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EMOTIONAL INTELLIGENCE IN BILINGUAL EDUCATION: HOW TO DEVELOP EMOTIONAL AND COGNITIVE SKILLS SIMULTANEOUSLY

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Abstract. *The article explores how emotional intelligence and cognitive skills can be developed simultaneously in the context of bilingual education. The aim of the study is to examine how bilingualism influences the formation of students' emotional intelligence within the broader scope of their cognitive development. General scientific methods were used in the course of the research: analysis, synthesis, induction, deduction, comparison, generalization and interpretation of academic sources. The results show that while the impact of bilingualism on the development of emotional intelligence and cognitive abilities remains a subject of discussion, a number of studies indicate positive tendencies. In particular, it has been demonstrated that bilingualism contributes to the formation of metalinguistic skills, strengthens communicative intelligence and indirectly stimulates intellectual development through its connection with social skills. It has also been established that bilingual children exhibit higher levels of creativity, mental flexibility and the ability to transfer knowledge across languages, which is the result of diverse linguistic experience. Regarding emotional intelligence, studies point to its multifactorial nature. Bilingualism has been shown to positively affect the development of empathy, enrich social-emotional skills and enhance emotional understanding through intercultural interaction and lexical diversity. Especially notable is the development of cultural empathy and openness to others. However, children from displaced families who grow up in conditions of social stress show lower levels of emotional stability. This is attributed not so much to bilingualism itself as to adverse social factors. In addition, it has been established that cultural differences in modes of emotional regulation influence the outcomes: open emotional expression, typical of Western cultures, differs from the restraint characteristic of Eastern traditions. Therefore, the impact of bilingualism on emotional intelligence is not universal and depends on a wide range of contextual variables. The practical significance of the study lies in the possibility of applying its findings to optimize bilingual education programs with consideration for students' emotional development.*

Keywords: *bilingualism, emotional intelligence, cognitive development, empathy, cultural context.*

Introduction

In light of global transformations and growing international mobility, migration processes are becoming increasingly intense, which in turn highlights the issue of migrant children's adaptation to new sociocultural and educational realities. One of the key aspects of this process is the development of bilingual children—those who must operate in multilingual environments, acquire new language codes and adapt to educational systems that often differ significantly from their native ones. This raises important questions: are bilingual children able to successfully master school programs, adapt to the educational environment, and what factors hinder or,

conversely, facilitate this process?

In recent decades, the cognitive and emotional development of bilingual children has drawn the attention of an increasing number of researchers. Academic literature presents various approaches to assessing the impact of bilingualism on cognitive processes: some scholars emphasize difficulties in cognitive development, which appear primarily at early stages of language competence formation, while others highlight positive dynamics in older age, particularly in the areas of social adaptation and emotional self-regulation. The growing interest in this topic is driven not only by changes in population demographics but also by the need to develop effective educational strategies for bilingual learners.

In this context, the present study aims to provide an analytical overview of academic literature concerning the influence of bilingualism on children's cognitive and emotional development. The objective is to test the hypothesis that bilingualism positively contributes to the development of both emotional intelligence and cognitive abilities, especially within multilingual educational environments.

Literature Review

The question of emotional intelligence development within bilingual education, particularly in the context of simultaneous formation of emotional and cognitive skills, has been sufficiently explored in international academic literature. A large portion of the sources comes from international scholarly journals and includes both theoretical approaches to the affective dimension of learning and empirical studies that demonstrate the impact of bilingualism on socio-emotional and cognitive development.

A significant contribution to the study of the cognitive aspects of bilingualism was made by J. Guilford [7], who in the 1950s proposed a structural model of intellect that later served as the foundation for analyzing cognitive processes in language learning. K. Hakuta, B. Ferdman and R. Diaz [8] outlined three perspectives on the influence of bilingualism on cognitive development, particularly in the context of thinking and memory. A notable historical contribution was also made by E. Peal and W. Lambert [14], who empirically demonstrated a positive link between bilingualism and general intellectual development.

As for emotional intelligence, the work of D. Goleman [6] should be noted for laying the groundwork for the modern understanding of emotional intelligence as a critical factor in education. C. Morilla [11] conducted a study showing that the development of emotional competence in bilingual education supports stronger verbal communication. Research by J.-M. Dewaele [4] further expands this topic by showing the relationship between teachers' emotional intelligence and their job satisfaction, creativity and teaching quality. Meanwhile, N. Alqarni and J.-M. Dewaele [1] explored how psychological factors affect emotional perception of languages in bilingual individuals.

In the context of the affective dimension of learning, J. Arnold and H. Brown [2] describe emotions as an integral part of language learning, while H. Bless and K. Fiedler [3] showed how mood influences information processing. W. J. Han [9] focused on the impact of bilingualism on children's socio-emotional well-being, and K. Voltmer and M. von Salisch [15] demonstrated how an immigrant background affects the development of emotional knowledge in children. Research also considers cultural aspects of emotional regulation, particularly in the work of A. Murata, J. S. Moser and S. Kitayama [12], which highlights cultural specificity in electrocortical responses during emotional suppression.

In the educational context, the work of V. Pavón and J. Ávila [13] is significant for discussing integrated language and content instruction (CLIL) approaches that enhance students' emotional engagement.

Despite the considerable amount of literature on the topic, there is a noticeable lack of systematized material addressing the integration of emotional and cognitive development in bilingual education. Therefore, using various methods of scientific inquiry, the information was analyzed, grouped, systematized and presented in light of the research topic.

Purpose of the article

The aim of the article is to demonstrate how bilingualism contributes to the development of emotional intelligence in students.

Research results

Emotions, thinking, passion and intellect form an inseparable unity in the process of perceiving the surrounding reality. These components do not function in isolation; rather, they interact within a complex cognitive-affective system that ensures a person's adaptability to a changing social environment. In this context, the concept of emotional intelligence, formulated by D. Goleman in 1995, gains particular significance. The scholar interprets emotional intelligence as the individual's ability to recognize and understand their own emotions, comprehend the emotional states of others and effectively manage emotional impulses in both intrapersonal and interpersonal interaction. A key element of this concept is also the ability to self-motivate, which determines the level of personal initiative, persistence and resilience [6].

In the context of bilingual education, this theory opens up perspectives for a deeper understanding of the relationship between emotional self-regulation and language competence. Mastering two languages requires the ongoing engagement of not only cognitive resources but also emotional involvement, including empathy, tolerance toward cultural differences and the ability to adapt to various communicative contexts. In the process of bilingual learning, students are constantly switching between language codes, which, according to current research, supports the development of cognitive flexibility and heightened sensitivity to nonverbal emotional cues. Thus, emotional intelligence in a bilingual educational environment functions not only as a factor in effective learning but also as a developmental objective enhanced by multilingual and multicultural interaction [11].

J. Arnold and H. D. Brown argue that it is impossible to separate thinking and emotions, as they always function together in the learning and cognitive processes [2]. A similar perspective is expressed by H. Bless and K. Fiedler, who, based on experimental research, show that emotions directly influence how people perceive, analyze and draw conclusions from information [3]. This approach offers a new view on the role of emotions in the learning process, especially in language education.

D. Goleman, in turn, emphasizes that emotional development is closely tied to the

interaction between emotional and cognitive centers of the brain. This balance is crucial for a person's ability to regulate their emotions, understand others and learn effectively [6].

It is evident that in bilingual education, students often face additional challenges, since acquiring content in another language requires not only memory effort but also internal stability and confidence. An essential part of this process is the ability to solve problems, work through mistakes and overcome difficulties. These factors contribute to the emergence of challenges and lower emotional intelligence, often related to increased anxiety. For this reason, as noted by V. Pavón and J. Ávila, emotional development is a crucial condition for successful second language acquisition. This is especially true for the ability to interact with others in the educational process, which requires not only language knowledge but also emotional sensitivity, confidence and social skills [13].

Until the past century, researchers studying the relationship between bilingualism and intelligence concluded that bilingualism had no positive effect on cognitive development. As noted by Hakuta, K., Ferdman, B. M., and Diaz, R. M. in 1985, while bilingualism does affect cognitive abilities, bilingual and monolingual children do not possess the same level of metalinguistic awareness, since bilingual children show higher levels of such awareness, which helps them learn to read more quickly. Furthermore, the authors aimed to demonstrate that bilingualism had a negative impact on cognitive development, based on observations of displaced children who struggled with academic tasks.

The main focus of the study was on French-speaking children from Montreal; participants were selected with consideration for multiple factors (gender, age, cultural background, etc.) that could influence the results. The key subject group consisted of bilingual children with equal proficiency in both languages. It was expected, based on prior research, that bilingual children would show lower performance in verbal or perhaps nonverbal intelligence. However, contrary to these assumptions, it was revealed that bilingual children outperformed their monolingual peers in tasks related to verbal or communicative intelligence [8].

An explanation for this was provided by researchers Peal, E., and Lambert, W. E., who concluded that this advantage may stem from the mental flexibility fostered by bilingualism [14]. In addition, bilingualism provides children with a broader range of cognitive abilities and enhances their capacity for concept formation. The experiment showed that bilingual children possess higher intelligence, whereas monolinguals tend to exhibit a more unitary form of intelligence that they apply uniformly across tasks [7].

Debates about whether bilingualism promotes or hinders a child's cognitive development are ongoing. Some studies suggest that interference from another language complicates the acquisition of a second language more than that of a native one. However, other data indicate that bilinguals are better at controlling cross-language interference. They achieve higher results in learning new vocabulary, grammar and pragmatic rules. Studies also highlight differences in language transfer, metalinguistic awareness and phonological working memory, which contribute to bilinguals' advantages in language learning.

Despite studies proving the positive cognitive effects of bilingualism, researchers at the University of Tennessee (USA) and Ruhr University (Germany) concluded that while bilingual children tend to be more social, bilingualism does not have a direct impact on intelligence. The influence on intellectual development is indirect, arising through a range of additional factors—for example, bilingual children have been shown to be more creative, more empathetic and to possess higher social-emotional skills.

In the research project known as the "St. Lambert Project," organized by Lambert, W. E., and Tucker, G. R. in 1972, it was found that bilingual children are capable of producing more creative and imaginative results compared to monolingual children, indicating a higher intellectual potential. Bilingual children also show greater efficiency in transferring skills from one language to another. This led researchers to suggest that such an ability may result from more advanced cognitive processing [10].

Based on the analysis of various studies on the impact of bilingualism on cognitive development, the following experimental and research results can be systematized (see Table 1).

Table 1 – The impact of bilingualism on a child's cognitive development

Factor	Research findings	Key conclusions
Development of metalinguistic skills [8]	Although researchers assumed that bilingual children might have lower verbal abilities due to language interference, results showed that they possess higher metalinguistic awareness and perform better in reading.	Bilingualism does not diminish cognitive abilities; on the contrary, it enhances conscious language awareness, which supports reading acquisition.
Advantage in communicative intelligence [14]	In a study of French-speaking children from Montreal, bilingual students outperformed their monolingual peers in communicative tasks and verbal activity.	Bilingualism is associated with mental flexibility, which contributes to successful completion of tasks requiring linguistic and social engagement.
Socio-emotional, indirect influence	Although no direct impact on intellectual development was found, bilingual children showed greater creativity, empathy and social skills, which positively correlated with academic performance.	Bilingualism enhances socio-emotional skills, which in turn support intellectual development.
Increased creativity and thinking [10]	In the "St. Lambert Project," bilingual children demonstrated stronger creative thinking and better knowledge transfer between languages, indicating higher levels of abstract reasoning.	Proficiency in two languages fosters the development of higher-order thinking skills, including creativity, imagination and analytical thinking.

Systematized by the author based on [8,10,14]

Another important emotional skill that supports foreign language learning is empathy. According to D. Goleman, empathy is the ability to recognize and understand other people's feelings as one's own, as well as to acknowledge and appreciate the strengths of others. It is based on three key skills: 1) maintaining positive relationships, 2) recognizing the uniqueness of others and 3) not missing opportunities to express this recognition. Awareness and understanding of others' emotions not only develops emotional intelligence but also significantly facilitates second language acquisition [6].

In a study conducted by W.Han among Latin American children from kindergarten through fifth grade, it was found that children who were fluent in two languages possessed stronger social-emotional skills [9]. By fifth grade, these students interacted more effectively with teachers, peers and parents compared to monolingual children of the same age. This suggests that fluency in multiple languages enhances children's social well-being, supports their comfort at school and contributes to a sense

of belonging.

In another study by Alqarni, N. and Dewaele, J.-M. (2018), Arabic-English bilinguals and Arabic monolinguals were shown videos in English. Bilinguals achieved significantly better results, as they were better at interpreting emotional expressions. In fact, Arabic-English bilinguals outperformed native English speakers. The findings again confirmed that Arabic-English bilinguals interpret emotions in English-language video content more accurately than English monolinguals [1]. This supports the idea that individuals with high emotional intelligence possess a broader vocabulary for describing emotions, which enables them to construct new emotional experiences and predictions. However, these findings become more controversial when bilinguals are children of immigrants.

Nevertheless, the emotional indicators identified as stronger among bilinguals do not necessarily indicate a higher level of emotional intelligence. For example, in a cultural profiling study of teenagers in London, it was found that multilingual participants, although demonstrating greater cultural empathy and openness to new experiences, had lower emotional stability. In contrast, monolinguals were found to be more emotionally stable but displayed lower cultural empathy [4].

Self-confidence is also undermined when a bilingual child comes from a displaced family. Such children and their parents often face greater challenges, and as a result, the children possess fewer emotional and volitional resources compared to those born in the host country, which negatively affects their socio-emotional development. In a study by Voltmer, K., and von Salisch, M. conducted in 2018, which examined 576 German children aged 3–6 (including both immigrant and local children), emotional knowledge development was assessed. It was found that immigrant children had lower emotional knowledge, largely due to limited resources [15]. The study also showed that the level of language proficiency among family members (for example, between parents) influences language acquisition in children.

The findings from the literature on emotional intelligence and its development under the influence of bilingualism can be summarized as follows.

Table 2 – The impact of bilingualism on a child's emotional intelligence

Factor	Description
Empathy as a key emotional skill	D. Goleman emphasizes that bilingualism has a positive impact on the development of empathy [6].
Enhanced social-emotional skills in bilinguals	W. J. Han found that bilingual Latin American children possess stronger social-emotional skills and interact better with adults and peers, which positively affects their experience in the school environment [9].
Better understanding of emotions in media texts	N. Alqarni and J.-M. Dewaele found that Arabic-English bilinguals interpret emotions in English-language videos better than native speakers. This is due to a richer emotional vocabulary and greater emotional sensitivity [1].
Cultural empathy but lower emotional stability	Multilingual young people show greater openness and empathy but lower emotional stability compared to monolinguals [4].
Fewer emotional resources in displaced children	Immigrant children have lower emotional knowledge due to language barriers, limited family resources and integration difficulties. Parents' language skills affect the child's linguistic and emotional development [15].

Systematized by the author based on [1, 6, 15]

Regarding emotional perception, a study involving participants from Argentina, the United States, Brazil, Japan and Chile found that they all processed emotions in similar ways despite cultural differences. It was believed that this similarity in emotional perception was influenced by exposure to Western media [5]. Both American and non-American students demonstrated greater awareness of emotions and facial expressions [5]. However, other studies have shown that the way emotions are processed may depend on cultural context. For instance, in Asian cultures it is encouraged to remain calm in stressful situations, whereas in Western cultures emotional expression is more accepted [9]. A neuroscientific study of bilingual participants from different countries showed that children from Eastern cultures activated the same brain areas when talking about themselves or family members—something that was not observed in Western participants. Western individuals focused more on independence, while Chinese participants focused on family and relationships [12].

Conclusions

The analysis of research on the impact of bilingualism on the development of a child's emotional intelligence and cognitive abilities shows that despite a significant

body of work, the issue remains unresolved. At the same time, a number of researchers have identified positive trends in this area. Specifically, bilingualism promotes the development of metalinguistic skills, provides advantages in communicative intelligence and indirectly supports general intellectual development through its close connection with social skills. Its role in enhancing creativity, cognitive flexibility and the ability to transfer knowledge between languages is also noteworthy.

When it comes to emotional intelligence, the situation is more complex and ambiguous. It has been established that a child's emotional development is shaped by many factors, among which age, cultural and social context, and family situation play an important role. At the same time, bilingualism positively influences the development of empathy, enriches social-emotional skills and supports deeper emotional understanding – due both to the lexical richness of the second language and to intercultural interaction. This is especially evident in the formation of cultural empathy and openness to others. However, some bilingual children, particularly those from displaced families, show lower levels of emotional stability. This is linked to the unfavorable social conditions in which these children are growing up. It is also important to consider cultural differences in emotional regulation: in Western cultures open emotional expression is more acceptable, whereas Eastern cultures value restraint and self-control. Therefore, general conclusions about the impact of bilingualism on emotional intelligence cannot be universal, as they depend on a wide range of contextual variables.

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