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Foreign language as a tool for developing critical thinking skills

The paper explores the intricate relationship between students' foreign language acquisition and the development of critical thinking skills in the context of modern university education. With the rapid advancements in information technology and globalization, which we witness nowadays, the need for highly qualified specialists proficient in foreign languages has become essential. The study argues that a foreign language learning transcends mere linguistic proficiency; it actively fosters cognitive flexibility, analytical reasoning, and metacognitive awareness, which are core components of critical thinking. Through a literature review, the paper identifies cognitive processes inherent in language acquisition that align with essential components of critical thinking, such as metacognition, problem-solving, and intercultural analysis; it also determines how the challenges inherent in learning a foreign language, such as ambiguity, cultural nuances, and complex communication. The findings indicate that modern foreign language education should absolutely move from the traditional way of learning to up-to-date methodologies that prioritize cognitive engagement and critical evaluation, utilizing tasks that compel students to articulate arguments, assess information critically, and engage in complex discussions. The implications suggest that integrating critical thinking development into language education can cultivate adaptable, reflective, and culturally competent individuals capable of navigating complex global environments. Recognizing foreign language learning as a strategic tool for cognitive development underscores its importance in fostering essential skills that are necessary for gaining academic success and effective global citizenship. The study concludes by advocating for curricular reforms that leverage foreign language instruction as a vital tool for cultivating critical thinking while suggesting avenues for future research to empirically assess the impact of various teaching methodologies on critical thinking development.

Keywords: foreign language, critical thinking, cognitive development, language study, educational tool.

Introduction. Modern life is characterized by the rapid development of information technologies, international cooperation, and vast globalization processes, people are constantly surrounded by vast amounts of information, requiring them to analyse, evaluate, and synthesize data from diverse sources to make informed decisions and navigate complex global realities. These globalization processes penetrate all spheres of our lives: industry, culture, agriculture, international relationships, the military sphere, and education. All these spheres of life require well-prepared, highly qualified specialists with a good command of foreign languages. That is why many teachers of foreign languages, methodologists, and applied linguists constantly look for, create, and develop new methods, approaches, and techniques for language studying and teaching. However, the process of studying a foreign language is a comprehensive issue: it is not only limited to the study of a language itself and the history of its development, but it implies the impact of the process of studying on the student's cognitive abilities, on their possibility to think critically, in particular, and to develop this critical issue.

Nowadays, the teaching system of foreign languages is being developed primarily on a competency-based approach. This approach implies students' mastering competencies that allow them to act effectively in uncertain conditions, caused by both socio-economic and political reasons, implementation of artificial intelligence into many spheres of our lives, radical changes in several industries, as well as the need to change career paths throughout the life repeatedly. It is generally accepted that in our modern world, students have to be ready to change their profession or specialization on average three or four times during their professional career. In view of this, students' acquisition of specific knowledge on a particular subject fade into the background, and the development of the so-called 21st-century skills takes on vital importance. Working in a team, communicating with people who hold different points of view, and having the ability to learn autonomously, due to the reduction of academic hours at universities, have become more and more important, and that is why the highlight is being given to students' extracurricular independent work. Thus, the key role in the list of new skills and abilities comes to the ability to think critically, which is no longer a desirable trait but a fundamental necessity. While critical thinking is often explicitly taught in disciplines like philosophy, science, and social studies, its connection to and development through foreign language study usually remains an understated aspect of language education.

Analysis of recent research and publications. The relationship between language and thought has been a subject of philosophical and psychological research for centuries, with theories ranging from linguistic determinism (Sapir-Whorf Hypothesis) to more nuanced views of mutual influence. In contemporary educational discourse, represented in the works of Huang et al. (2023), Ran (2025), Sajidin (2025), the focus has shifted towards how language learning can contribute to cognitive development, particularly critical thinking. Foundational definitions of critical thinking by scholars like R.H. Ennis (1987) and R. Paul and L. Elder (2008) emphasize reflective judgment, analysis, evaluation, and problem-solving that align with the cognitive demands of foreign language acquisition.

More directly, several researchers have explored the link between foreign language study and critical thinking. Thus, J.H. Flavell (1979) established metacognition as a crucial aspect of cognitive development. In turn, in foreign language study, learners constantly engage in metacognitive processes, for instance, planning how to learn, monitoring their comprehension, and evaluating their strategies, which are direct manifestations of critical thinking in action (Wenden, 1998).

Besides, it's worth admitting that the inherent ambiguities and challenges in understanding and producing a foreign language necessitate constant problem-solving. Learners must infer meaning from context, resolve grammatical puzzles, and adapt communication strategies, thereby exercising analytical and inferential critical thinking skills (Thakur & Al-Mahrooqi, 2015). Also, M. Byram (1997) emphasized that foreign language education is not just about linguistic skills but also about developing intercultural communicative competence. This involves analysing and comparing one's own culture with the target culture, which directly fosters critical thinking by encouraging perspective-taking, challenging assumptions, and promoting a more nuanced understanding of diverse worldviews.

Bloom's Taxonomy (Anderson & Krathwohl, 2001) categorizes cognitive skills from lower-order (remembering, understanding) to higher-order (applying, analysing, evaluating, creating). Modern foreign language pedagogy increasingly aims to engage learners in these HOTS through tasks that require more than simple recall, pushing them towards deeper cognitive engagement. While the scientific research strongly suggests a connection, explicit pedagogical frameworks that systematically outline how foreign language itself serves as a tool for critical thinking development are still evolving. So, we provide a structured analysis of this relationship and its practical implications.

The aim of the article. The article argues that a foreign language is not merely a subject to be learned but a powerful tool that actively facilitates the development of critical thinking skills. The process of studying and using a foreign language demands cognitive flexibility, analytical reasoning, and metacognitive awareness, all of which are core components of critical thinking. In the article, we explore the mechanisms through which

foreign language study acts as this cognitive tool and analyse why studying a foreign language can help develop the student's critical thinking.

Methodology. This article employs a conceptual analysis and literature review approach to investigate how a foreign language functions as a tool for developing critical thinking skills. We first establish clear working definitions for “critical thinking”, drawing from established theories in cognitive psychology and second language acquisition. This involves identifying the core components of critical thinking and the fundamental processes involved in learning and using a foreign language. The core of the analysis involves identifying the specific cognitive processes inherent in foreign language learning that directly align with and activate critical thinking skills. The study culminates in articulating how the foreign language itself serves as an instrument for cognitive development.

Results and discussion. Nowadays, in our quickly changing world, the main task of the modern education system is to teach students to acquire knowledge independently, without anybody's help or explanation. Future specialists must be able to use different sources of information by analyzing them and sorting them out; they must be able to organize their educational process and manage time effectively. Students should not rely on a certain amount of knowledge acquired at the institute; they should be able to obtain the necessary information throughout their subsequent professional activities after getting their diploma. The modern world is often faced with various types of cataclysms that force humanity to change its traditional way of living. The most striking examples of these calamities of the recent decade are the coronavirus pandemic and the Russian war in Ukraine. The COVID-19 Pandemic has forced people to limit their habitual mutual face-to-face communication, but to go online, having acquired the necessary technological skills and abilities for getting information on their own, and people continued to perform their functional duties with the help of cutting-edge technologies.

The Russian military aggression in Ukraine has forced millions of people to leave their homes, their usual jobs, relatives, and friends. The Internet has become the primary means of communication between people. However, even in relatively safe areas of Ukraine, ongoing bombings and air raids have made it impossible to conduct effective training in educational institutions. As a result, students are often forced to learn the educational materials on their own. Thus, the modern education system is evolving within a competency-based framework, which means students, having mastered various competencies, should be able to work effectively in any situation caused by the numerous changes in their country's social, political, or economic life. It is also widely accepted that employees should change jobs approximately every four years and acquire new skills and abilities relevant to their profession. Therefore, the knowledge gained at university is becoming less important than the ability to think critically, work in a team, find compromise solutions to emerging problems, and communicate with people with different views. A key component of these new skills is the ability of students to learn independently, meaning they should be prepared for self-study.

When the Council of Europe began to explore the most effective methods and approaches for adult foreign language teaching and learning in 1979, Professor Henry Holec published his book, “Autonomy and Foreign Language Learning” (Holec, 1980), which made a valuable contribution to the concept of learning. According to H. Holec, learners should set their own goals, determine the content of educational activities, choose the methods and approaches of learning, and assess the results they obtain. Learners should also hold full responsibility for their freedom of choice. This concept of autonomous learning could be applied only to adult learners.

Critical thinking implies the students' full involvement in creating their knowledge system with the help of active processes of thinking and reflection. The ability to think critically is generally considered a possibility to argue, refute flawed evidence, and monitor the correctness of the judgments. Such applied linguists as M.N. Browne and S.M. Keely, define critical thinking as the number of qualities and possibilities that help to analyze awareness of interrelated critical issues, as well as the ability to ask critical questions and to answer them at an appropriate moment, and the intention to use these vital issues (Browne & Keeley, 2016: 3). This kind of thinking helps not only to accept all arguments and conclusions but also to understand what types of supporting data exist to prove any particular argument or conclusion. D.F. Halpern (Halpern & Dunn, 2022) speaks about several distinctive features of critical thinking. The first feature of this phenomenon may be its independent consideration. The second one highlights that existing data is not the ultimate point, but just the starting one of this type of thinking. The next feature is a desire for convincing argumentation. The last distinctive feature is the social character of critical thinking. It is also considered that critical thinking is a good-oriented process that is characterized by logic, balance, and the use of various cognitive strategies and skills that provide significant opportunities to obtain desired results (Halpern & Dunn, 2022: 9).

Critical thinking is undoubtedly a strategy that can best improve the quality of a general process of considering; this type of thinking is characterized by a self-governing and self-regulating nature, encompassing the consideration and deep understanding of events that happen around us. Critical thinking helps us understand the intercultural spheres that we face every day through the analysis and assessment of everyday events. It

also helps to develop intellectual, social, and economic integrity and confidence in one's intellectual abilities (Kramsch, 1993: 20). Researchers think that critical thinking skills prepare students for practical activities and life in general; they develop the ability to predict and consider changes in the economy to notice the “chops and changes” in technologies and production management. Critical thinking helps students change their psychology, adapt to the market economy, and develop their business skills and professional qualifications. Considering the flow of information that our students face today, the development of critical thinking skills is especially acute. Living in the age of information technology, people are accustomed to an endless stream of new information. In this regard, awareness has emerged in various fields: in politics, economics, or education. All this provides an opportunity to satisfy many of the needs of human life. Constantly, people obtain different news about what is going on around them. It can be written or oral, but the primary sources of information flow are radio, television, newspapers, and the Internet, which are combined into one single concept of Media. It is impossible to argue, that critical thinking skills are indispensable for people nowadays. These skills help them in such processes as problem-solving, reinforcing their ideas, information recognition, and establishing their autonomy. It is emphasized that the student's ability to think critically is one of the skills most highly assessed by employers. Critical thinking is one of the most essential skills obtained through higher education (Lampert, 2007: 8). The researchers think that the critical thinking creation is the process of training and education that results in updating and developing such natural personal qualities as curiosity and sensitivity, self-confidence, independence, and communication skills (through active communication, which is regarded as the most efficient approach to motivation students in developing their ability to think critically), freedom of expression, and courage in expressing own ideas.

Thus, we support the idea that critical thinking is an intellectually controlled process of active communication, application of analysis, synthesis, and evaluation of information collected through observation, experience, consideration, and communication. It is also possible to note that the nature of a foreign language as a subject makes it an ideal environment for developing students' critical thinking skills and abilities. We also agree that teachers of foreign languages are responsible for helping students gain critical thinking skills while teaching them a foreign language.

A foreign language itself acts as a powerful catalyst, driving the development of critical thinking skills through its inherent demands and complexities. Learning a foreign language is a deeply metacognitive process, as learners are constantly forced to reflect on their own understanding and production. Thus, when encountering a new grammatical structure or vocabulary item, they don't just passively absorb it, they consciously analyse it, compare it to their native language, hypothesize rules, and test these hypotheses in communication. This continuous cycle of self-monitoring, self-assessment, and strategy adjustment directly cultivates metacognitive awareness, a cornerstone of critical thinking (Flavell, 1979). The foreign language acts as a mirror, reflecting the learner's cognitive processes and prompting strategic choices.

Language is inherently ambiguous and context-dependent. In a foreign language, this ambiguity is amplified, forcing learners into constant problem-solving modes. Whether it is inferring the meaning of an unknown word from surrounding context, understanding idiomatic expressions or culturally nuanced communication, learners are continuously engaged in analytical reasoning and inferential thinking (Thakur & Al-Mahrooqi, 2015). The foreign language provides a rich environment for developing these problem-solving skills, as every communicative act can present a mini-puzzle to be solved.

Exposure to a foreign language inherently means exposure to a new culture, new ways of thinking, and different conceptual frameworks. This process compels learners to compare and contrast linguistic structures, social norms, values, and worldviews with their own. By grappling with these differences, learners develop empathy, intellectual flexibility, and the ability to take multiple perspectives – all vital critical thinking skills (Byram, 1997). Thus, a foreign language fosters a critical and nuanced understanding of global issues.

In the digital age, foreign language learners access vast amounts of authentic information online. This necessitates a critical evaluation of these sources' credibility, bias, and relevance. When reading a news article in the target language, for example, learners must not only comprehend the literal meaning but also critically assess the author's intent, potential political leanings, or cultural assumptions. The foreign language thus becomes the medium through which critical information literacy is practiced and refined, moving beyond mere linguistic decoding to deep textual analysis.

Moving beyond basic transactional communication, expressing complex ideas, constructing coherent arguments, and participating in debates in a foreign language demand highly sophisticated critical thinking. Learners must select precise vocabulary, employ appropriate grammatical structures, and utilize culturally sensitive discourse strategies to convey their message effectively and persuasively. The foreign language challenges learners to think critically about *how* they communicate, pushing them towards greater clarity, precision, and logical coherence in their expression, thereby enhancing their overall argumentative skills.

Recognizing a foreign language as a tool for critical thinking has significant pedagogical implications, advocating for a shift from rote learning to cognitively demanding tasks. Thus, integrating regular debates and structured discussions on controversial or complex topics relevant to learners' interests requires them to formulate arguments, provide evidence, and respond to counter-arguments in a foreign language. Using diverse authentic texts, like news articles, documentaries, social media posts, and scientific reports, guides students through critical reading or listening strategies, focusing on identifying purpose and underlying text messages. Besides, encouraging metacognitive reflection through journaling, self-assessment rubrics, or peer feedback activities in the target language prompts students to analyse their learning process and communication effectiveness. Also, engaging students in long-term projects that require research, collaboration, and presentation of findings in a foreign language simulates real-world critical thinking and communication challenges.

Conclusions and prospects for further research. The study of a foreign language is far more than an exercise in linguistic acquisition; it is a profound cognitive journey that serves as a powerful tool for developing critical thinking skills. By navigating the complexities of a new linguistic and cultural system, students are compelled to engage in metacognition, problem-solving, cross-cultural analysis, information evaluation, and nuanced expression. These processes cultivate a sharper, more adaptable mind, equipping students with essential competences for academic success, professional advancement, and effective global citizenship.

The future of foreign language education should fully embrace this instrumental role, designing curricula and pedagogies that intentionally leverage the foreign language as a means for intellectual growth. Further research is needed to empirically measure the specific impact of different foreign language teaching methodologies on critical thinking development, to explore the long-term cognitive benefits of bilingualism on critical thinking across various age groups, and to investigate how digital tools and artificial intelligence can further enhance the foreign languages capacity as a critical thinking tool. Ultimately, by recognizing a foreign language as a tool for critical thinking, teachers can empower students with enhanced cognitive capabilities to engage with the world critically.

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У статті досліджується складний взаємозв'язок між вивченням іноземної мови та розвитком навичок критичного мислення у студентів у контексті сучасної університетської освіти. В умовах швидкого розвитку інформаційних технологій та глобалізації потреба у висококваліфікованих фахівцях, які вільно володіють іноземними мовами, стала надзвичайно актуальною. У дослідженні стверджується, що вивчення іноземної мови виходить за рамки простого володіння мовою, воно активно сприяє когнітивній гнучкості, аналітичному мисленню та метакогнітивній усвідомленості, які є основними компонентами критичного мислення. На основі огляду наукової літератури у статті визначено когнітивні процеси, властиві вивченню мови, які узгоджуються з компонентами критичного мислення, такими як метапізнання, вирішення проблем та міжкультурний аналіз, а також визначено проблеми, властиві вивченню іноземної мови, такі як неоднозначність, культурні нюанси та складна комунікація. Результати проведеного дослідження засвідчують, що мовленнєва освіта повинна перейти від традиційного способу навчання до методологій, які пріоритетують когнітивну взаємодію та критичну оцінку, використовуючи завдання, які спонукають студентів формулювати власну аргументацію, критично оцінювати інформацію та брати участь у складних дискусіях. Висновки свідчать, що інтеграція розвитку критичного мислення в мовленнєву освіту може сприяти вихованню адаптивних, рефлексивних та культурно компетентних осіб, здатних орієнтуватися у складних глобальних середовищах. Визнання вивчення іноземних мов як стратегічного інструменту когнітивного розвитку підкреслює його важливість у розвитку необхідних навичок для академічного успіху та ефективної діяльності в глобальних умовах. Дослідження завершується твердженням про необхідність впровадження навчальних реформ, які визначають викладання іноземних мов як життєво важливий інструмент для розвитку критичного мислення, а також пропонуються шляхи для майбутніх досліджень з метою емпіричної оцінки впливу різних методик навчання на розвиток критичного мислення.

Ключові слова: іноземна мова, критичне мислення, когнітивний розвиток, вивчення мови, навчальний засіб.



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