frontiers | Frontiers in Education

TYPE Original Research
PUBLISHED 26 June 2025
DOI 10.3389/feduc.2025.1549712

Check for updates

OPEN ACCESS

EDITED BY
Sohni Siddiqui,
University of Wuppertal, Germany

REVIEWED BY
Mahwish Kamran,
Iqra University, Pakistan
Anna Błasiak,
Ignatianum Academy in Krakow, Poland

*CORRESPONDENCE
Maria José D. Martins
✉ mariajmartins@ipportalegre.pt

RECEIVED 21 December 2024
ACCEPTED 02 June 2025
PUBLISHED 26 June 2025

CITATION
Martins MJD, Marchão A, Oliveira T, Caetano AP and Tinoca L (2025) Schools as learning communities for inclusion: insights from case studies of two school clusters in Portugal.
Front. Educ. 10:1549712.
doi: 10.3389/feduc.2025.1549712

COPYRIGHT
© 2025 Martins, Marchão, Oliveira, Caetano and Tinoca. This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY). The use, distribution or reproduction in other forums is permitted, provided the original author(s) and the copyright owner(s) are credited and that the original publication in this journal is cited, in accordance with accepted academic practice. No use, distribution or reproduction is permitted which does not comply with these terms.

Schools as learning communities for inclusion: insights from case studies of two school clusters in Portugal

Maria José D. Martins[1,2]*, Amélia Marchão[1,2], Teresa Oliveira[2], Ana Paula Caetano[3] and Luís Tinoca[3]

[1]Research Center on Health and Social Sciences (CARE), Portalegre Polytechnic University, Portalegre, Portugal, [2]School of Education and Social Sciences, Portalegre Polytechnic University, Portalegre, Portugal, [3]Unidade de Investigação, Desenvolvimento, Educação e Formação (UIDEF), Instituto de Educação, Universidade de Lisboa, Lisbon, Portugal

Introduction: Schools are facing increasing diversity in student origins due to migrations. The INCLUD-ED approach aims to transform schools into learning communities to increase social cohesion, inclusion, and academic success through successful educational actions like interactive groups, literary gatherings, community participation, dialogical teacher training, and a dialogical model of conflict resolution.

Methods: This research analyzed two school clusters in Portugal implementing the INCLUD-ED approach, focusing on practices and impacts on learning, relationships, and inclusion. A qualitative case study method was used, involving interviews with adults and focus groups with students.

Results: Both schools promoted literary gatherings and interactive groups. Teacher engagement varied, but most participants agreed the approach increased family/community involvement and enhanced academic and socio-emotional learning.

Discussion: The INCLUD-ED approach appears to transform schools into more inclusive learning communities, though full implementation faces some challenges. Further research is needed to evaluate long-term impacts.

KEYWORDS

inclusive education, schools as learning communities, student diversity, project INCLUD-ED, inclusive schools

1 Introduction

The increasing diversity of students' backgrounds (including country, language, religion, culture and ethnicity) due to forced or voluntary migration presents both opportunities and challenges for schools and educators. Teachers generally view this diversity as valuable, yet acknowledge the need for additional attention and training. Research indicates that positive experiences with students who have special educational needs lead to more favorable attitudes toward inclusive education among teachers (De Boer et al., 2011; Lacruz-Pérez et al., 2021). Moreover, educators who are more attuned to student diversity are more likely to implement inclusive educational practices (Semião et al., 2023).

The concept of inclusion was initially proposed to educate children with disabilities in the mainstream educational system and has gradually evolved toward a response to diversity and promotion of children and young people's democratic rights to a quality education (Florian, 2019; Knight et al., 2023).

More recently, inclusive education has been defined as a process that aims to enhance participation of all learners, reducing their exclusion from school culture, curriculum and communities. This approach necessitates restructuring schools' cultures, policies and practices to accommodate student diversity, enabling each individual to learn and engage in school and community life (Booth and Ainscow, 2002; UNESCO, 2020, 2021). Although recognizing the complexity of this concept and the fact that it is multi-dimensional, ambiguous and normative, as well as the challenge that involves evaluation of inclusive education (Norwich, 2022), this study is based on Booth and Ainscow (2002) definition of the concept, emphasizing a broad sense of it (inclusive education deals and responds to children diversity in terms not only of disabilities, but also differences related with ethnicity, culture, language, religious or other vulnerabilities).

The research has revealed that learning communities operate at the crossroads of several interacting systems, where teacher learning occurs through the recontextualization of knowledge in situational collaborative environments, aid to develop practice and inclusive cultures in schools (Akabor and Phasha, 2022; Walton et al., 2019). Increased family and student participation in school life, associated with training of educational communities, also seems to promote inclusion (López-Azuaga and Riveiro, 2020).

In Portugal, inclusive education is mandated by law, which establishes principles and standards to "guarantee inclusion, as a process that aims to respond to the diversity of needs and potential of each and every student, through increased participation in the learning processes and in the life of the educational community" (Decree-law N°. 54/2018, p. 2919)[1].

Over the past decade, Portugal has experienced growing migration from various regions (including Asia, Africa, America, and Europe), with migrant communities dispersed across the country, albeit concentrated along the coastline, similar to the native population. In response, the Ministry of Education's Directorate-General for Education (DGE) issued two documents: guidelines for schools receiving refugee children and youth (Directorate-General for Education (DGE), 2024a), and guidelines for teaching Portuguese as a second language (PSL) (Directorate-General for Education (DGE), 2024b).

These documents prioritize integrating migrant children (up to 18 years old) into the educational system alongside native Portuguese students. Schools have the autonomy to manage PSL support, either through dedicated teachers working with groups/classes based on language proficiency (combining students from different classes, ages and backgrounds), or through individualized or small group support provided by regular class teachers or other Portuguese language teachers in additional time. This support occurs concurrently with students attending the regular Portuguese Educational System program alongside other Portuguese students. Regarding Ukrainian war refugees, parents or guardians can opt for their children to follow the Ukrainian education system remotely, if available, or join Portuguese schools under the aforementioned conditions.

A global movement is calling for schools to transform into professional learning communities (PLC), where educators take on the responsibility of enhancing student learning and school improvement. This approach encourages teachers to engage in systematic collaboration and reflection with colleagues to achieve shared objectives (Stoll et al., 2006). PLCs are underpinned by theories of learning, creative organizations, collective and dialogical learning, and interrogative models of teacher education. Their success is facilitated by conditions such as shared leadership, community partnerships, inter-PLC networks, and a supportive environment that fosters participation in decision-making (Admiraal et al., 2021; Vangrieken et al., 2015, 2017). In our complex, evolving world, PLCs serve as a vital tool for maintaining educational quality by promoting continuous professional development among teachers. Numerous studies have shown that PLCs contribute to improved teacher learning, enhanced classroom instruction, and better student outcomes (Vanblaere and Devos, 2016).

1.1 The INCLUD-ED approach

In line with the learning communities' approach, the Community of Research on Excellence for All (CREA) at the University of Barcelona (Spain) initiated the INCLUD-ED project. This evidence-based initiative aims to convert schools into learning communities (LC) to combat educational failure and enhance social cohesion, emphasizing the importance of interaction and collaboration across various educational contexts in our technological society (Flecha, 2015). Grounded in dialogical learning theories, this approach advocates for schools as LCs to implement successful educational actions (SEA) that boost academic achievement and improve school atmosphere. These actions include: (i) Interactive groups, where classrooms are divided into small student groups, each supported by an adult volunteer; (ii) Dialogic Literary Gatherings, where participants discuss universal literature or other artistic works; (iii) Extended learning time for those in need; (iv) Community involvement in educational activities; (v) Dialogic Pedagogical Training for teachers; (vi) Family Education sessions; (vii) A dialogic model for conflict prevention and resolution, which involves creating dialogue spaces to establish community rules (Community of Research on Excellence for All (CREA), 2020; Flecha, 2015; Flecha and Soler, 2013; Molina Roldán et al., 2021; Morlà-Folch et al., 2022; University of Barcelona, 2012). This model outlines five phases for transforming a school into a LC: (i) sensitization; (ii) decision to become a PLC; (iii) dreaming and developing a shared vision and values; (iv) prioritizing actions; (v) planning (Community of Research on Excellence for All (CREA), 2020).

This study aimed to conduct two case studies involving two school clusters implementing the INCLUD-ED approach. The specific objectives were to: (i) Determine which SEAs were employed in each cluster; (ii) Assess the impact of these actions on student inclusion, academic achievement, and overall community relationships; (iii) Evaluate the project's contribution to enhancing

1 https://www.dge.mec.pt/sites/default/files/EEspecial/dl_54_2018_en_version_dge.pdf

family and community connections; (iv) Examine the progress of these schools in becoming LCs as proposed by INCLUD-ED; (v) Compare the two school clusters' implementation of this approach, particularly regarding the inclusion of foreign students, whether Portuguese was their first or second language; (vi) Assess whether the implemented SEAs contribute to inclusive policies, practices and cultures.

The research's unique value lies in its execution by independent researchers of a different nationality from the CREA group, which initially proposed this educational approach in Spain. Additionally, it addresses inclusion comprehensively, encompassing children with special needs, foreign students (regardless of their proficiency in Portuguese), various ethnicities, and diverse socio-cultural backgrounds.

2 Materials and methods

This study forms part of the LC4Inclusion project—the journey of schools as learning communities for inclusion (PTDC/CED-EDG/4650/2021), which aims to generate insights into PLC development processes and inclusive strategies in educational settings. This investigation employed a qualitative methodology and consists of two case studies, which according to Yin (2014) correspond to multiple cases with a holistic focus, with a descriptive-interpretative bias and cross-case analysis. This approach gives greater robustness to the overall study, due to the possibility of replication (literal replication) rather than sampling. In view of the objectives of the study, the aim was not to determine the prevalence or frequency of the phenomenon in particular, but rather to replicate the cases, following the procedures recommended by Yin (2014): (i) choice of a theoretical framework, selection of cases and data collection protocol; (ii) implementation of the first study, then of the subsequent studies/cases; (iii) writing of the report on the first case, then on each subsequent case; (iv) reaching of cross-case conclusions and implications, and writing of the cross-case report.

Data collection methods included the examination of school documentation, conducting interviews, observing classroom activities and other academic events, and undertaking focus groups with pupils within two school clusters, hereafter referred to as JR and SP, in view to triangulate the sources of information (Amado, 2017; Yin, 2014).

The aim was to achieve an analytical generalization (Yin, 2014), as opposed to a statistical one, based on an analysis matrix constructed for this purpose, aligned with the objectives of the study, and the categories and subcategories of analysis identified in the data analysis process.

2.1 Participants

Within the JR cluster, researchers conducted 15 semi-structured interviews comprising eight educators (14 women and one man), two parents (a mother and a father), and five non-teaching staff volunteers. Additionally, five focus groups were organized, involving 21 pupils from various primary grades (1st to 4th grades), lower middle (5th–6th) and middle school (7th–9th grades). These groups included: 3rd grade (mean age 8.25; one girl, four boys), 4th grade (mean age 8.75; two girls, two boys), 6th grade (mean age 11.0; seven girls, three boys, split into two groups), and 9th grade (mean age 14.0; two girls). Notably, two 6th grade participants were foreigners from a Portuguese-speaking nation, thus having Portuguese as their native language, albeit a different variant.

In the SP cluster, 11 semi-structured interviews were held with eight teachers (10 women, one man), one parent (mother), and two volunteers (retired educators). Three focus groups were organized with 13 middle school pupils: 7th grade (mean age 12.25; four girls, three boys, divided into two groups) and 9th grade (mean age 14.5; three girls, three boys). One 7th grade participant was a foreigner from a country where Portuguese is an official language, but different variant.

It is worth mentioning that all interviewed teachers in both school clusters had over two decades of teaching experience. Each focus group consisted of two to six students. Moreover, nine observations of activities deemed SEA were conducted in both clusters.

The sample used was a convenience sample and both school groups were located in the Alentejo region, a low-density region in the southeast of Portugal, where studies are also less frequent. The fact that many more female teachers than male teachers were interviewed reflects the demographic distribution of teachers in Portugal. According to Flores (2023), the percentage of female teachers in elementary education has fluctuated in recent years between 73 and 87% and in secondary education between 73 and 74%. The average age of Portuguese teachers is over 50 years old, also reflecting the fact that Portugal is a country with a large percentage of elderly people.

Regarding the students, focus groups were held with 19 girls and 15 boys, so that, despite differences in the composition of each group, the sum of each sex is balanced.

2.2 Instruments

The expanded LC4Inclusion team's researchers crafted three protocols for conducting semi-structured interviews with teachers, family members (some of whom also served as school volunteers), and other volunteers. Additionally, they devised a protocol for facilitating focus group discussions with pupils.

As Yin (2014) states, interviews are one of the most important sources of information for case studies, as they allow us to understand a set of evidence for the case study itself. In this study, the interviews with adult participants (individual) and the focus groups carried out with children were semi-structured, based on scripts/protocols previously prepared and approved, after pre-tests, by the project's research team. Individual interviews and focus groups allowed us to hear from participants with different statuses, thus ensuring evidence from different perspectives.

2.3 Procedure

The Institute of Education at the University of Lisbon's Ethics Committee granted approval for the study (as the project's coordinating body). Authorizations in writing were secured from

the DGE, school administrators, and parents or guardians of participating students. Assurances were given regarding data confidentiality, and informed consent was obtained from both adult and child participants.

The selection of cases was determined by the following criteria: identification of school groups that joined the INCLUD-ED project, after invitation by the DGE, availability of groups to participate in the project, informed consent of the different participants, choice of a specific territory, in this case the Alentejo region in Portugal.

A general analytical strategy was followed (Yin, 2014), with construction of the theoretical framework, chronological organization of the data, transcription of the interviews and focus groups. At a more specific stage, data categorization matrices were created and categorization tables were drawn up with coded examples of speeches and event frequencies. In this phase, for the purpose of content analysis and data classification, interviews and focus groups were audio-recorded. The categorization process was guided by the aforementioned objectives and the statements provided by participants. Field notes were employed to document SEA observations.

A database was created with the instruments used (protocols and scripts) and the evidence collected in the interviews and focus groups (transcriptions and categorical analysis in tables), in order to guarantee the reliability of the study (Yin, 2014). The database is archived in a unit that is directly accessible to researchers, ensuring the anonymity of the archived data.

Following the procedures recommended by Yin (2014), the reliability, credibility, confirmability and validity of the study were verified. Data reliability was ensured through the percentage of agreement between coders for each category considered. Two researchers separately coded the categories that were previously agreed upon by the research team, and intercoder agreement was calculated based on the percentage of agreement between these two coders. Triangulation of data obtained from different sources of information was cross-referenced to ensure validity.

3 Results

3.1 General characterization of the school clusters

The two clusters are situated in sparsely populated regions of inland Portugal, near the Spanish border. JR is positioned in the center-east, while SP is in the southeast, both within the Alentejo Region (NUTS 2). These school clusters accommodate to economically disadvantaged communities, as defined by Ministry of Education standards, and encompass education from pre-school to 9th grade (students up to 14–15 years old). The main school for middle grades is located in a small urban center, with satellite schools for pre-school and primary education distributed across the town and surrounding villages.

JR comprises seven schools, while SP consists of six. Both clusters are structured similarly, each serving approximately 950 students, with 9% being of foreign origin. JR cluster is also specialized in educating students with autism spectrum disorder, accommodating around 30 diagnosed children (3.18%). Consequently, JR is equipped with additional human and material resources to address this particular need, including a Snoezelen room, occupational therapists, psychologists.

In JR, foreign pupils hail from 17 different nations: Brazil (42 pupils), Angola (22), United Kingdom (4), Pakistan (3), Cuba (2), Italy (2), Venezuela (2), India (2), Nigeria (2), Sierra Leone (2), and one pupil each from China, Finland, Ireland, Malaysia, Spain, Sri Lanka and Ukraine. Among these students, only those from Brazil and Angola are native Portuguese speakers; the others receive supplementary assistance from a PSL teacher, either individually or in small groups. Furthermore, JR includes an unspecified number of students from the Portuguese Romani minority and temporarily accommodates children from itinerant families (such as circus performers, fairground workers, traveling merchants, etc.) during their stays in the city.

At SP, international pupils hail from 12 nations: Brazil (34), Moldova (19), Pakistan (10), Romania (6), Switzerland (6), Cuba (2), Peru (2), Ukraine (2), Angola (1), Guinea-Bissau (1), India (1) and Spain (1). Additionally, approximately 115 students belong to the Portuguese Romani minority, constituting roughly 12% of the total student population, with Portuguese as their native language. Students who are not native Portuguese speakers attend PSL classes instead of regular Portuguese lessons, in a separate group.

Both clusters became part of the INCLUD-ED initiative just before the COVID-19 outbreak. In JR, the implemented SEAs include: interactive groups, dialogic literary and artistic gatherings, extended learning hours, community involvement (primarily non-teaching staff and family members volunteering), dialogical pedagogical training for teachers, and to a lesser extent, family education. The dialogic model for conflict prevention and resolution has not been adopted. These SEAs are mainly employed in primary education and lower secondary school, aligning with the project coordinator's teaching levels.

At SP, the SEAs being utilized are: interactive groups, dialogic literary and artistic gatherings, community participation (chiefly family members and retired teachers, along with other school staff volunteering), and dialogical pedagogical training for educators. Class assemblies have replaced the dialogic model of conflict prevention and resolution to address behavioral issues and other classroom matters. Teachers provide tutorial support for students repeating the academic year. SEAs are primarily implemented in lower secondary school (7th–9th grades), corresponding to the project coordinator's teaching level.

3.2 Opinions of teachers, families, and volunteers about inclusive education and the INCLUD-ED project

As previously mentioned, both school clusters embraced the INCLUD-ED approach just before the COVID-19 pandemic lockdowns, which educators identified as the primary hindrance to the project's progress. Nevertheless, some literary discussions and teacher training sessions were conducted remotely during these periods, serving as a trial run and preparation for full implementation post-lockdown. Project coordinators also noted that some teachers were reluctant to adopt new methods and innovate. Specifically, in the JR cluster, the simultaneous execution

of numerous diverse projects was cited as a reason for not all educators participating in INCLUD-ED.

It is worth highlighting that each school has a designated teacher who locally oversees the project and has encouraged colleagues to undergo training and implement this approach. As a result, the project was primarily developed at the educational levels where these coordinators teach, namely primary education and lower middle school in JR, and middle school in SP.

After reading and analyzing the adults' statements, the researchers agreed that the categories for teachers, family members and volunteers could be the same. The categories considered, as well as the percentage of intercoder agreement, were as follows:

(i) Impact of SEAs on learning and academic skills, evidence of improvement in cognitive skills, motivation, and students' academic progress—87% of intercoder agreement.
(ii) Impact of SEAs on socio-emotional skills and effective coexistence between students, evidence of improved social relationships between students and acceptance of differences—90% of intercoder agreement.
(iii) Impact on family involvement and communication, evidence of greater family involvement at school, with impacts on student wellbeing and learning, and improvements in school-family communication—95% of intercoder agreement.
(iv) School's inclusive policy, culture, and practices, adult opinions on how the school operationalizes inclusion and to what extent it is an inclusive school —84% of intercoder agreement.
(v) The conception of the school as a learning community, or in the process of becoming one, refers to adults' opinions about whether the school has become, or is becoming, a LC—98% of intercoder agreement.

Reliability reached quite reasonable values which give credibility to the data.

Table 1 provides a summary of the views expressed by the adults who took part in this study (teachers, family members and volunteers). These opinions are categorized into several relevant study areas, with the frequency of each category indicated for both school groups.

Analysis of the data summarized in Table 1 reveals that across both school clusters, all participants, teachers, volunteers, and families believe the project enhances academic performance (particularly in Portuguese literacy, critical analysis, and debate skills) and emotional intelligence.

For example, referring to the literary gatherings he organized, a teacher reported that: "We can see them, both in terms of respect for each other and in terms of argumentation and critical thinking, and this has been a benefit. In fact, there's one class where I even thought it was a bit boring and said we wouldn't do it any more this year, but [the students] said they really enjoyed it."

Another teacher said: "Literary gatherings promote respect, the ability to argue, and to listen to others (. . .). Interactive groups promote collaboration and mutual support amongst students (. . .)."

Moreover, all adults concur that this approach strengthens the bond between schools and families, yielding advantages for pupils and improving school-parent dialogue. A mother, who was also a volunteer, said: "I see that more parents come to school (. . .) these actions are an advantage (. . .) Students become more respectful (. . .) As a volunteer in interactive groups, I try to get all the children to participate (. . .)".

While all adults view both school clusters as inclusive in terms of policies, culture, and practices, they feel that integrating students with severe or multiple disabilities poses a significant challenge (due to perceived lack of physical and specialized human resources), even more so than incorporating migrants, including those whose first language is not Portuguese. For example, a teacher said: "Inclusion is still difficult with some children with severe disabilities [severe form of autism or multiple disabilities with cognitive impairment] (. . .) but all students try to help".

Regarding the perception of the school as an LC, adults were more doubtful, citing incomplete teacher participation in the project and difficulties in volunteer recruitment, attributed to either incompatible parental work schedules or insufficient community information.

Teachers' accounts also show that none felt family member participation in their classrooms was intrusive. However, a few noted challenges in interactive groups where some parent volunteers occasionally overstepped their supportive role by attempting to teach. After clarification from the teacher about their role being to motivate and encourage students in pre-planned activities, it was determined that this SEA benefits all involved.

The similarities between the two school clusters outweigh the differences.

3.3 Field notes from SEA observations

Observations were conducted in two cluster schools: three in SP (comprising two literary or artistic sessions and one interactive group) and six in JR (including three literary or artistic sessions, one interactive group, a family training session on patience requested by parents, and an extended learning period). The field notes from these observations corroborated the interview data previously obtained. Two illustrative examples from both cluster schools are detailed below.

A participant observation of an interactive group lesson was conducted in a JR cluster primary school class with 11 pupils. The teacher, JRX1, organized three interactive groups (one with three pupils and two with four pupils) and enlisted four volunteers (a grandfather, a grandmother, a father, and a master's student). The teacher arranged an experimental activity for Environmental Studies, where volunteers supervised and ensured safety while pupils followed the teacher's instructions to perform three 15-min experiments. The groups rotated between tables for each new experiment, with volunteers remaining stationary. One experiment, "The Fat Man with Hot Air," took place in the Environmental Studies area. It required a balloon, two tall tubes, a lidless plastic bottle, hot and cold water, and a kettle (operated solely by the volunteer to prevent accidents). Pupils observed hot air expansion and cold air contraction, with volunteers ensuring no one was scalded. After each experiment, pupils completed evaluation forms, documenting their observations and expressing enthusiasm for repeating the activity.

A literary gathering observation in SP involved 14 secondary school pupils (6 girls and 8 boys) seated in a circle around

TABLE 1 Impacts of SEA implementation according to the opinions of adults in both school clusters (n = 36).

Category and definition	Examples JR/coding unit	Examples SP/coding unit	Freq. of adults
Impact of SEAs on learning and academic skills (evidence of improvement in cognitive skills, motivation, and students' academic progress)	"(. . .) a student had so many difficulties learning to read (. . .) but because we had weekly literary gatherings she said: What makes me happy is reading! (. . .) I held weekly literary gatherings with La Fontaine's fables, and parents had to read them previously with their children at home, then talk and write about them (. . .)." (Primary teacher JRX1—this teacher also held artistic gatherings about international and national paintings and sculptures). "We can see them [refers to the literary gatherings he organized], both in terms of respect for each other and in terms of argumentation and critical thinking, and this has been a benefit. In fact, there's one class where I even thought it was a bit boring and said we wouldn't do it any more this year, but [the students] said they really enjoyed it." (Middle school teacher JRY2) [With regard to extended learning time in the library] "(. . .) first they do their homework, and then we promote a more playful part and organize games with the aim of overcoming their academic difficulties. . . We do theater, they can be creative and showcase their skills." (Non-teaching staff volunteer at the school library JRX3) "As for reading, we ended up acquiring several classics. . . and students have felt motivated to read." (Head teacher JRX7)	"They learn to do group work, because most of them don't know how to work in groups. . . in literary gatherings they learn to speak." (Mother and volunteer SPX2) "Literary gatherings are not as good [as interactive groups] because here we have the issue of reading. It is still difficult to develop this taste for reading, even if it is just necessary to express what they feel or which sentence impressed them the most. They have difficulty identifying the phrase that struck them the most and interpreting what they felt with that phrase." (Teacher SPX10) "With interactive groups, I think there is a dynamism and motivation that cannot be achieved with normal group work, where there is much more dispersion. In interactive groups, there is an adult who accompanies them and can be a witness to all the work they do. And if they lose motivation, this adult can also help them regain it and refocus the group during the 15 min they have to carry out the activity. And for 90 min, the lesson goes by in the blink of an eye for both volunteers and students. That's the big advantage. When faced with a challenge, they feel a sense of accomplishment." (Teacher SPX10)	34 (94.4%)
Impact of SEA on socio-emotional skills and effective coexistence between students (evidence of improved social relationships between students and acceptance of differences)	"I participated in literary gatherings, interactive groups, extended learning time, dialogical gatherings with teachers (. . .). I think the biggest impact was in emotional and relational terms. (. . .) The biggest impact was the human aspect and the relationship between students (. . .). This human aspect of mutual help and solidarity was what impressed me most (. . .) and imagine the ease with which a child can discuss a subject, speak without fear, without shame, express their ideas, help other children. (. . .). The students themselves requested literary gatherings and interactive groups. They really liked it." (Teacher JRX2)	"Literary gatherings promote respect, the ability to argue, and to listen to others (. . .). Interactive groups promote collaboration and mutual support amongst students (. . .)." (Teacher SPX8)	36 (100%)
Impact on family involvement and communication (evidence of greater family involvement at school, with impacts on student well-being and learning, and improvements in school-family communication)	"We created a fashion show with clothes and a text dramatization about the environment, we intersected 3 projects [referring to Academia Ubuntu, Eco-Schools and INCLUD-ED] (. . .) some family members volunteered and the children [in the 1st year] loved it, seeing the family at school (. . .). The children learn a lot from them (. . .) they start to value all those mothers and fathers of all ethnicities, there was an appreciation of difference (. . .) it worked very well. The dynamics that are established in interactive groups are extremely interesting (. . .) even more so than in social gatherings because we have a volunteer there at each table (. . .)." (Teacher JRX6) "(. . .) I notice that the community, parents and families are more participative. And they are also more open to projects (. . .) because the school is full of projects (. . .). We noticed over the years that they became more participative, and I think this is largely due to the projects (. . .) precisely the I-ED project (. . .). I am a volunteer and mainly participated in training parents in two actions [focusing on emotional self-regulation]." (Non-teaching staff and volunteer JRX4) "It's good because we interact with the students and they interact with us, it's good because there is no longer that separation between student-teacher-parent that used to exist and we can join forces, do things together, I think it's very good. It creates a different bond, for the better (. . .). The biggest change has been a closer relationship between parents and all students involved (. . .) I think there should be more of that, parents, the educational community participating (. . .) in solving problems (. . .). The only reason they don't go to school more often is because of their jobs." (Father and volunteer in the interactive groups JRY1) "[Referring to literary gatherings] I always read the books with my daughter (. . .) I participated as a volunteer in interactive groups with the teacher JRX1, and as a mother I followed the literary gatherings remotely, during the confinements due to the pandemic. . . I think these activities are an added value for the school." (Mother and non-teaching school staff JRX13)	"I see that more parents come to school. . . these actions are an advantage. . . Students become more respectful. . . As a volunteer in interactive groups, I try to get all the children to participate. . . My daughter was embarrassed because I was in class, but everyone behaved well, they worked hard and I enjoyed the experience. . . In the literary gatherings I think they were more free and able to argue." (Mother and volunteer SPX2)	36 (100%)

(Continued)

10.3389/feduc.2025.1549712

TABLE 1 (Continued)

Category and definition	Examples JR/coding unit	Examples SP/coding unit	Freq. of adults
School's inclusive policy, culture, and practices (adult opinions on how the school operationalizes inclusion and to what extent it is an inclusive school)	"(. . .) We do everything we can for inclusion (. . .). We are concerned with getting closer to parents (. . .). We have a student and family support office, special education teachers work very closely with psychologists, social workers, and families (. . .) and the other teachers (. . .). The previous law established us, and we still are, as a reference school for autism spectrum disorders. . . parents know the work that has been done and come to this school and we continue to welcome them. . . we have a range of specialized professionals who have performed their duties admirably (occupational therapist, speech therapist, psychologist). (. . .) Most of these children are integrated into classes. . . some of them, after school, have time with the Special Education teacher (. . .) or this teacher goes to the classroom to support the children together with the regular teacher. As schooling progresses, some children with autism spectrum disorders go to a special school, but others continue their studies (. . .). Inclusion difficulties occur with children with multiple disabilities and with severe and complicated disabilities. . . School-age children who wear diapers (. . .) they have to go to the classroom, but their behavior is not stabilized, they do not follow what the teacher says, they can't even listen to a story. . . so that's not inclusion (. . .) but we are improving our therapy room, we have two rooms equipped with many items, we have a Snoezelen Room, music (. . .)." (Special Education teacher JRX11) "Inclusion is clearly practiced in this school, it is a national reference school for autism spectrum disorder. . . we have a PIEF—this means a course aimed at high-risk children in terms of behavior, school failure and age (. . .). Sometimes, there are children with more severe levels of disability who do not do well here, and are transferred to a Special School (. . .)." (Teacher JRX5) "Inclusion also involves including students who come from abroad. There are many students of other nationalities here. There are Brazilians with a different accent and there is a language barrier with some students. I have a Ukrainian in the class who I support, and it is always difficult to communicate (. . .) I use Google Translate. . . and I try to be careful so that he is not excluded from the group." (Non-teaching staff volunteer JRX12)	"The school is a space for inclusion (. . .) the various clubs available (sports, arts, European issues) promote inclusion where everyone collaborates in the planning process and activities (. . .) Also, tutorial support and Portuguese as a foreign language for those whose mother tongue is not Portuguese are very important." (Teacher SPX5) "The school promotes inclusion because all students participate in group work, whether migrants or Roma students." (Volunteer and retired teacher SPX1) "Inclusion is still difficult with some children with severe disabilities [severe form of autism or multiple disabilities with cognitive impairment] . . . but all students try to help." (Teacher SPX3) "This school is inclusive because it offers Portuguese as a foreign language to students who do not speak Portuguese as their mother tongue (. . .) Inclusion problems occur with students with severe disabilities such as severe autism spectrum disorder associated with aggression. . . In a class of 20 or 25 without a specialized teacher, it is difficult to achieve the inclusion of these children." (Teacher SPY7) "We promote inclusion, I try to hold gatherings with Roma families, we did that last year, this year it was not possible. . . We try to encourage them to continue and progress in school because they leave school early, usually before the end of compulsory schooling" [which is 12 years in Portugal]. (Teacher SPX8)	36 (100%)
The school as a learning community or in the process of becoming one (opinions of adults on whether the school has become, or is becoming, an LC)	"JR is inclusive, but it's regrettable that we're not fully an LC yet, (. . .) I think we need to connect all these projects. . . it's easier in primary school (. . .) but it's still complicated to manage everything." (Teacher JRX1) "I don't know." (Teacher JRY2) [The question was not understood by most volunteers.]	"I think we are at a very early stage [of becoming an LC]." (Teacher SPX9)	0 (0%)

X denotes female while Y represents male. In each row, the total number of answers corresponds to the total number of adults.

10.3389/feduc.2025.1549712

TABLE 2 Students' experience and opinions about inclusive education and the INCLUD-ED project in both school clusters (n = 34 students).

Category and definition		Examples JR/coding unit	Examples SP/coding unit	Freq. of students
Interactive groups	Favorable opinion	"Because that way I have more ideas and learn from other people." (Girl 6th grade) "We had a lot of science [groups] and a math group (. . .) Oh, it was beautiful, beautiful, I miss it!" (Boy 4th grade)	"In a group, we can better debate our ideas, listen to others and understand better when a classmate explains something to us." (Girl 9th grade) "We work with other people [volunteers in interactive groups], with whom it is not usual to work, it is fun and better." (Boy 9th grade) "I really like group interaction." (Foreign girl 7th grade)	28 (82.35%)
	Less favorable opinion	"Others don't let me give them ideas, so sometimes I like to work alone." (Girl 6th grade) "It depends on the groups, whether everybody works or not." (Girl 9th grade)	[None]	6 (17.64%)
Literary or artist gatherings	Favorable opinion (all students expressed favorable opinions)	"I liked hearing other people's opinions, and for others to hear ours." (Boy 4th grade) "After we heard the whole story, whoever could discover the meaning of the fable would tell us!" (Boy 4th grade)	"I really like the interaction and being able to hear the opinions of other group members." (Girl 7th grade) "I think that [with literary gatherings,] learning is much more interesting and interactive; it is much better to have a discussion than to just listen to a teacher explain on the blackboard." (Girl 7th grade) "(. . .) in literary gatherings I learn to listen. . . to respect each other's time and opinion (. . .) we talk about the language of the book and my school grades increased in Portuguese." (Girl 7th grade)	34 (100%)
Family at school	Favorable opinion	"I liked it because I felt good with my family; if they come to class, I feel good." (Girl 3rd grade) "Our mothers and fathers came to the classroom to do things with us, it was good." (Boy 4th grade)	"I invited my father to geography class and he came, he liked it and I really liked it, he's ok!" (Boy 9th grade)	28 (82.35%)
	Less favorable or unfavorable opinion	"I would be embarrassed if my mother came to participate in class!" (Girl 9th grade) "I would be ashamed if my mother came to see my behavior in the classroom." (Girl 6th grade)	"I was a little embarrassed with my mother [being] in the classroom." (Girl 7th grade)	6 (17.64%)
Inclusion at school	Achieved	"The class has students from other countries." (Boy 6th grade) "Sometimes we use Google Translator with a Ukrainian student." (Boy 6th grade) "We have a boy in the class, a little autistic." (Girl 6th grade)	"We had a boy in our class with some type of disability, I suppose it was autism, I was very patient with him. I also have a special brother, but the whole class helped him." (Girl 7th grade) "I usually help foreign students, [by] speaking English to those who don't speak Portuguese well and helping with school activities." (Girl 9th grade) "We have class assembly almost every week and we discuss current issues as well as disorderly behavior, lack of education among some students, and ways to resolve conflicts." (Girl 7th grade) "I try to be nice to everyone, including gypsies [Roma children]." (Boy 9th grade) "We did theater for the youngest ones." (Boy 7th grade)	26 (76.47%)
	Difficulties	"Sometimes he cries and hits his head on the table, no one can stand it and the teacher doesn't punish him!" [Referring to a child with autism spectrum disorder] (Boy 6th grade) "There is a boy who cries a lot and is often teased." (Boy 4th grade) "Some students call a classmate from Angola "nigger" and tease her." [Referring to someone in the focus group who confirmed having occasionally suffered racial bullying] (Girl 6th grade) "Some students posted nasty comments on Facebook about a girl and there was an argument over who did it." [Some describe episodes of bullying and cyberbullying] (Girl 6th year)	"Aggressive physical conflicts at school are rare. . ." (Boy 9th grade) "When someone bullies, we try to talk [to those involved] or talk to teachers or parents and it usually gets solved." (Girl 7th grade)	8 (23.53%)

In each row, the total number of answers corresponds to the total number of students.

10.3389/feduc.2025.1549712

a table, discussing "The Little Prince" by Saint-Exupéry, which they had previously read and debated. A digital roulette wheel selected the first speaker, and each pupil shared and explained an excerpt that resonated with them. Participants raised their hands to contribute, often relating their choices to personal experiences. Some pupils admitted being emotionally affected by the story, with some shedding tears and receiving comfort from classmates. All pupils demonstrated mutual respect and enjoyment of the activity. The session concluded with requests for another book to discuss in the future.

In summary, the observations revealed high levels of pupil engagement, interaction with volunteers, improved positive relationships, and academic progress in the areas studied.

3.4 Opinions of students on inclusive education and the INCLUD-ED project

When analyzing the speech of the children and adolescents who participated in the focus groups, the team agreed to code their opinions as favorable or unfavorable (or at least less favorable) to each SEA according to what they experienced in terms of learning performance or good coexistence processes. Thus, the percentage of agreement for the interactive groups was 90%; for dialogic gatherings it was 96%; and for the presence of the family at school it was 91%. With regard to inclusion, the categories in which inclusion has been achieved mean that, in their opinion, members of the educational community act in a way that contributes to the inclusion of all children, everyone is treated with respect and the needs of each student are met, or are not fully met, because there is still discrimination or some type of social exclusion at school. The percentage agreement for this category was 83%. The reliability values were very reasonable which gives credibility to the data.

Table 2 offers an overview of pupils' perspectives and encounters regarding the SEAs implemented in their respective schools. The classification was derived from the aforementioned objectives and the learners' remarks, which encompassed their positive and less positive views on focus groups, literary and artistic gatherings, and familial involvement in the classroom. Additionally, it addressed the application of inclusive education within the school environment and the associated challenges.

Examination of Table 2 indicates that most pupils in both schools showed a general inclination toward collaborative work and demonstrated enthusiasm for both literary and artistic gatherings. At JR, a small number of students acknowledged occasionally preferring individual work when peers are uncooperative or inhibit their expression. Pupil testimonials also suggest that interactive groups and literary and artistic sessions facilitate more enjoyable and effective learning, primarily enhancing skills in argumentation, listening, respect for others, and Portuguese language proficiency. Reporting on his experience in interactive groups, a 4th grade boy said: "We had a lot of science [groups] and a math group (. . .) Oh, it was beautiful, beautiful, I miss it!." A 7th grade girl reports: "(. . .) in literary gatherings I learn to listen (. . .) to respect each other's time and opinion (. . .) we talk about the language of the book and my school grades increased in Portuguese".

Some students explicitly appreciate acquiring new knowledge from volunteers. Regarding family presence at school, younger pupils (3rd and 4th grades) expressed approval, while some older students reported feeling self-conscious with relatives in the classroom. All pupils seem comfortable with and accepting of diversity in nationality, ethnicity, language, and disability. Some mentioned using English or Google Translate to interact with foreign students. In JR particularly, some pupils expressed discomfort with severely autistic children who exhibit crying and aggressive behavior toward themselves and others. Instances of bullying and cyberbullying, along with difficulties in addressing these issues, were reported, with greater emphasis in JR's accounts but also present in SP's. The statements from foreign students participating in the focus group largely aligned with those of Portuguese nationality: they enjoy interactive group work, and literary gatherings aid their Portuguese language development, although some reported experiencing verbal bullying from schoolmates outside the focus group. A 6th grade girl describes episodes of cyberbullying: "Some students posted nasty comments on Facebook about a girl and there was an argument over who did it".

4 Discussion and conclusion

The success of INCLUD-ED's implementation hinges largely on the initial teachers who join and their commitment to the project. This creates a distinction between JR and SP, as the former implemented it primarily in primary education, while the latter focused on middle school.

Both school groups faced challenges in fully implementing INCLUD-ED, including the confinements of COVID-19 pandemic, resistance from some teachers, and involvement in other initiatives (particularly in JR). Teachers opt into this approach voluntarily following a proposal from the Ministry of Education, with each school appointing a teacher to oversee the project's implementation. Each school cluster chose not all the features of the INCLUD-ED approach, but only those that the headteacher and teachers involved considered would be appropriate for that school cluster. This means that each school chooses the SEAs that they consider to be the best strategy for their schools.

Across both school clusters, there is a consensus among teachers, volunteers, family members, and pupils that interactive groups and literary and artistic sessions enhance learning outcomes. These methods are believed to improve soft skills such as socio-emotional competence, acceptance of diversity, mutual assistance, active listening, collaboration, and respect for others' time and opinions. Additionally, the project improves academic learning, especially critical thinking abilities and Portuguese language proficiency in reading comprehension, text interpretation, and writing. The triangulation of data (teachers, family members, volunteers and students) and the values obtained for reliability support this conclusion.

These findings were corroborated by researchers' field notes and align with studies conducted in other countries (Morlà-Folch et al., 2022; Molina Roldán et al., 2021). Notably, the literary and artistic gatherings, which involve reading and discussing classic literature and other art forms, foster, such as painting and music) promote students' familiarity with cultural traditions, an important educational aspect according to some scholars (Flecha, 2022). The INCLUD-ED approach seems to make learning more engaging for students. Teachers also report increased collaboration in activity planning.

This method promotes substantial interaction between the community and schools, particularly increased family participation in school activities compared to previous practices in both clusters. This aligns with theories on PLC (Stoll et al., 2006), which emphasize the importance of family and community partnerships in fostering supportive learning environments. The observation that younger pupils are more receptive to family members in class compared to older students likely stems from developmental factors, as teenagers seek greater autonomy from parents and prefer their absence in the classroom. A challenge identified in this participation is the difficulty in recruiting volunteers due to conflicting work schedules. SP is addressing this by attempting to engage retired teachers and other professionals, echoing the concept of collaborative leadership and resource-sharing proposed by Vangrieken et al. (2017), which suggests schools can benefit from diverse contributors within their local communities.

While the presence of non-Portuguese speaking foreign students is viewed as a challenge, it is not considered the primary issue faced by these educational institutions. The most significant hurdle, causing greater difficulties for both educators and pupils, is the inclusion of children with severe or multiple disabilities. Despite efforts to utilize all available material and human resources to address this situation, teachers are calling for additional support to achieve comprehensive inclusion of severely disabled children (Jury et al., 2023). Students were even more critical regarding inclusion, reporting episodes of social exclusion related to bullying and cyberbullying, especially those of JR. In fact, the dialogical model of conflict resolution was not implemented and no other violence prevention strategy was evidenced in JR, while SP, despite not using this strategy, replaced it with a class assembly to debate with children relational issues and conduct problems. This may explain why the content and tone of JR's speech involve more episodes of social exclusion, compared to SP, as can be seen in Table 2.

In essence, the two school clusters share more commonalities than differences. Regarding the principles guiding the inclusion of students whose first language is not Portuguese, SP aims to offer PSL classes, as recommended by Booth and Ainscow (2002). JR, on the other hand, supports these students in small groups outside of regular school hours but is seeking funding to implement the same approach as SP in the upcoming academic year, given the anticipated increase in foreign student numbers. An ongoing discussion in Portugal centers on the potential establishment of a "zero grade" for these students, particularly in schools with high foreign student populations, due to their challenges in achieving academic success during their initial year in Portugal. This debate reflects discussions on differentiated instruction and the need for targeted interventions, although this issue has not yet been addressed in the two school clusters examined in this study.

Inclusive education, broadly defined, appears to be an ongoing process in both school clusters, championed by all members of the educational community. While it presents various obstacles and difficulties that everyone strives to overcome, it remains a challenge (Martins et al., 2023; UNESCO, 2020, 2021). However, the transformation of schools into LCs as proposed by the INCLUD-ED approach has not yet been fully realized, as they are only in the initial stages of working toward this goal (Flecha, 2015). The majority of teachers believe that better coordination of various school projects, full implementation of SEAs, and enhanced community participation will be necessary to achieve this objective.

Given these data, we would recommend that JR implement strategies to prevent bullying and resolve conflicts (either the dialogical model for conflict prevention and resolution or the class assembly) and extend interactive groups and dialogical gatherings to middle school, as well as other SEAs that have had good results, and that SP implement SEAs in primary school. Furthermore, the class assembly seems to be more adapted to middle school, while the dialogical model for conflict prevention and resolution seems more appropriate for primary school.

Inclusive education and the transformation of schools into learning communities are ongoing and never-ending processes that challenge teachers, students and families.

5 Limitations of the study

This study has some limitations, namely the fact that it was carried out in a specific region of Portugal, although it covers a vast area of the southeast of the country; a convenience sample was used (the schools that authorized the study, among those in which the INCLUD-ED approach was being implemented); and there was no comparison with schools clusters that did not implement the INCLUD-ED approach (a possible future development of this research). Another limitation is related to the difficulty in differentiating the specific impact of INCLUD-ED, given the simultaneous dynamization of other projects by other teachers in these school clusters.

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.

Ethics statement

The studies involving humans were approved by Comissão de ética da Universidade de Lisboa. The studies were conducted in accordance with the local legislation and institutional requirements. Written informed consent for participation in this study was provided by the participants' legal guardians/next of kin. Written informed consent was obtained from the individual(s), and minor(s)' legal guardian/next of kin, for the publication of any potentially identifiable images or data included in this article.

Author contributions

MM: Conceptualization, Data curation, Formal Analysis, Funding acquisition, Investigation, Methodology, Project administration, Resources, Supervision, Validation, Visualization, Writing – original draft, Writing – review & editing. AM: Conceptualization, Data curation, Formal Analysis, Funding acquisition, Investigation, Methodology, Resources, Validation, Visualization, Writing – review & editing, Writing – original

draft, Supervision. TO: Conceptualization, Data curation, Formal Analysis, Funding acquisition, Investigation, Methodology, Resources, Software, Supervision, Validation, Visualization, Writing – original draft, Writing – review & editing. AC: Conceptualization, Data curation, Formal Analysis, Funding acquisition, Investigation, Methodology, Project administration, Resources, Supervision, Validation, Visualization, Writing – original draft, Writing – review & editing. LT: Conceptualization, Data curation, Formal Analysis, Funding acquisition, Investigation, Methodology, Project administration, Resources, Supervision, Validation, Visualization, Writing – original draft, Writing – review & editing.

Funding

The author(s) declare that financial support was received for the research and/or publication of this article. This work has been funded by Fundação para a Ciência e Tecnologia through LC4Inclusion -The Journey of Schools as Learning Communities for Inclusion -PTDC/CED-EDG/4650/2021 (https://doi.org/10.54499/PTDC/CED-EDG/4650/2021); and Unidade de Investigação e Desenvolvimento em Educação e Formação -UIDB/04107/2020 (https://doi.org/10.54499/UIDB/04107/2020).

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.

Generative AI statement

The authors declare that no Generative AI was used in the creation of this manuscript.

Publisher's note

All claims expressed in this article are solely those of the authors and do not necessarily represent those of their affiliated organizations, or those of the publisher, the editors and the reviewers. Any product that may be evaluated in this article, or claim that may be made by its manufacturer, is not guaranteed or endorsed by the publisher.

References

Admiraal, W., Schenke, W., De Jong, L., Emmelot, Y., and Sligte, H. (2021). Schools as professional learning communities: What can schools do to support professional development of their teachers? *Prof. Dev. Educ.* 47, 684–698. doi: 10.1080/19415257.2019.1665573

Akabor, S., and Phasha, N. (2022). Where is Ubuntu in competitive South African schools? An inclusive education perspective. *Int. J. Inclusive Educ.* 29, 361–377. doi: 10.1080/13603116.2022.2127491

Amado, J. (2017). *Manual de Investigação Qualitativa em Educação [Handbook of Qualitative Research in Education]*, 3rd Edn. Portugal: Coimbra University Press.

Booth, [Booth and Ainscow, 2022] T., and Ainscow, M. (2002). Index] for Inclusion. Developing Learning and Participation in Schools. Centre for Studies on Inclusive Education (CSIE). Available online at: https://www.eenet.org.uk/resources/docs/Index%20English.pdf (accessed December 12, 2024).

Community of Research on Excellence for All (CREA). (2020). *Formação em Comunidades de Aprendizagem [Training on Learning Communities]. CREA/DGE-ME*, 10 volumes. Available online at: https://comunidades-aprendizagem.dge.mec.pt/pt/formacao-em-comunidades-de-aprendizagem. (accessed December 12, 2024).

De Boer, A., Pijl, S. J., and Minnaert, A. (2011). Regular primary schoolteachers' attitudes towards inclusive education: A review of the literature. *Int. J. Inclus. Educ.* 15, 331–353. doi: 10.1080/13603110903030089

Directorate-General for Education (DGE). (2024a). *Crianças e Jovens Refugiados – Medidas Educativas [Children and Youth Refugees – Educational Measures]*. Available online at: https://www.dge.mec.pt/criancas-e-jovens-refugiados-medidas-educativas (acessed December 12, 2024)

Directorate-General for Education (DGE) (2024b). *Português Língua Não Materna [Portuguese as a second language]*. Available online at: https://www.dge.mec.pt/portugues-lingua-nao-materna#inf (acessed December 12, 2024)

Flecha, R. (2015). *Successful Educational Actions for Inclusion and Social Cohesion in Europe*. Cham: Springer International Publishing, 67–77. doi: 10.1007/978-3-319-11176-6_6

Flecha, R. (2022). *The Dialogic Society. The Sociology Scientists and Citizens Like and Use*. Richmond: Hipatia Press.

Flecha, R., and Soler, M. (2013). Turning difficulties into possibilities: Engaging Roma families and students in school through dialogic learning. *Camb. J. Educ.* 43, 451–465. doi: 10.1080/0305764X.2013.819068

Flores, I. (2023). *Professores Sob a lupa. A Realidade Demográfica e Laboral dos Professores do Ensino Público em Portugal 2016/17 - 2020/21 [Teachers Under the Magnifying Glass. The Demographic and Employment Reality of Public-School Teachers in Portugal from 2016/17 – to 2020/21] EDULOG – Fundação Belmiro de Azevedo*. Porto: Fundação Belmiro de Azevedo.

Florian, L. (2019). On the necessary co-existence of special and inclusive education. *Int. J. Inclusive Educ.* 23, 691–704. doi: 10.1080/13603116.2019.1622801

Jury, M., Laurence, A., Cèbe, S., and Desombre, C. (2023). Teacher's concerns about inclusive education and the links with teacher' attitudes. *Front. Educ.* 7:1065919. doi: 10.3389/feduc.2022.1065919

Knight, C., Conn, C., Crick, T., and Brooks, S. (2023). Divergences in the framing of inclusive education across the UK: A four nations critical policy analysis. *Educ. Rev.* 77, 495–511. doi: 10.1080/00131911.2023.2222235

Lacruz-Pérez, I., Sanz-Cervera, P., and Tárraga-Mínguez, R. (2021). Teachers' attitudes toward educational inclusion in Spain: A systematic review. *Educ. Sci.* 11:58. doi: 10.3390/educsci11020058

López-Azuaga, R., and Riveiro, J. M. S. (2020). Perceptions of inclusive education in schools delivering teaching through learning communities and service-learning. *Int. J. Inclusive Educ.* 24, 1019–1033. doi: 10.1080/13603116.2018.1507049

Martins, M. J. D., Oliveira, T., and Marchão, A. (2023). A inclusão de crianças e jovens em situação de vulnerabilidade. [The inclusion of children and youth in vulnerable situation]. *Sisyphus* 11, 10–32. doi: 10.25749/sis.28110

Molina Roldán, S., Marauri, J., Aubert, A., and Flecha, R. (2021). How inclusive interactive learning environments benefit students without special needs. *Front. Psychol.* 12:661427. doi: 10.3389/fpsyg.2021.661427

Morlà-Folch, T., Davids, A. I. R., Cuxart, M. P., and Valls-Carol, R. (2022). A research synthesis of the impacts of successful educational actions on student outcomes. *Educ. Res. Rev.* 37:100482. doi: 10.1016/j.edurev.2022.100482

Norwich, B. (2022). Research about inclusive education: Are the scope, reach and limits empirical and methodological and/or conceptual and evaluative? *Front. Educ.* 7:937929. doi: 10.3389/feduc.2022.937929

Semião, D., Mogarro, M. J., Pinto, F. B., Martins, M. J. D., Santos, N., Sousa, O., et al. (2023). Teachers' perspectives on students' cultural diversity: A systematic literature review. *Educ. Sci.* 13:1215. doi: 10.3390/educsci13121215

Stoll, L., Bolam, R., McMahon, A., Wallace, M., and Thomas, S. (2006). Professional learning communities: A review of the literature. *J. Educ. Change* 7, 221–258. doi: 10.1007/s10833-006-0001-8

UNESCO (2020). *Inclusion and Education: All Means All. Glob. Educ. Monitoring Report 2020*. Paris: UNESCO.

UNESCO (2021). *Reaching Out to All Learners: A Resource Pack for Supporting Inclusion and Equity in Education*. Paris: UNESCO.

University of Barcelona (2012). *Relatório INCLUD-ED final: Estratégias Para a Inclusão e Coesão Social na Europa a partir da Educação [Final INCLUD-ED Report: Strategies for Inclusion and Social Cohesion in Europe Based on Education]*. Spain: University of Barcelona.

Vanblaere, B., and Devos, G. (2016). Relating school leadership to perceived professional learning community characteristics: A multilevel analysis. *Teach. Teach. Educ.* 57, 26–38. doi: 10.1016/j.tate.2016.03.003

Vangrieken, K., Dochy, F., Raes, E., and Kyndt, E. (2015). Teacher collaboration: A systematic review. *Educ. Res. Rev.* 15, 17–40. doi: 10.1016/j.edurev.2015.04.002

Vangrieken, K., Meredith, C., Packer, T., and Kyndt, E. (2017). Teacher communities as a context for professional development: A systematic review. *Teach. Teach. Educ.* 61, 47–59. doi: 10.1016/j.tate.2016.10.001

Walton, E., Carrington, S., Saggers, B., Edwards, C., and Kimani, W. (2019). What matters in learning communities for inclusive education: A cross-case analysis. *Professional Dev. Educ.* 48, 134–148. doi: 10.1080/19415257.2019.1689525

Yin, R. K. (2014). *Case Study Research Design and Methods*, 5th Edn. Thousand Oaks, CA: SAGE.