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Navigating collaborative learning across national boundaries: a comparative study of educators' perspectives in Israel and Turkey

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The primary goal of the KIDS4ALLL project was to empower educators to foster a flexible, innovative, and collaborative learning environment within their classrooms. This article delves into teachers' experiences with implementing collaborative learning during the KIDS4ALLL project. Additionally, it explores how teachers perceived the implementation of the KIDS4ALLL pilot in learning environments across different national educational settings, specifically in Israel and Turkey. Given that both Israel and Turkey have centralized education systems and adhere to a traditional teaching approach, the two research questions offer insights into how the national education context of both countries influences the implementation of the collaborative learning approach of KIDS4ALLL and the experiences of educators. The methodology employed in this study involved semi-structured interviews with 16 educators and participant observation during the two pilots. The findings highlight a sense of fear and uncertainty among educators regarding their ability to conduct lessons in an unfamiliar yet innovative and flexible learning environment. These feelings were accompanied by challenges such as technological and language barriers, sociocultural diversities, and occasional behavioral issues. The results also underscore similarities between the two countries, emphasizing that centralized education systems, teachers' previous training, curriculum, and available physical space posed challenges to the pilot program's implementation.

KEYWORDS

collaborative learning, learning environments, Turkey, Israel, centralized educational system

1 Introduction

One of the primary objectives of KIDS4ALLL was to empower educators to cultivate a flexible, innovative, and collaborative learning environment in classrooms. This article analyses interviews conducted with educators during the implementation of the KIDS4ALLL pilot in public schools across two distinct national settings that of Israel and Turkey addressing two key discussion points. This article delves into how teachers experienced the implementation of collaborative learning within their classrooms, while also examining their perspectives on the learning environments within their specific national contexts. The findings reveal similarities between the two countries, emphasizing that the centralized education system, teachers' previous training and duties, curriculum, and available physical space posed

challenges to the pilot program's implementation. The educators expressed fear and uncertainty regarding their ability to conduct a lesson in an unfamiliar, yet innovative, and flexible learning environment, stemming from their previous inexperience and the habitual exercise of traditional classroom practices.

The overarching argument presented in this paper is that, despite contextual disparities such as migrant policies in education and curriculum practice, both countries exhibit more commonalities than differences in their responses to the KIDS4ALLL project. This underscores the project's potential to bridge divides and foster inclusive education practices in diverse global settings when these commonalities are taken into consideration.

Implementing KIDS4ALLL highlighted the imperative for enhanced inclusive teacher training to bridge the gap between theory and practice. Educators found themselves in situations of ambiguity and uncertainty resulting from little or no prior experience with autonomous learning. Additionally, it underscores the necessity for structural changes in both national education systems to facilitate collaborative learning. This supplementally highlights the need for more open curriculums that cater not to a uniform standard for all children but acknowledge the diverse needs of migrant and culturally varied backgrounds.

2 Collaborative learning as a response to traditional centralized teaching

Traditional centralized teaching is characterized by perceiving the class as a unified entity, often structuring academic tasks as individualistic or competitive endeavors. In essence, this approach lacks cooperation or interaction among learners, with each student predominantly working independently to complete educational tasks (Hämäläinen, 2012). Barrows (2002) defines traditional teaching as classroom-based learning involving numerous students, primarily focused on knowledge transmission from the teacher through lectures based on a predefined curriculum. This method is prevalent in classrooms in Israel and Turkey. One of the most prominent drawbacks of traditional centralized teaching is the teacher's limited ability to cater to a diverse student population and foster increased learner engagement.

In response to these limitations, scholars advocate for the adoption of collaborative, autonomous teaching methods to better address students' diverse characteristics and thereby enhance the teaching-learning processes in the classroom (Zeiser et al., 2014; Broder, 2016). Collaborative learning is characterized by mutual influence and equality in participation (Tobin, 2012). This learning methodology fosters the exchange of ideas, dialogue, investigation, and explanation, culminating in the attainment of shared goals and cultivating knowledge and ideas among participants (Marcos et al., 2020). The interactive nature of collaboration emerges as a cornerstone supporting the success of group learning (Koivuniemi et al., 2018), as it not only enhances individual learning but also proves to be effective in developing group skills (Wang and Shen, 2023). While cognitive skill plays a role, knowledge creation within collaborative learning settings is a collective phenomenon influenced by group-level characteristics (Bereiter and Scardamalia, 2014). From a sociocultural lens, wherein the foundational locus of human learning is situated within social interactions, the critical social

aspects of this pedagogical approach are underscored. This perspective highlights that apart from content, social interaction is also central (Barron, 2003).

Despite its merits, implementing cooperative learning in educational settings presents a multifaceted challenge. From the perspective of the educators, it's challenging to encourage them to embrace their innovative roles as facilitators and guides because they are expressing concern about the complexity of pedagogical and organizational aspects. Teachers may perceive themselves as less competent in successfully implementing collaborative learning in their classrooms. To achieve efficacy in collaborative learning, it is imperative to recognize the dual necessity of student interaction and teacher guidance (Kaendler et al., 2015).

2.1 Learning environments

Turning our attention to the learning environments, the space in which learning takes place, the focus is placed on the "dialogue between the physical and the educational dimension in the form of the environment" for its success (Nissim et al., 2016, p.30). Therefore, the physical space (furniture, technology, tools, educational climate, relationships between the learning partners), the organizational aspects (time, learners, and staff), and the human aspect (educators) are conceptualized as interrelated components, giving meaning and aim to learning goals (Nissim et al., 2016; Sasson et al., 2021).

Within this context and against the traditional learning environment, characterized by a teacher-centered classroom and a request-response-feedback pattern of communication (Bozo and Fisher, 2008), innovative, collaborative learning environments migrate from spaces of frontal teaching to teaching based on knowledge-building processes and constructivist principles. The teacher moves from the center to the background and no longer plays the role of an expert imparting knowledge but a facilitator, guide, collaborator, and sometimes expert. Innovative learning environments enable collaborative interactions, leading to deeper and more meaningful learning that places the student at the center. The student is active and required to research, process, and create new knowledge from diverse sources, including peer learning. Such an environment is focused on teaching-learning-assessment processes. It emphasizes the uniqueness of each student while adapting the teaching to the differences between the students: learning style, pace, goals, interests, preferences, previous experience, and abilities (Gallifa et al., 2021; Thomas et al., 2021). Consequently, the learning environment's characteristics influence learners' motivation and involvement in learning and the educators' motivation and performance.

3 National contexts: Israel and Turkey

3.1 Educational systems

The Republic of Turkey is a multicultural country known for its rich diversity, which still needs to be reflected in its education policy due to various ideological and political reasons (Aslan, 2017). On the other hand, the State of Israel is an example of a many cultures state, rather than a multicultural one, because it is deeply divided, and the mutual relations between the communities are characterized by

inequality, alienation, the lack of dialogue, and negative reciprocity (Jackson and Dorschler, 2016; Paul-Binyamin and Haj-Yehia, 2019). The polarization between the different communities is reflected mainly in the education system, the labor market, and the residential areas (Mounter, 2010; Samuha, 2010; Shipman, 2016).

Concerning the characteristics of the education systems in Turkey and Israel, there are points of similarity in everything related to a centralized concept. The Turkish education system is highly centralized and falls under the control of the Ministry of Education. The Board of Education is the official body responsible for developing the curriculum applied in all types of schools, whether private or public except for the minority schools (Kaya, 2009). Additionally, classroom schoolbooks must receive approval and authorization from the same board (Nohl et al., 2008; Tarman, 2010). Similarly, the Israeli education system is very centralized, even in international comparison. According to the reports of the OECD organization, Israel is placed below the average of the organization's member countries in the degree of centralization in the field of education. The state makes 69% of the decisions in the field of education in Israel, compared to an average of 35% involvement (Hoffman, 2021). As in the case of Turkey, the curriculum is created by the Ministry of Education and applied to all schools.

3.2 Immigration and education

Turkey and Israel are destination countries for immigrants, refugees, and asylum seekers, which also affect the countries' demography. In Turkey according to official statistics, there are approximately 5 million documented foreigners currently residing, with almost 1 million out of them being students currently enrolled in Turkish compulsory education¹. These students, aged between 5 and 17 years, constitute approximately 5% of the total school-going population in Turkey (for statistics on the general population, see Eğitim Sen, 2021). After the Syrian refugee influx in 2011, the education system was not prepared to engage this vast amount of non-Turkish-speaking children to the system. Therefore, during the first phase, where the migrants were seen as guests, the government founded Temporary Education Centers (TEC). This guest approach changed in 2014, and Syrian migrants gained a legal "Temporary Protection" status. Viewing education as a key factor for the integration of migrants and refugees, Turkey aimed to incorporate migrant children into the public school system, as the government started to create long-term policies in migrant and refugee employment, health, and education. During the initial phase, TECs operated in Arabic, using the Syrian curriculum and predominantly Syrian teachers. However, as policies evolved, TECs were closed, and migrant children were integrated into public schools, where they encountered a monolingual and nationalist curriculum with Turkish teachers. Even

those born in Turkey faced language barriers as they transitioned to public schools, as they primarily spoke their mother tongue at home. This language barrier persisted despite teachers volunteering to assist migrant children in learning Turkish through additional class hours, as they were often ill-equipped to teach Turkish to non-native speakers (Çelik and İçduygu, 2019).

Compared to Turkey, in Israel, the migrant population in schools is smaller, constituting 1% of the student body². The State of Israel has not assumed responsibility for asylum seekers, leading municipalities and third-sector organizations to directly care for the new residents, providing them with legal, psychological, medical, and childcare assistance. Presently, the majority of asylum seekers in Israel are from Africa, predominantly residing in the country's center. Their presence is reshaping public spaces, prompting what Ali Bensaad has termed as "marginalized globalization," in the context of North Africa (Kemp and Rajjman, 2008; Bean et al., 2010; Antebi-Yemini, 2015). African asylum seekers are in a temporary and disenfranchised status. Similar to Turkey, currently, in Israel, there are no formal educational policies in place in Israel, as the government refuses to regulate their status. Consequently, the children of African refugees and asylum seekers study in segregated settings without Israeli citizen children. This segregation contributes to the feelings of alienation of the children and their parents, exposes them to manifestations of racism, and increases the risk of dropping out and adopting dangerous behaviors.

The policies of both countries pose challenges for the children, their families, and the receiving society in both formal and informal educational settings. These challenges include language barriers, cultural tensions, social gaps, and academic performance concerns for the children and their families. Conversely, the receiving society must navigate the complexities of ensuring social inclusion and equity without conflict (Pianta et al., 2008; Eliyahu-Levi and Ganz-Meishar, 2020).

3.3 Teacher training and perceptions of heterogeneous learning environments

Focusing on teacher training and teachers' perceptions regarding heterogeneous learning environments in Turkey, teacher training is conducted either at the Faculties of Education or as an additional course for individuals who have studied in other faculties. The Higher Education Council oversees the content of teacher education and training. However, as of 2010, there was still no accepted standardized content for teacher education (Grossman et al., as cited in Tarman, 2010). Furthermore, research indicates a gap between awareness and the knowledge and skills necessary for managing multicultural and diverse class environments (Aslan, 2017). Despite Turkish teachers expressing a positive view of multicultural and pluralistic settings environments (Başarır, 2012; Özdemir and Dil, 2013; Demircioğlu and Özdemir, 2014; Aslan, 2017), they do not feel adequately prepared to address the needs of culturally diverse classrooms (Lee et al., 2021).

¹ Regarding the documented foreigners, 4.1 million of them are under international protection. This figure includes approximately 3.5 million Syrians who are also under temporary protection. Regarding the student population, from the 935,731 of foreign students currently enrolled in Turkish compulsory education, 855,136 are under temporary protection, with 730,806 falling under international protection (MEB, 2022).

² 27,000 out of a total population of 2,400,000. 22,000 have African background and 8,000 out of them are from asylum seekers families. ASSAF organization (2023). Refugees and immigration in Israel: June 2023 status. <https://assaf.org.il/he/refugees-in-israel>.

In Israel, teacher training takes place in the faculties of education in universities or teacher training colleges. The training process includes education and pedagogy courses, courses in the fields of knowledge, and clinical-practical training in the field of knowledge in the educational field. There is an overwhelming agreement among educators that the teacher training system is flawed by conservatism and does not prepare them for the updated work world of the 21st century (Kfir and Ariav, 2008), and does not cultivate skills such as interpersonal communication, teamwork, entrepreneurship, and critical thinking (Notov et al., 2020). Specifically, elementary school teaching students feel inadequately prepared professionally for working in environments with cultural and linguistic differences between parents and teachers (Patte, 2011; Eliyahu-Levi and Ganz-Meishar, 2023).

4 Data and method

The data for this study originates from the ethnographic research conducted during the two pilot phases of the KIDS4ALLL project from April to October 2023. It comprises semi-structured interviews with 16 educators; 8 in public schools in Israel and 8 in Turkey. Additionally, participant observation was carried out during the same period. The face-to-face interviews, each lasting about 45 min, covered various aspects including questions about the implementation of learning units, educators' experiences with collaborative and autonomous learning methods, organization of activities, and the usability of the project's digital platform. Ethnographic observation focused on five key indicators: the organization of the learning environment, the teaching method, the management of the study unit by the educator, the activity of the peers in the study unit, and the interaction of the peers in the class when presenting the final products and closing the activity. This observation process included a factual description of observed events, interpretation by the observer, feedback from a third party who reviewed the observation document, and analysis of materials generated during the observation activities.

Among the Israeli participants were six women and two men, four educators in an elementary school, two in a middle school, and two in a high school. All of them are based in the central region of the country and hold bachelor's degrees and teaching certificates from Israeli colleges of education. Their ages range from 25 to 40, with teaching experience spanning from 3 to 15 years. While five participants work as classroom teachers, the remaining are professional teachers who engage with students in class at least three times a week. Similarly, the Turkish participants included six women and two men, with three educators from elementary schools, three from middle schools, and two from high schools. All Turkish educators are certified classroom teachers, based in the central region of the country, and hold bachelor's degrees and teaching certificates from Turkey. Their ages range from 30 to 45, with teaching experience ranging from 5 to 20 years.

Researchers conducted interpretive content analysis to examine educators' inner experiences regarding cooperative-autonomous learning in the KIDS4ALLL project and the influence of the learning environment on its implementation. This analysis method, drawing from Titscher et al. (2000), Braun and Clarke (2006), and

Creswell (2012), involved systematically identifying central themes in educators' statements, descriptions, and contextual factors.

The coding process involved researchers reading all transcripts, identifying relevant sentences, and categorizing them based on research questions. Subsequently, researchers refined central themes and assigned sections to specific themes aligned with research objectives. In the third phase, researchers identified recurring themes and adapted segments accordingly. Finally, through discussions, researchers linked sections to research objectives, organized data, and provided insights into educators' experiences within the KIDS4ALLL project.

5 Findings

5.1 Findings on collaborative learning

The KIDS4ALLL project posed a significant challenge for educators in Israel and Turkey, requiring them to navigate uncertainties while integrating cooperative learning principles in culturally diverse classrooms. This challenge is intensified by the prevalence of traditional teaching methods in their academic training, primarily focusing on theoretical knowledge rather than experiential learning in uncertain situations. Teachers in both national settings, accustomed to traditional methods, found it particularly challenging to incorporate collaborative learning principles into heterogeneous classrooms. The conventional academic training they receive emphasizes direct teaching rather than preparing educators as facilitators for collaborative learning, necessitating additional training and experience.

In Turkey, educators in pilot institutions implemented the buddy system and collaborative learning in segmented groups within traditional classrooms for specific activities. Secondary school teachers noted their students' preference for the buddy system, which facilitated familiarity and friendships within peer groups. Primary school teachers highlighted that the buddy system was crucial in helping reserved students overcome shyness and engage socially, ensuring that every student felt involved in collaborative work. However, educators showed uncertainty during the implementation and reverted to traditional teaching methods when unsure of how to manage the class effectively, leading to occasional challenges in implementation.

In the Israeli context, educators expressed discomfort and uncertainty about the pedagogical concept of collaborative learning, using words like "uncomfortable," "inappropriate," "unfamiliar," and "different." Initially, they found it challenging to depart from their comfort zone and adopt a new, collaborative approach, preferring the familiar traditional teaching methods. Similar to the situation in Turkey, they were unfamiliar with incorporating the Buddy method into their lessons. Consequently, the learning unit began with a traditional lecture format, followed by the integration of the Buddy system. However, as educators observed children successfully adapting to collaborative learning and engaging as happy peers, they gradually developed trust in both the students and the collaborative process:

At first, I was confused; I didn't connect to KIDS [the project]; I felt uncomfortable and unsure of what I was doing in class. I decided to go step by step. In the beginning, I opened the class in plenary with

a general explanation of the topic of the learning unit. I asked questions about the subject and then divided the students into Buddy. It's a change for me; suddenly, I find myself walking between the Buddies, answering questions, and helping. It didn't happen in the first or second meeting. But what's important is that in the end, it happened. (Israeli teacher)

Israeli educators expressed a strong sense of responsibility for successfully implementing collaborative learning. They often devoted more effort to enhancing social–emotional aspects than cognitive and educational aspects in learning units. Additionally, they reported addressing children's resistance, boosting motivation, and promoting cooperation:

As a teacher, I am responsible for everything in my class, even when the program is not part of the school's formal curriculum. It is important to me that the children have friends in the class and that they meet new friends. Therefore, the dialogue between them is an essential element for me. This was a unique experience for me and the students, and before we started learning, we had to agree on the norms of behavior in a class where learning is cooperative and autonomous. I don't know exactly what each couple does. Some didn't like the idea of self-reading, of a learning conversation with a colleague. Others didn't like their study buddies and kept asking to change. (Israeli teacher).

Collaborative learning relies on mutual responsibility, as Israeli and Turkish teachers highlighted. Both emphasized each student's significant interdependence, commitment, and contribution toward a common goal. The Buddies worked together, exchanging ideas and information, fostering a world of knowledge. Teachers noted that interdependence was expressed through commitment, preparation, and information collection, ensuring an engaging dialogue. This mutual responsibility enhanced a sense of belonging, sustaining uninterrupted learning. Personal interaction and trust created a safe space for children to express opinions without fear of prejudice or hostile reactions.

One of the most prominent advantages of collaborative learning is igniting the teachers' curiosity and interest. According to them, despite the effort required in preparation and prior familiarization with the learning units, the gains were much more valuable. However, the acknowledgment of these new methods contrasts with the central educational system's stance as “not accepted,” leading educators to recognize this conflicting relationship:

I learned something new in pedagogy; collaborative learning increased my interest and curiosity. Through this teaching method, children work together, develop social skills, and increase interaction and motivation in class. This pedagogy is not accepted in school, but it is the right way to prepare the students for real life outside the school walls. (Israeli teacher)

The findings shed light on the challenges faced during the implementation. Departing from traditional teaching methods required educators to navigate uncertainties while integrating collaborative learning into culturally diverse classrooms. Despite being accustomed to conventional teaching approaches, educators endeavored to implement collaborative learning strategies, emphasizing however the need for

additional training and experience in this pedagogical approach. Despite the initial uncertainties and challenges, witnessing its effectiveness gradually instilled trust in the process to prepare students for real-life experiences beyond the classroom walls. However, the recognition of these new methods contrasts with the stance of the central educational system as “not accepted” in Israel, indicating a conflicting relationship that educators must navigate.

5.2 Findings on learning environments

The issues experienced in the classrooms reveal a multifaceted problem. Firstly, the physical space was a structural constraint for many implementations. In the Turkish context, rooms chosen for the implementation, such as the library or the PC room were not fitting properly, and together with overcrowded classrooms exceeding 14 students per class, organizationally were a constraint from the beginning of the pilot phases.

Still, the technological challenges represent the most central issue in both contexts. The PC classroom in the middle school in Turkey needed to be more adequate, old, seldom used, and dusty, highlighting neglect within the educational infrastructure. The same issues were encountered in Israel, where some computers were not working. Teachers from different national contexts pointed to the same challenges:

The use of technology has taken away learning time. It is true that over time, the children, and I overcame the technological difficulties more quickly, but it was complex. (Israeli teacher)

Due to physical space and technological issues, the attention was lost. Not only theirs [the students'] but also mine. (Turkish teacher)

The technological challenges educators face in utilizing the PCs available present a twofold concern. The slow-loading or non-functional nature of the computers not only induced anxiety among teachers but consumed valuable time. In some cases, the teachers had to print the needed material. The recourse to black-and-white photocopies, as a workaround for technological issues, emphasizes the adaptability of educators but also highlights the limitations imposed by the prevailing circumstances.

On the other hand, time was a burden not only due to technological challenges but also due to the strict demands of the curriculum, especially in Turkey, where teachers have limited flexibility. In Israel, educators enjoy more freedom as they can select from available subjects and determine their course of action. In contrast, Turkish teachers are required to adhere to a uniformly applied curriculum:

Even if we had the proper space and technological support for implementation, the curriculum is a burden for us because we need to finish on time. You feel like an extra activity is a waste of time, even though it is better for the student, but that's how you feel due to the situation [the curriculum] (Turkish teacher)

The time-related challenges voiced by middle school teachers illuminate a tension between the demands of the curriculum and their

desire for a more interactive learning experience. The imposed limitations on time, driven by the rigid structure of the curriculum from the Ministry of Education, is an important stress factor for educators. The obligation to follow a predetermined timeline restricts their ability to incorporate real-life elements from the educational platform into the classroom. Moreover, the comment mentioned above unveils a conflict between institutional expectations and the pedagogical ideals that prioritize a holistic learning experience. This tension impacts teacher morale and raises questions about the overarching educational philosophy embedded in the curriculum.

Moreover, a teacher in Israel pointed to the limited sources of teaching staff too:

There was not enough educational staff involved. We also need teachers for individual learning, teachers who will mediate the language and tasks. There were times when, during the lesson, I took a couple of students out of the classroom to work individually with a teacher; otherwise, they would not have been able to do the tasks. In other words, a support team and mediator are also required.

In Turkey, a language mediator is provided in the primary school, and it proved to be of great help during the pilot phase. However, there is no such option for the other educational stages. Teachers in the Turkish context also pointed out the shortage of teaching staff. In both cases, this was a significant challenge, negatively impacting the effectiveness of the learning process.

The challenges encountered in classroom environments underscore a multifaceted issue spanning structural constraints and technological deficiencies. In both Turkish and Israeli contexts, inadequate physical spaces and outdated technological infrastructure hindered the effective implementation of innovative pedagogical approaches. Technological challenges not only impeded instructional progress but also consumed valuable time, leading educators to resort to makeshift solutions such as black-and-white photocopies. Moreover, curriculum demands, especially in Turkey, intensified time-related pressures, limiting educator's ability to foster interactive learning experiences aligned with pedagogical ideals. This tension between institutional expectations and pedagogical aspirations raises fundamental questions about the overarching educational philosophy embedded within the curriculum, impacting teacher morale and the effectiveness of the learning process. Addressing these issues requires a concerted effort to enhance educational infrastructure, provide adequate technological resources, and prioritize teacher training and support to bridge the gap between institutional constraints and pedagogical innovation.

6 Discussion and further exploration

The findings shed light on the complexities and challenges of implementing collaborative learning environments, especially in traditional educational settings. KIDS4ALL aimed to foster collaboration, inclusivity, and innovative teaching methods within the national contexts of Israel and Turkey.

Starting from the education systems in both national contexts, the results underlined a constraint regarding the curriculum but also the autonomy of the teachers within it. In both countries, the teachers

have to follow the national curriculum with little space for maneuver. The Turkish curriculum is even more strict, while the Israeli one allows the teachers to make some choices, still among specific contents. Furthermore, considering teachers' training to be an integral part of the education system, the findings in both countries underline a lack of practical experience in collaborative learning and innovative teaching methods during their training. The findings suggest that both countries need to revisit their teacher training programs to incorporate elements that prepare educators for the demands of collaborative and innovative learning environments. The reluctance and challenges educators face in Israel and Turkey underscore the need for a paradigm shift in teacher training and professional development. The traditional training methods centered around direct teaching may not adequately prepare educators for the dynamic and collaborative learning environments promoted by projects like KIDS4ALL.

Additionally, technological constraints in both settings acted as a restraining factor, further influencing the dynamics of pilot implementations in both countries. The teachers had many pedagogical questions, requiring researchers to continue mediation. The teachers were unsure of themselves and had difficulty making decisions. Since the introductory workshop with the project was relatively short, and some of the topics were socially taboo, the educators avoided discussing them at school.

Adequate infrastructure, technological support, and a flexible curriculum are crucial elements that need attention to ensure the success of collaborative learning initiatives. The previous parts highlighted that the gaps in education in both countries are born from a centralized, top-down approach that provides the same response to every child everywhere without considering educational, cultural, and socio-economic differences. Against that, an adaptation to embrace more inclusive and collaborative approaches to address the diverse needs of students is needed. That is a bottom-up approach that transfers the weight of policy to the teachers and school principals, focusing on the autonomy of teachers and principals from the central structures of authority. Such autonomy is a predictor of the quality of the education system (OECD, 2019). In that sense, schools are expected to be accountable for their results and for the teachers to meet standards that ensure a pluralistic point of view that pays attention to different cultural and social tendencies.

Moreover, as the findings pointed out, the need for more flexible curricula that allow autonomy in teaching methods without time constraints should be considered. Research in Turkey already supports the need for preparation programs to focus on developing assets-based perceptions, pedagogical approaches for refugees, and culturally relevant curricula (Lee et al., 2021). Policymakers should consider the need for more flexible curricula that allow educators to explore innovative teaching methods without feeling constrained by time pressures.

On the other hand, focusing on the teachers' experiences during the project's implementation, their perceptions of collaborative learning, and the challenges and opportunities posed by implementing such projects within these traditional educational environments, the findings indicated a positive perception regarding collaborative learning even when not having prior experience. However, the observation revealed that although they considered this method a plus for their classes, they returned to traditional teaching methods during the implementation. Understanding this disjunction between teachers' favorable views and their return to

traditional methods is essential for future implementations. It highlights the need for a comprehensive approach that introduces innovative teaching methodologies and addresses the practical challenges educators face during the transition. Additionally, ongoing teaching development and support mechanisms can play a crucial role in helping teachers overcome obstacles and gradually integrate collaborative learning into their pedagogical practices.

Moreover, the positive outcomes observed in both countries, such as increased student engagement and interdependence, demonstrate the potential of collaborative learning environments. The emphasis on the buddy system in facilitating learning and social integration highlights the importance of interpersonal relationships in the learning process. At the beginning of the implementation, they had difficulty responding to the academic or behavioral challenges of the students and were required to find creative solutions. However, a gradual improvement was observed in understanding their shift to a new learning environment as a process. Educators were satisfied with the new environments, and the positive outcomes increased their motivation to promote it further. What is essential to notice is that the contrasting experiences in Israel and Turkey regarding teacher autonomy and trust in the learning process warrant further exploration. Understanding why some teachers in Israel embraced the change more readily than their Turkish counterparts could provide valuable insights into fostering teacher autonomy and confidence. Additionally, investigating the factors contributing to or hindering teacher trust in innovative pedagogies can inform strategies to promote a smoother transition to collaborative learning environments.

In conclusion, the comparison of collaborative learning implementation in Israel and Turkey within the KIDS4ALLL project pointed to interwoven factors that challenged the implementation of the pilot phases. It also provided valuable insights into the challenges and opportunities associated with introducing innovative teaching methodologies in traditional educational settings. Further research, collaboration between educators, and targeted interventions are essential to navigate these challenges and foster a shift toward more inclusive and collaborative learning environments.

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Data availability statement

The original contributions presented in the study are included in the article/supplementary material, further inquiries can be directed to the corresponding author.

Author contributions

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Conflict of interest

The authors declare that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

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