CHAPTER FOUR

Beyond Access: Ensuring Equity in Digital Placements for Pre-Service Teachers' Work-Integrated Learning

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Abstract: The incorporation of digital technologies in work-integrated learning (WIL) has become increasingly significant in teacher education, particularly in scenarios where traditional, face-to-face placements are restricted. While technology-mediated placements broaden accessibility and flexibility, they also raise crucial concerns regarding equity, inclusion, and participation for pre-service teachers. Guided by the Digital Equity Framework, this chapter conducts a critical analysis of existing literature to explore how equity can be upheld in digital WIL environments. The framework expands the concept of equity beyond technology access, encompassing aspects of meaningful participation, digital proficiency, and empowerment. Consequently, it offers a valuable perspective for investigating how the digital evolution in teacher education can foster not only connectivity but also agency and inclusion. Leveraging global and local academic work, the chapter examines how structural inequalities, digital discrepancies, and teaching methods influence the experiences of pre-service teachers in virtual placements. The discourse is structured around four interconnected themes: Access and Infrastructure, spotlighting the enduring disparities in connectivity and device provision; Digital Pedagogies and Support, evaluating fair mentoring and instructional design; Socioeconomic and Contextual Barriers, addressing inequalities associated with background and school environment; and Policy and Institutional Responses, delving into leadership, collaborations, and systemic transformation. The chapter asserts that progressing digital equity in WIL necessitates a holistic approach that aligns policy, leadership, and pedagogy to ensure that pre-service teachers are not just digitally connected but also empowered to excel within fair, technology-mediated professional learning settings.

Keywords: Digital equity, work-integrated learning, teacher education, educational leadership, policy and leadership.

1. Introduction

Work-integrated learning (WIL) is widely recognised as a cornerstone of teacher education, offering pre-service teachers structured opportunities to connect theoretical knowledge with professional practice. Through school-based placements, pre-service teachers develop pedagogical competence, professional identity, and contextual understanding of teaching and learning environments (du Plessis & Razmjoee, 2025). Traditionally, these placements have focused on face-to-face engagement within schools. However, recent shifts in educational

provision, accelerated by technological advancements and disruptions such as the COVID-19 pandemic, have led to an increasing reliance on digitally mediated and hybrid WIL models. Short, Halton, Morris, Rose, Whitaker, Russ, Fitzroy, Appleton, Adamson, and Boyd (2023) argue that these developments have expanded placement access, flexibility, and continuity, especially in contexts where physical placements are limited by geography, capacity, or systemic disruption. While digital technologies have allowed teacher education institutions to sustain and, in some cases, enhance WIL opportunities, their rapid integration has also highlighted and, at times, exacerbated existing inequities within teacher education systems.

Emerging scholarship points to the growing role of artificial intelligence (AI) in shaping digitally mediated learning environments, including WIL. AI-driven tools are increasingly used for feedback, assessment, and instructional support, raising new questions about equity, access, and participation. Nzuza (2025) notes that access to devices, reliable connectivity, and appropriate digital platforms remains unevenly distributed, particularly for pre-service teachers from historically marginalised, rural, or low-income backgrounds. Additionally, Brown and Luo (2025) indicate that disparities in digital competence, institutional support, mentoring quality, and pedagogical design also affect the extent to which pre-service teachers can meaningfully engage in technology-mediated placements. Consequently, the expansion of digital WIL raises critical questions about equity, inclusion, and participation that go beyond the mere provision of technological infrastructure.

Emerging scholarship cautions against viewing digital WIL as a neutral or inherently equitable solution to placement challenges (Gamage, 2022; Bell, Bartimote, Dempsey, Mercer-Mapstone, Moran, & Tognolini, 2022). Instead, researchers emphasise the importance of examining how structural inequalities, socioeconomic conditions, and institutional practices intersect with digital modalities to influence pre-service teachers' learning experiences. In a study on inclusive placement learning for diverse higher education students, Thompson and Brewster (2023) indicate that without deliberate attention to equity, digital placements risk perpetuating patterns of exclusion, where some students benefit from flexibility and innovation, while others face barriers that hinder engagement, learning, and professional growth. These concerns highlight the necessity of moving beyond access-oriented approaches to consider equity as a multidimensional construct encompassing participation, capability, agency, and empowerment.

Global scholarship on digital work-integrated learning (WIL) and online teacher education highlights the transformative potential of technology to enhance access and flexibility, particularly in situations where physical placements are limited. Studies emphasise the role of digital platforms in facilitating continuity of professional learning, promoting new forms of collaboration, and supporting reflective practice (Cohen, DuBois, Lynch, Swami, Noftle & Arensberg, 2023; Manganello & Aleo, 2026). However, this body of work also reveals ongoing inequities in access to reliable connectivity, digital competence, and the quality of mentoring and instructional design. Concurrently, local South African literature underscores how these

challenges are exacerbated by historical inequalities, socioeconomic disparities, and resource constraints within schools and higher education institutions (Nthambeleni & Motadi, 2025; Dlamini, 2022). Research in this context shows that pre-service teachers' experiences of digital placements are often influenced by unequal access to devices, limited institutional support, and diverse school environments that may not be adequately prepared for digital integration. Despite these findings, the literature lacks clarity on how equity can be systematically integrated into the design and implementation of digital placements, particularly through coordinated pedagogical, institutional, and policy interventions.

Drawing on both global and local scholarship, this chapter examines the conditions under which digital placements can support inclusive professional learning, as well as the policy, leadership, and pedagogical interventions necessary to ensure that pre-service teachers are not only connected to digital environments but also able to engage meaningfully and equitably within them. By situating digital WIL within broader discussions on equity and digital transformation in higher education, this chapter contributes to ongoing debates about how teacher education institutions can responsibly design, implement, and govern technology-mediated placements. In doing so, it aims to inform policy, institutional practices, and future research to advance equitable, inclusive, and empowering models of digital work-integrated learning.

2. Digital Work-Integrated Learning in Teacher Education

Work-integrated learning (WIL) in teacher education has traditionally been understood as face-to-face, school-based teaching practice where pre-service teachers develop professional competence through supervised classroom engagement (CHE, 2011; DHET, 2015). In South Africa and other Global South contexts, long-standing challenges such as uneven school resourcing, geographic disparities, and persistent inequalities in schooling systems have increasingly complicated the provision of equitable and high-quality WIL experiences (Maphumulo & Gcabashe, 2025; Nhlumayo & Mabeleng, 2025). In response to these challenges, digital placements have emerged as an alternative or complementary form of WIL, transforming how professional learning is conceptualised and implemented in teacher education. Digital work-integrated learning refers to structured teaching practice experiences where pre-service teachers engage in professional learning through online, virtual, or hybrid school environments (Schuster & Glavas, 2017). In this study, the authors use the term electronic work-integrated learning (eWIL) to describe this technology-facilitated form of WIL. In South African teacher education programmes, Czerniewicz (2018) notes that digital placements have included virtual lesson delivery, remote classroom observation, online assessment practices, and digital supervision by university lecturers and mentor teachers. These practices are common in Open Distance e-Learning (ODeL) institutions and align with national policy imperatives promoting digital transformation and innovation in higher education, including the DHET's emphasis on integrating digital technologies into teaching and learning (DHET, 2020).

Literature from the Global South highlights that digital placements are often introduced in response to systemic constraints rather than as standalone pedagogical innovations. In South Africa, digital WIL has been influenced by stark inequalities in digital infrastructure between urban and rural schools, as well as disparities in connectivity, device access, and digital competence (Czerniewicz, 2018; Roberts & Hernandez, 2019). As a result, the quality and pedagogical depth of digital placements vary significantly across contexts, raising critical concerns about equity, comparability, and the legitimacy of digital WIL experiences (Bozalek, Ng'ambi & Gachago, 2013). The literature further distinguishes between emergency-driven digital placements, implemented to ensure continuity during periods of disruption, and intentionally designed digital WIL models that align with programme outcomes and are supported by structured mentoring and assessment (Kaqinari, Makarova, Audran, Döring, Göbel & Kern, 2022). In many Global South contexts, emergency approaches have prioritised access and participation, often at the expense of supervision quality, reflective practice, and contextual responsiveness. Luckett and Shay (2020) further reveal that purposefully designed models, in contrast, recognise digital placements as legitimate sites of professional learning that require dedicated frameworks, institutional investment, and policy support.

To conceptualise digital placements as WIL in South Africa, it is essential to understand teaching practice as a socio-contextual and digitally mediated process, shaped by institutional policies, school partnerships, and broader structural inequalities (CHE, 2011; DHET, 2015). This perspective positions digital WIL not merely as a technical solution to placement challenges but as a contested pedagogical space where issues of equity, professional identity, and educational justice are negotiated. Such a conceptualisation provides a critical foundation for examining how digital placements can either expand or constrain equitable participation in teacher education within South African and Global South contexts.

3. Theoretical Framework: The Digital Equity Framework

This chapter is grounded in the Digital Equity Framework (DEF), which provides a critical lens for examining the distribution of access to, use of, and benefits derived from digital technologies within educational systems. Moving beyond narrow understandings of digital equity as merely access to devices or connectivity, the framework emphasises the structural, pedagogical, and contextual conditions that shape meaningful participation in digitally mediated learning environments (Smith, 2021). This perspective is particularly pertinent to work-integrated learning (WIL) for pre-service teachers, where digital placements increasingly facilitate professional learning, supervision, and assessment.

Jackson, Starr, and Weaver (2024) conceptualise the DEF as a multidimensional construct encompassing technological access, digital skills and competencies, institutional support, and sociocultural and contextual factors. In the context of pre-service teachers' digital WIL placements, access refers not only to reliable devices and internet connectivity but also to

equitable access to appropriate digital platforms, teaching resources, and virtual mentoring opportunities. Without these foundational conditions, participation in digital placements risks reproducing existing educational and socio-economic inequalities. Beyond access, the framework foregrounds capacity and capability, highlighting the importance of digital literacy, pedagogical readiness, and confidence in utilising digital tools for teaching and professional engagement. Pre-service teachers enter WIL placements with varied digital backgrounds, shaped by prior schooling, geographic location, and institutional resources, as noted by Rowston, Bower, and Woodcock (2022). The DEF, therefore, underscores how these disparities affect pre-service teachers' ability to engage meaningfully in digital teaching practices, collaborate with mentors, and demonstrate professional competence in online or hybrid environments. The framework further situates digital equity within institutional and systemic structures, including university policies, placement models, assessment practices, and support mechanisms. Equity in digital WIL placements depends on how institutions design placement requirements, provide training and technical support, and recognise the contextual constraints faced by both schools and student teachers (Lloyd, Paull, Clerke, & Male, 2019). From this perspective, inequities are not solely individual deficits but are produced and sustained through institutional arrangements and decision-making processes.

Finally, the DEF emphasises the importance of justice-oriented, inclusive pedagogical practices, advocating approaches that actively mitigate disadvantage rather than assuming uniform conditions of participation. Applied to this chapter, the framework enables a critical examination of how digital placements can either expand professional learning opportunities for pre-service teachers or exacerbate existing inequities if contextual realities are overlooked. By adopting the DEF as its theoretical lens, this chapter interrogates digital WIL placements not merely as innovative solutions to placement challenges, but as equity-laden practices that necessitate intentional design, institutional accountability, and sustained support to ensure fair and meaningful learning experiences for all pre-service teachers.

4. Discussion of Major Argument

While expanding access to digital platforms has been a central focus in the implementation of Work-Integrated Learning (WIL) for pre-service teachers, access alone does not guarantee meaningful or equitable participation. This chapter posits that achieving equity in digital placements necessitates a broader, more nuanced understanding of the structural, pedagogical, and contextual factors that shape students' experiences. It advances beyond a narrow focus on connectivity and devices to critically examine how inequalities are reproduced and can be addressed within digitally mediated WIL environments.

The discussion is organised around four key arguments. First, it highlights persistent gaps in access to reliable infrastructure and appropriate devices, which continue to disadvantage certain groups of students. Second, it examines the role of digital pedagogies and the extent to which

mentoring and instructional design practices either enable or constrain equitable learning opportunities. Third, it considers the influence of socioeconomic and contextual factors, particularly how students' backgrounds and school placement contexts shape their engagement and success. Finally, the chapter explores policy and institutional responses, emphasising the need for leadership, strategic partnerships, and systemic reform to promote inclusive and equitable digital WIL practices. Collectively, these sections demonstrate that ensuring equity in digital placements requires coordinated efforts across multiple levels, moving beyond access towards more inclusive, responsive, and contextually grounded approaches.

4.1. Access and infrastructure: Persistent gaps in connectivity and device provision

Access to reliable digital infrastructure remains a foundational yet uneven condition for the successful implementation of digital placements in pre-service teachers' work-integrated learning (WIL). While digital and hybrid placement models have expanded opportunities for continuity in professional learning, particularly in contexts characterised by placement shortages or geographic constraints, Nzuza (2025) contends that persistent disparities in connectivity and device provision continue to influence who can meaningfully participate in these arrangements. This chapter posits that without addressing these structural inequities, digital WIL placements risk reproducing and, in some instances, intensifying existing educational inequalities. Connectivity remains one of the most significant barriers to equitable digital placements (Bell, Bartimote, Mercer-Mapstone, Moran, Tognolini, & Dempsey, 2021; Gunter, 2025). Furthermore, Abedi (2025) and Ndanu (2025) indicate that many pre-service teachers, particularly those from rural, peri-urban, and economically marginalised communities, experience unstable or limited internet access. Inconsistent bandwidth, high data costs, and frequent network disruptions constrain pre-service teachers' ability to participate in synchronous teaching sessions, engage in online mentoring, submit digital artefacts, and access learning management systems. These challenges are often exacerbated during school-based placements where partner schools themselves lack adequate connectivity, thereby limiting opportunities for authentic digital teaching practice and collaboration with mentors. Equally critical is the issue of device provision. Access to a personal, functional digital device cannot be assumed for all pre-service teachers. Some rely on shared household devices, outdated hardware, or mobile phones that are ill-suited for lesson planning, video-based teaching, or sustained engagement with digital platforms (Sharma, 2025). The absence of appropriate devices undermines the quality of professional learning experiences and imposes additional cognitive and emotional burdens on pre-service teachers, who must navigate technological constraints alongside the demands of teaching practice.

Institutional responses to these access challenges are often inconsistent. In their study on understanding the impact of the digital divide on South African students in higher education institutions, Faloye and Ajayi (2022) indicate that while some higher education institutions offer limited data packages, device loan schemes, or campus-based digital hubs, these interventions

and the support provided are often insufficient, short-term, or inaccessible to students located far from university facilities. Moreover, Young, Harvey, and McKenzie (2024) argue that such support mechanisms tend to prioritise academic coursework over WIL-specific needs, leaving gaps in support during placement periods when digital engagement is most intensive.

From an equity perspective, access and infrastructure challenges must be understood as systemic rather than individual shortcomings. Particularly within the South African higher education context, pre-service teachers' capacity to succeed in digital WIL placements is shaped by broader socio-economic conditions, historical inequalities, and institutional resource allocation decisions (Msimango, 2025). Furthermore, Lutz (2019) indicates that inequity is no longer solely related to internet access, but also pertains to access to AI-enabled tools and platforms. Framing access issues as matters of individual responsibility obscures their structural nature and diverts attention away from the institutional accountability required to address these gaps. Ensuring equity in digital WIL placements, therefore, necessitates a deliberate and sustained investment in infrastructure that transcends baseline access. This includes partnerships with schools and service providers to enhance connectivity, scalable device provision strategies, and placement-sensitive support models that recognise the realities of students' learning environments (Aleksieva, 2025). Without such interventions, digital placements may, in principle, extend access while, in practice, limiting equity and reinforcing the very disparities they are intended to overcome.

From the Digital Equity Framework (DEF) perspective, the access and infrastructure challenges discussed in this section underscore that equity in digital WIL placements depends not only on the availability of connectivity and devices but also on the extent to which these resources facilitate meaningful participation and learning outcomes. The framework emphasises how uneven infrastructure, limited device access, and inconsistent institutional support systematically shape pre-service teachers' opportunities to engage in digitally mediated teaching and professional development. By situating connectivity and device provision within broader socio-economic and institutional contexts, the framework reinforces the need for structural, equity-driven responses that move beyond temporary fixes towards sustained investment and institutional accountability. In this way, access and infrastructure emerge as critical yet insufficient conditions for equity, highlighting the necessity to align digital WIL initiatives with fair principles that ensure all pre-service teachers can participate fully and benefit equitably from digital placements.

4.2 Digital pedagogies and support: Equity in mentoring and instructional design

While access to digital infrastructure is a necessary condition for participation in online or hybrid work-integrated learning (WIL) placements, it is not sufficient on its own to ensure equitable professional learning experiences for pre-service teachers. Equity in digital placements is also shaped by the quality of digital pedagogies, the nature of instructional design, and the availability

of responsive mentoring and support structures (Ros, 2024). Moreover, Huang (2025) argues that equity encompasses who benefits from AI-supported pedagogy and who is left behind. This section examines how inequities in pedagogical practices and support systems influence pre-service teachers' engagement, learning, and professional development within digitally mediated WIL contexts.

Digital pedagogies in WIL settings require intentional design that acknowledges the complexities of teaching practice and the diverse contexts in which pre-service teachers are placed. However, Singh, Evans, Reed, Karch, Qualey, Singh, and Wiersma (2022) indicate that many digital placements and pedagogies rely on instructional designs that replicate traditional face-to-face supervision models without adequate adaptation to online environments. Such approaches often privilege pre-service teachers who already possess strong digital literacy, confidence in online communication, and familiarity with learning management systems. For others, particularly those from under-resourced schooling backgrounds, these designs can create additional barriers to participation and meaningful learning. In their study evaluating WIL using a context-sensitive approach, Young, Semple, Harvey, and McKenzie (2023) assert that equitable instructional design in digital WIL placements must be inclusive, flexible, and context-sensitive. This includes providing multimodal learning resources, clear expectations for digital engagement, and scaffolded opportunities for developing digital pedagogical competence. Asynchronous learning activities, recorded mentoring sessions, and varied assessment formats can support pre-service teachers facing connectivity challenges or balancing placement responsibilities with other socio-economic demands (Ersin & Atay, 2021). Such design choices acknowledge unequal starting points and aim to create fair conditions for learning rather than uniform experiences.

Furthermore, mentoring plays a critical role in shaping the quality of WIL experiences. However, James, Hudson, and Lasczik (2022) note that digital placements often reveal disparities in access to effective mentorship. In some contexts, mentor teachers and university supervisors lack the training or confidence to support pre-service teachers in online or hybrid teaching environments. This can result in inconsistent feedback, limited professional dialogue, and reduced opportunities for reflective practice. Pre-service teachers placed in digitally confident schools or supported by technologically adept mentors are thus advantaged, while others experience minimal guidance and professional isolation. An equity-oriented approach to digital mentoring necessitates structured, sustained, and well-supported mentoring models. This includes preparing mentor teachers and supervisors for digital supervision, clarifying roles and expectations, and providing platforms that facilitate regular, meaningful interaction. Moreover, Chan (2020) asserts that equitable mentoring also involves recognising power dynamics within digital spaces and ensuring that pre-service teachers' voices, challenges, and contextual realities are acknowledged and addressed.

Institutional support mechanisms significantly influence the effectiveness of digital pedagogies and mentoring. Essential components such as technical help desks, pedagogical support teams,

and professional development initiatives for both mentors and pre-service teachers are crucial for promoting equitable engagement (Nzuza, 2025). When such support is fragmented or reactive, inequities are likely to persist, placing the burden of adaptation on individual students rather than on the institutions themselves. In summary, digital pedagogies and support structures are vital for ensuring equity in digital WIL placements. Beyond merely providing access, institutions must invest in inclusive instructional design and equitable mentoring practices that acknowledge diversity in digital readiness and contextual constraints. Only through intentional, justice-oriented approaches can digital placements realise their potential to expand, rather than limit, professional learning opportunities for pre-service teachers.

4.3. Socioeconomic and contextual barriers: Disparities linked to background and school context

Equity in digital work-integrated learning (WIL) placements for pre-service teachers is significantly influenced by socioeconomic and contextual factors that go beyond mere access to technology and institutional support. The social, economic, and geographic backgrounds of students, alongside the contexts of the schools in which they are placed, play a crucial role in determining their ability to engage meaningfully in digitally mediated professional learning (Salisu, Al-Mamary, Alfalah, Abubakar, Al-Samhi, Goaill, Alhaidan & Alshammari, 2026). This section explores how these intersecting factors contribute to uneven experiences and outcomes in digital WIL placements.

Pre-service teachers enter WIL placements with diverse socioeconomic realities that affect their engagement with digital learning environments. As mentioned earlier in this chapter, students from economically disadvantaged backgrounds often encounter constraints such as limited financial resources for data, unstable living conditions, and competing responsibilities, including paid work or caregiving, particularly for those in ODeL institutions. A study by Jan and Mahboob (2022) on the challenges and strategies of online mentoring highlights how these factors can restrict the time, focus, and flexibility needed to fully participate in online mentoring sessions, synchronous teaching activities, or extended digital lesson preparation. In contrast, students from more privileged backgrounds are generally more likely to have access to stable learning environments and supplementary resources that facilitate sustained engagement. The potential for AI to reproduce privilege arises if only certain students can effectively leverage it (Cao, Choi, Park & Lee, 2025). Geographic contexts further exacerbate these disparities. Pre-service teachers placed in rural or remote areas often face challenges such as weaker digital infrastructure, limited technical support, and reduced exposure to technology-enhanced teaching practices (Nhlumayo, 2024). Additionally, Kormos and Wisdom (2021) note that schools in these contexts may lack learning management systems, digital teaching tools, or adequately trained personnel to support online instruction. Consequently, digital placements may become more symbolic than substantive, providing limited opportunities for genuine engagement with digital pedagogies or professional collaboration.

The context of the school also plays a vital role in shaping equity within digital WIL experiences. Well-resourced schools with robust digital cultures tend to offer structured support, mentorship, and opportunities for innovation, which enhance pre-service teachers' professional learning (Msimango, 2025). In contrast, Ajani and Govender (2025) observe that under-resourced schools often prioritise basic instructional continuity over digital experimentation, which limits pre-service teachers' exposure to meaningful technology integration. These contextual differences can inadvertently favour some students while marginalising others, thereby reinforcing pre-existing inequalities within teacher education pathways. A study by Chhabra (2021) on pre-service teachers' habitus and meaning-making processes in diverse classroom placements when teaching and engaging with technology for equity suggests that cultural and social capital further influence how pre-service teachers navigate digital placements. Familiarity with academic discourse, professional communication norms, and digital platforms is not evenly distributed and is often linked to prior educational experiences. Students who lack this capital may experience heightened anxiety, reduced confidence, and limited participation in online professional spaces. Without targeted support, digital placements may amplify these hidden inequities, framing challenges as individual shortcomings rather than contextual constraints.

From an equity perspective, socioeconomic and contextual barriers must be recognised as structural conditions that shape digital WIL experiences. Addressing these disparities necessitates institutional strategies that are sensitive to students' lived realities and the diverse contexts of partner schools. This encompasses flexible placement models, differentiated support mechanisms, and stronger partnerships with schools in under-resourced communities. Ultimately, ensuring equity in digital WIL placements demands an approach that accounts for the complex interplay between socioeconomic background and school context. By foregrounding these factors, institutions can move beyond deficit-based interpretations of student performance and towards more just, inclusive, and context-responsive models of professional learning for pre-service teachers (Sha, Xiaoxiao, Li & Wenmeng, 2025; Destiny & Lator, 2024). Viewed through the Digital Equity Framework, the disparities outlined in this section underscore that equity in digital WIL placements cannot be reduced to questions of access alone, but must be understood in relation to students' capabilities, opportunities for meaningful participation, and the outcomes of their professional learning experiences. The framework foregrounds how socioeconomic background, geographic location, school context, and forms of social and cultural capital interact to shape pre-service teachers' engagement with digitally mediated WIL. By situating these challenges within broader structural and institutional contexts, the Digital Equity Framework shifts the focus from individual deficits to systemic responsibility. It provides a coherent theoretical foundation for this chapter by highlighting the need for context-responsive, justice-oriented interventions that address not only technological provision but also pedagogical support, institutional partnerships, and differentiated forms of assistance. In doing so, the framework reinforces the chapter's central argument: that ensuring equity in digital placements requires intentional, systemic approaches that enable all pre-service

teachers to participate meaningfully and benefit equitably from work-integrated learning in digital contexts.

4.4 Policy and institutional responses: Leadership, partnerships, and systemic reform

Ensuring equity in digital work-integrated learning (WIL) placements for pre-service teachers necessitates deliberate, coordinated policy and institutional responses that extend beyond ad hoc and informal solutions. While digital placements have emerged as a practical response to placement shortages and disruptions, their long-term viability and equity hinge on strong leadership, collaborative partnerships, and systemic reform. This section explores how institutional policies and leadership practices can either promote or hinder equitable digital WIL experiences.

Saad, Alias, Chong, and Sabri (2025) and Zabalawi, Kordahji, and Aftimos (2024) suggest that leadership at the institutional level plays a central role in shaping the vision, priorities, and funding for digital WIL initiatives. The authors further indicate that higher education institutions should foster a digitally and equity-transformed educational environment. Equity-oriented leadership involves recognising digital placements as pedagogical spaces that require the same level of planning, quality assurance, and support as traditional school-based placements. However, in many contexts, digital WIL policies remain underdeveloped or are viewed as temporary alternatives rather than integral components of teacher education programmes (Msila, 2025). This lack of formal policy direction often results in inconsistent implementation, unclear expectations for students and mentors, and uneven access to support. Effective policy responses require clear guidelines defining the purpose, scope, and standards of digital WIL placements. Such policies should address issues of access, mentoring, assessment, workload, and ethical use of digital technologies. Importantly, equity considerations must be embedded within these frameworks to ensure that institutional responses are sensitive to students' diverse contexts and do not assume uniform conditions of participation.

Partnerships and stakeholder collaboration between universities, schools, and external stakeholders are equally critical in advancing equitable digital education and placements (Siddiqi, 2024). Strong and reciprocal partnerships enable shared responsibility for mentoring, resource provision, and professional learning. Letuma and Dlamini (2025) state that schools serve as key sites of practice, while universities provide pedagogical guidance, supervision, and infrastructure support. In digitally constrained contexts, partnerships with government departments, non-governmental organisations (Djatmiko, Sinaga & Pawirosumarto, 2025), and technology providers can help address gaps in connectivity, device access, and training. Without such collaboration, digital WIL initiatives risk imposing disproportionate burdens on individual schools or pre-service teachers.

Systemic reform is essential to address the structural conditions that perpetuate inequities in digital WIL placements. This necessitates a re-evaluation of placement models to permit

flexibility, hybrid approaches, and differentiated support based on contextual realities. Additionally, it involves investing in professional development for university supervisors and mentor teachers to enhance their capacity for digital mentoring and assessment. Systemic reform further requires the alignment of digital WIL policies with broader institutional strategies regarding digital transformation, teacher education, and social justice. Accountability mechanisms are crucial for sustaining equitable practices. Institutions must establish processes for monitoring the quality and equity of digital placements, including mechanisms for student feedback, data-driven evaluation, and continuous improvement. Moreover, Calzada and Eizaguirre (2025) advocate for a transition from digital inclusion to AI inclusion and governance. Equity indicators should be integrated into programme review and accreditation processes to ensure that digital WIL initiatives are not only innovative but also just and inclusive.

The DEF emphasises that equitable digital participation is shaped by institutional rules, norms, resource distribution, and power relations, all of which are enacted through leadership decisions, policy design, and partnership structures. From this perspective, leadership commitment, coherent policy frameworks, and accountable partnerships are pivotal to enabling fair access, meaningful participation, and equitable outcomes in digital WIL placements. Thus, the framework reinforces the assertion that sustainable equity in digital WIL cannot be attained through individual efforts alone; it necessitates coordinated institutional action, systemic reform, and ongoing accountability to ensure that digital placements function as inclusive and just environments for professional learning. In conclusion, policy and institutional responses to digital WIL placements must be grounded in robust leadership, collaborative partnerships, and a commitment to systemic reform. By embedding equity at the centre of policy design and implementation, institutions can transform digital placements from short-term solutions into sustainable, inclusive models of professional learning that support diverse pre-service teachers and enhance teacher education systems.

5. Conclusion

This chapter critically examines equity in digital work-integrated learning (WIL) placements for pre-service teachers, arguing that while access to digital technologies is necessary, it is insufficient to ensure equitable professional learning experiences. Drawing on the Digital Equity Framework, the review demonstrates that equity in digital placements is influenced by a complex interaction of infrastructure, pedagogical support, socioeconomic background, institutional policy, and school context. Consequently, digital placements do not function as neutral or universally beneficial innovations; rather, they serve as pedagogical spaces that can either mitigate or reproduce longstanding inequalities in teacher education. The literature reviewed reveals persistent gaps in connectivity and device provision, uneven mentoring and pedagogical support, and significant disparities linked to students' socioeconomic backgrounds and placement contexts. In South African and broader Global South settings, these challenges are exacerbated by historical patterns of inequality and varying institutional capacity. While digital

WIL placements have the potential to expand access and alleviate placement shortages, this chapter illustrates that without intentional design and systemic support, such models risk favouring students and schools that are already digitally resourced.

The chapter further emphasises the critical role of institutional leadership, policy coherence, and partnerships in promoting equity in digital WIL. Effective responses require a shift away from short-term, emergency-driven solutions towards sustainable, equity-oriented frameworks that recognise digital placements as legitimate and complex sites of professional learning. This includes investing in infrastructure, enhancing mentor capacity, embedding ethical and inclusive pedagogical practices, and developing accountability mechanisms that prioritise equity outcomes. By applying the Digital Equity Framework as a cohesive theoretical lens, the chapter offers a structured approach to understanding how equity can be operationalised in digital WIL placements. It advocates for a transition from access-focused narratives to justice-oriented practices that address participation, capability development, and learning outcomes. Ultimately, ensuring equity in digital placements requires coordinated institutional action and ongoing critical reflection, positioning digital WIL not merely as a response to constraints, but as an opportunity to envision more inclusive and socially just models of teacher professional learning.

6. Declaration

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