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Professional Development of Vocal Teachers in Cultural and Arts Education Institutions in Ukraine Within the Context of the Competence-Based Approach

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Abstract

This study examines the theoretical, methodological, and regulatory foundations of the professional development of vocal teachers in cultural and arts education institutions in Ukraine within the competence-based approach. The research aims to identify key professional competences and develop an integrated model for improving vocal teachers' professional development. The methodology combines theoretical analysis, literature synthesis, comparative analysis, qualitative document analysis, and conceptual modelling, incorporating competence-based, sociocultural, activity-based, and systemic approaches. The conceptual synthesis proposes six interconnected dimensions of professional competence: artistic and vocal performance, pedagogical and methodological, digital, communicative and intercultural, reflective and professional development, and socio-emotional and adaptive competences. Cultural-creative technologies are conceptualised as instruments for promoting artistic innovation, professional collaboration, reflective practice, and continuous learning. A structural-functional model comprising methodological, organisational-technological, substantive, and evaluative components is proposed. The conceptual contribution lies in integrating professional competence development with cultural-creative practices and the institutional characteristics of Ukrainian arts education. The proposed framework offers provisional practical guidance for designing professional development programmes, improving institutional support mechanisms, and establishing competence-oriented assessment criteria. The study emphasises the importance of professional adaptability, cultural responsibility, and lifelong learning in strengthening vocal education in Ukraine. Further empirical validation is required to evaluate the model's effectiveness across educational settings.

Keywords: vocal teachers; professional development; competence-based approach; cultural and arts education; vocal pedagogy; cultural-creative technologies; Ukraine

1. INTRODUCTION

The contemporary transformation of cultural and arts education in Ukraine has intensified the need to reconsider the professional development of vocal teachers within the framework of the competence-based approach. Changes in educational paradigms, the growing importance of student-centred learning, the integration of digital technologies into artistic education, and the challenges associated with war-related disruption have significantly affected the professional responsibilities of educators working in music and arts institutions. In this context, the professional competence of vocal teachers can no longer be understood exclusively in terms of their artistic qualifications, performance experience, or mastery of traditional vocal teaching methods. Instead, it requires the continuous development of an integrated set of artistic, pedagogical, methodological, communicative, digital, intercultural, and reflective competences that enable educators to respond effectively to changing educational conditions and the individual needs of learners.

One of the fundamental challenges facing contemporary arts education is the potential discrepancy between the objectives and organisational practices of educational institutions and the creative aspirations, cultural interests, and professional expectations of learners. Traditional approaches to vocal education, predominantly based on the transmission of established performance techniques and the reproduction of artistic models, may not fully address students' needs for creative autonomy, self-expression, interdisciplinary collaboration, and professional self-realisation. Such discrepancies can negatively affect learning motivation, artistic initiative, and the development of professional identity. Overcoming these limitations requires a reconsideration of the role of vocal teachers as facilitators of artistic development, mentors, and active participants in creating an inclusive and culturally responsive educational environment.

The competence-based approach provides a conceptual framework for addressing these challenges by shifting the emphasis from the accumulation of theoretical knowledge and technical skills towards the ability to apply them effectively in complex professional and educational situations. In vocal pedagogy, this approach involves the integration of vocal performance proficiency with pedagogical knowledge, methodological flexibility, psychological awareness, artistic interpretation, and the capacity to support individual learning trajectories. Accordingly, the professional development of vocal teachers should be regarded as a continuous and multidimensional process encompassing formal professional learning, non-formal educational activities, collaborative artistic practice, pedagogical reflection, and independent professional improvement.

The relevance of this approach is reinforced by the national regulatory framework governing education and professional development in Ukraine. The Law of Ukraine "On Education" No. 2145-VIII of 5 September 2017, particularly Article 59, establishes continuous self-education, participation in professional development programmes, and other forms of professional growth as essential components of the professional development of teaching and academic staff [1]. The Procedure for the Professional Development of Teaching and Academic Staff, approved by Resolution of the Cabinet of Ministers of Ukraine No. 800 of 21 August 2019, as amended, provides an institutional framework for organising professional learning through various forms and activities [2]. These provisions create opportunities for vocal teachers to develop their competences through specialised training, internships, workshops, masterclasses, educational projects, and other recognised professional learning activities.

The competence-oriented transformation of music education is also reflected in Ukrainian higher education standards. The bachelor's standard for specialty 025 "Musical Art," approved by Ministry of Education and Science Order No. 727 of 24 May 2019, specifies professional competences and programme learning outcomes [3]. The revised classification introduced by Cabinet of Ministers Resolution No. 1021 of 30 August 2024 lists music under specialty B5 "Musical Art" [4]. These references concern different regulatory instruments: the classification identifies a field of study, whereas a standard specifies educational requirements. Institutions therefore need to identify the standard and transitional arrangements applicable to each programme and intake. For vocal teachers, competence-oriented programme design creates a need to update performance expertise alongside the ability to connect teaching methods, assessment activities, and students' individual artistic development with clearly stated learning outcomes.

At the same time, the professional development of vocal teachers in Ukraine takes place under circumstances that substantially complicate the organisation and continuity of arts education. The consequences of Russia's full-scale invasion of Ukraine in 2022, including population displacement, interruptions to face-to-face learning, security restrictions, and unequal access to educational infrastructure, have increased the importance of professional adaptability and pedagogical resilience. Vocal teachers are increasingly required to combine traditional individual instruction with distance or blended learning, employ digital resources for musical communication and performance analysis, and maintain students' motivation and psychological well-being in unstable educational environments. These developments highlight the importance of competences that extend beyond conventional vocal training, particularly digital literacy, inclusive pedagogical practice, emotional responsiveness, and the ability to ensure continuity of artistic learning.

An additional dimension of this transformation concerns the cultural and social mission of vocal education. As institutions responsible for transmitting and renewing national artistic traditions, cultural and arts education providers

contribute to the preservation of Ukraine's musical heritage, the development of cultural identity, and the promotion of intercultural dialogue. Vocal teachers play a central role in these processes by introducing students to national and international vocal repertoires, encouraging artistic interpretation, supporting participation in cultural initiatives, and facilitating creative collaboration. Consequently, their professional development should incorporate not only performance-related and pedagogical competences but also the capacity to integrate cultural heritage, contemporary artistic practices, and participatory cultural activities into educational programmes.

Despite the growing significance of competence-based education, the relationship between the professional development of vocal teachers and the specific institutional, methodological, and sociocultural conditions of Ukrainian arts education requires further structured examination. General approaches to teacher professional development do not always adequately reflect the distinctive characteristics of vocal pedagogy, including the individualised nature of vocal instruction, the interaction between physiological and psychological aspects of voice production, the importance of artistic interpretation, and the integration of teaching with performance practice. Furthermore, the relationship between regulatory requirements for professional development and their practical implementation in different types of cultural and arts education institutions warrants particular attention.

This reveals a central research problem: although competence-based principles and continuing professional development are embedded in the Ukrainian educational framework, the practical mechanisms for developing and integrating the specific professional competences required of vocal teachers remain insufficiently systematised. Addressing this problem requires an integrated perspective that connects educational legislation, competence-based pedagogy, the distinctive demands of vocal instruction, and the institutional conditions supporting continuous professional learning.

The aim of this study is to examine the theoretical, regulatory, and pedagogical foundations of the professional development of vocal teachers in cultural and arts education institutions in Ukraine within the context of the competence-based approach and to identify the principal competences, organisational conditions, and professional development mechanisms necessary for improving the quality of vocal education.

To achieve this aim, the study focuses on analysing the Ukrainian regulatory framework for continuing professional development; identifying the structural components of vocal teachers' professional competence; examining contemporary approaches to competence-oriented vocal pedagogy; and determining the pedagogical and institutional conditions that support professional growth, artistic innovation, and adaptation to changing educational circumstances.

The proposed contribution of the study lies in the development of an integrated conceptual understanding of vocal teachers' professional development that connects artistic mastery with pedagogical effectiveness, digital adaptability, cultural responsibility, and lifelong professional learning. By considering the specific conditions of cultural and arts education in Ukraine, the study seeks to provide a foundation for improving professional development programmes, strengthening institutional support mechanisms, and advancing competence-based approaches to vocal pedagogy.

2. LITERATURE REVIEW

The professional development of vocal teachers has become an increasingly significant area of research at the intersection of music pedagogy, competence-based education, lifelong learning, and cultural studies. Contemporary scholarship reflects a gradual transition from traditional understandings of teaching professionalism, primarily associated with subject-specific expertise and the transmission of artistic skills, towards multidimensional models that integrate pedagogical knowledge, artistic performance, technological competence, professional identity, and reflective practice. Nevertheless, the specific mechanisms through which these dimensions interact in the professional development of vocal teachers require further investigation, particularly within the institutional and sociocultural context of Ukrainian cultural and arts education.

An important contribution to the conceptualisation of professional competence in music education was made by Puffer and Hofmann [5], who developed an empirically grounded model of music teachers' professional competences. Their research distinguishes professional knowledge, situation-specific teaching abilities, and artistic-musical skills within a model of music teacher competence. The significance of this model lies in its recognition that the professional effectiveness of music educators cannot be adequately explained through general pedagogical competence alone. Music teaching involves specific forms of artistic communication, musical interpretation, practical performance, and situation-dependent instructional decision-making. This perspective provides a relevant starting point for considering vocal teachers, whose professional responsibilities involve the simultaneous application of vocal technique, pedagogical diagnosis, artistic interpretation, and individualised instructional strategies.

The distinction between general pedagogical competence and discipline-specific artistic expertise is further developed in the literature on music teacher professional development. Zhang et al. [6], in their review of the factors influencing music teachers' professional development, identify both internal and external determinants of professional growth. Internal factors include professional experience, individual beliefs, and personal characteristics, whereas external factors encompass the relevance of professional development content, opportunities for autonomous learning, collegial support, and lifelong learning. Particularly important is their observation that music teachers frequently need to reconcile artistic

and pedagogical professional identities. This dual professional orientation creates particular requirements for professional training, institutional support, and continuing education. It should be examined in relation to the specific teaching role rather than assumed to distinguish all music educators uniformly from colleagues in other disciplines.

In the context of vocal education, the interaction between artistic and pedagogical professionalism becomes especially complex. Vocal teachers are expected not only to demonstrate advanced singing and interpretative abilities but also to possess knowledge of vocal physiology, breathing coordination, phonation, articulation, stylistic interpretation, and age-appropriate vocal development. Such expertise must be accompanied by the capacity to identify individual learning needs, adapt teaching methodologies, provide constructive feedback, and create psychologically supportive learning environments. Accordingly, vocal teachers' professional competence should be understood as an integrated capacity to transform artistic and specialised knowledge into effective educational practices rather than merely as the possession of technical performance skills.

Recent research supports the need to expand traditional approaches to vocal teacher preparation. Li et al. [7], in a scoping review of twenty-first-century skills in vocal pedagogy, identify a movement towards reflective, student-centred, technologically supported, and culturally responsive educational practices. Their review highlights the growing importance of creativity, critical thinking, communication, collaboration, digital literacy, and intercultural awareness in contemporary vocal education. At the same time, the authors identify significant obstacles to the implementation of these competences, including rigid curricula, insufficient teacher preparation, unequal technological resources, and limitations in professional development opportunities. These findings suggest that the modernisation of vocal education depends not only on the revision of educational content but also on systematic changes in the professional development of teachers responsible for implementing new pedagogical approaches.

The competence-based approach is therefore closely related to changes in the educational role of the vocal teacher. Whereas traditional models often position the teacher as the principal source of artistic knowledge and an authoritative interpreter of performance standards, contemporary learner-centred approaches emphasise the teacher's role as a facilitator of creative development, a mentor, and a reflective practitioner. This transformation requires pedagogical flexibility, the ability to support individual artistic trajectories, and the capacity to encourage students' independent interpretation and creative decision-making. The findings of Li et al. [7] indicate that the integration of cognitive, creative, technological, socio-emotional, and cultural dimensions may provide a productive basis for the further development of contemporary vocal pedagogy.

An additional perspective is offered by Bennett and Moore [8], who investigate norm-disruptive learning and competency development among music teachers. Their thematic synthesis examines professional learning experiences that challenge established assumptions, teaching practices, and repertoire traditions. From this perspective, the development of professional competence involves not only the acquisition of additional knowledge and skills but also the critical reconsideration of existing pedagogical beliefs and established professional norms. For vocal teachers, this perspective is significant because traditional methods of artistic training can be strongly influenced by individual performance schools, inherited teaching practices, and established notions of artistic excellence. Reflective reconsideration of these traditions may encourage more inclusive, culturally responsive, and pedagogically flexible approaches to vocal instruction.

Research on collaborative professional learning provides further insights into effective mechanisms of music teacher development. Verdi [9] examines the potential of professional learning communities as a means of strengthening collaboration, exchanging pedagogical experience, and promoting reflective teaching practices among music educators. Professional learning communities can provide teachers with opportunities to discuss instructional challenges, evaluate teaching strategies, and develop shared approaches to educational improvement. Their relevance is particularly evident in artistic education, where individualised teaching practices and specialised disciplinary requirements may limit opportunities for systematic professional collaboration.

Similar conclusions emerge from the case study conducted by Rolandson and Ross-Hekkel [10], which explores the role of virtual professional learning communities in supporting music teachers working in rural educational environments. The study demonstrates the potential of online professional collaboration as a mechanism for addressing geographical isolation and facilitating engagement with specialised pedagogical approaches. Although the findings derive from a small, context-specific sample, they provide a useful basis for considering how digital professional networks may support educators who experience restricted access to conventional professional development opportunities. In Ukraine, such mechanisms are potentially relevant to vocal teachers working in geographically dispersed institutions or under conditions that limit physical mobility and face-to-face educational interaction.

Digital competence constitutes another increasingly important component of contemporary teaching professionalism. The European Framework for the Digital Competence of Educators (DigCompEdu), developed by Redecker [11], provides a systematic approach to conceptualising teachers' digital competences across professional engagement, digital resources, teaching and learning, assessment, learner empowerment, and the facilitation of learners' digital competence. Although this framework was not developed specifically for music education, its structure offers a valuable reference point for

examining the digital transformation of vocal teaching. In particular, the application of digital technologies in vocal pedagogy requires educators to adapt methods of instructional communication, organise online and blended learning, evaluate recorded performances, provide individual feedback, and select appropriate digital resources.

However, digital transformation in vocal education cannot be understood as the simple replacement of face-to-face instruction with online communication. Vocal performance involves complex interactions between breathing, phonation, posture, auditory perception, and embodied musical expression. The limitations of digital sound transmission and remote observation therefore require specific methodological adjustments. In this regard, digital competence must be integrated with vocal-pedagogical expertise and professional judgement. The development of technological skills without corresponding methodological competence may be insufficient to ensure the quality and effectiveness of vocal instruction.

The cultural dimension of music teacher professional development has also received increasing attention in international scholarship and educational policy. The UNESCO Framework for Culture and Arts Education [12] emphasises the importance of integrating culture and the arts into educational systems, strengthening cultural diversity, supporting creativity, and improving the professional preparation of educators. This international perspective suggests that professional competence in arts education should include the ability to connect artistic instruction with cultural heritage, social participation, intercultural understanding, and creative expression. In vocal education, these objectives may be pursued through the interpretation of national and international musical repertoires, the promotion of linguistic and stylistic diversity, and participation in community-oriented artistic initiatives.

For Ukraine, the cultural dimension of vocal pedagogy has additional significance because music education contributes to the preservation and development of national cultural heritage and artistic identity. The professional activities of vocal teachers may support the transmission of Ukrainian vocal traditions while encouraging engagement with European and global artistic practices. Accordingly, the development of intercultural and cultural competences should be considered an integral component of professional learning programmes for vocal educators. Such competences extend beyond repertoire knowledge and require an understanding of the educational, historical, linguistic, and social contexts in which musical works are created, interpreted, and performed.

War-related disruption has introduced further challenges that require specific attention within Ukrainian music pedagogy. Novosiadla [13], examining trauma-informed musical practices associated with Nigel Osborne in Ukrainian professional music-pedagogical education, highlights the relevance of psychological support and trauma-sensitive artistic approaches in preparing music educators for professional work during wartime and subsequent recovery. This research is particularly relevant to considering how the professional responsibilities of music teachers increasingly intersect with learners' emotional well-being and the broader social functions of arts education. At the same time, it is important to distinguish trauma-informed pedagogical practices from specialised clinical interventions, which require separate professional qualifications.

These considerations suggest that professional development programmes for Ukrainian vocal teachers should address psychological awareness, educational resilience, inclusive communication, and the adaptation of teaching methods to learners affected by displacement, interrupted education, or prolonged uncertainty. Nevertheless, such competences should complement rather than replace the central artistic and pedagogical functions of vocal education. An effective competence-based model must therefore balance the preservation of professional vocal standards with the flexibility necessary to respond to changing social and educational circumstances.

The Ukrainian regulatory framework provides an additional institutional dimension to the scholarly discussion. The Law of Ukraine "On Education" [1] establishes general principles of professional development and recognises continuing professional learning as a component of teaching professionalism. The Procedure for the Professional Development of Teaching and Academic Staff, approved by the Cabinet of Ministers of Ukraine [2], provides regulatory mechanisms for the organisation and recognition of professional learning activities. However, these provisions do not themselves constitute a specialised competency model for vocal teachers. Their practical implementation must therefore be considered in relation to the educational objectives, institutional resources, professional qualifications, and specific methodological requirements of different cultural and arts education institutions.

A synthesis of the reviewed literature reveals several interrelated tendencies. First, music teachers' professional competence is increasingly understood as a multidimensional construct combining disciplinary expertise with pedagogical and situational abilities [5]. Second, professional development depends on the interaction of individual motivation, professional identity, institutional support, and access to meaningful learning opportunities [6]. Third, contemporary vocal pedagogy places growing emphasis on learner-centred instruction, reflective practice, technological adaptability, and intercultural engagement [7]. Fourth, collaborative and virtual professional learning environments offer potentially valuable mechanisms for supporting continuous development, particularly where access to specialised training is limited [9, 10].

Despite these contributions, several limitations remain. Existing studies frequently address general music teachers rather than educators specialising in individual vocal instruction. Competence frameworks developed within school music

education cannot automatically be transferred to institutions providing specialised artistic training without considering the distinctive requirements of vocal performance and pedagogy. Furthermore, international models of professional development do not fully capture the specific regulatory and institutional conditions of Ukrainian cultural and arts education or the challenges associated with wartime educational disruption.

Consequently, a research gap can be identified at the intersection of competence-based pedagogy, vocal-specific professional requirements, continuing professional learning, and the Ukrainian institutional context. Further investigation is needed to determine how these dimensions can be incorporated into a coherent conceptual model of professional development that supports artistic excellence, pedagogical effectiveness, cultural responsibility, digital adaptability, and professional resilience. Addressing this gap provides the theoretical justification for the present study and establishes the basis for examining the competences and organisational conditions necessary to improve the professional development of vocal teachers in cultural and arts education institutions in Ukraine.

3. MATERIALS AND METHODS

The methodological framework of this study was designed to examine the professional development of vocal teachers in cultural and arts education institutions in Ukraine within the context of the competence-based approach. The study adopted a qualitative, interdisciplinary research design integrating pedagogical, sociocultural, activity-based, and competence-oriented perspectives. Professional development was conceptualised as a continuous process involving the acquisition, integration, and practical application of artistic, pedagogical, methodological, digital, communicative, and reflective competences. The principal methods included theoretical analysis and synthesis, comparative analysis, qualitative document analysis, thematic categorisation, and conceptual modelling. The design is best understood as an interpretive conceptual synthesis rather than a systematic review or an empirical evaluation of teacher development. These procedures were selected to identify relationships between teachers' professional responsibilities, Ukrainian educational legislation, institutional conditions, and contemporary models of continuing professional development [11, 14].

The competence-based approach provided the principal analytical perspective. It understands professional competence as the integrated ability to mobilise knowledge, skills, values, and professional judgement in particular educational situations. In vocal pedagogy, this encompasses technical and interpretative mastery, the design of individualised instructional strategies, assessment of students' progress, and responsiveness to different learning needs. An important methodological distinction was made between formal qualifications, participation in professional development activities, and demonstrable competence in teaching practice. Artistic performance experience alone was not treated as sufficient evidence of pedagogical competence.

Three questions organise this conceptual inquiry. First, which forms of professional capability need to be distinguished when performance expertise is considered alongside responsibility for teaching? Second, how might structured artistic and collaborative activities support learning in those areas? Third, what institutional arrangements and forms of evidence would be needed to examine that learning in practice? These questions connect the stated objectives to the proposed categories without treating the resulting model as an observed description of every Ukrainian institution. They also distinguish the conceptual justification of an activity from the separate empirical question of whether participation changes teaching or student learning.

The sociocultural approach was applied to interpret vocal education as an activity embedded in a broader cultural and institutional environment. It enabled analysis of the relationship between teachers' professional learning and the preservation, transmission, and renewal of artistic traditions, including Ukrainian musical heritage, intercultural communication, and participation in contemporary cultural practices. The activity-based approach, in turn, emphasised the practical and reflective character of professional learning. It considered lesson planning, individual vocal instruction, repertoire analysis, rehearsal, performance preparation, masterclasses, collaborative artistic projects, mentoring, and reflective assessment as possible contexts for professional competence development. The systemic approach made it possible to integrate methodological principles, organisational resources, professional learning content, and evaluation criteria within a common conceptual framework.

The research materials comprised Ukrainian legislative and policy documents, international education frameworks, and scholarly publications concerning music teacher professionalism, vocal pedagogy, competence-based education, and lifelong learning. National sources included the Law of Ukraine "On Education" No. 2145-VIII of 5 September 2017 and the Procedure for the Professional Development of Teaching and Academic Staff approved by Resolution of the Cabinet of Ministers of Ukraine No. 800 of 21 August 2019, as amended. These documents were examined for provisions governing continuing professional development, institutional responsibilities, and forms of professional learning. The analysis distinguished among arts schools, professional pre-higher education institutions, and higher education institutions, recognising that their regulatory conditions and staff roles are not identical. International reference points included the European Framework for the Digital Competence of Educators [11] and the UNESCO Framework for Culture and Arts Education [12]. They were used as comparative and conceptual resources rather than as binding legal norms in Ukraine.

The source types serve different analytical purposes. Legislation provides a basis for discussing formal responsibilities and recognition procedures; international frameworks supply comparative categories; and research publications offer context-specific findings and theoretical arguments. A recommendation in a policy document is not equivalent to an observed effect in a teaching study. Equally, a case study in another educational system does not establish how the same activity would function in a Ukrainian conservatoire or arts school. These distinctions limit the strength of claims that can be made from the combined materials and guide the interpretation of the proposed model.

The report does not specify a reproducible database search, a complete screening record, a fixed source-selection period, or independent coding procedures. Consequently, the cited works should be understood as an explicitly referenced conceptual corpus rather than an exhaustive representation of all relevant scholarship. Bowen's account of document analysis [14] provides methodological guidance, but citation of that guidance does not establish that every suggested procedure was implemented. The present report therefore makes no claim of systematic-review completeness, coding reliability, or saturation. Future work could strengthen reproducibility by documenting source inclusion criteria, versions of policy documents, coding decisions, and alternative interpretations.

The analysis proceeded through four interrelated operations. First, theoretical concepts—professional competence, professional identity, reflective practice, artistic-pedagogical expertise, continuing professional development, and creative self-realisation—were compared and synthesised. Second, provisions in the Ukrainian regulatory framework were interpreted alongside institutional expectations relevant to vocal teaching. Third, thematic categorisation was used to group professional requirements and learning opportunities into six proposed competence dimensions: artistic and vocal performance; pedagogical and methodological; digital; communicative and intercultural; reflective and professional development; and socio-emotional and adaptive. Fourth, these categories were integrated into a conceptual model relating professional learning activities to expected improvements in professional practice. The resulting classification was a research-generated analytical framework, not a previously validated assessment scale.

Particular attention was given to cultural-creative technologies as potential mechanisms of professional learning. In this study, they were defined operationally as structured and purposeful pedagogical-artistic practices that combine creative production, cultural participation, collaboration, and critical reflection. Relevant examples included vocal workshops, artistic laboratories, interdisciplinary educational projects, repertoire interpretation seminars, professional learning communities, festivals, and practice-oriented masterclasses. Their potential educational contribution was evaluated conceptually in terms of relevance to professional objectives, opportunities for active participation, feedback and reflection, and transfer of learning to teaching practice. Participation in such activities was not assumed, in itself, to demonstrate improved competence.

The term "cultural-creative technologies" is used here for organised pedagogical and artistic practices rather than specifically for software, devices, or automated systems. A workshop or collaborative performance project qualifies as a proposed professional learning activity when its aims, participant roles, feedback, and opportunities for subsequent application are made explicit. The label should not obscure differences between performing an artistic task, discussing teaching, and demonstrating a change in practice. These are analytically distinct events, and an evaluation would need evidence appropriate to each of them.

The proposed model comprised four mutually related components. The methodological component combined competence-based, sociocultural, activity-based, and systemic principles, emphasising continuity, individualisation, professional autonomy, creativity, inclusion, and reflection. The organisational-technological component incorporated professional development programmes, mentoring, workshops, creative laboratories, digital environments, professional networks, and independent study. The substantive component specified knowledge and skills relevant to vocal instruction, including voice production, artistic interpretation, teaching methodology, assessment, digital literacy, intercultural communication, and adaptability. The evaluative component identified potential indicators through which professional learning might be examined in subsequent empirical research.

The proposed indicators and corresponding assessment methods are presented in Table 1. Artistic competence was associated with vocal technique, stylistic interpretation, repertoire selection, and awareness of vocal health. Pedagogical competence related to instructional planning, individualisation, formative assessment, and feedback. Digital competence included appropriate use of instructional technologies and recorded performance, while acknowledging the acoustic and observational limitations of remote vocal teaching. Communicative and intercultural competence concerned collegial collaboration and culturally responsive practice. Reflective competence related to self-evaluation and the transfer of professional learning into teaching. Socio-emotional and adaptive competence concerned supportive learning conditions, inclusion, and appropriate responses to disruption or uncertainty.

The study was limited to documentary, theoretical, and conceptual analysis. No questionnaire survey, classroom observation, teacher interview, or pedagogical experiment was undertaken as part of the present research design. Consequently, the proposed competence dimensions and assessment indicators should not be interpreted as empirically validated findings or as evidence of causal effects of professional development programmes. Future investigations may test the model

using teacher questionnaires, semi-structured interviews, instructional observations, portfolios, expert assessment, and longitudinal measurements. Such validation would require explicit sampling criteria, suitable research ethics procedures, reliable instruments, and transparent analysis of the collected data. Within these limitations, the methodological framework establishes a basis for examining the professional development of vocal teachers as an integrated artistic, pedagogical, regulatory, and sociocultural process.

Table 1. *Proposed Analytical Framework For Assessing The Professional Development Of Vocal Teachers*

Competence dimension	Proposed assessment indicators	Potential assessment methods
Artistic and vocal performance	Vocal technique; artistic interpretation; repertoire selection; vocal-health awareness	Expert assessment; performance portfolio
Pedagogical and methodological	Lesson design; individualisation; student assessment; formative feedback	Lesson observation; teaching portfolio
Digital	Selection of digital resources; online/blended instruction; recorded -performance feedback	Digital portfolio; structured self-assessment
Communicative and intercultural	Professional collaboration; cultural responsiveness; inclusive repertoire	Interviews; reflective reports
Reflective and professional development	Self-evaluation; continuing learning; professional planning; application of new learning	Reflective journal; professional development portfolio
Socio-emotional and adaptive	Supportive learning environment; inclusion; responsiveness to disruption	Observation; interviews; scenario-based assessment

Note. The dimensions, indicators, and methods are proposed by the present conceptual synthesis. They have not been validated as a scale or rubric. Methods listed in this table are options for future evaluation, not procedures undertaken in the present study.

Table 1 presents the proposed analytical framework for assessing the professional development of vocal teachers in cultural and arts education institutions in Ukraine within the competence-based approach. The framework comprises six interrelated dimensions: artistic and vocal performance, pedagogical and methodological, digital, communicative and intercultural, reflective and professional development, and socio-emotional and adaptive competences. Each dimension is associated with specific indicators and potential assessment methods, enabling a comprehensive examination of the knowledge, practical skills, professional attitudes, and adaptive capacities required for effective vocal instruction. Particular attention is given to the integration of artistic expertise with contemporary pedagogical practices, digital technologies, cultural diversity, and continuous professional learning. The proposed framework also recognises the importance of professional resilience and adaptability in responding to the challenges currently affecting Ukrainian arts education. The identified indicators provide a conceptual basis for the design of professional development programmes, institutional self-assessment, and future empirical research. However, their application as standardised assessment criteria requires further empirical validation.

4. RESULTS AND DISCUSSION

The theoretical, comparative, and regulatory analysis undertaken in this study provided a basis for developing an integrated conceptual framework for the professional development of vocal teachers in cultural and arts education institutions in Ukraine. The principal conceptual proposition is that professional development within the competence-based approach should be understood not merely as the periodic acquisition of additional qualifications but as a continuous, structured, and context-sensitive process through which artistic, pedagogical, methodological, digital, communicative, and reflective capabilities are progressively integrated into professional practice. This interpretation broadens the understanding of vocal teacher professionalism by connecting individual artistic expertise with institutional educational objectives, sociocultural responsibilities, and the changing requirements of contemporary music education.

The analysis highlighted the conceptual importance of distinguishing between professional qualification, professional competence, and professional development. Professional qualification refers to formally recognised educational or occupational preparation, whereas professional competence concerns the integrated application of relevant knowledge, skills, professional judgement, and attitudes in practical teaching situations. Professional development, in turn, represents the process through which these capabilities are maintained, strengthened, and transformed throughout an educator's career. This distinction is particularly important for vocal teachers, whose professional identity frequently combines artistic performance and pedagogical responsibilities. Although advanced performance expertise constitutes an essential foundation for vocal instruction, it does not automatically ensure the capacity to individualise learning, evaluate educational progress, address learners' psychological needs, or employ contemporary instructional technologies.

This interpretation is consistent with Puffer and Hofmann [5], who conceptualised music teachers' professional competence through the interaction of professional knowledge, situation-specific abilities, and artistic-musical skills. However, the present study extends the application of this multidimensional perspective to the specialised context of vocal pedagogy by incorporating the sociocultural and institutional conditions of professional development in Ukraine. The proposed

approach recognises that professional competence is manifested not only through the quality of vocal demonstrations and artistic interpretations but also through the teacher's ability to transform specialised artistic knowledge into pedagogically appropriate learning experiences.

The conceptual synthesis identified six interrelated dimensions of vocal teachers' professional competence: artistic and vocal performance, pedagogical and methodological, digital, communicative and intercultural, reflective and professional development, and socio-emotional and adaptive competence. These dimensions should not be interpreted as independent or mutually exclusive characteristics. Instead, they represent interconnected components of professional activity that become relevant in different combinations depending on the educational situation, students' learning needs, institutional resources, and artistic objectives.

Artistic and vocal performance competence constitutes the discipline-specific foundation of vocal teaching. It encompasses knowledge and practical understanding of vocal technique, sound production, musical interpretation, stylistic conventions, repertoire selection, and the principles of healthy voice use. Nevertheless, the findings of the conceptual analysis indicate that artistic expertise becomes pedagogically meaningful only when it can be effectively communicated, demonstrated, adapted, and evaluated within an educational relationship. Consequently, a competence-based understanding of artistic professionalism requires the integration of performance proficiency with an ability to analyse vocal difficulties, explain technical processes, and select appropriate corrective strategies.

Pedagogical and methodological competence provides the mechanism through which artistic knowledge is transformed into meaningful learning outcomes. It includes instructional planning, individualisation, formative assessment, constructive feedback, and the selection of methods appropriate to learners' age, vocal development, previous musical preparation, and artistic interests. Within the proposed model, professional development should therefore address not only the expansion of teachers' methodological repertoire but also their ability to justify pedagogical decisions and evaluate their consequences for students' learning.

The importance of this dimension is reinforced by Li et al. [7], whose scoping review identifies a broader transition in vocal pedagogy towards student-centred, reflective, and creatively oriented approaches. Their findings suggest that contemporary vocal education increasingly requires the integration of technical instruction with communication, critical thinking, collaboration, digital literacy, and cultural responsiveness. The present study interprets these developments from the perspective of teacher professional development, identifying the acquisition of relevant pedagogical capabilities as a necessary condition for introducing competence-oriented approaches into vocal instruction.

Digital competence was proposed as another important dimension of professional development. In the proposed model, it involves more than the ability to operate digital devices or communication platforms. It includes the pedagogically appropriate selection of technologies for instructional planning, recorded-performance analysis, individual feedback, professional communication, and blended learning. Digital competence also requires awareness of the limitations of remote vocal teaching, particularly where sound transmission, acoustic conditions, and the observation of physiological aspects of singing may affect instructional accuracy.

The DigCompEdu framework [11] offers a useful conceptual foundation for differentiating between the technical and pedagogical dimensions of digital competence. Nevertheless, its general educational categories require adaptation to the characteristics of individual vocal instruction. For example, the educational value of audio recordings, video analysis, and digital feedback should be considered in relation to the specific objectives of vocal training rather than assessed exclusively through the frequency of technology use. Accordingly, the proposed approach prioritises pedagogical suitability, accessibility, and professional judgement over technological novelty.

Communicative and intercultural competence was identified as particularly relevant to the sociocultural mission of Ukrainian cultural and arts education institutions. Vocal education functions not only as a means of acquiring performance skills but also as a process through which students encounter artistic traditions, linguistic practices, cultural meanings, and forms of collective expression. The professional development of vocal teachers should therefore include the ability to work with culturally diverse repertoires, communicate effectively with students and professional colleagues, support artistic collaboration, and integrate national cultural heritage into contemporary educational practice.

The UNESCO Framework for Culture and Arts Education [12] provides an international policy perspective supporting the integration of creativity, cultural diversity, and cultural participation into educational development. Within the Ukrainian context, the proposed model recognises the particular importance of national vocal traditions and the role of artistic education in cultural continuity. However, cultural responsibility should not be understood as restricting artistic education to a predetermined repertoire. Instead, it requires a balance between preserving Ukrainian cultural heritage and developing intercultural understanding through engagement with European and international musical practices.

Reflective and professional development competence represents the capacity of vocal teachers to critically evaluate their professional practice, identify learning needs, and make informed decisions about further professional growth. This dimension connects professional autonomy with responsibility for maintaining and updating professional knowledge. The analysis suggests that meaningful professional development requires more than attendance at seminars, courses, or

workshops. It also involves the application of acquired knowledge, evaluation of its suitability for specific teaching situations, and continued adjustment of professional strategies.

Socio-emotional and adaptive competence acquires particular significance under conditions of prolonged educational uncertainty. In Ukraine, wartime disruption, population displacement, and the reorganisation of educational processes have increased the importance of flexible teaching arrangements and psychologically supportive learning environments. For vocal teachers, this competence involves the ability to recognise changes in students' educational needs, establish respectful pedagogical communication, adapt instructional formats, and maintain continuity in artistic learning. Such professional capabilities are complementary to artistic and methodological expertise and do not imply that teachers should perform clinical psychological functions.

A further conceptual finding concerns the role of cultural-creative technologies as an instrument of competence-oriented professional development. Based on the synthesis of pedagogical and sociocultural approaches, cultural-creative technologies are defined in this study as structured and purposeful forms of artistic-pedagogical interaction that combine creative activity, professional reflection, cultural communication, and practical application of specialised knowledge. Their distinguishing characteristic is the integration of cultural creation with professional learning, allowing the educator to participate actively in the production, interpretation, and transmission of artistic meanings.

This definition differs from approaches in which cultural-creative activities are understood primarily as instruments for developing students' creativity or organising extracurricular participation. In the proposed framework, vocal teachers themselves are considered active participants in cultural creation, and professionally oriented cultural-creative activities are understood as potential mechanisms for strengthening their artistic, methodological, communicative, and reflective competences.

The analysis proposed several forms of cultural-creative activity for possible incorporation into professional development programmes. Vocal laboratories and creative workshops may provide opportunities for examining vocal techniques, discussing methodological problems, experimenting with interpretative approaches, and exchanging professional experience. Collaborative artistic projects may support the integration of performance practice with communication, organisational skills, and intercultural engagement. Repertoire research and historically informed artistic reconstruction may encourage the exploration of musical heritage, stylistic traditions, and the relationship between historical interpretation and contemporary performance. Digital creative projects may support the production of educational recordings, methodological resources, and technology-assisted teaching materials.

Professional learning communities and mentoring arrangements represent an additional organisational mechanism through which cultural-creative and competence-based activities can be connected. Their potential significance lies in creating opportunities for continuing dialogue, peer feedback, collaborative problem-solving, and reflection on teaching practices. However, professional collaboration should be structured around clearly identified learning objectives if it is to constitute a meaningful component of professional development rather than informal professional communication alone.

The pedagogical potential of cultural-creative technologies can be interpreted through four interrelated mechanisms. The first is experiential learning, whereby professional knowledge is developed through participation in authentic artistic and educational activities. The second is reflective transformation, through which teachers reconsider established instructional strategies in response to professional experience and feedback. The third is collaborative knowledge development, which involves the exchange and adaptation of professional approaches within artistic and educational communities. The fourth is creative self-realisation, understood as the meaningful development and expression of an educator's artistic and pedagogical capacities.

These mechanisms offer a conceptual explanation of how cultural-creative activities may contribute to professional growth. Nevertheless, their effectiveness cannot be assumed solely on the basis of their artistic or participatory characteristics. A cultural project, festival, masterclass, or performance initiative becomes an instrument of professional development when its objectives, activities, feedback procedures, and reflective components are explicitly connected to relevant professional competences.

Another result of the analysis is the formulation of an integrated structural-functional model for the professional development of vocal teachers. The model comprises four interconnected components: methodological, organisational-technological, substantive, and evaluative. Its structure reflects the understanding that professional development depends simultaneously on theoretical orientation, available learning opportunities, relevant professional content, and mechanisms for evaluating the application of acquired competences.

The methodological component establishes the foundational approaches and principles guiding professional learning. Its central principles include professional continuity, pedagogical individualisation, the integration of artistic and educational practice, reflective autonomy, creative engagement, accessibility, and responsiveness to institutional and sociocultural conditions. These principles are intended to support professional learning that is purposeful and adaptable rather than restricted to uniform training programmes.

The organisational-technological component includes the institutional arrangements, educational formats, and resources

necessary to support professional development. Relevant arrangements may include continuing education programmes, specialised masterclasses, vocal laboratories, professional mentoring, artistic collaborations, digital learning environments, and professional networks. Their selection should depend on the professional needs of teachers, the educational objectives of the institution, and the practical accessibility of relevant resources.

The substantive component specifies the professional competences to be developed and provides a foundation for aligning professional learning activities with expected outcomes. It integrates artistic mastery, pedagogical methodology, digital literacy, intercultural communication, reflective practice, and adaptive professional behaviour. The competence areas are interconnected, and their relative importance may vary according to the teaching context, educational level, institutional responsibilities, and professional experience of the educator.

The evaluative component connects professional development objectives with observable indicators of professional practice. Within the proposed model, evaluation should extend beyond participation records or certificates of course completion. Relevant forms of evidence may include teaching portfolios, documented changes in lesson planning, reflective reports, demonstration of teaching strategies, peer feedback, and the quality of educational materials developed during professional learning. These indicators may support formative evaluation, although the establishment of standardised levels of competence requires further empirical investigation.

The relationship between the four components can be conceptualised as a continuous developmental cycle. Professional needs and institutional priorities inform the selection of learning objectives; these objectives guide the organisation of relevant educational and cultural-creative activities; participation creates opportunities for acquiring and applying professional knowledge; and reflective evaluation informs subsequent professional development decisions. Such a cycle makes it possible to connect professional learning with the practical responsibilities of vocal teachers and the broader educational mission of cultural and arts institutions.

A hypothetical application illustrates the distinction between activity and outcome. A teacher could identify a need to improve feedback on recorded performances, participate in a peer workshop, revise a feedback protocol, and document its use in subsequent lessons. Workshop attendance would indicate participation; the revised protocol and lesson records would indicate an attempted change in practice. Evidence of improved student understanding would require an additional assessment designed for that purpose. This example illustrates how the model might organise professional learning and does not report an intervention conducted in the present study. Table 1 offers possible evidence sources for such future applications without prescribing numerical competence levels.

From a regulatory perspective, the proposed model complements the framework established by Ukrainian educational legislation. Article 59 of the Law of Ukraine "On Education" [1] recognises professional development and continuing learning as important elements of teaching professionalism. Resolution No. 800 of the Cabinet of Ministers of Ukraine [2], as amended, establishes procedural requirements concerning professional development for the categories of educational personnel covered by the regulation. These provisions provide a legal context for developing structured professional learning activities; however, the specific recognition of particular activities must be assessed according to the applicable requirements and institutional circumstances.

A significant implication of the regulatory analysis is that formal compliance with professional development requirements should be distinguished from the substantive improvement of professional competence. The completion of a course or the accumulation of documented learning hours may demonstrate participation in professional development but does not, by itself, establish improvement in teaching practice. Therefore, the proposed framework emphasises the need to connect formal professional learning with reflective and practice-oriented evaluation.

The institutional application of the model also requires differentiation between arts schools, professional pre-higher education institutions, and higher education institutions. These organisations may differ in their educational objectives, staff qualifications, teaching responsibilities, professional development arrangements, and available resources. Consequently, a universal model should function as an adaptable conceptual framework rather than as an identical programme imposed across all categories of cultural and arts education institutions.

Local adaptation would also require attention to time, access, and workload. A professional learning plan may be difficult to implement when participation depends on unpaid travel, unreliable connectivity, or resources unavailable to particular teachers. Institutions could therefore compare the accessibility of proposed formats before assigning activities, while allowing different routes towards the same learning objective. These are design considerations within the proposed framework, not findings about the prevalence of particular barriers in the institutions discussed. Their relative importance would need to be established through local consultation and subsequent empirical investigation.

The theoretical contribution of the present study consists primarily in integrating competence-based professional development with the sociocultural and creative functions of vocal pedagogy. Whereas existing approaches to professional competence emphasise the interaction of pedagogical knowledge, professional judgement, and artistic abilities [5], the proposed model explicitly incorporates institutional learning mechanisms, cultural-creative activities, and the Ukrainian educational context into a unified developmental structure.

The findings also extend the implications of Li et al. [7], who highlight the relevance of cognitive, creative, technological, socio-emotional, and cultural capabilities for contemporary vocal education. The present study shifts the analytical emphasis from the competences promoted in vocal learners to the professional competences required of teachers who design and facilitate such learning. This distinction is important because student-centred educational reform requires corresponding changes in teachers' professional preparation, methodological resources, and opportunities for continuing development.

The resulting conceptual framework further suggests that the professional development of vocal teachers should not be limited to conventional instructional courses. A broader combination of specialised training, professional collaboration, artistic production, pedagogical experimentation, reflective evaluation, and engagement with cultural heritage may provide a more comprehensive foundation for professional learning. In this respect, cultural-creative technologies can be understood as a bridge between the artistic and pedagogical dimensions of teacher professionalism.

The practical significance of the proposed framework lies in its potential application to the planning and evaluation of professional development activities. Cultural and arts education institutions may use the six competence dimensions to identify priority areas of professional learning, align training opportunities with teaching responsibilities, and develop locally appropriate systems of mentoring, collaboration, and reflective assessment. Professional development providers may also use the framework to design interdisciplinary programmes combining vocal performance, pedagogical methodology, digital instruction, and cultural communication.

The analysis nevertheless identifies important limitations. The proposed model is based on theoretical synthesis and documentary interpretation and has not been subjected to experimental testing or quantitative validation. Consequently, the study does not establish that particular cultural-creative technologies produce measurable improvements in teachers' professional performance or students' educational outcomes. The proposed relationships should be understood as theoretically grounded propositions requiring further investigation.

Future empirical research should therefore examine the applicability of the model across different types of Ukrainian cultural and arts education institutions. Surveys, semi-structured interviews, observation of teaching practice, expert assessment, and analysis of professional portfolios could be used to identify the professional learning needs of vocal teachers and explore the relationships between participation in professional development activities and changes in professional practice. Comparative research involving institutions with different organisational characteristics could also clarify how institutional resources, teaching experience, and regional conditions influence the implementation of competence-based professional development.

Overall, the results of the conceptual analysis indicate that professional development in contemporary vocal education should be considered an integrated process connecting artistic expertise, pedagogical responsibility, professional autonomy, cultural participation, and institutional support. The proposed model offers a provisional theoretical foundation for organising this process within the competence-based approach and offers a basis for developing context-sensitive professional learning programmes in Ukrainian cultural and arts education institutions. Its principal contribution lies in treating cultural-creative technologies not as isolated educational activities but as potential elements of a coherent system of professional competence development.

5. CONCLUSIONS

The study has examined the theoretical, methodological, and regulatory foundations of the professional development of vocal teachers in cultural and arts education institutions in Ukraine within the context of the competence-based approach. The findings indicate that the transformation of contemporary arts education requires a reconsideration of traditional models of teacher professionalism and a transition towards integrated, continuous, and practice-oriented professional development. In this context, professional competence extends beyond vocal performance proficiency and specialised artistic knowledge to encompass pedagogical effectiveness, methodological adaptability, digital literacy, intercultural communication, reflective practice, and the capacity to respond to changing educational conditions.

The theoretical analysis proposed six interconnected dimensions of vocal teachers' professional competence: artistic and vocal performance, pedagogical and methodological, digital, communicative and intercultural, reflective and professional development, and socio-emotional and adaptive competence. Their integration provides a conceptual foundation for understanding professional development as a multidimensional process in which artistic expertise is continuously transformed into effective pedagogical practice. The proposed classification also emphasises that the quality of vocal education depends not only on the teacher's individual artistic achievements but also on the ability to create supportive learning environments, implement student-centred instructional strategies, and facilitate learners' creative and professional self-realisation.

An important theoretical contribution of the research is the conceptualisation of cultural-creative technologies as purposeful, structured, and potentially transferable forms of artistic and pedagogical activity that support professional learning through creativity, collaboration, cultural participation, and critical reflection. The study establishes a conceptual

distinction between the application of cultural-creative technologies for students' artistic development and their use as instruments for strengthening teachers' professional competences. Vocal laboratories, creative workshops, collaborative performance projects, professional learning communities, artistic reconstruction, and digital educational initiatives were identified as potentially relevant mechanisms for connecting artistic experience with continuing professional development. Their potential effectiveness, however, depends on clearly defined learning objectives, appropriate institutional support, structured feedback, and opportunities to apply acquired competences in professional practice.

The research further proposes an integrated structural-functional model of vocal teachers' professional development consisting of four interrelated components: methodological, organisational-technological, substantive, and evaluative. The methodological component establishes the principles of continuity, individualisation, creative activity, reflective autonomy, and integration of artistic and pedagogical learning. The organisational-technological component encompasses the institutional mechanisms and educational formats through which professional development may be implemented. The substantive component specifies the knowledge, skills, and professional capabilities required for contemporary vocal instruction, while the evaluative component provides a conceptual basis for assessing professional growth through observable indicators and practice-oriented evidence. Together, these components form a coherent framework for planning, organising, and evaluating competence-oriented professional development.

The analysis of Ukrainian educational legislation indicates that the competence-based model can be situated within the existing legal framework governing continuing professional development. At the same time, the research highlights the importance of distinguishing between formal compliance with professional development requirements and meaningful improvements in professional practice. Participation in training programmes and the acquisition of certificates should therefore be complemented by reflective assessment, the practical application of newly acquired knowledge, and institutional mechanisms supporting continuous improvement. Furthermore, the implementation of professional development models should account for differences between arts schools, professional pre-higher education institutions, and higher education institutions, including their educational objectives, institutional capacities, and professional requirements.

The Ukrainian context also demonstrates the importance of integrating cultural responsibility and professional adaptability into the competence-based approach. Under conditions of wartime disruption, educational displacement, and the expansion of digital and blended learning, vocal teachers require professional capacities that enable them to maintain educational continuity while responding to students' individual, artistic, and socio-emotional needs. Simultaneously, the preservation and development of Ukrainian vocal traditions, engagement with national cultural heritage, and participation in intercultural artistic exchange remain significant dimensions of professional competence. Accordingly, the professional development of vocal teachers should be understood as both an educational priority and a component of the broader cultural sustainability of Ukrainian society.

The theoretical significance of the study lies in advancing an integrated understanding of vocal teachers' professional development through the synthesis of competence-based, sociocultural, activity-based, and systemic approaches. Its contribution consists in the proposed classification of professional competences, the conceptual justification of cultural-creative technologies as mechanisms of professional learning, and the development of a structural-functional model adapted to the institutional and sociocultural conditions of Ukrainian arts education. The practical significance of the findings concerns their potential application in designing continuing professional development programmes, improving institutional support systems, developing competence-oriented assessment criteria, and strengthening collaboration between educators and cultural institutions.

The study has several limitations. Its findings are based on theoretical synthesis, comparative analysis, and the interpretation of regulatory and scholarly sources rather than direct empirical measurements of teachers' professional performance. Consequently, the proposed model and assessment indicators require further testing before conclusions can be drawn regarding their effectiveness in particular institutional settings. Future research should involve vocal teachers from different types of Ukrainian cultural and arts education institutions and employ surveys, semi-structured interviews, pedagogical observation, professional portfolio analysis, and longitudinal evaluation to examine changes in professional competence. Comparative studies may also clarify the influence of institutional resources, teaching experience, regional conditions, and participation in cultural-creative activities on professional development outcomes.

In conclusion, the competence-based approach provides a theoretically grounded framework for modernising the professional development of vocal teachers in Ukraine. The proposed integration of artistic mastery, pedagogical expertise, digital adaptability, cultural engagement, and reflective professional learning offers a foundation for developing more responsive and sustainable professional development systems. The principal contribution of the research is the conceptual transition from fragmented forms of professional training towards a coherent model of continuous competence development that recognises vocal teachers as educators, performing artists, cultural mediators, and reflective professionals. Further empirical validation and institutional adaptation of this model may contribute to improving the quality of vocal education and strengthening the capacity of Ukrainian cultural and arts education institutions to respond to contemporary educational and sociocultural challenges.

Author Contributions

All authors contributed equally to the research, reviewed the manuscript, and approved the final version for publication.

Conflict Of Interest

The authors declare no conflicts of interest.

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Data Availability Statement

The study is based on published scholarly literature and publicly accessible legislative and policy documents identified in the reference list. No original participant dataset was generated or analysed. The proposed competence dimensions and assessment indicators are presented in the manuscript and Table 1.

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