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Quality and quality assurance in teacher professional development: A comparative study

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Highlights:

- Quality standards and assurance in teacher professional development were examined through global comparison.
- Policy orientations, implementation mechanisms, and quality assurance tools were assessed in three dimensions.
- Quality assurance models were analyzed through the cases of Japan, Germany, Finland, and the United States.
- Policy recommendations were proposed for quality-assured teacher professional development in Türkiye.

Abstract

This study examines teacher professional development processes from the perspectives of quality and quality assurance in Finland, the United States, Japan, and Germany. Adopting a qualitative approach, the research utilized the document analysis method. The data were sourced from national laws and regulations, policy documents, reports from international organizations, and peer-reviewed academic articles on teacher professional development and quality assurance published between 2004 and 2025. The analysis was conducted across three main dimensions: policy orientations, implementation mechanisms, and quality assurance tools. The findings indicate that Japan's emphasis on lifelong professional development and lesson study practices has fostered a strong professional learning culture. The U.S. demonstrates a multi-actor quality assurance system supported by standards, certification, and accreditation processes. Germany's federal structure relies on a cyclical quality management approach. In Finland, teacher autonomy and research-based teacher education are highlighted. The comparative analysis reveals similarities and differences in how these countries integrate teacher professional development with quality assurance. The findings reveal a range of balances between centralization and autonomy, supervision and guidance, and individual and collective learning. The study emphasizes that effective quality assurance mechanisms are critical in enhancing educational quality. Based on these findings, it is recommended that Turkey's policymakers strengthen quality assurance mechanisms in teacher professional development, expand practice-oriented training, and establish a flexible system responsive to local needs. It would be particularly beneficial for Turkey to examine and integrate approaches such as mentoring, peer learning, and performance-based feedback, as seen in these international examples.

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1. Introduction

On a global scale, teacher professional development is recognized as one of the most fundamental factors directly influencing the quality of education systems. Educational research has demonstrated that teachers' continuous updating of their knowledge, skills, and pedagogical approaches has a significant impact on student learning outcomes (Darling-Hammond, Hyler, & Gardner, 2017; Desimone, 2009). Preparing qualified teachers and supporting their development throughout their professional lives shapes not only individual teaching practices but also the long-term development goals of societies (Schleicher, 2018).

Quality in education is defined as a holistic concept that ensures the effectiveness of teaching processes and safeguards students' cognitive, affective, and social outcomes (Harvey & Green, 1993; OECD, 2019). Teachers' participation in professional learning communities, the development of research-based practices, and the adoption of innovative teaching strategies enhance educational quality (Avalos, 2011; Vangrieken et al., 2015). In this regard, quality assurance plays a central role in education systems. Quality assurance is not limited to monitoring institutional performance; it establishes teacher professional development processes on a transparent, accountable, and sustainable foundation (Stensaker, 2008; UNESCO, 2017). International organizations consider addressing teacher professional development within the quality assurance framework to be critical for the continuity and effectiveness of education policies (OECD, 2019; European Commission, 2020).

This study examines teacher professional development (TPD) practices in the United States, Finland, Germany, and Japan from the perspectives of educational quality and quality assurance. These countries were selected due to their institutional structures for teacher education, diverse quality assurance mechanisms, and frequent references in the international literature. Accordingly, the central research question of this study is: "What similarities and differences do the teacher professional development practices in the United States, Finland, Germany, and Japan reveal in terms of educational quality and quality assurance?" In this way, the article aims to make the strong relationship between teacher professional development and educational quality more visible, and to develop policy recommendations applicable to developing countries, such as Türkiye, drawing on international experiences. In terms of scope, the study aims to address teachers' individual development and examine quality assurance approaches designed to strengthen the overall quality of education systems, thereby offering an original contribution to the literature.

1.1. Theoretical Framework

Teacher professional development is one of the most critical components for improving learning outcomes in contemporary education systems. Professional development (PD) refers to planned and systematic learning processes that enable teachers to continuously update their knowledge, skills, attitudes, and pedagogical approaches (Borko, 2004; Desimone, 2009). Practical professional development activities focus on teachers acquiring new knowledge and their ability to transfer this knowledge into classroom practices. In this context, key components such as content focus, active learning, continuity, collegial collaboration, and contextual relevance are particularly emphasized in the literature (Desimone, 2009; Opfer & Pedder, 2011). Empirical studies by Garet, Porter, Desimone, Birman, and Yoon (2001) demonstrated that long-term and collaborative professional development programs positively transform teachers' classroom practices. Furthermore, Hill, Beisiegel, and Jacob (2013) and Kennedy (2016) revealed that the effectiveness of professional development is contingent on strengthening teachers' pedagogical content knowledge, which directly impacts student achievement. Meta-analytic findings also show that practice-oriented models, particularly teacher coaching, significantly enhance instructional quality and student achievement (Kraft, Blazar & Hogan, 2018). At this point, it is also emphasized that teachers should move beyond individual development and establish a collective learning culture through school-based professional learning communities (Vangrieken, Dochy, Raes & Kyndt, 2015; Louws, Meirink, van Veen & van Driel, 2017).

The quality of professional development processes is directly linked to the concepts of quality and quality assurance in education. Although the notion of quality in education was initially adapted from industrial production processes, it has expanded over time to include pedagogical, social, and cultural dimensions (Harvey & Green, 1993; Tikly & Barrett, 2011; UNESCO, 2005). In Harvey and Green's (1993) classic classification, quality is explained through dimensions such as excellence, fitness for purpose, value for money, and transformative learning experiences. Within this framework, educational quality is linked to academic outcomes, the effectiveness of instructional processes, school climate, equity, inclusiveness, and

the sustainability of learning environments (Tikly & Barrett, 2011). Quality assurance, on the other hand, refers to the institutional mechanisms that ensure the preservation and enhancement of these standards (OECD, 2013; Stensaker, 2008). OECD (2013) explains quality assurance through a cycle of monitoring, evaluation, feedback, and continuous improvement. UNESCO (2005) associates quality with equipping individuals with the knowledge, skills, and values necessary to transform their lives. The recently developed ISO 21001 standard (2018/2025) for educational organizations institutionalizes quality through learner-centered process management and a culture of continuous improvement. Thus, quality assurance is conceptualized as a monitoring mechanism and a learning culture that continuously enhances teaching and learning processes (Hofer, Holzberger, & Reiss, 2020).

The quality standards of teacher professional development are extensively defined in the literature. Guskey (2002) associates the quality of professional development activities with the tangible changes they generate in teacher practices and student learning outcomes. Avalos (2011) and Opfer and Pedder (2011) emphasize that effective professional development programs should include needs assessment, research-based and curriculum-aligned content, participatory and practice-oriented methods, evaluation of outcomes based on teacher practices and student learning, and feedback-driven continuous improvement. In this regard, the study by Kraft et al. (2018) demonstrated that teacher coaching and professional learning communities (PLCs) significantly improve instructional quality. Moreover, OECD (2020) reports indicate that professional development programs should be designed at the content level, considering teachers' professional well-being and equitable conditions.

International organizations also provide important policy frameworks on teacher professional development and quality assurance. Through TALIS surveys, OECD reports the effects of high-quality professional development on teacher autonomy, collegial collaboration, and classroom practices (OECD, 2021). Furthermore, its Synergies for Better Learning report highlights that quality assurance should be consistently designed at the student, teacher, school, and system levels (OECD, 2013). Through its Teacher Policy Development Guide (2019), UNESCO recommends a life-cycle approach in teacher policies and encourages the integration of professional development processes with quality assurance. According to UNESCO, ensuring quality in teacher education is a critical condition for achieving the Sustainable Development Goals (SDG 4). The European Commission, through Eurydice reports, examines the relationship between teacher career pathways, professional development opportunities, and teacher well-being, recommending that professional development be supported by quality assurance standards and integrated into harmonized frameworks at the European level (European Commission, 2020). In addition, Grek, Lawn, Ozga, and Segerholm (2013) also demonstrated that school inspections and external evaluation practices conducted in Europe should function as monitoring tools and transform into constructive mechanisms that promote teacher learning.

2. Method

2.1. Research Design

This study adopted a qualitative approach, employing the document analysis method to examine teachers' professional development processes from a quality and quality assurance perspective. Document analysis is a qualitative research method that involves the systematic examination, analysis, and interpretation of written documents to understand a specific phenomenon (Bowen, 2009). This method enabled a comparative evaluation of the policies and practices of selected countries regarding teacher professional development.

2.2. Participants

The study's sample consisted of Finland, the United States (US), Japan, and Germany. Their prominence justified the selection of these countries in international indicators like PISA and TALIS, where they stand out for their teacher policies. They are frequently referenced in the literature and are considered global exemplars in teacher professional development (OECD, 2019; Schleicher, 2018). Furthermore, these countries represent diverse governance models—centralized, federal, or autonomous—and distinct quality assurance mechanisms, offering a suitable variety for comparison. Considering recent reform initiatives in Turkey, such as the Teaching Profession Law and the National Education Academy, the experiences of these four countries are particularly relevant for informing policy development.

2.3. Data Sources

The data used in this study were obtained from various types of documents. This included national-level legal and policy documents such as reports from Japan's Ministry of Education (MEXT), teacher standards published by the KMK in Germany, policy documents prepared under the ESSA in the US, and reports from FINEEC in Finland. International reports from organizations like the OECD, UNESCO, and the European Commission/Eurydice and peer-reviewed academic articles on teacher professional development and quality assurance were also reviewed. Standards and accreditation documents from organizations such as InTASC, NBPTS, and CAEP were used to understand the quality assurance mechanisms in teacher professional development. The documents were limited to sources published between 2004 and 2025. This timeframe enabled the inclusion of teacher standards that came into force in Germany in 2004, while also allowing for the examination of current reports published up to 2025, thereby strengthening the study's historical scope.

2.4. Data Analysis

The collected data were analyzed using content analysis, a qualitative research method. A coding scheme was first developed based on a comprehensive literature review in the analysis process. The documents were then examined through three main dimensions: policy orientations, implementation mechanisms, and quality assurance tools related to teacher professional development. The coding process was carried out independently by two researchers. A comparison of coding on a subset of the documents revealed an inter-rater agreement of over 85% and a Cohen's kappa (κ) value of .75. Any coding discrepancies were resolved through discussion and consensus, and the coding scheme was revised as necessary. To enhance the study's reliability and validity, expert opinions were sought, data triangulation was ensured, detailed descriptions were provided, and an audit trail was established. The analysis findings were then presented using thematic matrices and comparative tables, systematically highlighting the similarities and differences between the countries.

3. Results

3.1. Findings on quality management in teacher professional development in Japan

In Japan, teacher professional development is regarded as one of the strongest aspects of the education system and is integrated with lifelong learning. The Ministry of Education, Culture, Sports, Science and Technology (MEXT) requires teachers to participate in professional development at every stage of their careers. It sets national standards for this process (Ono & Ferreira, 2010). This approach aims to enable teachers to develop systematically from the beginning of their careers until retirement. Professional development policies enhance individual competencies and build a collective learning culture among teachers (Akiba & Liang, 2016).

At the center of Japan's professional development policies lies the "lesson study" model, a collaborative method in which teachers observe, analyze, and redesign classroom practices to improve their competencies. Lesson study has a deep-rooted tradition in the Japanese education system, dating back to the 19th century, and is still considered one of the most effective tools for teacher professional development today (Fujii, 2014). This model enables teachers to directly translate theoretical knowledge into classroom practice while supporting continuous growth through peer observation and constructive feedback.

Regarding quality assurance, Japan demonstrates a highly centralized structure compared to many other countries. MEXT strictly regulates teacher education program standards, in-service training content, and professional development requirements across career stages (OECD, 2019). This ensures that teacher development processes are coordinated nationally while safeguarding overall education quality. Quality assurance mechanisms encompass individual teacher performance and school-based collective development.

Practical examples demonstrate that professional development activities in Japan are primarily rooted in a collective culture. Lesson study groups involve teachers jointly preparing a lesson plan, implementing it in class, and then having it extensively evaluated by observers. Through this process, teachers improve their pedagogical skills and capacity for critical thinking, collaboration, and classroom interpretation (Takahashi & McDougal, 2016). Such professional learning communities in Japan are promoted at the school level and through local and national conferences, encouraging the dissemination of best practices nationwide (Saito & Atencio, 2015).

One of the strengths of Japan's professional development model is the strong collaborative culture among teachers. Lesson study enables teachers to perceive their profession not merely as an individual responsibility but as a collective learning process (Fernandez, 2002). Moreover, the culture of continuous development supports teachers in staying receptive to pedagogical innovations and adopting research-based approaches in lesson design. However, there are also some weaknesses in Japan's model. Lesson study sessions require significant time and energy, adding to teachers' already heavy workloads, which may increase the risk of burnout for some (Yoshida, 2012). In addition, the centralized structure of quality assurance may overlook local differences and teachers' individual needs.

In conclusion, Japan's professional development policies offer a strong model that supports collective teacher learning through innovative practices such as lesson study and secures quality assurance through centralized standards. Nevertheless, balancing teachers' workload and incorporating local needs more effectively into decision-making processes are crucial for the system's sustainability.

3.2. Findings on quality management in teacher professional development in the United States

In the United States, teacher professional development is conducted within a multi-actor, multi-level, and standards-based quality management system. This structure, in which federal, state, and local institutions coordinate, produces quality assurance through the Plan-Do-Check-Act (PDCA) cycle. At the federal level, the U.S. Department of Education (USDoe) sets the general framework of teacher policies, provides funding, and manages national data. However, since the American education system is not centralized, each state, through its State Education Agency (SEA), designs and implements its own certification systems, professional development criteria, and teacher evaluation mechanisms. At the local level, Local Education Agencies (LEAs) and school administrators directly support teachers' daily development processes, monitoring quality continuously through tools such as mentoring, coaching, and performance feedback (Darling-Hammond, Hyler & Gardner, 2017; USDoe, 2024).

The main standards regulating teacher competencies include the ten core standards developed by the Interstate Teacher Assessment and Support Consortium (InTASC). These standards are grouped into four domains—"learner and learning," "content knowledge," "instructional practice," and "professional responsibility"—and serve as a reference both in the design of teacher preparation programs and in teacher performance evaluations (CCSSO, 2011). Additionally, the advanced certification provided by the National Board for Professional Teaching Standards (NBPTS) serves as an important quality mechanism that documents teachers' professional mastery while offering salary incentives and leadership opportunities (NBPTS, 2024). Although certification systems vary across states, they typically include requirements such as completing a graduate-level teacher education program, passing standardized tests like PRAXIS, and fulfilling continuing professional development hours (ETS, 2023).

The U.S.'s teacher performance measurement and quality assurance are based on a mixed and multi-dimensional evaluation model. These systems include student learning outcomes assessed through "value-added modeling," standardized tests such as PRAXIS and edTPA, classroom observations, teacher portfolios, and feedback from students, parents, and other stakeholders. Frameworks such as the Danielson Framework for Teaching provide a structured approach to evaluating teachers in planning, classroom management, instructional effectiveness, and professionalism (Danielson, 2013). The data collected through these processes are used to shape teachers' individual development plans and to design professional development activities.

Accreditation also plays a central role in quality assurance. The Council for the Accreditation of Educator Preparation (CAEP) evaluates teacher preparation programs at universities and colleges based on five standards: candidate quality, clinical practice, program impact, continuous improvement, and institutional capacity. Programs meeting these standards receive accreditation (CAEP, 2023). Accreditation not only enhances transparency and accountability in institutions but also ensures the quality of graduates.

The Title II - Supporting Effective Instruction State Grants program is particularly significant among the financial and institutional mechanisms supporting teacher professional development in the United States. Implemented under the Every Student Succeeds Act (ESSA) of 2015, this federal funding program provides resources to states and local districts for professional development activities, mentoring and coaching systems, leadership training, and alternative certification programs. While 95% of the funds are allocated directly to local institutions, the remaining 5% is used by states to develop institutional capacities. The program aims to equip teachers with up-to-date pedagogical skills, enhance leadership capacity, and ensure access to effective teachers in disadvantaged areas (USDoe, 2024).

Within this multi-actor structure, teacher unions (NEA and AFT) advocate, ensuring teachers' voices are heard nationally. Independent research organizations such as RAND Corporation and the American

Institutes for Research (AIR) conduct comprehensive studies on teacher quality, student achievement, and educational equity, providing evidence-based policy recommendations and contributing scientifically to quality assurance (RAND, 2012; AIR, 2020). For example, RAND's *Teachers Matter* report highlights the decisive impact of teacher quality on student achievement, while AIR collaborates with state education agencies to develop performance measurement and program evaluations.

In conclusion, teacher professional development in the United States is managed through a multi-level quality assurance system in which certification, standards, performance assessment, and accreditation mechanisms function in an integrated manner. This system provides a guiding framework based on national standards while allowing states autonomy in implementation, thereby supporting teachers' continuous professional development.

3.3. Findings on quality management in teacher professional development in Germany

In Germany, teacher professional development is based on a cyclical planning, implementation, evaluation, and improvement process within a multi-stakeholder and multi-level quality management system. This cycle aims to enhance teachers' pedagogical competencies and ensure the overall quality of the education system. The leading actors in this process include the Standing Conference of the Ministers of Education and Cultural Affairs (KMK), state ministries of education, the Federal Ministry of Education and Research (BMBF), universities and teacher training centers (Zentren für Lehrerbildung, ZfL), independent quality agencies, school administrations, and teacher unions and professional associations.

At the planning stage, the KMK coordinates across states by establishing minimum standards for teacher preparation and professional development, while at the federal level, the BMBF develops national strategies and funds research projects to enhance quality (KMK, 2004; BMBF, 2023). Universities and ZfLs design the curricula of teacher preparation programs and conduct accreditation processes. This stage ensures a scientifically grounded foundation for professional development and the applicability of quality standards (Terhart, 2011).

During implementation, state ministries of education organize in-service training (Fortbildung) programs and support school-based professional development. School administrations conduct internal planning to improve teacher performance, while teacher unions (e.g., GEW, VBE) provide guidance and support for their members (GEW, 2020). This multi-actor implementation system serves as a mechanism that sustains a culture of continuous teacher learning.

Independent quality agencies and national evaluation institutions are critical in the evaluation stage. The Institute for Quality Development in Education (IQB) contributes to quality assurance by developing assessments that measure student achievement and teacher competencies across states. In addition, independent agencies such as QA NRW in North Rhine-Westphalia conduct school inspections and analysis activities (IQB, 2021; Altrichter & Eder, 2004). These evaluations enhance transparency in teacher professional development and enable evidence-based decision-making for improvement.

The final stage, improvement, is realized by integrating evaluation findings into education policies and school-based development plans. Universities and teacher training centers revise curricula, schools update their development plans, and KMK and BMBF propose national reforms (BMBF, 2023). Thus, quality management evolves into a mechanism not limited to inspection and assessment but focused on continuous learning and development.

Germany's system offers a strong model that institutionalizes professional development and supports quality assurance through a multi-actor structure. However, due to variations across states, achieving uniformity in implementation is not always easy, which may create diversity and inequality in professional development opportunities (Terhart, 2011). Nevertheless, Germany's cyclical approach to quality management—incorporating planning, implementation, evaluation, and improvement—provides an important international example of how teacher professional development can be systematically and institutionally structured.

3.4. Findings on quality management in teacher professional development in Finland

Finland has a unique education system that structures teacher professional development within a systematic quality cycle, grounded in a cultural foundation of trust. Professional development is designed as a lifelong process, from entry into the profession to retirement, based on substantial autonomy, research-based teacher education, and localized quality assurance (Niemi, 2015). Teachers work in an environment

where they experience high levels of professional autonomy and responsibility; this context contributes to schools developing innovative projects and revitalizing their teaching practices (Niemi, 2015).

In Finland, quality assurance is shaped not by strict inspections but by a guidance-oriented and continuous improvement approach. Despite abolishing national school inspections, education providers—schools and teachers—can evaluate and improve their performance, forming a structure rooted in professional trust (Eurydice, 2025). Local education providers' responsibility and teachers' competence to plan their development are central to the quality assurance system (Eurydice, 2025).

At the institutional level, the Finnish Education Evaluation Centre (FINEEC) plays a central role in quality assurance. Since 2014, FINEEC has been responsible for evaluating the quality systems of educational institutions from early childhood to higher education, conducting outcome-based and system-level assessments, and providing guidance to education providers in quality management (FINEEC, 2025).

The approach to teacher evaluation also reflects Finland's distinctive pedagogical philosophy. Unlike accountability models based on student performance or value-added measures, Finland prioritizes participatory, reflective, and development-oriented methods in teacher evaluation. Individual development dialogues with school administrators and colleagues are shaped around personalized development plans (Tarhan, Karaman, Kempainen & Aerala, 2019). This approach is considered a supportive tool for teachers and aims to empower them professionally (Tarhan et al., 2019).

Finland's international success in education stems from the trust in the teaching profession, the high quality of teacher education, and the alignment of its quality system with these values (Sahlberg, 2010). Social respect for the teaching profession increases teachers' motivation for continuous learning and supports the sustainability of a quality culture in education (TALIS 2018 data).

In conclusion, quality management in teacher professional development in Finland is shaped by trust-based autonomy, local responsibility, independent evaluation structures, and supportive pedagogical assessment practices. This model offers a strong alternative to contemporary quality assurance approaches by prioritizing guidance over inspection, community-based progress over individual development, and process-oriented quality over performance measures.

3.5. Summary of Comparative Findings

Table 1 summarizes the key findings on quality management in teacher professional development in Finland, the United States, Japan, and Germany. The table presents, in a comparative manner, each country's approach to professional development, quality assurance structure, key practices, strengths, and limitations. This way, similarities and differences across countries can be observed holistically, allowing the detailed findings to be evaluated in a more systematic and accessible framework.

Table 1. Comparative Findings on Quality Management in Teacher Professional Development Across Countries

Country	Approach to Professional Development	Quality Assurance Structure	Key Practices	Strengths	Limitations
Japan	Lifelong professional development, mandatory in-service training	Centralized system; MEXT strictly regulates standards and content	Lesson Study, collaborative learning communities, and national conferences	Strong collaborative culture, transfer of theory to practice, continuous improvement	High workload and time demands; the centralized system may overlook local needs
USA	Multi-actor, multi-level, standards-based system	Multi-actor QA at federal, state, and local levels; PDCA cycle	InTASC standards, NBPTS certification, Danielson Framework, CAEP accreditation, Title II funding	Diverse certification and evaluation tools, strong funding support, and multidimensional performance assessment	State-level disparities, overemphasis on standardized tests, and heterogeneity in practice

Germany	Systematic approach based on the Plan-Do-Check-Act (PDCA) cycle	Multi-stakeholder: KMK, BMBF, universities, ZfL, independent QA agencies	In-service training (Fortbildung), IQB assessments, and QA NRW inspections	Institutionalized quality management, independent evaluation bodies, and data-driven improvement	Diversity across states creates inequalities; difficulty in ensuring homogeneity
Finland	Trust-based autonomy, research-oriented teacher education	Guidance-oriented QA; independent evaluation by FINEEC instead of strict inspections	School-based responsibility, individual development plans, developmental dialogues	High social trust, substantial teacher autonomy, respected profession, innovative practices	Local variation; process-oriented QA is less effective in measuring performance outcomes

4. Discussion

4.1. Implications for theory and practice

The experiences of Japan, Germany, Finland, and the United States regarding teacher professional development and quality assurance reveal variations shaped by different historical and cultural contexts. Japan's "lesson study" model supports teachers' continuous professional development through joint planning, observation, and evaluation processes. This approach strengthens the culture of collective learning, allowing teachers to adopt innovative perspectives in lesson design and pedagogical approaches (Fujii, 2014). However, the heavy workload and time constraints placed on teachers have also generated criticisms concerning the sustainability of this model.

In Germany, professional development and quality assurance operate within a multi-stakeholder framework shaped by the federal structure. Frameworks established by the Kultusministerkonferenz (KMK) guide the development of in-service training policies in individual states, while institutions such as the IQB provide states and schools with data-based feedback through national-level evaluations. This model seeks to ensure continuous quality assurance through the plan-implement-evaluate-improve cycle (Kultusministerkonferenz, 2020). In this respect, Germany's system institutionalizes quality management in teacher professional development by striking a balance between central coordination and local flexibility.

Finland's experience is based on teacher autonomy and a trust-oriented approach. Teachers enter the profession after research-based, master's level education, and in-service professional development processes are largely entrusted to their individual responsibility.¹ At this point, professional ethics and the trust placed in teachers, rather than central inspections, play a decisive role in Finland (Sahlberg, 2011). The Finnish Education Evaluation Centre (FINEEC) provides quality assurance through systematic monitoring activities and offers feedback that supports teachers' professional growth (Lavonen, 2017). This model demonstrates that a trust-based system can balance professional autonomy and accountability.

A multi-actor and standards-based quality assurance framework is evident in the United States. The InTASC standards define teacher competencies at the national level, CAEP accredits teacher preparation programs, and NBPTS provides advanced teacher certification. Additionally, Title II grants support teachers' access to continuous professional development programs (Darling-Hammond, 2017). This system constitutes a multidimensional structure in which various institutions collaborate to ensure teachers' ongoing development from entry into the profession through advanced career stages.

Compared with policies recently developed in Türkiye, the experiences of these countries highlight significant similarities and differences. The enactment of the Teaching Profession Law in 2024, which defined teaching as a specialized profession, addressed professional development within a systematic framework. With this law, induction training, career stages (teacher-expert teacher-head teacher), and in-service programs carried out under the National Education Academy have provided teachers with professional development in a more planned and traceable structure. Furthermore, introducing individual professional development plans and regular monitoring-evaluation processes is an important innovation in quality assurance (Ministry of National Education, 2024).

Türkiye's new approach carries elements that can draw inspiration from Japan's collective learning culture, Germany's multi-stakeholder quality management, Finland's trust-based autonomy, and the United States' standards-driven multi-actor structure. Türkiye's strength lies in its potential to develop a holistic

quality assurance model informed by international best practices while adapted to its own cultural and institutional context. This presents a strategic opportunity to support teacher professional development sustainably and enhance the overall quality of the education system.

4.2. Limitations and directions for future research

Although this study comprehensively compares teacher professional development and quality assurance systems in four high-capacity countries, it has limitations. The analysis is based primarily on secondary sources such as policy documents, academic studies, and international reports, which may restrict the ability to capture local variations and teachers’ lived experiences. Moreover, while illuminating, the focus on Japan, Germany, Finland, and the United States excludes other contexts that could provide additional insights into alternative professional development and quality assurance models.

Future research may benefit from expanding the comparative scope to include other countries, particularly those with emerging or rapidly reforming teacher education systems. In addition, integrating qualitative data such as interviews with policymakers, teacher educators, and practitioners could enrich the findings by capturing perspectives beyond written documents. Mixed-methods approaches that combine large-scale survey data with qualitative insights could also offer a more holistic understanding of how teacher professional development and quality assurance are experienced in practice. Finally, longitudinal studies examining the long-term effects of reforms, particularly in Türkiye following the 2024 Teaching Profession Law, would provide valuable evidence for assessing the sustainability and impact of new policies.

5. Conclusion

This study examined the approaches to quality management in teacher professional development in Japan, Germany, Finland, and the United States, and compared them with recent regulations in Türkiye. The findings reveal that each country has developed models suited to its historical, cultural, and institutional context. In Japan, collective learning through “lesson study” practices is emphasized; in Germany, the federal structure ensures multi-stakeholder quality assurance mechanisms; in Finland, professional responsibility is grounded in trust and autonomy; and in the United States, a standards-based, multi-actor system of accreditation and certification prevails. In Türkiye, the Teaching Profession Law, enacted in 2024, and the establishment of the National Education Academy have made significant contributions by addressing professional development and quality assurance processes in a more holistic, planned, and institutionalized framework.

Several strategic recommendations can be made for Türkiye in light of these comparisons. First, models that encourage collaborative teacher learning, as seen in Japan, could be adapted and expanded through school-based professional development practices. As in Germany, the inclusion of independent quality evaluation institutions could contribute to monitoring teacher professional development with objective data. Inspired by Finland’s trust-based approach, policies that strengthen teachers’ professional autonomy in Türkiye could be reinforced, thereby supporting teachers’ individual responsibility for professional growth more effectively. The multi-actor structure evident in the United States underscores the importance of strengthening partnerships with universities, professional organizations, and independent institutions in Türkiye.

In conclusion, Türkiye’s ongoing reform process has the opportunity to adapt international best practices to its own socio-cultural context. In this regard, enhancing transparency, continuity, and participation in quality assurance and professional development processes; supporting teachers throughout their career stages; and strengthening professional development through school-based learning communities are critical. Steps taken in this direction will improve teachers’ professional competencies and contribute to the overall quality of the education system. This study examines teacher professional development and quality assurance through a comparative analysis of four countries. It offers context-sensitive policy recommendations for Türkiye’s ongoing reform process, informed by international best practices.

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Author Biography: Mehmet Arslan works at the Presidency of National Education Academy, Ministry of National Education, Republic of Türkiye. Research interests include educational management, teacher education, professional competencies, quality, organizational learning, and teacher identity.

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