Empirical Article

Pre-Service Teaching and Work-Integrated Learning (WIL) in A Diverse and Democratic South African School Setting: A Social Theoretical Perspective.

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This article was not written with the assistance of any Artificial Intelligence (AI) technology, including ChatGPT or other support technologies.

Abstract

Work-Integrated Learning (WIL) is a form of experiential learning that connects students with workplaces in their chosen field of study. WIL is a vital component of South Africa's teacher education, requiring pre-service teachers to complete a school practicum as part of their qualification. This research explores the question: What are effective WIL models for pre-service teachers in diverse South African contexts? The study reviews the practical and philosophical models of WIL and the concurrent model, examining their implementation in various universities as case studies. The study also identifies challenges, opportunities, and the need for support in South African WIL. The study adopts a social learning theory framework. The study informs how WIL effectively supports pre-service teachers and schools in diverse South African classroom. The study also discusses how WIL can promote education for sustainable development (ESD) and the achievement of the Sustainable Development Goals (SDGs).

Keywords: Work-Integrated Learning (WIL), South African schools, higher-education institutions, pre-service teachers, social learning, diversity and inclusion, education for sustainable development (ESD), SDGs.

Okucashuniwe

Inqubo yokubeka umfundi endaweni yokusebenza (WIL) iwuhlobo lokufunda okuhlangenwe nakho oluxhumanisa Abafundi nezindawo zokusebenza emkhakheni abawukhethile wokufunda. I-WIL iyingxenye ebalulekile yemfundo yobuthishela yaseNingizimu Afrika, edinga ukuthi othisha abaqeqeshwa ngaphambi kokuqala ukufundisa baqedele abakufundile ekilasini endaweni yangempela njengengxenye yokuphothula kwabo. Lolu cwaningo luhlola lo mbuzo: Yiziphi izifanekiso ze-WIL ezisebenzayo kothisha abaqeqeshwa ngaphambi kokuqala ukufundisa ezimeni ezahlukahlukene zaseNingizimu Afrika? Ucwaningo lubuyekeza izifanekiso ezisebenzayo zesimo sengqondo nokuziphatha ze-WIL kanye nesifanekiso sezigaba eziningi zenqubo yokuthuthukiswa kwesofthiwe ezenziwa ngesikhathi esisodwa, luhlola ukuqaliswa kwazo ezimfundweni

eziphakeme ezihlukahlukene njengezifundo zocwaningo. Ucwaningo luphinde luhlonze izinselele, amathuba kanye nesidingo sokwesekwa kwe-WIL yaseNingizimu Afrika. Ucwaningo lamella unlace lombono wokufunda kwezenhlalo. Lolu cwaningo lwazisa ukuthi i-WIL ibasekela kanjani ngempumelelo othisha abaqeqeshwa ngaphambi kokuqala ukufundisa kanye nezikole ezisemakilasini ahlukahlukene aseNingizimu Afrika. Luphinde luxoxe ngokuthi i-WIL ingayithuthukisa kanjani imfundo yentuthuko esimeme (ESD) kanye nokufezwa Kwemigomo Yokuthuthukiswa Okusimeme (ama-SDG).

Amagama asemqoka: Inqubo yokubeka umfundi endaweni yokusebenza; Izikole zaseNingizimu Afrika; Imikhakha yemfundo ephezulu; ukuqeqeshwa kothisha ngaphambi kokuqala ukufundisa; ukufunda ngokuziphatha kwabantu ezimeni zokuxhumana; ukwehlukahluka nokwamukela umehluko; imfundo yentuthuko esimeme; Imigomo Yokuthuthukiswa Okusimeme**.**

Introduction

Teacher training in undergraduate education needs to be understood in a post-democratic landscape, which ought to consider issues of equality, diversity and inclusion (Sant, 2019; Perry-Hazan & Somech, 2021; Savolainen et al., 2022). As Kalil and Grant assert (2021): "Higher education in a post-apartheid South Africa has been in a state of flux, as institutions have grappled with the challenges of transforming themselves to meet the changing needs of a developing democracy in a globalized economy." Work-integrated learning (WIL), an essential component of teacher education in South Africa, provides pre-service teachers not only with practical experience and teaching skills, but also the context that is necessary for diverse, democratic and inclusive classrooms (Maseko & Nxumalo, 2016; Mncube & Mphahlele, 2019). WIL is a form of experiential learning that integrates theory and practice by providing students with opportunities to engage in meaningful work experience that is relevant to their field of study (Boud & Solomon, 2001; Almaiah et al., 2020). WIL programs can take many forms, including internships, cooperative education, service learning and practicums (Billet, 2009; Wild & Heuling, 2020). Work-based learning (WBL), on the other hand, is a subset of WIL that refers to learning that occurs in the workplace or is directly related to the work tasks and responsibilities of the students (Billet, 2009). WBL can be seen as a more specific and applied form of WIL that focuses on the development of work-related competencies and skills:

> For many, with only their personal observations and experiences as school students to draw on, their entry into the profession as pre-service teachers also involves developing new understandings of their role, professional practices and the school environment as a professional educator. The use of authentic, industry-driven WIL learning activities creates numerous opportunities for universities to support students to develop a range of professional capabilities prior to placement (Winslade et al., 2020)

Research has shown that WIL can lead to better learning outcomes, increased employability and improved skill development (Billet, 2009; Zegwaard & Coll, 2012). WIL can also help bridge the gap between academic learning and real-world work experience, providing students with a more holistic understanding of their field of study (Boud & Solomon, 2001).

The Sustainable Development Goals (SDGs) of the United Nations provide a framework for sustainable development and include a specific goal on education (Goal 4), which emphasizes the need for inclusive and equitable quality education for all (United Nations General Assembly, 2015). WIL can contribute to achieving this goal by preparing pre-service teachers with the necessary skills and knowledge to provide quality education in South African schools (Langeveldt et al., 2023). Furthermore, different WIL models can also contribute to achieving other SDGs, such as reducing inequality (Goal 10) and promoting decent work and economic growth (Goal 8) by addressing social and economic challenges in the classroom (United Nations General Assembly, 2015). The educational landscape and SDGs should have a strong emphasis when considering the development of student teachers through WIL (Crawford & Cifuentes-Faura, 2022). This, in turn, has significant implications for the socioeconomic development of learners. Indeed, as Vladimirovaa and Le Blanc (2015) posit: "Education plays a well-recognized role of an enabler for many areas under the SDGs, e.g., growth, gender equality and many others ... progress in other areas may affect education in many ways."

To achieve this study's objectives, the following research question is posed**:** What are the best models of WIL for pre-service teachers in diverse South African social contexts?

To address this research question, a comprehensive review of the relevant literature on WIL was carried out in South African schools, including case studies of higher-education institutions that have implemented best-practice models. The key characteristics of effective WIL models were identified and evaluated for their effectiveness in South African schools based on the review findings.

Literature Review

In South Africa, Work-Integrated Learning has gained prominence in the education system as a critical component of teachers' formation before they begin working. It is recognized as an effective way to prepare pre-service teachers for classroom demands by providing them with the practical experience and skills necessary for effective teaching (Billett, 2011; Singh et al., 2018; Department of Higher Education & Training, 2018; Mafumo et al., 2018).

Theoretical and practical learning to facilitate WIL models in South African schools

In South African schools, several WIL models have been used to improve teacher training. Some of the models include the mentorship model, the school placement model and the co-teaching model (Johannes et al., 2020). The mentorship model involves pairing pre-service teachers with experienced teachers who act as mentors, guiding and supporting them in their teaching practice. The school placement model involves placing pre-service teachers in schools to gain practical experience under the supervision of experienced teachers. The co-teaching model involves pre-service teachers working alongside experienced teachers to develop their skills through collaborative teaching. This work is so important because if one were to contextualize this wide enough that it touches upon the global aspects in terms of "the long-term relationship resulted in the devotion of the mentors to their mentees" (Nguyen, 2021). If one were to situate WIL discussions in this article to be applicable in various situations and nations as Nguyen's work suggest, then cultural and contextual factors should be taken into account when putting such initiatives into reality, and the effects of globalization on work-integrated learning practices need to better be understood.

Studies have shown that the effectiveness of these WIL models in South African schools depends on the balance between theoretical and practical learning. Pre-service teachers must have a balance of theoretical and practical learning to acquire the skills and competencies necessary for effective teaching (Nieuwenhuis & Ngidi, 2019). Adequate support and mentorship from experienced teachers are also critical in ensuring the success of WIL models (Johannes et al., 2020). This is difficult for both student teachers and their mentors, according to Manderstedt et al. (2022), exclaim that "this [puts] considerable pressure on students, who must deal with at least two different discursive practices during their work placement, which are different in terms of hierarchy. The conditions also put a lot of pressure on the mentors, who are supposed to assess the students in relation to university requirements." Despite the benefits of WIL in South African schools, there are several challenges associated with its implementation. Limited resources, insufficient infrastructure and a lack of coordination between higher-education institutions and schools have been identified as the main challenges facing the effective implementation of WIL in South African schools (Ngidi & Nieuwenhuis, 2020). These challenges have resulted in inadequate support for pre-service teachers during their practical training, which undermines the effectiveness of WIL models.

To address these challenges, it might be useful to compare the WIL model in South Africa with other countries that have similar or different contexts and approaches. For example, a study by Kalil and Grant (2014) compared the WIL model in South Africa with that of Australia and found that both countries face similar issues such as funding constraints, quality assurance and stakeholder collaboration. However, the study also found that Australia has a more established and coordinated national framework for WIL that provides clear guidelines, standards and incentives for all parties involved. The study suggested that South Africa could learn from Australia's experience and adopt some of its best practices to improve its own WIL model.

Another aspect that might help to improve the WIL model in South Africa is to consider the diverse context of the country itself. South Africa is a multicultural and multilingual country that has 11 official languages and various ethnic groups (Savolainen et al., 2012). This diversity poses both opportunities and challenges for pre-service teachers who need to adapt to different cultural and linguistic settings in their practicum placements. A study by Mncube and Mphahlele (2015) explored how pre-service teachers cope with cultural diversity in their WIL experiences and found that they face various difficulties such as communication barriers, cultural misunderstandings, and stereotypes. The study recommended that pre-service teachers should receive more training and support on intercultural competence and awareness before and during their WIL placements. The study also suggested that higher-education institutions and schools should collaborate more closely to ensure that pre-service teachers are matched with suitable mentors and schools that can cater for their diverse needs and expectations.

Effectiveness of WIL and technology in South African schools

To address these challenges, several strategies have been proposed. These strategies include improving the funding mechanisms for WIL programs, improving infrastructure, promoting research and innovation, and strengthening partnerships between stakeholders (Ngidi & Nieuwenhuis, 2020). The use of technology has also been identified as an opportunity to improve the effectiveness of WIL models in South African schools. Using technology in WIL programs can provide pre-service teachers with access to online resources, virtual classrooms and other digital tools to enhance their learning experience (Johannes et al., 2020). For example, the use of e-portfolios can help pre-service teachers document and reflect on their WIL activities, as well as showcase their competencies and achievements to potential employers (Moodley & Singh, 2019). Most students, according to Costley (2014), agree that incorporating technology into the curriculum improves the WIL learning experience. Another example is the use of mobile devices and applications, which can enable pre-service teachers to access learning materials, communicate with mentors and peers, and collect data in various contexts (Makgato & Mudau, 2018)**.** Costley (2014) posits:

> Technology has a positive impact on student learning. Technology encourages students to be more engaged; thus, students often retain more information. Due to the arrival of new technologies that are rapidly occurring around the world, technology is relevant for students. Technology provides meaningful learning experiences. Technology also provides hands-on learning opportunities that can be integrated into all school curricular areas [including WIL].

Different models of WIL have been used in South African schools, including the cooperative education model, the service-learning model and the apprenticeship model (Department of Higher Education & Training, 2018; Singh et al., 2018). Each model has its strengths and weaknesses, and the choice of model can have a significant impact on the effectiveness of WIL in preparing pre-service teachers for the classroom.

Several studies have evaluated the effectiveness of different WIL models in South African schools. For example, a study by Mafumo et al. (2018) found that the apprenticeship model was more effective in preparing pre-service teachers for the classroom than the service-learning model. However, other studies have found that the cooperative education model is the most impactful (Singh et al., 2018). The effectiveness of WIL models is influenced by several factors, including the balance of theoretical and practical learning, the quality of support and mentoring provided, and the level of collaboration between tertiary institutions and schools (Billett, 2011; Department of Higher Education & Training, 2018). Additionally, the employability of graduates is a key goal for the government and a performance metric for higher-education institutions. As Ng, Chan et al., (2021) state, "WIL students become increasingly employable when they equip themselves with the required skill standards that allow them to show their capabilities in the workplace. WIL improves the understanding of values and culture in the workplace." However, most WIL studies focus on undergraduate students' experiences, making it challenging to translate WIL models to postgraduate programs (Karim et al., 2020; Campbell et al., 2018). The compressed nature of postgraduate degrees makes industry involvement difficult, but benefits outweigh constraints.

Implementing WIL in South African schools faces significant challenges, such as limited resources, inadequate infrastructure and a lack of coordination between higher-education institutions and schools (Department of Higher Education & Training, 2018; Singh et al., 2018). However, there are also opportunities to improve WIL, such as using technology, promoting innovation, and fostering collaboration between stakeholders (Billett, 2011; Department of Higher Education & Training, 2018). Addressing challenges and taking advantage of opportunities requires the participation of educators, policymakers and education stakeholders.

WIL and South African higher-education institutions: a tool for teaching in schools

In South Africa, the Department of Higher Education & Training has developed the National Work-Integrated Learning Strategy (2017), which aims to promote the integration of WIL in all academic programs in the country. Several universities have implemented WIL in their teacher-education programs. For example, according to Koen and Du Plessis (2019), the University of Johannesburg has developed a WIL model that integrates theoretical and practical learning through school-based experiences. In this model, pre-service teachers are placed in schools for a year and are required to complete various tasks and assignments that align with the curriculum. The model also incorporates the mentorship and support of student teachers by more experienced teachers to ensure that receive adequate guidance and feedback is given.

Similarly, the University of Cape Town has implemented a WIL model that integrates service learning and community participation in its teacher-education program. In this model, pre-service teachers are required to participate in community-service activities that are aligned with the curriculum and provide opportunities for practical learning. This model also incorporates reflection and self-assessment to allow pre-service teachers to critically reflect on their learning and develop their professional skills (Okeke-Uzodike et al., 2020). Put differently by Jita and Munje (2022), "Therefore, it

is important for pre-service teachers to have the opportunity to develop adequate skills, mainly from teaching-practice mentoring experience, as required by South African national curricula". The University of Stellenbosch has a WIL model that incorporates school-based experiences and mentorship in its teacher-education program (Mncube & Mphahlele, 2019). Pre-service teachers are placed in schools for a year and complete various tasks and assignments aligned with the curriculum, while receiving mentorship and support from experienced teachers. The model includes the mentorship and support of experienced teachers to ensure that pre-service teachers receive adequate guidance and feedback.

At the University of South Africa (UNISA), a blended WIL model has been implemented that combines online learning and school-based experiences in the teacher-education program. In this model, pre-service teachers complete theoretical learning online and are then placed in schools for practical learning. The model incorporates support and mentorship from experienced teachers and uses technology to improve learning and communication (Chabeli & Muller, 2014).

In general, best-practice models for WIL in South African schools have been found to incorporate a balance of theoretical and practical learning, support and mentorship, and collaboration between higher-education institutions and schools (Maseko & Nxumalo, 2016; Mncube & Mphahlele, 2019). These models have been evaluated as effective in preparing pre-service teachers for the classroom and improving their employability. To support these strategies, researchers suggest that improving coordination and collaboration between higher-education institutions and schools can improve the implementation of WIL in South Africa (Maseko & Nxumalo, 2016). Additionally, technology can be used to support learning and communication between pre-service teachers and mentors (UNISA, 2023). Other suggestions include establishing effective feedback mechanisms to address challenges and improve the quality of WIL programs (Mncube & Mphahlele, 2019) and incorporating community engagement and social justice principles into WIL programs (Chabeli & Muller, 2014).

Opportunities to improve WIL in South African schools

The use of technology, innovation and the promotion of collaboration between stakeholders are key opportunities to improve WIL in South African schools. These opportunities can help address some of the challenges faced in the implementation of WIL and contribute to the effectiveness of WIL programs.

The present study explored best practices, challenges and opportunities related to work-integrated learning (WIL) in South African schools. Best-practice models were identified from international and African countries, including cooperative education, apprenticeships, problem-based learning, community-based learning and service-learning models. In addition, four South African universities were discussed for their effective WIL models: the University of Johannesburg (service-learning model), the University of Cape Town (work-integrated learning model), Stellenbosch University (experiential learning model) and the University of South Africa (internship model). Despite the benefits of WIL, challenges in its implementation were also identified. These challenges include inadequate funding, lack of infrastructure, and difficulties in the placement and transportation of students. Strategies to address these challenges include collaboration among stakeholders, government support, leveraging technology and innovation, and greater collaboration between stakeholders.

In terms of technology, it can help provide alternative learning experiences, promote interaction and facilitate evaluation. Innovation can help create new WIL models and improve existing ones. Collaboration among stakeholders can improve student learning outcomes and help create sustainable WIL programs. As Kalil and Grant (2021) explain, "while we recognize that the school-practitioner implementations are responsive to social characteristics of the learning environment, we have not directly investigated how social features of the pedagogy might create the conditions conducive to teaching and learning of integrated multimodal communication practice" (p. 47).

To improve WIL in South African schools, policymakers and educators must prioritize funding, infrastructure development and effective student placement strategies. They should also foster collaboration among stakeholders, promote innovation and use technology to provide a more engaging and effective learning experience for students. There are numerous advantages to incorporating technology in the training of student teachers, as expounded by Barrett et al., (2019), posits that:

> Educational IT can allow [students] to learn at their own pace in purposely designed break-out spaces, outside learning areas or even corridors, staircases or cafeterias. Flexibility and adaptability in the design of formal and informal learning spaces may not only provide students with more diverse learning opportunities, stimuli and experiences, but also the chance to develop non-cognitive skills.

WIL models and Sustainable Development Goals (SDGs)

Work-integrated learning (WIL) models have the potential to contribute to the achievement of the Sustainable Development Goals (SDGs) of the United Nations by providing students with the opportunity to develop skills and knowledge that are relevant in addressing global challenges. For example, WIL can help prepare pre-service teachers with the skills and knowledge needed to address social and economic challenges in the classroom, which is relevant for SDGs 4, 8 and 10. As Nousheen, et al. (2020) explain:

> [Pre-service] teachers play a key role in the transformation of schools and overall society. To facilitate the societal transformation and attainment of SDGs requires a well-planned and well-established learning process that may contribute to the real change in the minds of people. Education for sustainable development (ESD) provides a well-planned and well-established platform to raise consciousness among individuals and to empower their decision-making capabilities to act sustainably. It is a well-recognized fact that ESD provides the required learning process to inspire the societal transformation and various educational institutions' adopted initiatives.

According to a study by Billett et al. (2018), WIL models that integrate academic learning with workplace experience can improve the quality of pre-service teacher education by providing opportunities for students to apply theoretical knowledge in practice. This approach can help students develop a deeper understanding of the context in which they will be working and also improve the formation of their professional identity (Billett et al., 2018).

Furthermore, WIL models that provide students with opportunities to engage in work-based learning can help develop the skills and competencies necessary for the workplace, such as problem-solving, communication and teamwork (Gribble et al., 2019). These models can help bridge the gap between the knowledge and skills that students acquire through their education and those needed in the workplace (Gribble et al., 2019).

In terms of diversity and inclusion, WIL models that incorporate community-based learning can help address social and economic inequality by providing students with opportunities to work with different people groups and gain a deeper understanding of their needs and perspectives. Diversity and inclusion are important aspects of teacher education that aim to promote respect, equity and social justice in the classroom and beyond (Sleeter, 2017). Diversity refers to the recognition and appreciation of the differences among students in terms of their social identities, such as race, ethnicity, gender, sexuality, disability, language, culture and religion (Banks et al., 2005). Inclusion refers to the creation of a learning environment that values and supports the participation and contribution of all students, regardless of their backgrounds and abilities (Gay, 2018). Diversity and inclusion are essential for effective classroom instruction because they can enhance the quality of teaching and learning in several ways. A benefit of diversity and inclusion are diversity and inclusion can foster critical thinking and creativity by exposing students to different perspectives, experiences and worldviews. This can help students develop a deeper understanding of themselves and others, as well as challenge their assumptions and biases (Nousheen & Kalsoom, 2022). This approach can also help prepare students to become socially responsible citizens and contribute to the development of more inclusive and equitable communities. This speaks to helping pre-service teachers develop empathy when engaging with students from diverse racial and socioeconomic backgrounds, which is so important not only in South Africa, but also globally. A diversity of backgrounds in an educational context is summarized by Nousheen and Kalsoom (2022) as:

> ...socio-cultural perspectives (human rights, peace and human security, gender equality, cultural diversity and intercultural understanding, health, HIV/AIDS and governance); environmental perspectives (natural resources, such as water, energy, agriculture, biodiversity, climate change, rural development, sustainable urbanization, disaster prevention and mitigation); and economic perspectives (poverty reduction, corporate responsibility and accountability, and market economy).

WIL models can make important contributions to achieving SDGs by providing students with the skills and knowledge needed to address global challenges, such as ending world hunger, universal access to education and taking action against climate change. By integrating academic learning with work experience and community-based learning, WIL models can help develop students' professional identities, work skills and a sense of social responsibility, which are essential components of sustainable development.

In particular, WIL can help advance Goal 4 (quality education) by improving the quality and relevance of education (Langeveldt & Pietersen, 2024), as well as Goal 8 (decent work and economic growth) by preparing pre-service teachers with the skills and knowledge needed to address social and economic challenges in the classroom. Furthermore, different WIL models can contribute to the achievement of other SDGs, such as reducing inequality (Goal 10) and promoting sustainable communities and cities (Goal 11).

Theoretical Framework

In analyzing how WIL models assist future educators in a uniquely South African context, the conceptual framework I have employed in this study is that of social learning theory (Kalil & Grant, 2021). We have chosen this framework because it emphasizes the role of observation, modelling and imitation in learning, which are key aspects of WIL. Moreover, this framework can help to answer the research question of what the best models of WIL for pre-service teachers in diverse South African social contexts are, as it can explain how different models of WIL influence the social learning processes and outcomes of pre-service teachers. Social learning theory, first advanced by psychologist Albert Bandura, proposes that people learn best through observation, modelling and imitation (Bandura, 1977). This theory helps to connect models that higher-education institutions use, along with examples of pedagogy in action and student feedback (Moosa & Rembach, 2020). As pre-service teachers are trained for a diverse South African school context, these procedures are linked (Van Steen & Wilson, 2020). Furthermore, seeing and doing is essential to student formation in terms of how the WIL process develops. Or, to put it another way, according to Bandura (1977), the WIL process is underpinned by learning that takes place alongside or in combination with other individuals as a form of social learning, which puts this type of interaction into context. Although resources, skills and technology are crucial for the WIL process, in essence, students learn best through observation (Schoeman, 2021).

Methodology

The research's general research methodology is the qualitative method. Cohen et al. (2000) provide a concise summary of the rationale behind the selection of this method: "the data [in literature reviews] at a specific point describe the nature of the conditions already in place or identify benchmarks to which the conditions already in place can be compared". This method allowed us as the researchers to locate the conceptualization around the constructs of the success of WIL models employed in South African schools varies, underscoring the need to identify the best practical and philosophical models needed for a diverse context. Several practical and theoretical models, including the block practicum model, the distributed model and the concurrent model, have been identified through a thorough assessment of the literature and a consideration of various universities as case studies through the lens of literature reviews has been employed, in order to understand the best practice of WIL models in a diverse South African educational environment.

In light of the aforementioned, the social learning theory allowed for analysis in this study in order to understand the research question of this study to investigate *what are the best models of WIL for pre-service teachers in a diverse South African social context?* In answering this question higher education institutions and all related parties will foreground teaching and learning within a defendable version of democracy in which WIL can be appreciated.

Results

The study, based on a thorough literature review and analysis of Wo models, offers crucial insights for future research in South African schools.

The key is to create a comprehensive WIL model that integrates classroom-based learning, supervised teaching practicums, and community-based service learning. The integration of these elements provides pre-service teachers with a comprehensive comprehension of their future responsibilities. They provide hands-on experiences in diverse settings, working with students from diverse backgrounds. This approach promotes adaptability and prepares students for the dynamic classroom environment through a multifaceted approach.

The success of WIL is not only theoretically based but also heavily relies on practical guidance and mentorship. Experienced teachers play a crucial role in providing support to pre-service teachers during their WIL journey. Mentorship helps bridge the gap between theory and practical application by providing insights, encouragement, and constructive feedback that foster growth and confidence.

The use of technology in schools is crucial for enhancing the learning experience and enhancing the overall learning experience. Digital platforms enable seamless communication and collaboration among various stakeholders, including teachers, students, and community partners. Technology, through virtual classrooms, online resources, and collaborative tools, significantly improves knowledge exchange and innovative practices.

The collaboration ecosystem is crucial for effective WIL. Schools, universities, and community organizations work together to create a symbiotic ecosystem. They foster the growth of pre-service teachers by combining resources, expertise,

and networks. The implementation of collaborative efforts enhances the effectiveness of WIL, enhancing student learning and fostering community engagement.

The impact of WIL extends beyond individual classrooms, contributing to the achievement of the SDGs. WIL models significantly contribute to achieving SDGs by providing pre-service teachers with adaptable skills and a deep understanding of social and economic challenges. These educators serve as change agents, influencing the development of a more equitable and sustainable future. The South African education system can benefit greatly from a collaborative, technology-enhanced WIL model, which empowers pre-service teachers to contribute meaningfully and drive positive societal change.

Limitations

This study focuses primarily on what are the best models of WIL for pre-service teachers in a diverse South African social context. If one were to have studied all the faculties of education in all the Universities in South Africa, and perhaps even the entire higher educational space in South Africa, deeper issues relating to WIL may rise, this may also be true if this study were to be applied to other countries internationally. These may include:

- Unbiased and efficient assessment techniques for WIL experiences. Traditional assessment techniques might not fully reflect the range of abilities and skills acquired in practical teaching situations.
- South Africa is a multilingual nation, and in some situations, language difficulties can make it difficult to communicate and impart knowledge. When pre-service teachers interact with students, colleagues, and community members, language barriers may present difficulties.
- The educational system in South Africa is going through reforms and adjustments. WIL models may be less relevant and successful in this dynamic context because they must adjust to changing objectives and policies.

Therefore, many readers of this study may find it difficult to objectively wrestle with some of the ideas presented here. Nevertheless, the research question discussed is this study is quite exciting and could become instrumental to policymaking. It is still uniquely South African based while it still offers an example in its implementation and contributions in South Africa, or the presentation of South African context could comparatively help other countries navigate and learn from it.

Implications and Conclusion

The research question, namely *what are the best models of WIL for pre-service teachers in a diverse South African social context?* has been investigated in this article. This was foregrounded by the premise that WIL models need to be created by the South African Qualifications Authority (SAQA) to assist pre-service teachers, schools and higher-education institutions in addressing the specific needs and difficulties of the various classroom environments in South Africa, rather than addressing only the mechanical and practical elements of teacher formation. As Slabbert and Naudé (2022), aptly put it, "owing to political transformation in South Africa, the term diversity has become synonymous with the political reform taking place in the country. Approaches to diversity are important elements in improving understanding of social integration in a racially integrated school environment, as schools are considered a reflection of society." Work-integrated learning (WIL) is an important pedagogical approach to prepare pre-service teachers with the skills and knowledge they need to become effective and caring school practitioners (Pietersen, 2022). WIL models have been successfully implemented in various countries around the world. However, despite the benefits of WIL, there are still several challenges to its effective implementation in South African schools, including limited resources, inadequate infrastructure, coordination issues between higher education institutions and schools, insufficient funding, and placement and transportation difficulties.

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