program

		<i>Levene statistic</i>	<i>Df1</i>	<i>Df2</i>	<i>Sig.</i>
Hasi Belajar Mahasiswa	Based on mean	1.937	3	180	.125
	Based on median	1.929	3	180	.126
	Based on median and with	1.929	3	169.411	.127
adjusted df		1.947	3	180	.124
	Based on trimmed mean				

The writing style and tone should prioritize clarity, avoiding overly technical language that might confuse readers. Explanations should be straightforward, concise, and free from unnecessary repetition. Consistency ensures alignment between the objectives, results, and discussions. All claims and interpretations should be supported by evidence from the study and relevant references.

Results of the homogeneity test of pre-test and post-test data. The results of the normality test of pre-test data in the control class showed a significance level of $0.125 > 0.05$, while in the experimental class, it showed a significance level of $0.126 > 0.05$. Then, the results of the post-test data homogeneity test in the control class showed a significance level of $0.127 > 0.05$, while in the experimental class it showed a significance level of $0.124 > 0.05$. These results indicate that the pre-test and post-test data in the control and experimental classes are homogeneous.

The SPSS results obtained a p-value of 0.154. This indicates that the p-value is >0.05 . This indicates that the p-value is >0.05 , so H_0 is accepted. Thus, it can be concluded that the initial intelligence level of students before treatment between the control group and the experimental group was not significantly different. The pre-test analysis results show a p-value of 0.003, which indicates that the p-value is <0.05 . Therefore, the null hypothesis (H_0) is rejected. Thus, it can be concluded that the students' thinking levels after the treatment between the control and experimental groups are significantly different. Therefore, the developed learning model is suitable for use in improving student learning.

Dissemination

The product was disseminated to spread the learning model based on critical and collaborative thinking in higher education. Student responses to the learning process were obtained based on a questionnaire administered after completing the course. Based on the learning materials provided to students and the lecturer's explanations, 76% understood completely, while 21% stated that some of the learning materials could be understood, and 3% understood a little.

Regarding student responses to interest in the learning process, 84% stated that the learning atmosphere was interesting because students could discuss with friends and get to know each other (Suryadi et al., 2024). Students were interested because the learning material was in line with the Indonesian language curriculum, which was new information for them. Students were also happy to be trusted to do independent assignments. 13% of students stated that they were less interested in the learning process because they felt that there were too many assignments. 3% of students complained about

difficulties in completing assignments. In addition, obstacles that arose in the learning process were related to a lack of motivation to learn and the difficulty of understanding original legal documents.

Based on the positive responses and interest of students in the learning process, it can be concluded that the critical thinking and collaborative-based Indonesian language learning model received positive responses from students and can be disseminated for future learning.

Discussion

Based on interviews with lecturers teaching Indonesian language courses in law study programs, it was found that the material taught was still general and uniform with other study programs. The main emphasis was on scientific writing skills without any differentiation based on legal disciplines. This finding reinforces the report by Himawan et al. (2022) that the teaching materials used did not represent specific language competencies in the legal field. Teaching materials such as reading and analyzing texts, describing events, writing scientific papers, and listening and speaking exercises have not accommodated the needs of law students in accessing and producing legal texts. This finding is an important basis for the development of a legal register-based Indonesian language learning model that can bridge the gap between general academic language competencies and communicative needs in a legal context.

Through follow-up interviews with lecturers in legal writing, legal research methodology, and legal practitioners, it was found that students really need to master the legal register in order to convey legal ideas accurately, straightforwardly, and contextually. Indonesian in this context must not only be grammatically correct, but also careful in choosing diction that is in accordance with legal language conventions (Rahayu & Suryadi, 2022; Nuthihar et al., 2020). Therefore, the development of contextual and needs-based learning tools is very important. In response to this need, a set of learning tools was developed, including OBE-based RPS, syllabi, LKM, supporting media, and guidelines for using the legal register-based learning model. These tools were designed in accordance with Permenristekdikti Number 44 of 2015 and took into account the principles of Outcome Based Education (OBE), which emphasizes concrete student learning outcomes (Himawan et al., 2024).

The development of a legal register-based learning model in this study represents a form of **learning innovation based on scientific context**. The expert validation test, which showed a score of 87.5%, can be interpreted to mean that the integration of the outcome-based approach (Outcome-Based Education/OBE) and the R2D2 model (Willis, 1995) is capable of producing a learning design that is reflective and adaptive to user needs. The R2D2 model, with its principles of recursive and reflective design, allows for a cycle of continuous improvement based on feedback from lecturers and legal practitioners. This approach is in line with the principles of design-based research (DBR), which emphasizes collaboration between developers, experts, and practitioners to produce models that are not only theoretically valid but also contextually relevant (Anderson & Shattuck, 2012).

The effectiveness of the model, tested through limited experiments, shows a significant increase in students' critical and collaborative thinking skills. These results can be interpreted as evidence that **learning that places scientific context at the center of learning activities** encourages higher-order thinking processes. This is in line with Vygotsky's (1978) theory of social constructivism, which states that cognitive abilities develop through social interaction and collaboration in meaningful contexts. The active learning syntax used, such as think-pair-share, STAD, and jigsaw, facilitates the formation of constructive academic dialogue, so that students not only master the language structurally but also understand its functional meaning in legal discourse.

Conceptually, these findings expand our understanding of **register-based learning models** as a form of integration between systemic functional linguistic theory (Halliday, 1994) and modern collaborative learning principles. This model positions language as a means of representing and negotiating meaning in specific social contexts, rather than merely a mechanistic skill. Thus, the main contribution of this study lies in its attempt to link **applied linguistic approaches** with **contextual learning design theory**, resulting in a replicable model framework that can be applied to other scientific fields with distinctive discourses (Himawan & Suyata, 2021).

From a practical perspective, the results of this study have strategic implications for the development of Indonesian language curricula in higher education. The integration of legal registers in learning enables law students to **construct their academic and professional identities through language**. Students not only learn to write scientifically, but also practice using diction, sentence structure, and argumentative style in accordance with the tradition of Indonesian legal discourse. This is important because language is the main instrument in the formation of legal arguments, as stated by Tiersma (1999) that "legal language shapes the very way law is conceptualized and practiced."

Thus, this study makes two main contributions. First, theoretically, this study enriches the repertoire of developing context-based learning models, particularly through the legal register approach. Second,

practically, this study shows that learning designs that link linguistic and professional needs can improve students' critical, collaborative, and communicative thinking skills.

The limitations of the study in terms of implementation scale require cross-institutional trials to test the stability and applicability of the developed model in various legal education contexts. In the future, the development of legal language-based critical thinking assessment instruments and performative rubrics will strengthen the validity of learning outcomes. With this direction, the Indonesian language learning model based on legal registers is expected to make a real contribution to the transformation of Indonesian language learning in higher education institutions to be more contextual, reflective, and responsive to the professional needs of the 21st century.

Conclusion

The results of this study emphasize the importance of developing learning tools that integrate critical and collaborative thinking within Indonesian language learning for law students. Insights from lecturers and legal practitioners highlight that mastering legal registers enables students to express ideas accurately and contextually—an essential foundation for critical thinking in analyzing and formulating legal arguments. The learning products developed therefore go beyond linguistic competence by fostering deep, reflective thinking within a legal framework. The RPS, structured according to Outcome-Based Education (OBE) principles and validated with high feasibility, provides a solid foundation for learning implementation that promotes both critical and cooperative skills. Simplified sub-CPMK components and detailed syntactic explanations in the RPS enhance instructional effectiveness and create a collaborative learning environment that supports productive dialogue, perspective exchange, and collective reasoning. Statistical analyses showing significant pretest differences between control and experimental groups underscore the need to consider learners' initial abilities in designing interventions, while posttest results demonstrating significant improvement confirm the model's effectiveness in cultivating critical and collaborative thinking. This law-based learning model successfully transforms students from passive recipients into active participants who process, critique, and construct knowledge through interaction. Overall, integrating critical and collaborative thinking in Indonesian language instruction strengthens law students' comprehension and communication within academic and professional contexts, enhancing analytical precision, logical reasoning, and teamwork—key competencies in legal practice. Despite its success, the study's limitations include its narrow institutional scope, short intervention period, and general assessment instruments that may not fully capture the complexity of legal discourse. These constraints suggest directions for future research, including cross-institutional validation and the development of performance-based assessments tailored to legal contexts. Consequently, this study contributes both theoretically and practically to higher education pedagogy by offering a model that not only enhances linguistic mastery but also nurtures critical, reflective, and communicative thinking aligned with the intellectual and professional demands of the legal field in the digital era.

Declarations

- Author contribution** : Triwati Rahayu played a role in designing the overall research and was primarily responsible for developing the Indonesian language learning model. She also led the manuscript writing process and formulated a critical and collaborative thinking-based learning approach. Suryadi made a significant contribution to strengthening the theoretical framework, particularly in linking the context of legal studies with language learning. He was also involved in data analysis and substantive editing of the final manuscript. Both authors discussed the entire research process intensively, agreed on the final manuscript, and are fully responsible for the accuracy and integrity of the content of this article.
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