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Mapping Multilingual Pedagogies for Young Learners: A Scoping Review of Theories, Practices, Benefits and Challenges in European Early Childhood and Early Primary Education

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Systematic Review

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Abstract

This scoping review maps multilingual education practices for young learners aged 3 to 7 in European early childhood education and care and early primary settings. Following PRISMA-ScR guidelines, peer-reviewed studies published between 2020 and 2025 were searched in Scopus and Web of Science. Fifteen studies met the inclusion criteria and were analysed in relation to their theoretical foundations, pedagogical practices, reported benefits, and challenges. The findings show that multilingual practices draw on diverse frameworks, including translanguaging, plurilingual and pluralistic approaches, language awareness, bilingual/CLIL education, emergent literacy, oral-language intervention, and home–ECEC collaboration. Reported practices included storytelling, shared reading, language comparison, play-based and multimodal activities, songs and rhymes, vocabulary and phonics instruction, translanguaging interaction, and parent-supported literacy activities. The review indicates that multilingual practices can support engagement, inclusion, oral language, vocabulary, narrative competence, emergent literacy, metalinguistic awareness, positive attitudes toward linguistic diversity, identity, agency, and home–school continuity. However, challenges remain, including uneven effects, implementation constraints, fidelity issues, persistent monolingual ideologies, and limited integration of children's home or heritage languages. As the mapped practices include bilingual education, CLIL, and early foreign-language provision, the review also outlines the early-years foundations on which later second and foreign language learning and teaching build. Further longitudinal, comparative, and implementation-focused research is needed to strengthen sustainable multilingual pedagogies in early education.

1. Introduction

In the eleventh chapter of "The World Until Yesterday", Jared Diamond (2013) argues that multilingualism has historically been the norm as each language serves as "the vehicle for a unique way of thinking and talking, a unique literature, and a unique view of the world" (2013, p.252). This perspective is evident in European language policies, which acknowledge the significance of majority, minority, heritage, and prestige foreign languages, as well as the importance of home-language literacy support among the highest research priorities (Duarte et al., 2023). European institutions have consistently positioned plurilingualism as a fundamental aspect of European citizenship and have promoted early language learning, including at the pre-primary level (European Commission, 2011).

Globalization and migration have recently established multilingualism as both a prevailing reality and a central objective within European educational systems, shaping language education policies and establishing explicit policy priorities (Duarte et al., 2023). At the European policy level, plurilingual and intercultural education are increasingly regarded not only as a language-learning priorities but also as prerequisite for democratic culture, social cohesion, and educational equity (Council of Europe, 2022). Consequently, linguistic and cultural diversity are regarded as resources that education systems should recognize, value, and cultivate, rather than as barriers to schooling.

As multilingual and plurilingual perspectives have gained prominence in policy, research, and practice, the terminology employed in language education has also multiplied. Terms such as multilingualism, plurilingualism, translanguaging, language awareness, and pluralistic approaches are sometimes used interchangeably, although they originate from distinct theoretical, pedagogical, and policy traditions (García & Otheguy, 2020; Gkaintartzi & Katsara, 2024; Žefran et al., 2025). In response, the Council of Europe (2022) has adopted consistent terminology to clarify the conceptual foundations of language education.

Accordingly, multilingualism refers to the presence of multiple languages within a society, school or classroom, whereas plurilingualism describes an individual's single, dynamic, and uneven repertoire across languages and varieties, which learners use as an integrated whole rather than as separate compartments (Council of Europe, 2022; Piccardo & North, 2020). Bilingual education typically denotes instruction organized around two languages. In contrast, translanguaging refers to the fluid language practices of multilingual speakers and the intentional incorporation of these practices into educational contexts (García & Otheguy, 2020; García & Kleifgen, 2020).

This conceptual clarification is particularly relevant for young learners, the primary focus of this scoping review, as multilingual education in early childhood is shaped by both broad European objectives and children's developmental characteristics. The preservation and promotion of Europe's linguistic diversity are presented as prerequisites for cohesive democratic societies (Council of Europe, 2022). However, language-education policy for young learners is widely recognized as both complex and politically sensitive. & Bonacina-Pugh & Hélot, (2023) argue that language-education policies are shaped by competing agendas and by relative status of majority, minority, heritage, and prestige foreign languages. This complexity is especially significant in early childhood, when the acquisition of multiple languages by young learners is closely linked to cognitive, linguistic, and societal benefits (Aerila et al., 2025; Council of Europe, 2022; Mañoso-Pacheco & Sanchez-Cabrero, 2022; Rantanen, 2024; Schwartz, 2025; Zheng et al., 2021; Veerman et al., 2026).

The period from 3 to 7 years old is characterized by rapid development in oral language and in emergent literacy skills, including phonological awareness, vocabulary, narrative competence, print knowledge, and notational knowledge (Bigozzi et al., 2023; Incognito et al., 2021; Logan et al., 2023). These abilities function as developmental precursors to subsequent reading and writing proficiency (Bigozzi et al., 2023; Logan et al., 2023). This period is also significant as children begin to exercise agency in and through language, making deliberate choices regarding language use, interlocutors, and communicative purposes (Schwarz, 2025). Furthermore, research has identified awareness and attitudinal benefits, such as heightened language awareness, curiosity about language, openness to linguistic diversity, positive attitudes toward multilingualism, print engagement, metalanguage, and enthusiastic participation in multilingual activities (Becker & Knoll, 2022; Gkaintartzi & Katsara, 2024; Laursen & Daugaard, 2025; Žefran et al., 2025). Collectively, these findings highlight both the developmental significance of multilingual education in early childhood and the necessity of investigating the pedagogical approaches through that facilitate these outcomes (Gkaintartzi & Katsara, 2024; Žefran et al., 2025).

The pedagogical approaches that facilitate these outcomes are diverse and draw from various theories and frameworks, though they are not mutually exclusive (Veerman et al., 2026). Pluralistic approaches, such as Awakening to Languages codified in the FREPA framework, intentionally expose children to multiple languages and cultures (Candelier et al., 2013). These approaches prioritize curiosity, cross-linguistic comparison, language awareness, and openness to diversity over immediate proficiency in any single target language (Coelho & Ortega, 2020; Rantanen, 2024). In contrast, translanguaging pedagogy challenges traditional theories of language transfer (Cummins, 1981; Rantanen, 2024) by positing that individuals do not possess separate languages in the mind, but rather draw on unified set of linguistic resources according to context (García, 2017; García & Wei, 2014). Translanguaging pedagogy therefore values children's entire linguistic repertoires as resources for meaning making, participation and identity expression (García & Otheguy, 2020; García & Kleifgen, 2020). Other approaches, such as oral-language and emergent-literacy frameworks, focus more directly on the components of early language development and the instructional practices that support vocabulary, narrative competence, phonological awareness and early literacy (Hadley et al., 2022, 2023). Additionally, bilingual education, Content and Language Integrated Learning (CLIL), and exposure-based models organize learning around the quantity and quality of input in an additional language, examining whether such provision supports additional-language development without compromising the language of schooling (Hemmi & Banegas, 2021; Hidalgo & Ortega-Sánchez, 2023; Uhl et al., 2023; Verhagen et al., 2024)

These approaches are particularly significant within the institutional contexts where early multilingual education occurs. Previous research indicated that early childhood education and care (ECEC), kindergarten, and the first primary grades constitute a strategic but complex site for multilingual due to benefits in cognitive, emotional and social development education (Gkaintartzi et Katsara, 2024; Myles, 2017; Waddington 2023; Whiting & Marshall, 2023). Recent UNESCO guidance (2025) recommends the integration of multilingual education from the earliest grades, emphasizing mother-language instruction, the provision of appropriate learning materials, and active family and community involvement. Similarly, European policy supports comprehensive language learning approaches beginning as early as possibly including ECEC, and highlights the importance of learners' full linguistic repertoires, linguistic diversity, and cooperation with parents when children's home language differs from the language of instruction (Council of Europe, 2022).

However, the field remains heterogenous, as studies employ diverse theoretical frameworks, investigate various practices, and report a range of outcomes. Consequently, it is necessary to map the multilingual practices implemented with children aged 3 to 7, the theoretical foundations underpinning these practices, and the reported benefits and challenges.

2. The present review

A substantial body of literature reviews has explored multiple dimensions of multilingual education, utilizing studies form diverse global contexts. Recent review literature has shifted focus from identifying

multilingual children's unequal classroom opportunities to examining multilingual pedagogies, teacher practices, and potential outcomes.

Among systematic reviews, Langeloo et al. (2019) offer a foundation analysis by focusing on teacher-child interactions with multilingual young children in early-childhood education. Their review demonstrated that multilingual children may experience teacher-child interactions similar to those of monolingual peers. Nevertheless, teachers employ specific strategies to support multilingual learners, including using their home language, incorporating cultural resources, and using non-verbal communication. The review also identified a persistent issue: multilingual children may encounter unequal learning opportunities and limited language support in early-childhood classrooms, underscoring the significance of interactional quality.

Pontier et al. (2020) advanced this discourse by investigating dynamic language use in bilingual and multilingual early-childhood education settings. While Langello et al. (2019) primarily addressed the nature and quality of teacher-child interaction, Pontier et al. (2020) emphasized the naturalistic language practices of both teachers and children. Their review revealed that both groups engage in strategic language practices across various program models, and that teacher agency significantly influence alignment with or resistance to language policies. This work shifted the focus from merely supporting multilingual children to conceptualizing multilingual classrooms as dynamic environments where language practices are actively negotiated. However, the review also noted that these practices were not consistently planned or systematically incorporated into pedagogy.

Prilutskaya (2021) provided a broader perspective by reviewing empirical research on pedagogical translanguaging with English Language Teaching (ELT) and related contexts. This review highlighted the rapid emergence of translanguaging as a linguistically inclusive pedagogical framework and synthesized extensive empirical evidence across educational levels and international contexts. Although the review did not specifically address young children on European ECEC or early-primary settings, nor did it compare multilingual practices beyond translanguaging, its relevance to the present study lies in its demonstration that translanguaging is now central to discussion of multilingual education. Furthermore, it establishes that leveraging learners' linguistic repertoires constitutes a valuable pedagogical resource.

More recently, Veerman et al. (2025) addressed gaps identified in previous reviews by systematically analyzing multilingual pedagogies and their outcomes in primary education. Their review identified four categories of multilingual pedagogies: translanguaging-based, affirming, scaffolding, and cross-linguistic pedagogies. The review linked pedagogies to cognitive outcomes, including vocabulary development, morphological awareness, content learning and literacy, as well as socio-affective outcomes such as wellbeing, relational aspects, engagement, identity, and self-efficacy. Thus, Veerman et al. (2025) offer a valuable l framework for categorizing multilingual practices and interpreting their outcomes. However, their analysis is limited to primary education and does not specifically address ECEC, the early-primary transition, or the 3-7 age range.

Scoping reviews build upon systematic review literature by shifting the focus from interaction and outcomes to broader landscape of available strategies, teacher beliefs and implementation conditions. Zheng et al. (2021) addresses part of the gap identified by Langello et al. (2019), by specifically examining early childhood education and mapping the strategies teachers use to support young learners' multilingual development. The review identified four main categories of strategies: translanguaging, interaction-promoting, linguistic based, and culture-based, Notably, most studies concentrated on majority-language learning, with fewer examine how teachers support children's home-language maintenance. However, this review remains focused on teachers' strategies for multilingual development rather than exploring the broader relationship among theoretical foundations, typed of practices, reported benefits, challenges, and research gaps.

Burner and Carlsen (2023) contribute to the field by examining English teachers' multilingual beliefs and practices in English as a Second Language (ESL) and English as a First Language (EFL) classrooms. Their review indicates that teachers often hold more favorable attitudes toward multilingualism than are evident in their classroom practices. When multilingual approaches are implemented, they typically emphasize the language of instruction or students' first language, rather than utilizing students' full linguistic repertoires. Although this review is limited to English classrooms, it is significant because it clarifies why the presence of multilingual theories or policy recommendations does not necessarily lead to multilingual classroom practices.

Finally, Jaramillo- López et al. (2025) expanded the ECEC literature by examining monolingual early childhood educators who teach monolingual children, focusing on educator and learning environment characteristics. Their scoping review revealed a lack of systematic knowledge about how monolingual educators support monolingual children. The review also highlighted regional differences: culturally responsive practices were rare in Latin American contexts, while educators in the USA and Europe were more likely to incorporate children's first languages, even with limited proficiency. This review is particularly significant given that many teachers of multilingual children do not share their pupils' home languages.

Collectively, these reviews demonstrate that the field has established several key findings. First, multilingual children's classroom experiences are influenced by the quality of teacher-child interactions and by the extent to which teachers acknowledge and utilize children's linguistic repertoires. Second, multilingual practices are increasingly viewed not only as aids to comprehension but also as means of affirming identity, fostering participation, enhancing language awareness, and supporting learning. Third, implementation remains inconsistent: although multilingualism is often valued in principle, classroom practices are frequently shaped by monolingual norms, insufficient teacher preparation, policy limitations, or only symbolic inclusion of home languages. Fourth, the scope of existing reviews varies, with some focusing on interaction quality, others on dynamic language use, translanguaging beliefs, monolingual educators, or primary-school outcomes.

This scoping review addresses a specific gap in the literature, as limited attention has been given to mapping multilingual education practices for young children in European ECEC and early-primary settings. The review examines the theoretical and pedagogical foundations of reported practices implemented, their reported benefits and challenges, and the gaps and future directions identified in the literature. Its aim is to provide a focused synthesis of current knowledge regarding multilingual education practices for children aged 3 to 7 in European educational settings. In doing so, the review speaks directly to second and foreign language education research: the practices it maps, including bilingual education, CLIL, and early foreign-language provision, constitute the earliest stage of the second and foreign language learning trajectories that this field typically examines at later ages.

3. Methodology

This study employs a systematic scoping review design to determine the volume and coverage of empirical evidence and to present best practices in multilingual education for pupils 3-7 years old. According to Mays et al. (2001, p.194) scoping reviews “aim to map rapidly the key concepts underpinning a research area and the main sources and types of evidence available”. A scoping review differs from systematic reviews and meta-analysis by focusing on identifying knowledge gaps, shaping research agendas, and suggesting practical application, such as policy or practice (Tricco et al., 2016). In contrast, systematic reviews aim to answer specific research questions using previously identified study designs (Arksey & O” Malley, 2005). Meta-analysis, meanwhile, uses statistical techniques to summarise and synthesise findings from quantitative research (Deeks et al., 2024).

This systematic scoping literature review was conducted following the reporting guidelines of the Preferred Reporting Items for Systematic Reviews and Meta-Analyses extension for scoping reviews (PRISMA-ScR) (Tricco et al., 2018). These guidelines help researchers create more comprehensive scoping and systematic reviews, as well as meta-analyses by providing a structured approach for identifying, screening, and synthesizing relevant literature (Tricco et al., 2018). A PRISMA flow diagram (see Figure 1) was developed to illustrate each stage of the review process, from identification to final inclusion. Following the approach outlined by Christou et al. (2025), we implemented the four-phase procedure described by Xiao and Watson (2019). Consequently, this review included the following phases: (a) identification of literature, (b) screening for relevance, (c) assessment of quality and eligibility, and (d) extraction and synthesis of data.

3.1. Research questions

The following research questions guided this study:

RQ1: What are the theories and pedagogical approaches used in the reported studies and in which competences are they targeting?

RQ2: What types of multilingual education practices for young learners aged 3 to 7 are described and what are their main characteristics?

RQ3: What benefits and challenges of these practices are reported in the included studies?

3.2. Search terms

A list of keywords for the information research was developed through an initial limited search on the topic. This preliminary search helped the researchers to find as many relevant articles as possible and identify the relevant databases for their scoping review (Kazi et al., 2021). Going one step further and following the points of Kazi et al. (2021, p.3), the researchers further divided the search terms into four categories. The first category was relevant to the language-education phenomenon, i.e. plurilingual, multilingual, code-switching, etc. The second category defined the target age group/educational setting, i.e. preschool, kindergarten, nursery etc. The third category aimed to capture the educational context, i.e. classroom, school, early childhood education, etc. Lastly, the fourth category focused on pedagogical action and implementation, i.e.., teaching, classroom practice, intervention, etc. Boolean operators such as OR, AND were used between the blocks, while quotation marks and truncation (*) were used to capture variations in terminology. The final search was applied to TITLE-ABS-KEY fields and limited to publications from 2020–2025 to reflect recent evidence.

After formulating and finalizing relevant key terms necessary for the search, researchers identified as relevant databases those of Scopus and of the Core Collection of Web of Science (Clarivate, n.d.). Scopus was selected due to its comprehensive coverage of peer-reviewed literature across disciplines, particularly in the Social Sciences and Arts and Humanities, fields central to the focus of this review (Singh et al., 2021; Mongeon & Paul-Hus, 2016). Furthermore, French, one of the two inclusion languages (the other being English), is better represented in Scopus compared to other databases (Mongeon & Paul-Hus, 2016), further supporting its appropriateness for this review. In addition, Web of Science (WoS) is a global database that indexes key research outputs, whereas all indexed publications are peer reviewed and recognized for their impact within the field (Thieme et al., 2022).

The exact query string used for search in Scopus database was:

TITLE-ABS-KEY ((plurilingual* OR multilingual* OR bilingual* OR "emergent bilingual*" OR "dual language" OR "two-way immersion" OR translanguag* OR "code-switch*" OR "language mixing") AND (preschool* OR pre-school* OR kindergarten* OR nursery OR "pre-primary" OR ECEC OR "early primary" OR "first grade" OR "grade 1" OR "reception class") AND (classroom* OR school* OR "early childhood education" OR "early years setting*") AND ("teaching practice*" OR "classroom practice*" OR "teaching strateg*" OR "instructional strateg*" OR intervention* OR implement* OR program* OR "classroom-based")) AND PUBYEAR > 2019 AND PUBYEAR < 2026.

Adjustments to the Scopus query were made to rephrase it as a WoS query, without changing the predefined four keyword categories. The same Boolean operators (AND, OR) were applied. The resulting WoS query was as follows:

TS=((plurilingual* OR multilingual* OR bilingual* OR "emergent bilingual*" OR "dual language" OR "two-way immersion" OR translanguag* OR "code-switch*" OR "language mixing") AND (preschool* OR pre-school* OR kindergarten* OR nursery OR "pre-primary" OR ECEC OR "early primary" OR "first grade" OR "grade 1" OR "reception class") AND (classroom* OR school* OR "early childhood education" OR "early years setting*") AND ("teaching practice*" OR "classroom practice*" OR "teaching strateg*" OR "instructional strateg*" OR intervention* OR implement* OR program* OR "classroom-based")) AND PY= (2020-2025)

In both databases, the search was limited to peer-reviewed journal articles published between 2020 and 2025, available in English or French, and reporting research conducted within Europe. Only articles with accessible full text were included. A total of 124 results - 68 papers from Scopus and 56 papers from WoS - matched the search criteria from both databases.

3.3. Inclusion and exclusion criteria

This literature review included articles that met the following criteria (Table 1):

Table 1 Inclusion and exclusion criteria.

Inclusion criteria	Exclusion criteria
1. **Timeframe:** Published between 2020 and 2025.	Published before 2019 or after December 2025.
2. **Publication type:** Peer reviewed publications.	Non-peer reviewed publications.
3. **Language:** English or French.	Not in English or French.
4. **Population:** Learners aged ≤ 7 years (or mixed ages only if ≤7 results are clearly extractable).	Focus on pupils > 7 years old with no extractable ≤7 subgroup.
5. **Context**: Implemented in ECEC and/or early primary educational settings (including school-linked provision).	Home- or clinic-based interventions where the core activity is implemented outside the educational setting (even if participants are recruited via schools/ECEC or assessed in school), i.e., without in-class enactment of the practice.
6. **Multilingual focus:** Participants are multilingual/bi(pluri)lingual children and/or the setting/programme aims to support multilingual education.	Monolingual-only focus with no multilingual population/programme/aim.
7. **Concept ("good practice"):** Study examines an implemented educational practice/intervention/programme supporting multilingualism, described in enough detail to extract at least aim + what was done + who delivered it + setting (ideally also duration/frequency/materials)	Pedagogical proposals, didactic models, policies, policies' assessments without empirical evaluation of implemented practice.
8. **Evidence type:** Empirical study (qualitative, quantitative, or mixed-methods) reporting outcomes or implementation evidence related to children (learning, engagement, participation, feasibility, etc.).	Purely theoretical/commentary pieces with no empirical data; plus studies primarily about teachers/future teachers' perspectives, evaluations, strategies, professional development programmes (without child-focused practice/outcomes)
9. **Participant focus:** Child-focused (parents/teachers may be included only if linked to implemented practice and child-related evidence).	Studies focused on parents/families' opinions/perspectives without child-focused practice/outcomes.

3.4. Studies selection

The combination of search syntax yielded a total of 124 articles (see Figure 1). The databases search was conducted in January 2026, with the final search completed on January 29, 2026. After removing 44 duplicate articles, 80 articles remained for screening based on the inclusion criteria (see Table 1).

3.4.1. Screening for inclusion

To enhance methodological rigor, eliminate bias, and ensure consistency and clarity, multiple authors screened the titles and abstracts of 80 papers (Christou et al., 2024; Peters et al., 2020). In line with the

approach outlined by Christou et al. (2025), two researchers independently conducted the initial screening of all titles and abstracts (the first and second authors of this study), while a third researcher (the third author of this paper) reviewed 20% of the dataset (16 papers). Any concerns regarding the eligibility of the papers for inclusion were addressed through discussions among all authors, considering the research questions posed in this review. During this phase, 18 records were excluded as 6 of them did not take place in a European country, 7 were review studies and 5 studies were found to be irrelevant to the objectives of this scope review. From the 62 remaining studies that were evaluated for eligibility, 2 more studies have been excluded due to a lack of full-text access. The full texts from the remaining 60 studies were retrieved for quality and eligibility assessment, although the quality evaluation is not mandatory in a scoping review (Kazi et al., 2021).

3.4.2. Full-text eligibility assessment

During this phase, the three authors went through the 60 full-text articles to further evaluate the eligibility of the identified literature, considering the inclusion and exclusion criteria (see Table 1). These criteria, along with the study's research questions and objectives, guided the researchers in making final decisions during the inclusion phase. Following the approach outlined by Christou et al. (2025), the two authors conducted their assessments independently, while the third author reviewed 20% (n = 12) of the assessments. Any concerns regarding the eligibility of the papers for inclusion were addressed through discussions among all authors, considering the inclusion and exclusion criteria of this review. In this phase, 45 additional papers were excluded as they did not meet the inclusion criteria.

3.4.3. Data charting, coding, and synthesis

A total of 15 papers met the inclusion criteria for this review (Additional file 1). To address RQ1 and RQ2, we employed an iterative, directed content analysis approach to chart and categorise information from the included studies. This process was guided by the review questions, previous literature on content analysis (Vaismoradi et al., 2016; Neuendorf, 2017), as well as established practices in recent scoping reviews on second language (L2) learning (e.g., Zheng et al., 2021; Chan et al., 2022; Aydin & Tekin, 2023; Chong & Reinders, 2025; Veerman et al., 2026). Following the approach of Christou et al. (2025), the researchers independently charted data from a randomly selected 10% of the dataset (n = 2) for cross-checking purposes to reduce bias and enhance consistency. After comparing the extracted data and discussing any discrepancies, consensus was reached on the interpretation and application of the charting categories. The remaining studies were then charted using the agreed framework. A shared Microsoft Excel spreadsheet was used to record and organise the extracted data. The charting categories were designed to address the review questions and included only data that corresponded to predefined categories.

Table 2 Coding categories of research questions.

Research Questions	Coding Categories
RQ 1. What are the theories, pedagogical approaches used in the reported studies and in which competences they are targeting?	· Theory/theoretical framework · Pedagogical approach · Targeted competence domain
RQ 2. What types of multilingual education practices for young learners aged 3 to 7 are described and what are their main characteristics?	· Practice type · Grouping format · Duration · Frequency · Session length
RQ 3. What benefits and challenges of these practices are reported in the included studies?	· Benefits · Challenges

For RQ3, the extracted data relating to reported benefits and challenges, were analyzed separately using inductive (bottom-up) thematic analysis. This analysis followed Proudfoot's (2023) framework, which builds upon the work by Braun and Clarke (2006) and Nowell et al. (2017). The final six-phase approach included: (1) familiarization with data; (2) generation of initial codes; (3) searching for themes; (4) reviewing themes; (5) defining themes; (6) final analysis. Coding and theme development were conducted using the shared Excel charting file.

Following the PRISMA 2020 Statement (Page et al., 2021) and other scholarly recommendations (Peters et al., 2015; Tricco et al., 2016), we included the following study characteristics, which were considered as essential for this scoping review, regardless of the research questions: publication characteristics (author(s), year of publication, country), participant characteristics (education level, children's age, children's languages, number of participating children per study), and study design (qualitative, quantitative, mixed methods). This spreadsheet was shared among the researchers. Table 2 presents the coding categories selected for this review, along with their relevance the three research questions.

4. Results

4.1. Synthesis of selected articles

The literature review synthesized the characteristics of 15 selected studies according to the following areas: publication characteristics (author(s), year of publication, country), participant characteristics (education level, children's age, children's languages number of participating children per study), and study design (qualitative, quantitative, mixed methods). Of the 15 included studies, an equal number were published in 2023 (n = 4) and in 2025 (n = 4). The remaining seven studies were published in 2021 (n = 3), 2022 (n = 1), and 2024 (n = 3). Most studies originated from Sweden (n = 3). The others were conducted in a variety of countries: Germany (n = 2), Luxembourg (n = 2), and one study each from France, Slovenia, Spain, Italy, Switzerland, Netherlands, Denmark, Greece.

Regarding participants' characteristics, most studies focused on preschool and kindergarten aged children (approximately 3-6, n = 9), followed by studies on primary school children (6-7 years, n = 3). Fewer studies involved children in ECEC or day care settings (2-4 years, n = 2). One study did not report participants' age.

Children's linguistic profiles were highly diverse; however, all studies were conducted in bilingual or multilingual contexts that combined home, heritage, societal, and school languages. The number of participants varied widely, ranging from small-scale qualitative studies with 3-5 children to large-scale quantitative studies including up to 584 participants. Approximately half of the studies employed quantitative methodologies (46.7%, n = 7), 40.0% used qualitative approaches (n = 6), and 13.3% used mixed methods (n = 2) (Table A1 in Additional file 1).

4.2. Findings for Research Question 1: What are the theories, pedagogical approaches used in the reported studies and in which competences they are targeting?

The reviewed studies drew from a range of theoretical frameworks and pedagogical approaches to inform their research. For clarity and synthesis and drawing on previous research (Candelier et al., 2012; Rohde, 2015; Coelho & Ortega, 2020; García & Kleifgen, 2020; García & Otheguy, 2020; Hemmi & Banegas, 2021, Goldfeld et al., 2022; Oshchepkova et al., 2023; Mason et al., 2026), each theory or pedagogical approach was classified into six broader thematic categories according to the primary theoretical or pedagogical orientation of each study.

Based on this categorisation, the most frequently referenced categories were **translanguaging / plurilingual approaches** (n = 4) (Becker & Knoll, 2022; Geiger-Jaillet & Schlemminger, 2023; Laursen & Daugaard, 2025; Lundberg et al., 2023) and **oral-language / literacy intervention approaches** (n = 4) (Engel de Abreu et al., 2025; Lilja et al., 2025; Sundström et al., 2024; Voltmer et al., 2021). These were followed **by pluralistic / language-awareness approaches** (n = 2) (Gkaintartzi & Katsara, 2024; Žefran, Bratož & Rutar; 2025***) bilingual education / CLIL / exposure-based approaches*** (n = 2) (Uhl, Steinlen & Piske, 2023; Verhagen et al.. 2024), and **literacy / emergent-literacy approaches** (n = 2) (Incognito et al., 2021; Rendón-Romero, Navarro-Pablo & García-Jiménez. 2021). One study was primarily framed by **home-ECEC collaboration approaches**, highlighting literacy learning through cooperation between educators and families (Kirsch & Bergeron-Morin (2023). Overall, the review suggests that research on

multilingual education for young learners is theoretically heterogenous, combining multiple pedagogical approaches.

In terms of the targeted competences, five broader categories were identified based on established research to capture the range of competences addressed in the reviewed studies (Candelier et al., 2012; Council of Europe, 2020; Hadley et al., 2022; Hadley et al, 2023; National Early Literacy Panel, 2008; Schwartz, 2025; Zhang & Zhou, 2019). The selected domains on **oral language**, **literacy / emergent literacy, metalinguistic / plurilingual awareness, intercultural awareness / attitudes**, and **participation / identity / agency** encompass linguistically oriented outcomes, broader educational dimensions, as well as students' participation and agency in multilingual learning contexts. This categorization was necessary because the reviewed studies addressed a continuum ranging form vocabulary, grammar and narrative development to multilingual awareness, identity formation and inclusive participation. Table 4 presents the theories, pedagogical approaches, and targeted competence domains used in each study, along with the broader categorization (Table A2 in Additional file 1).

4.3. Findings for Research Question 2: What types of multilingual education practices for young learners aged 3 to 7 are described in the reviewed studies?

Findings (Table A3 in Additional file 1) present a broad repertoire of multilingual education practices for pupils aged 3 to 7, combining language, literacy, interaction, play, and multimodal engagement in different ways. Because several studies reported more than one practice type, the frequencies described below are not mutually exclusive.

The most frequently reported practice types included storytelling or narrative work, play or game-based tasks, language comparison activities, and multimodal or multisensory translanguaging interaction or activities (each n = 6). Shared reading and translanguaging interaction or activities were each reported in four studies (each n = 4), while songs, rhymes, chants and CLIL or bilingual program activities appeared in three studies (n = 3). Those were followed by phonics or literacy instruction, vocabulary intervention dialogic reading, and arts, movement or drama practices that were each reported in two studies (n = 2). Practices such as narrative intervention, parent-supported or joint literacy activity, CLIL-type thematic activities, and teacher-mediated language support each appeared in one study and mainly in studies focused on early childhood classrooms (Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025) or multilingual settings in primary schools (Uhl, Steinlen & Piske , 2023). These practices were often combined with oral interaction, books, games, songs, movement, and visual or material support. Shared reading and storytelling practices were mostly reported by studies on multilingual literacy and narrative interaction (Geiger-Jaillet & Schlemminger, 2023; Incognito et al., 2021; Kirsch & Bergeron-Morin, 2023; Laursen & Daugaard, 2025; Lilja et al., 2025; Sundström et al, 2024; Voltmer et al., 2021; Žefran, Bratož & Rutar, 2025). In contrast, translanguaging activities were mainly reported in studies examining flexible classrooms language use and children's multilingual meaning-making (Becker & Knoll, 2022; Geiger-Jaillet & Schlemminger, 2023; Lundberg et al., 2023).

The grouping format of the reviewed studies depended on the aims of practice and the structure of program. Small-group arrangements were reported in studies (n = 5) that required closer interaction, targeted support or more focused participation, i.e. vocabulary, heritage-language, narrative programs and multilingual making-meaning activities (Engel de Abreu et al., 2025; Geiger-Jaillet & Schlemminger, 2023; Laursen & Daugaard, 2025; Lilja et al., 2025; Sundström et al., 2024). Whole-class arrangements were most common in studies (n = 5) that described classroom-based multilingual activities and CLIL or bilingual settings (Gkaintartzi & Katsara, 2024; Rendón-Romero, Navarro-Pablo & García-Jiménez, 2021; Uhl, Steinlen & Piske, 2023; Verhagen et al., 2024; Žefran, Bratož & Rutar, 2025). A combination of whole-class and small group arrangements was reported in studies (n = 4) characterized as multi-component and interaction-rich that were ongoing or embedded in routines i.e. translanguaging activities, literacy or storytelling, shared or dialogic reading, play, arts or drama (Becker & Knoll, 2022; Kirsch & Bergeron-Morin, 2023; Lundberg et al., 2023; Voltmer et al., 2021). The only study to combine whole-class, small groups and individual arrangements is that of Incognito et al. (2021), which implemented a more structured format through a formally designed PASSI intervention with clearly defined conditions.

No single dominant pattern was observed in terms of duration, frequency and intensity. Instead, the reviewed studies varied considerably, ranging from one-off activities to longer-term program models, depending on each study's aim and design.

To facilitate the analysis, the reviewed studies were classified according to Veerman et al.'s (2026) framework of multilingual pedagogies, which suggests four categories : translanguaging-based, affirming, scaffolding, and cross-linguistic. Veerman et al. (2026) note, however, that these categories may overlap and should not be considered as mutually exclusive. In light of this, a two-step categorization was applied to identify the dominant pedagogical orientation and to capture relevant dimensions of the reviewed studies. In the primary categorization, scaffolding was identified as the most frequent category (n = 8), followed by affirming (n = 3), translanguaging-based (n =2), and cross-linguistic practices (n = 2). In the secondary categorization, affirming practices were the most prevalent (n = 4), while translanguaging-based and cross-linguistic practices each appeared twice as secondary categories.

Overall, the emerge of the scaffolding practices in the primary categorization, indicates that the selected practices in the reviewed studies aimed to "support individual students' learning through tools and strategies that involve a language which students are familiar with, whether that are physical learning materials or support-based approaches to instruction" (Veerman et al., 2026, p.8). On the other hand, the secondary categorization highlights that the reported practices "consist of actively demonstrating that students' linguistic and cultural identities matter and are valued within the school context" (Veerman et al., 2026, p.7).

4.4. Findings for the Research Question 3: What benefits and challenges of these practices are reported in the included studies?

The reported benefits and challenges across the 15 included studies in this scoping review were organized into four main patterns using inductive (bottom-up) thematic analysis (Table A4 in Additional file 1). Regarding the benefits domain, the most frequently observed pattern was language/literacy gains (n = 5). This pattern encompassed improvements in vocabulary, phonological awareness, notational knowledge, sentence-level processing, and early reading-related skills (Incognito et al., 2021; Rendón-Romero, Navarro-Pablo & García-Jiménez, 2021; Sundström et al., 2024; Uhl, Steinlen & Piske, 2023; Voltmer et al., 2021). Awareness/attitudinal gains (n = 4) were the second most prominent pattern. In this pattern, studies were included that reported increased language awareness, curiosity about languages, openness to linguistic diversity and positive attitudes toward multilingualism (Becker & Knoll, 2022; Gkaintartzi & Katsara, 2024; Laursen & Daugaard, 2025; Žefran, Bratož & Rutar, 2025). The third pattern, engagement and inclusion gains (n = 4), comprised studies that highlighted multilingual or translanguaging-oriented practices that supported participation, agency, confidence, identity, and inclusion in classroom interaction (Geiger-Jaillet & Schlemminger, 2023; Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025; Lundberg et al., 2023). The final pattern that was identified in the benefits domain was additive bilingualism/cross-linguistic transfer. This fourth pattern included two studies (n = 2) that reported gains to additional or heritage language development without negative effects on the majority or school language (Engel de Abreu et al., 2025; Verhagen et al., 2024). Altogether, these patterns indicate that the reported benefits extended beyond linguistic attainment to include affective, participatory, and identity-related dimensions.

The challenges identified in the reviewed studies varied widely, yet recurring patterns emerged. The most frequently reported challenge was limited or uneven effects (n = 5), followed by difficulties related to implementation or feasibility (n = 3). Studies addressing the first theme indicated that observed gains were restricted to specific outcomes rather than occurring across all measured domains (Engel de Abreu et al., 2025; Incognito et al., 2021; Sundström et al., 2024; Uhl, Steinlen & Piske, 2023; Voltmer et al., 2021). In contrast, studies within the second theme reported variation in parent involvement, a decline in fidelity over time, and challenges in maintaining consistent multilingual practices during classroom interaction (Geiger-Jaillet & Schlemminger , 2023; Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025). Other studies (n = 2) highlighted challenges related to monolingual ideology or limited home-language inclusion (Becker & Knoll, 2022; Lundberg et al., 2023), while two further studies (n = 2) reported structural or contextual constraints (Gkaintartzi & Katsara, 2024; Žefran, Bratož & Rutar, 2025). In the former (monolingual ideology or limited home-language inclusion), the main challenge was that, despite a general appreciation for multilingualism, heritage or home languages were only partially integrated in practice. In the latter (structural or contextual constraints), challenges included unfamiliar scripts, the broader invisibility of multilingualism, or reliance on participant perceptions. In three studies, challenges were minimally reported, with greater emphasis on affordances than barriers (Laursen & Daugaard, 2025; Rendón-Romero, Navarro-Pablo & García-Jiménez, 2021; Verhagen et al., 2024). Overall, the findings suggest that the reviewed practices were more consistently linked to positive outcomes than to significant drawbacks. Nevertheless, the conditions of implementation and the persistence of monolingual norms remained important limiting factors.

In terms of reporting level, most studies reported benefits and challenges primarily at the pupil-outcomes level (n = 10), especially in intervention research. However, many studies also identified mixed outcomes across multiple levels, including classroom or pedagogical practice, educator implementation, or child-teacher-parent interaction. These findings suggest that the reviewed practices were perceived not only as interventions producing measurable pupil gains but also as socially and pedagogically situated processes.

5. Discussion

This scoping review identified 15 empirical studies to evaluate the volume and scope of empirical evidence and to present best practices in multilingual education for pupils aged 3-7 years. The following paragraphs discuss the findings of this review in relation to the three main research questions.

5.1. Research Question 1: Theories, pedagogical practices and targeted competences

As previously discussed by Bonacina-Pugh & Hélot (2023), multilingual education is a multifaceted and complex phenomenon with ideological and political implications, shaped by numerous language education policies that involve multiple layers and policy agents. This complexity and heterogeneity are evident in the findings of this review's first research question, which examines the theories and pedagogical practices implemented in European school settings and the competences they aim to develop. The analysis revealed that multilingual education for this age group is an active but highly heterogeneous field.

Theories and pedagogical approaches of the reviews studies were classified into six broader thematic categories according to their primary theoretical or pedagogical orientation, building on previous research (Candelier et al., 2012; Rohde, 2015; Coelho & Ortega, 2020; García & Kleifgen, 2020; García & Otheguy, 2020; Hemmi & Banegas, 2021; Goldfeld et al., 2022; Oshchepkova et al., 2023; Mason et al., 2026). This categorization revealed two broad tendencies: translanguaging and plurilingual approaches, as well as oral language and literacy intervention approaches. The following discussion first addresses translanguaging and plurilingual approaches, then examines oral language and literacy intervention approaches.

Translanguaging and plurilingual approaches, identified in four studies, are mainly conceptualized as pedagogies of inclusion, recognition, and meaning-making. Translanguaging is regarded as an effective pedagogy that values pupils' multilingual resources and challenges language hierarchies and ideologies by focusing on pluralistic learning experiences (Becker and Knoll, 2022). As a classroom practice, translanguaging supports the languages present in learners' plurilingual repertoires (Geiger-Jaillet & Schlemminger, 2023). When integrated with other frameworks, such as Bernstein's (2000), it conceptualizes language as social practice and explores how educators can create educational opportunities for pupils (Lundberg et al., 2023).

Indirect implementation of translanguaging, together with plurilingual approaches, helps pupils explore different languages without requiring mastery, thereby promoting curiosity, awareness, respect, and openness towards linguistic diversity (Laursen & Daugaard, 2025). Therefore, language learning should cover not only grammar and vocabulary, but also written signs, sounds and words that possess symbolic, aesthetic and personal meaning, and engage pupils through desire, imagination, identity and emotional response (Laursen & Daugaard, 2025).

Within the reviewed studies, translanguaging and plurilingual approaches are primarily conceptualized as pedagogical strategies for inclusion, recognition, and meaning-making. Thus, these approaches go beyond developing literacy skills to support broader socio-educational and metalinguistics dimensions, such as pupils' participation, identity and plurilingual awareness.

An equivalent number of studies (n = 4) examined oral-language and literacy intervention approaches. This category includes research on heritage language interventions for Dual Language Learners (DLL) with a migration background (Engel de Abreu et al., 2025), as well as direct interventions that employ explicit or implicit instruction (Lilja et al., 2025). Included in this group, are school-based vocabulary group interventions for multilingual pupils at increased risk of speech, language and communication needs (SLCN) (Sundström et al., 2024), and interventions designed to train early childhood education teachers in language support strategies (LSS) (Voltmer et al., 2021). In contrast to translanguaging and plurilingual approaches these, studies tented to focus on defined linguistic outcomes, such as oral language, phonemic awareness, vocabulary development, narrative skills, and early-literacy competences. Furthermore, these studies were generally more outcome-oriented and often evaluated the effectiveness of specific interventions or instructional models (Voltmer et al., 2021; Engel de Abreu et al., 2025). Their contribution is significant, as they provide more direct evidence of how structured support can enhance pupils' oral language and literacy development (Egert et al., 2021).

Two of the remaining studies were classified as employing pluralistic and language awareness approaches. In these studies, researchers aimed to foster language and intercultural awareness, as well as positive attitudes towards languages and cultures (Gkaintartzi & Katsara, 2024), or to integrate pluralistic approaches to language learning in early childhood education (Žefran, Bratož & Rutar, 2025). These approaches prioritize optimizing relationships between languages and cultures to develop authentic plurilingual competence (Coelho & Ortega, 2020). Thus, they expose pupils to multiple languages and cultures, encourage cross-linguistic comparison, promote curiosity, openness, and respect for linguistic diversity, rather than focusing on immediate proficiency development in a specific target language (Coelho & Ortega, 2020).

Furthermore, the categories of bilingual education, CLIL and exposure-based approaches were each represented by two studies in this scoping review. Uhl, Steinlen and Piske (2023) examined the influence of child-internal factors, such as language aptitude, motivation and individual cognitive abilities, alongside child-external factors, including the quality and quantity of L2 on instructed second language acquisition. Verhagen et al. (2024) examined the effects of bilingual exposure in ECEC settings on

vocabulary development in a linguistically diverse sample of pupils, considering the amount of exposure to two languages received at home. The primary focus of these two studies was to determine whether increased or structured exposure to another language supports language growth, and whether this occurs without negatively impacting proficiency in the majority school language. Consequently, these approaches tented to adopt an input- or exposure-based perspective on multilingual development, targeting mainly vocabulary, grammar or broader oral language development in L2 or non-majority language.

Of the remaining three studies, two were classified under literacy and emergent approaches. One study examined the efficacy of two different school-based interventions on notational knowledge of bilingual language-minority (BLM) preschoolers and their monolingual peers, controlling for linguistic background and socio- economic status (Incognito et al., 2021). The other study evaluated the suitability of phonics for developing literacy skills in two languages (Rendón-Romero, Navarro-Pablo & García-Jiménez. 2021). These studies are closely linked to early reading and writing, primarily addressing code-related and early literacy skills, such as phonological awareness, notational knowledge, decoding, letter-sound knowledge, and early reading-related abilities. While they devote less attention to pupils' multilingual identities, home practices, or intercultural dimensions, their value lies in addressing foundational literacy skills essential for the acquisition of emergent literacy skills in two languages and for later academic success (Rendón-Romero, Navarro-Pablo & García-Jiménez. 2021). Additionally, these studies assess whether bilingualism and monolingualism are associated with differences in emergent literacy, a critical set of abilities that are developmental precursors to reading and writing (Incognito et al., 2021).

The final study was categorized as home-ECEC collaboration and examined interactions between the educators and 3-year-old children, as well as among educators, parents, and children when the parents occasionally read books in the centres (Kirsch & Bergeron-Morin, 2023). This approach integrates language development, literacy, inclusion, and parental participation through shared reading practices and dialogic reading. By involving families and home languages, this category emphasizes on the social conditions that support multilingual practices and shows that collaboration between homes and ECECs can contribute to the development of pupils' language skills (Kirsch & Bergeron-Morin, 2023).

In summary, oral-language and literacy interventions, bilingual education, CLIL models, and emergent literacy approaches are best characterized as outcome-oriented, as they primarily target specific linguistic or literacy skills. In contrast, translanguaging and plurilingual approaches, pluralistic and language-awareness approaches, and home-ECEC collaboration are more accurately described as broader socio-pedagogical approaches, given their strong connections to awareness, participation, identity, inclusion, and intercultural openness. Nevertheless, these categories should not be regarded as entirely distinct, as several studies have combined linguistic, metalinguistic, affective and participatory aims. This evidence suggests that multilingual pedagogy in early education should be conceptualized as multidimensional.

5.2. Research Question 2: Types of multilingual education practices

The second aim of this scoping review was to identify and document the various types of multilingual education practices implemented for pupils aged 3-7. The practices identified in the findings of RQ2, when considered alongside the findings of RQ 1, represent the practical enactment of the theoretical and pedagogical orientations mapped in RQ1. These practices reflect varying conceptualizations of the intended purpose of multilingual education for young pupils. According to Veerman et al.'s (2026) categorization, these practices can be interpreted not only by content or competence domains but also in terms of their pedagogical function. Based on this perspective, the discussion of the RQ2 will be analyzed alongside the findings of QR1. At the conclusion of the discussion, the RQ2 findings will be interpreted using Veerman et al.'s (2026) categorization to determine how the reported practices in the reviewed studies functioned as scaffolding learning, affirming pupil's linguistic identities, encouraging the use of linguistic repertoires, or developing cross-linguistic awareness.

A key pattern identified is the central role of storytelling, narrative work, shared or dialogic reading. These practices are present in nearly all pedagogical approaches outlined in RQ1, except for Bilingual education, CLIL, and exposure based approaches. In oral-language and literacy intervention studies, these activities are primarily implemented mainly in small groups (Lilja et al., 2025; Sundström et al., 2024), with only one study utilizing both whole-group and small-group formats (Voltmer et al., 2021). The main objectives of those studies were to develop vocabulary skills and support language learning and development for multilingual pupils, including those with or without Speech, Language and Communication Needs (SLCN). Similar practices are observed in other clusters of pedagogical approaches identified in RQ1, such as in translanguaging and plurilingual approaches, which aim to foster metalinguistic or plurilingual awareness and facilitate multilingual meaning making in a more flexible way (Geiger-Jaillet & Schlemminger, 2023; Laursen & Daugaard, 2025) (Table A5 in Additional file 1).

Practices including play, games, songs, rhymes, movement, drama, and multisensory activities are frequently reported in nearly all reviewed studies and across most pedagogical approaches clusters identified in RQ1, with the exception of Bilingual education, CLIL, and exposure based approaches. These practices are mainly implemented in studies involving pupils aged 3-7, where learning is conceptualized as embodied, interactive and affectively engaging. The aim is to introduce language through playful, multimodal, sensory and meaningful activity structures. For example, Žefran et al. (2025) conducted a 10-month program using a whole-class format that incorporated a range of these activities to operationalize pluralistic or language awareness approaches to language learning. Similarly, Lundberg et al. (2023), drawing on translanguaging plurilingual approaches, aimed to "investigate how preschool educators navigate linguistic diversity in pedagogic practice and how the practice creates space for children's multilingual language" (p. 257). These practices are also employed to support literacy and emergent literacy approaches, as demonstrated by Incognito et al. (2021), utilized them on a 30 week-long program to improve the notational knowledge and the phonological skills among language-minority children (Table A6 in Additional file 1).

A final pattern of practices identified was language comparison and multimodal activities, documented in five studies. These practices, informed by pluralistic, language-awareness, and translanguaging plurilingual approaches, were mainly implemented to facilitate pupils' exploration of multiple languages, writing systems, sounds, and words (Gkaintartzi & Katsara, 2024). Other implementation included comparing written signs and discussing language forms through metalanguage (Laursen & Daugaard, 2025), as well as noticing and comparing languages and cultures (Žefran et al., 2025). The overarching aim of these studies was to develop curiosity about unfamiliar languages, enhance language awareness, promote intercultural openness, and cultivate positive attitudes toward linguistic diversity, which are central principles of the referenced approaches (Rantanen, 2024). At the same time, these practices were not only limited to awareness-oriented approaches. For instance, Engel de Abreu et al. (2025) and Rendón-Romero et al. (2021), utilized these practices as scaffolding tools for vocabulary development, phonological awareness, biliteracy transfer, letter-sound knowledge and early literacy. The findings indicate that, in the first study, language comparison supports both metalinguistic and plurilingual awareness, while in the second study, phonics activities facilitate cross-language transfer between literacy systems. Overall, the practices described in these studies can engage pupils aged 3-7 with linguistic diversity, even before they develop advanced literacy or high proficiency in an additional language (Table A7 in Additional file 1).

The grouping format identified in RQ2 further reflect the pedagogical orientations outlined in RQ1 and also consider the specific competences targeted by researchers. For example, small group formats were mainly reported in studies focused on oral language or literacy interventions, as well as translanguaging or plurilingual approaches (Engel de Abreu et al. (2025); Geiger-Jaillet & Schlemminger, 2023); Laursen & Daugaard, 2025; Lilja et al., 2025; Sundström et al., 2024). These studies emphasized close adult-child interaction and targeted competence domains such as oral-language, vocabulary, narrative, heritage language, and meaning making practices. In contrast, whole-class formats were commonly employed in CLIL, bilingual education, exposure-based and literacy or emergent literacy approaches (Rendón-Romero et al., 2021; Uhl et al., 2023; Verhagen et al., 2024), which mainly targeted competences such as literacy, emergent literacy, and oral language. Additionally, depending on the practices implemented and competences targeted, whole-class formats were also reported in studies adopting pluralistic or language awareness approaches (Gkaintartzi & Katsara, 2024; Žefran et al., 2025). In these studies, researchers utilized practices such as language comparison, multimodal or multisensory activities, and songs, rhymes or chants to foster metalinguistic or plurilingual awarenessm as well as intercultural awareness and attitudes. Studies that combine whole-class and small-group formats are evident in interaction-rich and routine-embedded practices, such as translanguaging interaction, shared or dialog reading, narrative work, play activities (Becker & Knoll, 2022; Kirsch & Bergeron-Morin, 2023, Lundberg et al., 2023; Voltmer et al., 2021) (Table A8 in Additional file 1).

Analysis of the RQ2 findings using Veerman et al.'s (2026) categorization indicates that scaffolding was the most frequently observed primary orientation in the dataset. This outcome aligns with expectations, given pupils' age group and the targeted competences' domains. It would noted, however, that the below

referenced categories are not mutual excluded, thus some of the revised studies may appear in more that one categories.

Scaffolding appears to be the post prominent pedagogy for supporting young multilingual learners' linguistic and learning needs (Veerman et al., 2026). The most evident and frequent strategy was scaffolding through learning materials (Veerman et al., 2026), as demonstrated in studies that facilitated language and literacy learning with concrete, visual, multimodal, or structured resources. Practices such as language comparison activities, vocabulary intervention, storytelling or narrative work, play-based activities, shared or dialogic reading, as well as multimodal or multisensory activities that were identified in several studies (Engel de Abreu et al., 2025; Incognito et al., 2021; Lilja et al.. 2025; Rendón-Romero et al.,2021; Sundström et al., 2024; Uhl et al., 2023; Verhagen et al., 2024; Voltmer et al., 2021). Another scaffolding strategy identified was paired or biliteracy scaffolding, defined as "the use of supports for the simultaneous development of both the language of schooling and students' home languages" (Veerman et al., 2026, p. 8). This approach appeared more selectively in the reviewed studies (Engel de Abreu et al., 2025; Kirsch & Bergeron-Morin, 2023). The final type, emotional scaffolding, is provided by class teachers or class assistants and supports pupils in recognizing their emotions, particularly anxiety that may arise in multilingual classroom settings. This support enables participation in classroom activities and achievement in learning goals (Veerman et al., 2026, p. 8). Examples of emotional scaffolding were observed in studies that implemented playful activities or acknowledged pupils' home practices (Gkaintartzi and Katsara, 2024; Laursen and Daugaard, 2025; Lundberg et al., 2023; Voltmer et al., 2021; Žefran et al.,2025).

Affirming practices that "consist of actively demonstrating that students' linguistic and cultural identities matter and are valued within the school context" (Veerman et al., 2026, p.7), including welcoming, acknowledging and celebrating pupils' diverse linguistic identities, were identified. These practices were primarily evident in studies focusing on home-ECEC collaboration (Kirsch & Bergon-Morin, 2023), research discussing the advantages of supporting and promoting pupils' heritage language without hindering school language acquisition (Engel de Abreu et al., 2025), and studies employing multilingual and multicultural activities to expose pupils to various languages and foster curiosity, inclusion and positive attitudes towards linguistic diversity (Gkaintartzi & Katsara, 2024; Žefran et al., 2025).

Another category identified in this data set is cross-linguistic practices, which, according to Veerman et al. (2026, p. 9), "aim to develop students' language awareness using multiple languages, by thinking about form-related aspects of language". Based on this definition, three of the reviewed studies are classified within this category, either as a primary or secondary focus. However, given the pupils' age group, it is not possible to discuss cross-linguistic practices precisely as described by Veerman et al (2026). Instead, these practices are better characterized as those that encourage pupils to notice similarities and differences, to play with sounds, compare words, explore writing systems, respond to written signs, sing songs in different languages, or discuss how the same concept appears across languages. Such practices were evident in studies by Gkaintartzi and Katsara (2024), Laursen and Daugaard (2025), Rendón-Romero et al. (2021), and Žefran et al. (2025), all of which position pupils as

active language observers, rather that passive recipients of language instruction (Gkaintartzi & Katsara, 2024).

Translanguaging-based practices were present in the dataset, though less frequently. Notably, in contrast to Veerman et al. (2026), who define translanguaging practices as the careful and deliberate planning of language use by teachers for each activity, the studies reviewed here often described translanguaging as an interactional or participatory practice rather that a fully planned pedagogical model. For example, translanguaging practices such as storytelling, book sharing, home-language materials, or peer talk, were found to create space for pupils' linguistic agency and demonstrated how young children's linguistic repertoires can serve as resources for meaning-making, participation, and identity expression (Geiger-Jaillet & Schlemminger, 2023; Kirsch & Bergeron-Morin, 2023; Laursen and Daugaard, 2025; Lundberg et al., 2023). Two studies indicated that translanguaging practices were challenging to implement systematically. For instance, although translanguaging was included in teacher training, it was not strongly evident in the classroom (Lilja et al., 2025), In other cases, institutional language policies marginalized pupils' heritage languages (Becker and Knoll, 2022). These finding highlight the need for intentional teacher practice, institutional support, and a willingness to value all languages (Becker and Knoll, 2022; Lilja et al., 2025).

In summary, the discussion for RQ2 builds upon the findings of RQ1 by illustarting how broad pedagogical approaches are implemented as specific classroom practices. The reviewed studies indicate that the same practice often served several purposes. For instance, shared reading could support vocabulary, narrative competence, and home-language inclusion. Similarly, play, songs, and multimodal activities facilitate participation and foster positive attitudes towards linguistic diversity. Additionally, Veerman et al.'s (2026) categorization provides a valuable framework was useful for interpreting these practices through established categories such as scaffolding, cross-linguistic, translanguaging, and affirming practices. Therefore, effective language pedagogy in early education requires not only exposure to multiple languages but also the promotion of social justice and equity by creating environments that represent diverse languages, enabling pupils to notice, compare use and value languages through structures support and meaningful interaction (Rantanen, 2024).

5.3. Research Question 3: Benefits and challenges of these practices reported in the included studies?

The benefits identified in the reviewed studies, when considered alongside the findings of RQ1 and RQ2, indicate that multilingual education practices function as language-learning activities, literacy-support strategies, language-awareness practices, and socially inclusive pedagogical spaces (Becker & Knoll, 2022; Geiger-Jaillet & Schlemminger, 2023; Kirsch & Bergeron-Morin, 2023; Lundberg et al., 2023). Therefore, the value of multilingual education for young learners should be assessed in terms of both measurable linguistic outcomes and children's participation, identity, agency, engagement, and attitudes towards linguistic diversity (Coelho & Ortega, 2020; Piccardo & North, 2020; Rantanen, 2024) (Table A8 in Additional file 1).

To clarify the categories of benefits, this section first examines linguistic development outcomes, specifically language and literacy, additive bilingualism, and cross-linguistic transfer, which are the most frequently identified. Studies on language and literacy have investigated structured literacy, phonics, vocabulary, CLIL-related grammar development, and teacher-mediated language support practices. Reported benefits are typically domain-specific, including notational knowledge (Incognito et al., 2021), improved phonological awareness and early reading-related skills (Rendón-Romero et al., 2021), vocabulary (Sundström et al., 2024), grammar development (Uhl et al., 2023), and enhanced sentence-level language processing (Voltmer et al., 2021). When considered alongside the findings of RQ1 and RQ2, these results indicate that structured and scaffolded multilingual practices can facilitate young learners' language and literacy development, provided they are aligned with clearly defined competence domains (Veerman et al., 2026). However, these effects depend on the specific competence domains, the amount and quality of exposure, and the conditions under which practices are implemented (Incognito et al., 2021; Rendón-Romero et al., 2021; Sundström et al., 2024; Uhl et al., 2023; Voltmer et al., 2021) (Table A9 in Additional file 1).

The second category of linguistic development outcomes, namely additive bilingualism and cross-linguistic transfer, addresses a central concern in multilingual education: whether supporting an additional or heritage language may hinder development in the majority or school language. Evidence from the reviewed studies indicates that additive bilingual or exposure-based practices can support development in an additional or heritage language without compromising the majority of instructional language (Engel de Abreu et al., 2025; Verhagen et al., 2024). The benefits reported in RQ3 align with the theoretical assumptions and practice designs identified earlier in the review, specifically the findings of RQ1 and RQ2. The referenced studies implemented structured heritage-language oral-language interventions and bilingual ECEC exposure-based routines, often utilizing cross-language transfer facilitation models such as the Linguistic Interdependence Hypothesis (Engel de Abreu et al., 2025). Verhagen et al. (2024) focused on exposure-based bilingual development and bilingual ECEC models. However, the effects varied across language outcomes, indicating that the benefits of multilingual practices depend on the language being supported, the amount and quality of the exposure, the children's age and language background, and the specific outcome measures (Engel de Abreu et al., 2025; Verhagen et al., 2024) (Table A9 in Additional file 1).

The second broader category of benefits includes awareness and attitudinal benefits, as well as engagement and inclusion. Specifically, awareness and attitudinal benefits - such as increased language awareness, curiosity about language, openness to linguistic diversity, positive attitudes toward multilingualism, print engagement, metalanguage, and enthusiastic participation in multilingual activities - were identified in studies emphasizing language awareness, multilingual awareness, pluralistic approaches, language comparison, multilingual artefacts, and children's engagement with scripts and signs (Becker & Knoll, 2022; Gkaintartzi & Katsara, 2024; Laursen & Daugaard, 2025; Žefran et al., 2025). In relation to the RQ1 findings, these studies were associated with translanguaging plurilingual approaches, as well as with pluralistic and language awareness frameworks. The targeted competences, included metalinguistic and plurilingual awareness, intercultural awareness and attitudes, and

participation, identity and agency. In connection with RQ2 findings, these aims were realized through language comparison, songs, rhymes, chants, storytelling, arts, movement, drama, multilingual artefacts, and multimodal or multisensory activities. A key insight is that awareness-oriented and pluralistic practices broaden the purpose of multilingual education by engaging young learners with linguistic diversity in reflective, affective, and exploratory ways, rather than focusing on immediate proficiency in a specific target language. These practices aim to cultivate curiosity, openness to diversity, and positive dispositions towards multilingualism (López Gopar et al., 2020; Rantanen, 2024) (Table A9 in Additional file 1).

The fourth and final category of benefits identified in the reviewed studies, concerns engagement and inclusion. This category includes studies that emphasize participation, agency, confidence, identity, inclusion, and home language validation through translanguaging interaction, home-ECEC literacy collaboration, narrative instruction, and pedagogical environments that recognize children's multilingual repertoires (Geiger-Jaillet & Schlemminger, 2023; Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025; Lundberg et al., 2023). Findings related to RQ1 indicate that these benefits are grounded in translanguaging, sociocultural, ecological, affective, or socio-cognitive perspectives. The targeted competences include participation, identity, agency, oral language, literacy, emergent literacy, and plurilingual awareness. When analyzed alongside the findings for RQ2, the relevant practices include translanguaging interaction, shared reading, storytelling, parent-supported literacy activity, narrative work, and multimodal meaning-making (Table A9 in Additional file 1).

The preceding discussion demonstrates that, although the four benefit categories are analytically distinct, they frequently overlap in practice. As indicated by the reviewed studies, multilingual education practices are multidimensional, with a single practice often supporting language learning, awareness, participation, and inclusion simultaneously (Table A12 in Additional file 1).

Turning now to the cross-cutting challenges identified across the four benefit categories, the most frequently reported issue was limited or uneven effects, particularly in studies measuring pupil outcomes (Engel de Abreu et al., 2025; Incognito et al., 2021; Sundström et al., 2024; Uhl et al., 2023; Voltmer et al., 2021). Additional studies highlighted challenges related to implementation and feasibility, emphasizing that effective practices require not only positive attitudes but also sustained professional support, adequate time, resources, and clearly defined pedagogical objectives (Geiger-Jaillet & Schlemminger, 2023; Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025; Voltmer et al., 2021). Another commonly reported challenge involved monolingual ideology and limited inclusion of home languages, underscoring the importance of how practices are framed, which languages are legitimized, and whether children and families are recognized as active contributors to the learning environment (Becker & Knoll, 2022; Lundberg et al., 2023; Lilja et al., 2025). When considered alongside findings from RQ1 and RQ2 findings, these approaches seek to challenge monolingual norms but remain constrained by institutional language policies, teacher confidence, resource availability, and dominant language ideologies. These challenges are also linked to RQ2 findings, as the presence of translanguaging, multilingual artefacts, home-language activities, or parent-supported literacy practices does not guarantee equitable

implementation. Structural, contextual, and methodological constraints were also reported in the reviewed studies (Gkaintartzi & Katsara, 2024; Laursen & Daugaard, 2025; Žefran et al., 2025), suggesting that awareness, attitudes, identity, and participation may be more difficult to evaluate through with conventional measures than vocabulary, reading, or grammar. When RQ3 is considered alongside RQ1, it becomes clear that the type of evidence available is shaped by the targeted competence domain. Linguistic outcomes are often measured through tests, whereas awareness, attitudes, identity, and inclusion are more often documented through observations, interviews, classroom interactions, or participant perceptions (Table A10 in Additional file 1).

Finally, the level at which the included studies reported their findings further clarifies the documentation of benefits and challenges. Studies addressing language and literacy benefits, additive bilingualism, or cross-linguistic transfer primarily presented evidence at the pupil outcome level, using measures such as notational knowledge, phonological awareness, vocabulary, grammar, sentence-level processing, or bilingual vocabulary growth (Engel de Abreu et al., 2025; Incognito et al., 2021; Rendón-Romero et al., 2021; Sundström et al., 2024; Uhl et al., 2023; Verhagen et al., 2024; Voltmer et al., 2021). In contrast, studies focusing on awareness, attitudes, engagement, and inclusion more frequently document outcomes at the level of classroom interaction, pedagogical practice, educator implementation, parent and family participation, or program-level perceptions (Becker & Knoll, 2022; Geiger-Jaillet & Schlemminger, 2023; Gkaintartzi & Katsara, 2024; Kirsch & Bergeron-Morin, 2023; Laursen & Daugaard, 2025; Lilja et al., 2025; Lundberg et al., 2023; Žefran et al., 2025). This distinction is important because it demonstrates that the reported practices were evaluated not only as interventions that produced measurable child outcomes, but also as socially situated pedagogical processes shaped by educators, families, classroom interactions, and institutional conditions (Table A11 in Additional file 1).

6. Conclusion

This systematic scoping review identified 15 empirical studies on multilingual education practices for young learners aged 3 to 7 within European early childhood and early primary education settings. The review specifically examined the theoretical and pedagogical approaches underpinning these practices, the types and characteristics of the practices implemented, as well as the reported benefits and challenges. The findings indicate that multilingual education in the early years is a diverse and evolving field in which language learning, literacy development, language awareness, identity, participation, and inclusion are closely interconnected.

In response to the first research question, which addresses theories, pedagogical approaches and the competences, the findings indicate that the reviewed studies were informed by a broad range of theoretical and pedagogical perspectives. This aligns with previous global reviews that identified similar approaches, including translanguaging, interaction-promoting, linguistically based, affirming, scaffolding and cross- linguistic pedagogies employed by teachers in various educational settings (Burner & Carlsen, 2023; Zheng et al., 2021; Veerman et al., 2026). A unique contribution of this review is its focus on recently implemented practices with very young learners in European educational contexts.

Given that multilingualism is recognized as a fundamental aspect of European culture by policymakers (Bergeron-Morin et al., 2023; Bos-Solé & Waddington, 2025; European Commission, 2011), multilingual education should be conceptualized as a comprehensive pedagogical approach that acknowledges children's entire linguistic repertoires as valuable resources for learning, participation and identity development (Aerila et al., 2025). Duarte et al. (2023, p.60) further supported this perspective, noting that "the effectiveness of multilingual support in regular school lessons, the features of multilingual didactics and the effectiveness of literacy support in home languages on the development of academic language skills in the majority language have been ranked as the topics with highest research priority".

Addressing the second research question, which examines multilingual education practices for young learners aged 3 to 7 and their key characteristics, the reviewed studies identified a wide range of multilingual education practices. These results are consistent with existing research documenting similar practices. Specifically, the previous studies corroborate translanguaging, interaction- promoting, and teacher-family collaboration (Jaramillo-López et al., 2025; Zheng et al., 2021). This review extends current understanding by demonstrating that multilingual practices include both highly structured interventions targeting specific language and literacy skills and more open-ended, playful, child-centered, and identity-affirming classroom activities. Additionally, collaboration between families and educational settings, particularly through parent-supported literacy practices, is recognized as a significant asset, especially in countries with substantial migrant populations (Duarte et al., 2023), as evidenced in both this scoping review and prior studies (Jaramillo-López et al., 2025; Zheng et al., 2021). Such collaboration provides monolingual educators with opportunities to learn about children's languages and cultures through classroom activities and family interviews. These practices underscore the importance of children's first language, multimodal communication, family involvement, and culturally responsive environments, even when educators do not share the children's home languages (Jaramillo-López et al., 2025; Kirsch & Bergeron-Morin, 2023; Žefran et al., 2025; Zheng et al., 2021).

Regarding the third research question and the benefits reported across the included studies, our findings underscore the multidimensional nature of these outcomes. This conclusion is consistent with previous research conducted in diverse school settings and among students of varying ages. For instance, Veerman et al. (2026) linked multilingual pedagogies to both cognitive outcomes, such as vocabulary and literacy development, and socio-affective outcomes, such as engagement, identity affirmation and belonging. The present review indicates that similar benefits are evident in early childhood and early primary settings, provided that practices are developmentally appropriate, meaningful, and well-scaffolded. Furthermore, practices such as CLIL, which are recognized for supporting learning, content learning, motivation, and participation across educational contexts and age (Gil-López et al., 2021; Hidalgo & Ortega-Sánchez, 2023), demonstrate potential value in early childhood settings (Uhl et al., 2023; Verhagen et al., 2024).

An additional objective of the third research question was to identify key challenges. Several challenges emerged, including the domain-specific nature of reported effects. For instance, some interventions improved word knowledge or notational knowledge but did not produce significant benefits in broader

semantic, phonological, or cross-language outcomes (Incognito et al., 2021; Sundström et al., 2024; Engel de Abreu et al., 2025). Implementation issues also recurred, particularly regarding teacher confidence, time constraints, resource availability, training, and the sustainability of practices. These findings are consistent with previous research. For example, Egert et al. (2021) identified intervention fidelity, dosage, timing, and implementer characteristics as important factors in language interventions for dual language learners in ECEC. Similarly, Burner & Carlsen (2023) concluded that multilingual beliefs and multilingual practices do not always align, aw educators and institutions may value multilingualism in principle, while everyday classroom practices remain influenced by monolingual norms, language hierarchies, or limited pedagogical guidance.

A further challenge concerns the status of children's home languages, which may remain marginal, receive only symbolic acknowledgement, or be subordinated to majority, school, or prestigious foreign languages (Becker & Knoll, 2022; Kirsch & Bergeron-Morin, 2023; Lilja et al., 2025; Lundberg et al., 2023). While previous research recognizes that translanguaging or home-language use can be transformative, such outcomes are not automatic (Zheng et al., 2021). The pedagogical value of these practices depends on their implementation, indented purposes, and the extent to which they support meaningful interaction, learning, and inclusion, rather than serving as a means for classroom management or symbolic recognition (Zheng et al., 2021; Burner & Carlsen, 2023; Jaramillo-López et al., 2025).

Overall, this scoping review contributes to the literature by synthesizing recent empirical studies from Europe that focus on implemented practices with young learners aged 3 to 7. The findings indicate that there is no universally optimal model of multilingual education for this age group. Instead, the review identifies a set of promising pedagogical principles relevant to early childhood and early primary education. Multilingual practices can support language learning, literacy development, language awareness, engagement, and inclusion. However, the effectiveness of these practices is enhanced by pedagogical intentionality, high-quality implementation, and the extent to which children's home languages are valued as educational resources.

6.1. Implications for second and foreign language education

The findings also carry implications for second and foreign language education and for language teacher education. The reviewed studies indicate that early bilingual, CLIL, and exposure-based provision can support development in an additional language without compromising the language of schooling (Engel de Abreu et al., 2025; Uhl et al., 2023; Verhagen et al., 2024), suggesting that the foundations of later second and foreign language learning are laid before formal language instruction begins. For language teacher education, the evidence reviewed here suggests that preparing educators to scaffold learning across languages, to collaborate with families, and to counter monolingual ideologies may be as consequential for later language learning as the choice of instructional model. In our view, early childhood and early primary settings therefore merit more systematic attention within second and foreign language education research, which has concentrated predominantly on older learners.

6.2. Limitations and Future Directions

This review has several limitations that should be considered when interpreting the findings. Although the final corpus was relatively small and geographically dispersed, this characteristic also offers contextual breadth by including studies for diverse European contexts. These studies capture practices from countries with growing concerns about linguistic diversity related to migration, refuge movements, and multilingual early childhood populations. However, the sample is not statistically representative of Europe as a whole, so the findings should be regarded as indicative rather than generalizable.

Another limitation is the uneven reporting of practices across the included studies. While all selected articles met the inclusion criteria, the level of detail regarding implementation varied considerably. Some studies provided sufficient detail to clarify pedagogical logic, materials, educator roles, duration and implementation processes, whereas others offered more limited descriptions. The types of evidence used to report practices also differed, ranging from assessment-based outcome measures to observational, interview-based, or mixed methods. This variation restricted the extent to which specific practices could be fully compared, replicated, or considered transferable to other multilingual educational settings. Consequently, the synthesis should be viewed as an overview of reported practices and their associated benefits and challenges, rather than as an evaluation of implementation quality, replicability, or effectiveness across contexts.

These limitations suggest several directions for future research. Further studies should provide richer and more systematic descriptions of multilingual education practices, including the linguistic resources employed, the roles of educators and families, the frequency and duration of activities, and the ways in which children participate. Longitudinal and comparative research designs are also needed to examine not only immediate language or literacy outcomes, but also children's engagement, identity, inclusion, and longer-term educational trajectories. Greater attention should be devoted to underrepresented European contexts and to the experiences of migrant, refugee, and minoritised-language children in early childhood and early primary education. Additionally, future research should investigate how multilingual practices can be implemented sustainably in everyday classrooms, considering teacher preparation, institutional language policies, family-school collaboration, and the practical constraints faced by educators.

Abbreviations

BLM: bilingual language-minority; CLIL: Content and Language Integrated Learning; DLL: dual language learners; ECEC: early childhood education and care; EFL: English as a foreign language; ELT: English language teaching; ESL: English as a second language; FREPA: Framework of Reference for Pluralistic Approaches to Languages and Cultures; L1: first language; L2: second language; LSS: language support strategies; PRISMA-ScR: Preferred Reporting Items for Systematic Reviews and Meta-Analyses extension for Scoping Reviews; RQ: research question; SLCN: speech, language and communication needs; WoS: Web of Science.

Declarations

Availability of data and materials. The data charted from the 15 included studies are presented within the article and its additional file (Additional file 1). The full data-charting spreadsheet is available from the corresponding author on reasonable request.

Competing interests. The authors declare that they have no competing interests.

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Authors’ contributions. RT conceptualised the review, developed the search strategy, and drafted the manuscript. RT and IL independently conducted the screening, eligibility assessment, and data charting; MK cross-checked 20% of the screening and eligibility decisions. All authors contributed to the synthesis, critically revised the manuscript, and read and approved the final version.

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Figures

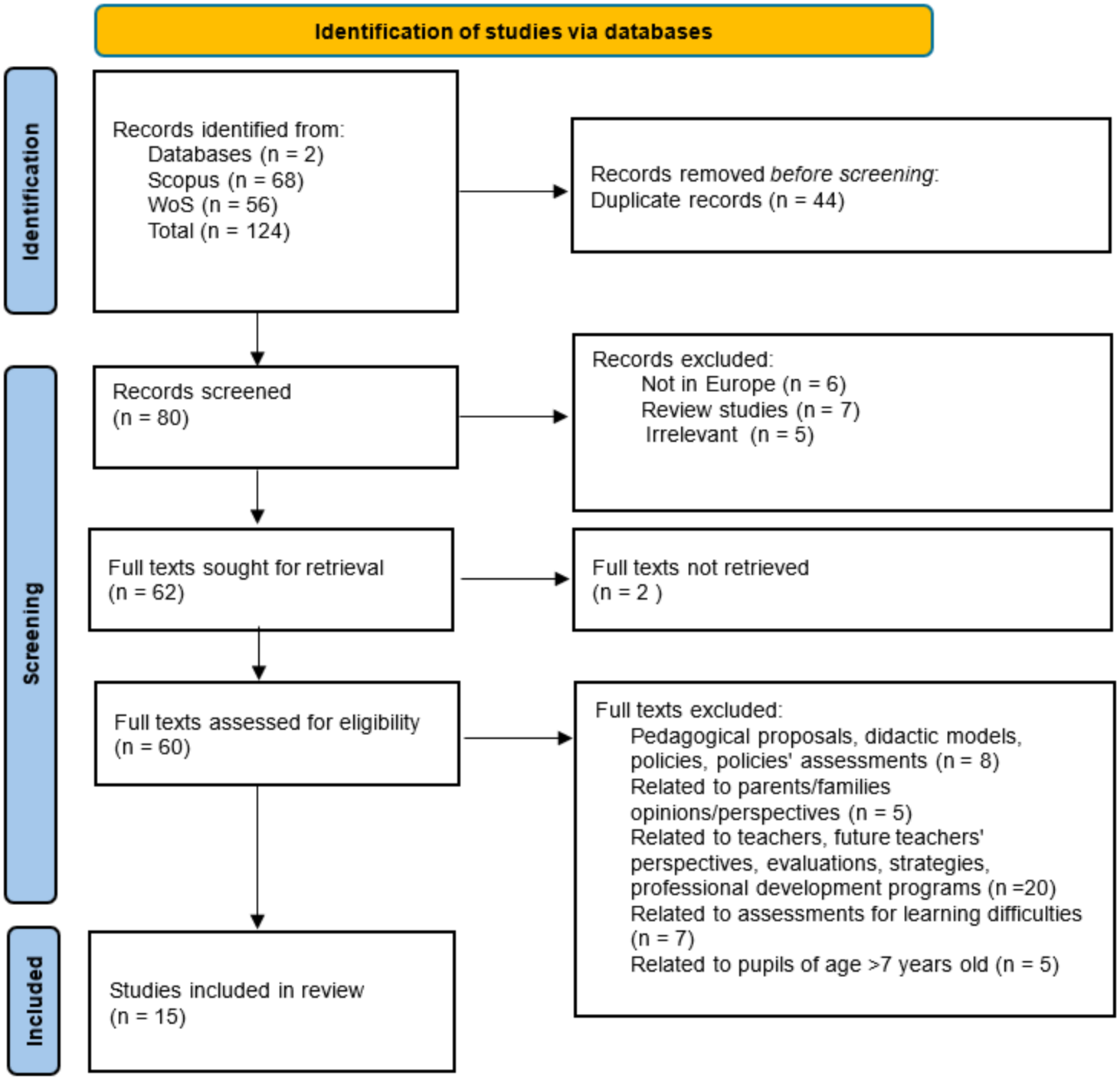


Figure 1

PRISMA ScR flow diagram

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