

Transforming educational leadership in higher education with innovative administrative strategies

¹Kofi Nkonkonya Mpuangnan & ²Zukiswa Roboji

Abstract

In developing nations particularly in Africa, innovative administrative strategies are essential for educational leaders to navigate inherent challenges in education. This study aims to explore how educational leaders in higher education can be equipped with innovative administrative strategies to cause a positive change in education delivery. A systematic literature review was conducted to achieve this aim, drawing on the transformational leadership model as its theoretical underpinning. The search encompassed scholarly publications from major repositories like Scopus, Web of Science, and International Bibliography of the Social Sciences and Textbooks from 1967 to 2023. The search process went a series of exclusive and inclusive processes and yielded 43 research articles. The synthesized findings were analyzed using a thematic approach. The findings indicate that transformational leadership has the potential to incorporate innovation into higher educational administrative practices. It was also found that innovative administrative practices in higher education can be achieved through staff motivation, technology integration, adoption of agile methodologies, collaborative research, interdisciplinary collaboration, seminars, workshops, and positive organizational culture. Based on the findings, professional development programs for managers and administrators in higher education were highly recommended. These programs would help enhance the knowledge and skills of employees in educational administration.

Keywords: *education, employable skills, leadership development, staff development, systematic literature review, transformational leadership model*

Article History:

Received: January 29, 2024

Revised: March 6, 2024

Accepted: March 8, 2024

Published online: May 1, 2024

Suggested Citation:

Mpuangnan, K.N. & Roboji, Z. (2024). Transforming educational leadership in higher education with innovative administrative strategies. *International Journal of Educational Management and Development Studies*, 5 (2), 27-56. <https://doi.org/10.53378/353054>

About the authors:

¹Corresponding author. Department of Curriculum and Instructional Studies. University of Zululand, South Africa. Email: nkonkonya@gmail.com

²Walter Sisulu University, South Africa. Email: zukiswaroboji@gmail.com



1. Introduction

Educational leadership's role in higher education is crucial for its growth and development. Educational leaders must follow administrative practices to improve staff quality and achieve institutional excellence (Nguyen et al., 2021). Acknowledging the pivotal role of education in addressing societal issues, it is crucial for educational leadership across the African continent to take proactive measures. This involves ensuring broad access, elevating the quality of schools, and aligning educational curricula with the dynamic needs of the swiftly evolving global economy. It is evident that numerous developing nations are faced with prevalent economic challenges encompassing issues such as poverty, unemployment, and deficient infrastructure (World Bank, 2023). Redemption of fate among citizens of such nations lies in transformational leadership, particularly in education, where young people acquire knowledge and skills. This level of education must equip young people to tackle new challenges and be able to shift the contours of educational paradigms to align with societal needs (Fullan, 2021; Gronn, 2020). Tackling these educational challenges requires effective leadership. This is a fundamental step towards fostering sustainable development and empowering the citizens of any developing country for a more promising and enlightened future.

The increasing focus on innovative leadership in education is key for aligning with societal needs. This is because preparing students for the future demands a departure from the conventional, one-size-fits-all approach (Mieghem et al., 2022; Pentang et al., 2022). It necessitates transformational leaders who can steer educational institutions towards strategies that nurture critical thinking, creativity, and comprehensive development of skills in students (Meyers et al., 2023). In this light, analyzing the outcomes and advantages of adopting innovative strategies in higher education is crucial. Doing so can address gaps in institutional performance and contribute to improved student success. This approach enables educational institutions to adeptly respond to the rapidly changing global environment and empower students with skills for achieving success. Educational leaders must also respond to changes and adopt strategies that prioritize student-centred learning (Noriey, 2023), and foster creativity, critical thinking, collaboration, and problem-solving skills.

The modern student population particularly in developing countries is characterized by diverse learning needs, interests, and abilities, necessitating personalized and engaging

learning experiences (Chizhik & Chizhik, 2018). However, there is evidence that many educational institutions in the African continent are faced with limited resources (UNESCO, 2021), be it financial, technological, or infrastructural. Innovative administrative strategies are essential for leaders to optimize these scarce resources. For example, leveraging digital platforms can alleviate shortages in physical learning materials, while forging strategic partnerships with businesses or non-profits can reinforce the need for more infrastructure. This can facilitate the adoption of modern teaching methods emphasizing critical thinking, problem-solving, digital literacy, and entrepreneurship. In this way, the students will be better prepared to confront global challenges and compete internationally. Addressing these needs requires educational leaders who can take innovative approaches (Pentang et al., 2022; Vassallo, 2022). Such leaders must be able to work actively towards narrowing achievement gaps, reducing disparities in educational outcomes, and ensuring equal opportunities for all students to thrive. This calls for a managerial role that involves identifying and addressing systemic barriers implementing evidence-based strategies and collaborating with stakeholders from various backgrounds (Devanadera & Ching, 2023). While existing literature recognizes the significance of collaboration and interdisciplinary approaches in education, empirical studies investigating the leadership practices, initiatives, and challenges involved in fostering collaboration across diverse stakeholders are lacking. Therefore, this study would address the following research questions.

1. How can educational leaders foster a culture of innovation and creativity in higher education?
2. How relevant are collaboration and interdisciplinary approaches to higher educational administrative practices?

2. Literature review

2.1. Theoretical framework

Transformational leadership model (TLM) emphasizes inspiring and motivating individuals to unlock their full potential and enhance their skills (Bass, 1985). Within the field of education, Kwan (2020) found that transformation leadership has proven to be highly effective in improving student outcomes, teacher satisfaction, and overall school culture. A study by Leithwood, et al. (1999) discovered that schools led by transformational leaders

consistently outperformed those led by leaders who did not embody this style. Moreover, Hallinger and Heck (1996) conducted another study revealing a positive correlation between transformational leadership and teacher job satisfaction, and their commitment to the school. According to Bass (1985), the transformational leadership model encompasses four key components, which are:

- i. *Idealized influence*. This concerns the leader's ability to embody a role model for their followers, earning them trust and respect.
- ii. *Inspirational motivation*. This centres around the leader's skill to artfully convey a captivating and motivating vision, thereby igniting enthusiasm and drive among their followers to strive for its actualization actively and enthusiastically.
- iii. *Intellectual stimulation*. The leader's ability to inspire followers to embrace innovative and critical thinking, thereby fostering an environment of growth and development.
- iv. *Individualized consideration*. This involves emphasizing the leader's capacity to grasp and effectively respond to the distinct requirements of every individual follower. This entails cultivating an environment that is both encouraging and growth-oriented.

In this study, TLM is pivotal in the literature review aiding in addressing research questions. The area of higher education is marked by the necessity for innovation and adaptability. As such, this model provides valuable insights into the methods through which leaders can propel constructive transformation, cultivate an environment conducive to innovation, and effectively navigate administrative hurdles. Therefore, the study has explored the literature surrounding the transformation of educational leadership in higher education. This model has offered a perspective that allows for an in-depth examination of leaders' roles in instigating and executing change activities.

2.2. Shaping the quality and outcomes of educational institutions through leadership

The significance of effective leadership in educational settings cannot be overstated, as it plays a crucial role in establishing a positive school culture, fostering academic excellence, and facilitating student success (Fullan, 2014; Hallinger & Heck, 2010). One prominent leadership style that has been widely acknowledged for its impact on educational institutions is transformational leadership. This approach, characterized by visionary and inspirational

leadership, has demonstrated its ability to enhance the quality of schools (Bass & Riggio, 2006). Transformational leaders motivate and empower their followers, cultivating a shared vision and creating an environment of trust, innovation, and continuous improvement (Leithwood & Jantzi, 2005). Extensive research has indicated a positive relationship between transformational leadership and various educational outcomes, including student achievement, teacher satisfaction, and overall school performance (Robinson et al., 2008). Another leadership approach gaining recognition in educational research is distributed leadership. This model emphasizes shared responsibility and collaborative decision-making among leaders, teachers, and stakeholders (Harris, 2008). By promoting distributed expertise, professional learning communities, and collective efficacy, distributed leadership contributes to improved educational outcomes (Spillane et al., 2004). Effective school leaders employ a range of practices and strategies to shape the quality and results of educational institutions. One such approach is instructional leadership, which focuses on supporting and enhancing teaching and learning processes, ultimately leading to improved student achievement (Hallinger & Heck, 2010). Instructional leaders provide valuable feedback, facilitate professional development opportunities, and offer necessary resources to enhance instructional practices among teachers (Seashore et al., 2010). In practice, distributed leadership entails the dispersion of expertise and authority throughout the organization, encouraging active participation and input from teachers, administrators, and other members of the school community. This approach nurtures professional learning communities, where educators collaborate to exchange knowledge, explore best practices, and collectively address challenges.

School leaders who prioritize the establishment of a safe, inclusive, and supportive environment play a crucial role in enhancing student engagement, minimizing disciplinary issues, and elevating academic performance (Hoy & Tarter, 2011). By cultivating strong relationships with students, parents, and staff members, they positively impact student well-being and achievement (Leithwood et al., 2004). Research consistently emphasizes the profound influence of leadership on student success and overall school performance. Effective leadership practices, such as setting high expectations, monitoring student progress, and providing timely feedback, yield positive outcomes in terms of student learning (Leithwood et al., 2006). Strong instructional leadership and a commitment to continuous improvement significantly increase student achievement (Hallinger & Murphy, 1985). Furthermore, studies have consistently demonstrated a correlation between effective leadership and improved

school performance indicators, including graduation rates, attendance, and standardized test scores (Louis et al., 2010; Robinson et al., 2008). Leaders who foster a positive school climate, establish a clear vision and implement data-driven decision-making processes actively contribute to overall school enhancement and success (Fullan, 2005).

The literatures outline research gaps in educational leadership, including the interaction between leadership styles, implementation challenges, contextual factors' influence, long-term impact assessment, and measurement methods. Hence, it highlights the need for in-depth exploration of how different leadership approaches interact, challenges leaders face in practice, contextual factors' role, long-term effects, and robust measurement methods to evaluate leadership effectiveness. Addressing these gaps could enhance understanding and inform evidence-based practices for improving student success and school performance.

2.3. Innovative approaches to administrative practices

Recently, there has been a surge of interest in reimagining administrative practices to optimize efficiency, productivity, and overall organizational performance (Farrell, 2018; Bason, 2017). One key aspect of this transformation revolves around integrating technology (Hesselink & Schalk, 2007). By leveraging cutting-edge technologies like artificial intelligence (AI), machine learning, and robotic process automation (RPA), traditional administrative tasks have undergone a significant evolution (Bhatti, 2020). For instance, implementing AI-powered Chatbots has revolutionized customer service interactions, resulting to reduced response times and heightened customer satisfaction. Additionally, RPA has played a pivotal role in automating repetitive administrative tasks, leading to substantial savings in time and costs (Siau et al., 2021). Moreover, the adoption of agile methodologies, has captured the attention of administrative practices. Agile administrative practices embrace iterative and adaptable approaches to problem-solving and decision-making (Cohn, 2017). This methodology fosters collaboration, flexibility, and swift responses to dynamic circumstances. Research indicates that embracing the agile approach enhances organizational responsiveness and fuels innovation, ultimately yielding improved administrative outcomes (Baral et al., 2019).

Modern approaches to administration place a growing emphasis on the human aspect within organizations (Peterson et al., 2020). These human-centric approaches prioritize the well-being, engagement, and empowerment of employees, recognizing their significant influence on overall organizational performance. One way this is achieved is by implementing

innovative administrative practices such as flexible work arrangements and employee wellness programs (Mpuangnan et al., 2022). Research has shown that such initiatives enhance job satisfaction and reduce employee turnover rates (Khanyile & Mpuangnan, 2023). Additionally, fostering a culture of innovation and creativity among employees has proven beneficial for problem-solving and decision-making in administrative functions (Collins et al., 2022). Furthermore, the availability of vast amounts of data and advancements in data analytics have revolutionized administrative practices, enabling evidence-based decision-making (Ma et al., 2018). By leveraging data-driven insights, organizations can make informed decisions, optimize resource allocation, and identify areas for improvement (Chan et al., 2021). For instance, predictive analytics can be employed to forecast demand and optimize inventory management, resulting in cost savings and improved customer service. The integration of data analytics into administrative practices has the potential to enhance efficiency, effectiveness, and overall organizational performance.

Literature highlights gaps in optimizing administrative practices for organizational performance. While interest in leveraging technologies like AI and RPA for administrative tasks is high, research on implementation challenges and long-term impact is lacking. Similarly, while agile methodologies gain traction, empirical studies on their effectiveness and scalability are scarce. Human-centric approaches, including employee well-being initiatives, lack comprehensive research on outcomes and sustainability. Furthermore, data analytics' potential in informing decision-making requires more exploration for effective resource allocation. Addressing these gaps could provide valuable insights for organizations aiming to enhance administrative efficiency and overall performance.

2.4. Revitalizing educational leadership through innovative administrative practices

To effectively address the evolving needs of students and equip them for a rapidly changing world, it is crucial to reimagine educational leadership and embrace innovative administrative practices. Central to this transformation is adopting of transformational leadership (Leithwood et al., 1999). Transformational leaders can inspire and motivate followers by conveying a compelling vision and empowering them to unlock their full potential (Bass & Riggio, 2006). This leadership style has been proven to positively impact student achievement and foster a positive school culture (Leithwood et al., 2008). By fostering

innovation, creativity, and collaboration, transformational leaders drive meaningful change within educational institutions.

Another vital aspect of revitalizing educational leadership is the implementation of distributed leadership practices (Alma, 2002). Distributed leadership involves sharing responsibilities among various individuals, including administrators, teachers, and stakeholders (Harris, 2014). This collaborative approach encourages shared decision-making, collaboration, and the utilization of diverse expertise. Research indicates that distributed leadership enhances instructional practices, improves student outcomes, and cultivates a culture of continuous improvement (Harris et al., 2013). In addition, embracing innovative administrative practices necessitates the effective integration of technology in educational leadership (Scherer & Teasley, 2017). Technology offers opportunities to enhance administrative efficiency, promote data-informed decision-making, and support personalized student learning experiences. By leveraging technology effectively, educational leaders can optimize their administrative processes and empower educators to implement innovative teaching strategies.

Integrating technology in educational settings offers numerous benefits for administrative processes, decision-making, and student learning experiences (Halverson et al., 2015). By harnessing technological tools and platforms, educational leaders can effectively connect with stakeholders, foster transparency, and cultivate an atmosphere of innovation. To revitalize educational leadership, it is crucial to establish a culture that embraces innovation within educational institutions (Fullan, 2021). This involves promoting practices encouraging risk-taking, supporting experimentation, and prioritizing continuous learning (Robinson et al., 2009). Educational leaders play a vital role in cultivating a culture of innovation by providing professional development opportunities, allocating resources for research and development, and acknowledging and appreciating innovative approaches (Anderson & Dexter, 2005). A culture that values innovation nurtures creativity, adaptability, and resilience, which are vital qualities for educational leaders operating within a dynamically evolving educational landscape.

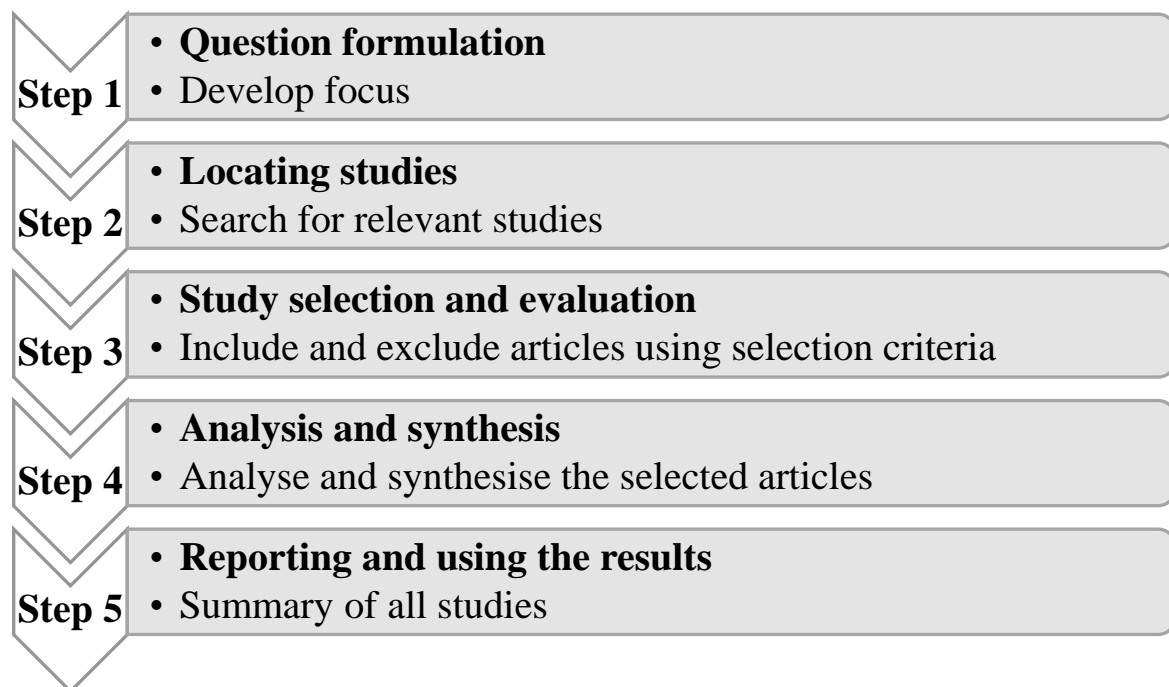
3. Methods

The study was carried out through a systematic literature review (SLR), which involves synthesizing ideas from a wide array of sources to form a coherent and comprehensive

argument (Dickins & Weber-Buchholz, 2022). Employing this approach, the researcher gathered information from various outlets, including academic journals, conference proceedings, reports found within Scopus, Web of Science (WoS), and the International Bibliography of the Social Sciences (IBSS). The search was focused on specific themes such as innovative administrative practices, the roles of educational leaders, and interdisciplinary approaches to administrative practices. The search process adhered to the five-step framework outlined by Denyer and Tranfield (2009), which is detailed further in Figure 1.

Figure 1

Five steps of Systematic Literature Review



Source: Adapted from Denyer and Tranfield (2009)

Step 1: Question formulation. The initial step involves delineating the scope and establishing a lucid focal point for the investigation (Han & Dong, 2020; Denyer & Tranfield, 2009). The study's objective was to employ pertinent literature (spanning from 1959 to 2023). Comparing older literature with contemporary studies enables researchers to discern changes, advancements, or enduring themes within the field. The studies addressed the subsequent research questions:

1. How can educational leaders foster a culture of innovation and creativity among teachers and staff to revitalize administrative practices in the education setting?
2. How can educational leaders promote collaboration and interdisciplinary approaches among stakeholders, such as teachers, parents, and community members, to drive innovation in administrative practices?

Step 2: Locating studies. The second phase of the model involves systematically identifying, evaluating, and compiling the primary contributions relevant to the research questions (Han & Dong, 2020; Denyer & Tranfield, 2009). This investigation scoured prominent online scholarly databases such as Scopus, WoS, and IBSS to ensure impartiality and encompass a comprehensive spectrum of sources and data. These databases were chosen due to their accessibility within educational institutions and utilization in analogous investigations. The exploration was driven by thematic criteria encompassing innovative administrative practices, the roles of educational leaders, and the interdisciplinary approaches to administrative practices. Additionally, a proactive approach was adopted, examining supplementary sources generated from citations within the chosen studies. It is pertinent to note that no supplementary pertinent studies were unearthed during this exploration process.

Step 3: Study selection and evaluation. The study employed a rigorous and transparent process for selecting relevant articles from various repositories, maintaining clarity throughout its various phases. A total of 217 articles were initially sourced from abstracts of Scopus, WoS and IBSS as well as textbooks. The articles were taken through inclusive and exclusive criteria in various stages. Within Scopus, a total of 18 articles and books were included, indicating a substantial contribution to the repository's database. WoS follows closely behind with 10 articles deemed suitable for inclusion, suggesting a slightly narrower selection compared to Scopus. IBSS included 7 articles, reflecting a focused yet significant addition to its collection. Additionally, 8 books were included, indicating a recognition of the value of book publications alongside scholarly articles. In total, 43 articles and textbooks were selected from these repositories and included in this study.

The process of selecting the articles goes both exclusive and inclusive phases. In Scopus, a notable number of articles initially encountered rejection, primarily due to duplication, totaling 32 instances. Despite these initial exclusions, 26 articles are subsequently deemed unfit upon further review, highlighting Scopus's dedication to upholding rigorous

quality standards. Additionally, 11 items face a second rejection, signifying ongoing efforts to refine and enhance the database's content. Consequently, Scopus boasts a substantial collection, comprising a total of 87 articles. Similarly, a comparable trend emerges in the data pertaining to WoS. Here, 40 articles are initially rejected, reflecting the repository's careful screening process. Of these, 23 undergo further evaluation and are consequently excluded, alongside 7 items facing a second rejection. These figures underline WoS's commitment to maintaining the integrity and uniqueness of its database. Ultimately, WoS encompasses 80 articles and books within its repository.

In contrast, IBSS demonstrates a relatively lower frequency of initial rejections, with 13 instances. Despite this, 8 items are excluded upon subsequent scrutiny, highlighting IBSS's dedication to quality assurance. Moreover, only 4 items face a second rejection, indicative of a stringent selection process. IBSS hosts a total of 32 articles, reflecting its commitment to maintaining a high standard of scholarly literature. Furthermore, the analysis extends to the realm of book publications, where rejection rates are comparatively lower than those for articles. For instance, only 3 books are initially rejected, with 5 undergoing a second rejection. Similar trends are observed in both WoS and IBSS, where rejection rates for books remain relatively minimal. Overall, books contribute to a total of 18 items across all repositories, further enriching the scholarly landscape within these platforms. The entire process of article selection is visually represented in Table 1, offering a comprehensive overview of the systematic approach employed in this study. Ultimately, the findings were presented as per the emerging themes.

Table 1

Inclusive and exclusive criteria for selection of articles and textbooks

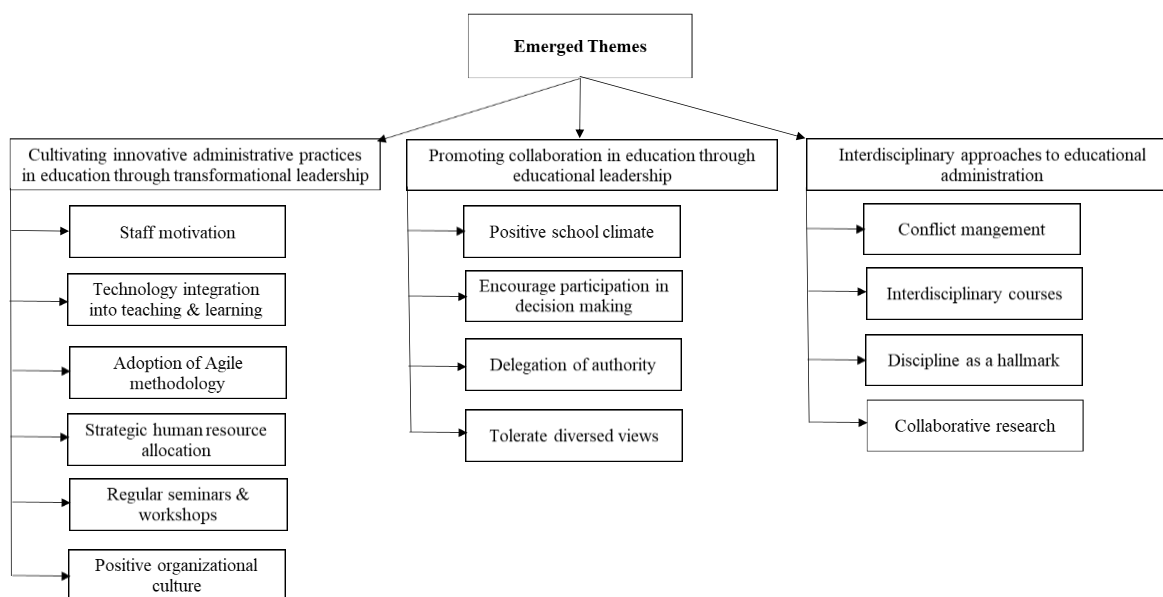
Repository	Articles & Textbooks Included	Articles & Textbooks Excluded			Total
		First Rejection	Second Rejection	Duplicated Articles & Textbooks	
Scopus	18	32	26	11	87
WoS	10	40	23	7	80
IBSS	7	13	8	4	32
Books	8	3	5	2	18
Total	43	88	62	24	217

4. Findings and Discussions

The study's results were organized into three main thematic areas, with each major theme explored in detail. The major themes encompassed cultivating innovative administrative practices in education through transformational leadership, promoting collaboration in education through educational leadership and interdisciplinary approaches to educational administration. Within each major theme, various sub-themes surfaced as shown in Figure 2, and were elaborated upon in paragraph format. The subsequent presentation provides a comprehensive breakdown of the study's findings, offering insights into the aspects of each thematic area and its corresponding sub-themes.

Figure 2

Thematic presentation of the data



4.1. Cultivating innovative administrative practices in education through transformational leadership

The synthesis of studies under this sub-theme has highlighted the profound impact of staff motivation on organizational creativity and performance. When organizations foster intrinsic motivation among employees, they empower them to take ownership of their responsibilities, leading to enhanced effectiveness. Staff motivation, as evidenced by Inam et al. (2021) and Saeid et al. (2022), fosters individual creativity and contributes to achieving institutional goals. Moreover, the role of transformational leadership, as revealed by Park et al.

(2022) and Avolio and Bass (2001), is paramount in creating a culture of trust, collaboration, and innovation. Through providing support, and essential resources, and enabling professional growth, transformational leaders empower employees to excel, leading to enhanced job performance and organizational commitment. Therefore, higher education seeking to thrive in today's dynamic and competitive environment must prioritize cultivating staff motivation and embracing transformational leadership practices to drive innovation, creativity, and ultimately, organizational success.

Incorporating technology into teaching and learning processes in higher education holds substantial significance for institutional development. However, it requires a strategic and transformative approach driven by effective leadership to foster a culture of innovation and creativity among staff members. Such leadership must value innovative approaches and create an environment conducive to technology integration. This approach, as advocated by scholars like Chaker and Jarraya (2021), is crucial for enhancing educational experiences and outcomes for students. Moreover, Lai and Bower (2019) underline the importance of resource accessibility in driving educators' practices concerning technology integration. Therefore, by embracing transformational leadership principles and prioritizing the cultivation of a culture of innovation, higher education institutions can effectively leverage technology to enhance teaching and learning experiences, ultimately contributing to improved educational outcomes.

Another powerful approach to nurturing innovation in higher education lies in the adoption of agile methodologies. It can be established that agile methodologies possess significant potential to foster a culture of innovation when transposed into the education domain. Sawyer (2007) affirms that these methodologies emphasize collaboration and teamwork, engendering an ecosystem wherein educators and staff collaborate on ventures, exchange thoughts, and draw insights from each other's journeys. By embracing this approach, teachers and staff gain a sense of autonomy, enabling them to exercise the decision-making process and assume ownership of their endeavours. Also, it can be learned from the data that agile methodologies underline self-organization, furnishing individuals with the authority to make decisions collectively, thereby kindling the flames of creativity and innovation. This metamorphoses into an iterative process, enabling educators to flexibly adapt to evolving needs while nurturing an environment steeped in innovation (Nerur et al., 2005). Furthermore, the acquisition of innovative skills by staff members equips them with the confidence to embrace risk-taking and to experiment with novel concepts. Consequently, setbacks are regarded not as

setbacks but rather as invaluable prospects for growth and enhancement, echoing the sentiment expounded by Boelens et al. (2017). Thus, by embracing agile methodologies, higher education institutions can foster a culture of innovation, collaboration, and continuous improvement, ultimately enhancing the educational experience for all stakeholders.

The strategic management of human resources under transformational leadership has been recognized as a critical determinant of organizational success. The findings serve to testify that organizations led by transformative leaders possess the capability to effectively assess, train, and strategically allocate human resources to achieve specific objectives. This alignment ensures that human resources are strategically deployed to maximize their contribution towards achieving organizational goals. According to Boon et al. (2019), strategic human resource management involves comprehending the external factors influencing the organization, recognizing its internal capabilities and limitations, and ensuring that HR strategies are aligned to propel the organization towards its goals effectively. In essence, this approach involves the deliberate and planned management of human resources and manpower to achieve organizational goals and gain a competitive advantage. Noe and Winkler (2012) support that developing manpower effectively requires regular in-service training. This can provide employees with opportunities to acquire fresh knowledge, hone existing skills, and stay attuned to industry dynamics and best practices (Blanchard & Thacker, 2013). The training can focus on enriching diverse domains, including technical competencies, leadership enhancement, communication finesse, customer service excellence, problem-solving acumen, and more. In this light, Meyers et al. (2023) establish that in-service training nurtures a culture of perpetual learning within the organizational fabric, empowering employees to remain current with industry regulations, trends, and optimal methodologies.

Seminars and workshops serve as crucial catalysts in fostering innovation and creativity among educators and staff members in higher education institutions. Rust (1998) posits that these platforms have the potential to induce tangible shifts in the practical application of organizational strategies. Specifically, within higher education, participation in seminars and workshops enables teachers to stay updated on emerging pedagogical techniques, innovative strategies, and resourceful problem-solving methodologies. Engaging in such events exposes educators and staff members to novel concepts and alternative approaches, stimulating inventive thinking and encouraging experimentation with new teaching paradigms. These forums provide dedicated time and space for reflection, prompting participants to critically

assess their current instructional methods and educational strategies. Consequently, collaborative activities like group discussions, analysis of real-world cases, and hands-on exercises become avenues for educators to scrutinize their practices, identify areas for improvement, and devise innovative solutions. This iterative process of reflective practice cultivates a culture of continuous improvement and empowers educators to explore innovative pedagogical techniques with confidence.

Innovative administrative practices can be enhanced through a positive organizational culture. According to Potnuru et al. (2019), cultivating a positive organizational culture is closely intertwined with prioritizing employee well-being and job satisfaction. Luthans and Peterson (2019) agree that job satisfaction, a crucial component of employee well-being, stems from the underlying motivations driving employees' actions. Job satisfaction can manifest in various forms, such as monetary rewards, promotions, recognition, approval, or the sense of fulfilment derived from performing well (Mankoe, 2007). To effectively support and motivate employees, it takes a transformative leader to establish a reasonable reward system that acknowledges the work quality of the followers (Ya-Ting & Huang, 2021). This system must be designed objectively to ensure equitable treatment and employee satisfaction. According to Herzberg (1959), rewards can be either intrinsic or extrinsic, including factors like pay and benefits. In an educational institution, extrinsic rewards may involve additional compensation or incentives for employees who work overtime, while intrinsic rewards encompass the internal gratification derived from engagement and meaningful contributions. To ensure transparency and fairness, the administrator needs to develop a comprehensive motivation policy that guides establishing a reward system equitable to all employees. This policy should mitigate ambiguity or bias, fostering an environment where employees feel valued and motivated to contribute their best efforts. The details of the articles cited under this theme are presented in table 2.

Table 2

Articles about cultivating innovative administrative practices in education

Repository	Author name and year of publication	Number of Articles
Scopus	Ian & Stephanie (2021), Inam et al., (2021), Saeid et al., (2022), Park et al. (2022), Avolio & Bass (2001), Chaker & Jarraya (2021), Boon et al. (2019), Rust (1998), Potnuru et al. (2019), Luthans & Peterson (2019), Ya-Ting & Huang (2021),	10
WoS	Nerur et al. (2005), Boelens et l. (2017),	2
IBSS	Meyers et al. (2023)	1
Books	Sawyer (2007), Noe & Winkler (2012), Blanchard & Thacker (2013), Mankoe (2007), Herzberg (1959)	5
Total		18

4.2. Promoting collaboration in education through educational leadership

In higher education, effective leadership can promote a positive school climate. This involves establishing an inclusive and collaborative work environment among staff members. For instance, distributed leadership has emerged as a powerful approach that fosters collaboration and interdisciplinary practices among diverse stakeholders (Harris, 2022), such as teachers, administrators, students, parents, and community members. This form of inclusive and school-positive climate holds immense potential for generating innovative solutions, enhancing educational outcomes, and adopting a comprehensive and holistic approach to education. A research study like Harris et al. (2018) has supported evidence that distributed leadership positively impacts collaboration and interdisciplinary work among these stakeholders. Their analysis identified various mechanisms through which distributed leadership facilitates collaboration, including establishing professional learning communities, cultivating shared goals and visions, and promoting a culture based on trust and shared responsibility. Consequently, this form of leadership encourages the exchange of expertise and the pooling of resources, thereby fostering increased collaboration among stakeholders from different disciplines (Gronn, 2009). As a result, these stakeholders can leverage their diverse perspectives and knowledge to address complex educational challenges and implement innovative approaches effectively.

It can be learned that effective leadership in higher education promotes collaboration among staff members through a participatory decision-making process. This assertion is supported by Owen and Steinhoff's (1987) findings, which indicate that active involvement within a group context fosters a stronger commitment to shared objectives and enhances personal accountability. Also, the emphasis on collaboration in educational administration, as highlighted in the argument, underlines the importance of openly sharing knowledge, information, and personal experiences with staff to cultivate a culture of cooperation. The data further advocate for a spectrum of staff involvement, ranging from basic suggestions to comprehensive democratic models where employees have significant control over management and decision-making. This approach can foster inclusivity and acknowledge the value of diverse perspectives in achieving organizational goals. The importance of effective communication and procedural transparency is also emphasized in the argument (Benjamin et al., 2022), particularly in the context of facilitating productive staff meetings. Providing advance notice, allowing staff to submit grievances and suggestions for the meeting agenda,

and ensuring that every participant has an opportunity to voice their opinions during discussions are crucial components of fostering an environment conducive to collaboration and mutual respect. It can be inferred that when staff members collaborate, decision-making processes tend to rely on achieving majority consensus or agreement. This approach serves to pre-emptively address and mitigate future potential conflicts and criticisms that may arise in the institution.

It can be deduced from the literature that delegation of authority in higher education has an impact on fostering collaboration and interdisciplinary approaches. Kameron et al. (2021) agree that delegating routine tasks and responsibilities to educators and administrators liberates their time and energy, allowing them to focus on critical educational aspects such as curriculum design, student support, and strategic planning. This method stresses the distribution of decision-making power among various stakeholders within educational institutions, including administrators, teachers, and support staff. Daft and Marcic (2016) contend that delegation cultivates shared responsibility and collaboration, which are essential components of effective educational environments. The inclusion of diverse perspectives and expertise through delegation is highlighted as a crucial aspect of collaborative efforts (Liu, 2021). This aligns with the principles of interdisciplinary approaches, where the integration of various disciplines and perspectives enhances the understanding and resolution of complex educational challenges (Clark & Wallace, 2015). Moreover, delegation allows for the specialization of individuals or teams in specific aspects of education (Mbatha et al., 2006). This specialization enables stakeholders to leverage their expertise, contributing to the development and implementation of interdisciplinary initiatives. As stakeholders concentrate on their areas of strength, they can make significant contributions to broader educational objectives while fostering a culture of collaboration and mutual support.

The notion of tolerating diverse views within higher education underlines a fundamental principle for promoting collaboration among workers. This approach emphasizes the importance of allowing subordinates to have decision-making authority over areas directly related to their responsibilities (Ming-Hong, 2017), recognizing that those closest to the challenges are often best equipped to address them effectively. By decentralizing decision-making to appropriate levels, organizations can streamline processes, enhance productivity, and improve overall effectiveness. Mia et al. (2022) assert that decision-making authority in higher education involves individuals who possess both the capacity and accountability to

make significant decisions that impact the institution and its stakeholders. This authority is distributed among various tiers of governance, including institutional executives, faculty members, administrative personnel, students, and external stakeholders, as noted by Sheng-Ju et al. (2023). Each of these stakeholders assumes roles that align with the institution's overarching objectives and strategic plans, ensuring that decisions are in harmony with the institution's core mission and values. This collaborative approach to decision-making not only fosters inclusivity but also promotes a shared sense of ownership and commitment to the institution's success, ultimately contributing to its overall effectiveness and sustainability in fulfilling its educational mission. Table 3 shows the details of articles used under this theme.

Table 3

Articles about promoting collaboration in education through educational leadership

Repository	Author name and year of publication	Number of Articles
Scopus	Clark & Wallace (2015), Mia et al. (2022), Sheng-Ju et al. (2023)	3
WoS	Owens & Steinhoff (1987), Benjamin et al. (2022), Liu (2021), Mbatha et al. (2006)	4
IBSS	Harris (2022), Kameron et al. (2021), Ming-Hong, 2017)	3
Books	Harris et al. (2018), Gronn (2009), Daft & Marcic (2016)	3
Total		13

4.3. Interdisciplinary approaches to educational administration

Effective conflict management has the potential to foster an interdisciplinary approach to educational management in higher education. Since conflict is inevitable, especially in educational institutions with diverse backgrounds (Deem & Brehony, 1993), the effort to manage it cannot be overlooked. Various stakeholders, including teachers, administrators, parents, and policymakers must be actively engaged in addressing conflicts. This is because conflict resolution in education is crucial for promoting collaboration and a positive educational environment (Patel, 2023). Conflicts within educational settings can stem from numerous sources, including competition for resources, conflicting goals, and frustration with others' actions. To mitigate conflicts and promote collaboration, an interdisciplinary approach is essential (Guilherme, 2015). An interdisciplinary approach must be employed to build trust,

enhance communication, foster innovation, resolve power dynamics, and promote continuous improvement across disciplines. It can be deduced from the data that school leaders prioritizing the establishment of safe, inclusive, and supportive environments can elevate academic performance by minimizing disciplinary issues. Ndiyuje (2022) concludes that by adopting appropriate conflict management strategies, stakeholders can cultivate an inclusive, collaborative, and effective educational environment conducive to interdisciplinary approaches and positive educational outcomes.

The development of interdisciplinary courses or programs serves as another crucial instrument for fostering interdisciplinary approaches in higher educational administration. According to Liu et al. (2022), interdisciplinary courses can enhance understanding of complex educational issues and facilitate a progressive educational methodology that transcends the boundaries of single disciplines. Incorporating perspectives from various academic backgrounds can equip individuals with a more comprehensive and holistic grasp of challenges within the field of education. This pedagogical strategy supports Jæger (2021) and acknowledges the multifaceted nature of real-world complexities, which often require a multidimensional viewpoint for effective resolution. Lu (2022) holds a similar view on the interdisciplinary approach as it prompts learners to move beyond narrow perspectives, engaging with diverse ideas and viewpoints from different disciplines. Exposure to various disciplines and their distinct methodologies expands intellectual horizons and nurtures critical thinking skills as students learn to analyze and integrate information from diverse sources. For example, in educational matters, integrating knowledge from psychology, sociology, economics, and neuroscience can lead to a deeper understanding of how factors such as classroom dynamics, social contexts, economic disparities, and cognitive processes intersect to shape learning outcomes. This integrated approach enables students to uncover patterns and interdependencies that may go unnoticed when studying each discipline in isolation. Therefore, educational leaders in higher education need to encourage interdisciplinary activities to achieve institutional excellence.

Maintaining discipline among workers is crucial for fostering interdisciplinary collaboration in higher education. Discipline ensures adherence to the rules and regulations that govern every institution (Oliveira et al., 2022). Weak discipline within an organization can lead to a breakdown in moral fibre, subsequently impacting work ethics and effectiveness. Ditommaso (2017) argues that discipline is a hallmark of fostering effective teamwork,

communication, and the integration of diverse perspectives. When educators, administrators, policymakers, and other stakeholders embrace a disciplined approach, they establish a strong foundation for collaboration, ensuring that everyone is working towards a shared purpose. This shared vision serves as a unifying force to encourage interdisciplinary collaboration (Stohlman et al., 2022). For instance, without discipline, it will be difficult to carry out interdisciplinary projects where input and contributions are required from multiple stakeholders. Gilson et al. (2015) assert that discipline is key to ensuring that each stakeholder's time and expertise are utilized efficiently to accomplish a goal. This, in turn, facilitates the smooth collaboration flow and reduces delays. Therefore, leadership in higher education must acknowledge the importance of discipline in attaining a shared objective.

Collaborative research activities promote interdisciplinary administrative processes in higher education. Collaborative research brings together experts from diverse fields to solve complex problems and transform educational administrative challenges. Evis (2022) concurs that fostering interdisciplinary research within the field of education offers a gateway to a wealth of viewpoints, methodologies, and insights into a problem. This cooperative activity facilitates the interchange of ideas, methodologies, and discoveries from other fields, including psychology, sociology, neuroscience, economics, and pedagogy (White & Deevy, 2020). This interdisciplinary can pave the way for creating more potent and precisely targeted interventions, policies, and practices that effectively grapple with the multifaceted nature of educational challenges. Therefore, embracing collaborative research stands indispensable for propelling the field of higher education forward and effecting meaningful, enduring enhancements in teaching, learning, and educational outcomes. Table 4 shows the details of articles used under this theme.

Table 4

Articles justifying interdisciplinary approaches to educational administration

Repository	Author name and year of publication	Number of Articles
Scopus	Ndijuye (2022), Lu (2022), Ditommaso (2017), Evis (2022), White & Deevy (2020)	5
WoS	Liu et al. (2022), Jæger (2021), Oliveira et al. (2022), Gilson et al. (2015)	4
IBSS	Patel (2023), Guilherme (2015), Deem & Brehony (1993)	3
Books	-	0
Total		12

5. Conclusion and Recommendation

The future of education holds tremendous promise through the revitalization of educational leadership and the implementation of innovative administrative practices. As the education environment continuously evolves, it becomes imperative for educational leaders to adapt their approaches to meet the diverse needs of students, teachers, and the community. Embracing innovative methods throughout higher educational practices can help leaders cultivate a dynamic learning environment that nurtures creativity, critical thinking, and student collaboration. These are relevant skills that must be bestowed on young people to be relevant in society now and in the future. This can be achieved through transformational leadership's efforts including leveraging technology to enhance teaching and learning, human resource training, positive organizational culture, as well as adopting data-driven decision-making processes.

It can be established that revitalizing educational leadership through innovative approaches can yield positive outcomes for students, thereby ensuring that institutions remain agile, responsive, and future-ready. Through this approach educational leaders can prioritize individualized instruction, personalized learning pathways, and holistic support systems, to create an inclusive and equitable educational experience for all students. This approach can foster academic success and supports the social-emotional well-being of students for lifelong learning and future achievements. In this context, higher education institutions in developing nations must demonstrate unwavering commitment to ongoing professional development, collaboration, and adaptability to embrace necessary administrative changes, all for the betterment of their communities.

Based on the discussions, the following implications could be drawn to assist governments, educators and researchers who are interested in this field:

- i. Professional development programs for managers and administrators in higher educational institutions are highly recommended. These programs help them enhance their knowledge and skills in educational administration.
- ii. Conducting further research on theories of educational administration and their impact on employee behaviour in higher education is recommended for a deeper

- understanding of the field. This research can provide insights into effective educational administration practices and strategies.
- iii. Management of higher education must hire educational administrators based on their background in educational administration, management, or related fields. Candidates with a strong educational administration background are likely to have studied relevant courses on administration and possess the necessary competence for the job.
 - iv. It is important to involve the communities in the decision-making processes. By allowing communities to participate in decision-making processes, educational institutions can benefit from their input, especially in discipline and adherence to moral values. This involvement creates a system of checks and balances that contributes to the success of the institutions.
 - v. Administrators should avoid adopting an authoritative leadership style within educational institutions. Instead, administrators should adopt leadership styles that foster collaboration, cooperation, and mutual respect among all stakeholders in the educational community. This approach tends to yield better outcomes and promote a positive learning environment.

References

- Anderson, R. E., & Dexter, S. (2005). School technology leadership: An empirical investigation of prevalence and effect. *Educational Administration Quarterly*, 41(1), 49-82.
- Avolio, B.J., & Bass, B.M. (Eds.) (2001). *Developing potential across a full range of leadership TM: Cases on transactional and transformational leadership* (1st ed.). Psychology Press. <https://doi.org/10.4324/9781410603975>
- Baral, S., Kapoor, A., & Joshi M. (2019). Agile Administrative Practices: An Exploratory Study. *Journal of Business and Management*, 21(1), 112-128.
- Bason, C. (2017). *Leading public sector innovation: Co-creating for a better society*. Policy Press. <https://doi.org/10.2307/j.ctt9qgnsd>

- Bass, B. M., & Riggio R. E. (2006). *Transformational leadership* (2nd ed.). Psychology Press.
- Bass, B. M. (1985). *Leadership and performance beyond expectations*. Free Press.
- Benjamin, B., Milliken, A., Grace, P. (2022). Effective communication—improving communication skills. In: Grace, P., Milliken, A. (eds) *Clinical Ethics Handbook for Nurses. The International Library of Bioethics*, Vol 93. Springer, Dordrecht. https://doi.org/10.1007/978-94-024-2155-2_4
- Bhatti, Z. A. (2020). Artificial intelligence and the future of customer service. *Journal of International Technology and Information Management*, 29(4), 1-7.
- Blanchard, P. N., & Thacker J. W. (2013). *Effective training: Systems, strategies, and practices*. Pearson Education.
- Boelens, R., De Wever, B., & Voet M. (2017). Four key challenges to the design of blended learning: a systematic literature review. *Educational Research Review*, 22, 1-18, <https://doi.org/10.1016/j.edurev.2017.06.001>
- Boon, C., Den Hartog, D. N., & Lepak, D. P. (2019). A systematic review of human resource management systems and their measurement. *Journal of Management*, 45(6), 2498-2537. <https://doi.org/10.1177/0149206318818718>
- Chaker, H., & Jarraya, H. (2021). Combining teaching “about” and “through” entrepreneurship: A practice to develop students’ entrepreneurial competencies. *Industry and Higher Education*, 35(4), 432–442. <https://doi.org/10.1177/0950422221991005>
- Chan, T. C., Ho S. C., & Wu R. W. (2021). Leveraging predictive analytics for inventory management: A case study in retail. *International Journal of Information Management*, 61, 1-10.
- Clark, S.G., Wallace, R.L. (2015). Integration and interdisciplinarity: concepts, frameworks, and education. *Policy Sci* 48, 233–255. <https://doi.org/10.1007/s11077-015-9210-4>
- Cohn, M. (2017). *Agile estimating and planning*. Pearson Education.
- Collins, J., Robinson D., & Stewart B. (2022). Fostering a culture of innovation: The role of administrative practices. *Journal of Applied Psychology*, 108(2), 189-203.
- Daft, R. L., & Marcic, D. (2016). *Understanding management* (10th ed.). Cengage Learning. Chapter 7: Organizing for Action.

- Deem, S. & Brehony K.J. (1993). Consumers and education professionals in the organization and administration of schools: partnership or conflict? *Educational Studies*, 19:3, 339-355. <https://doi.org/10.1080/0305569930190308>
- Denyer, D., & Tranfield D. (2009). *Producing a systematic review*. In *The SAGE Handbook of Organizational Research Methods* (pp. 671–689). SAGE Publications Inc.
- Devanadera, C. & Ching D. (2023). School head's managerial roles as correlates of organizational performance. *International Journal of Educational Management and Development Studies*, 4 (3), 110-133. <https://doi.org/10.53378/353015>
- Dickins, K. & Weber-Buchholz, S., (2022). *Literature review and synthesis: A guide for nurses and other healthcare professionals*. Springer Publishing Company
- Ditommaso, A. (2017). Advancing an interdisciplinary agenda for education in sustainability: A pedagogical framework. *Sustainability*, 9(7), 11-42.
- Evis, L. H. (2022). A critical appraisal of interdisciplinary research and education in British Higher Education Institutions: A path forward? *Arts and Humanities in Higher Education*, 21(2), 119–138. <https://doi.org/10.1177/14740222211026251>
- Farrell, M. P. (2018). Innovating administrative justice: Enhancing efficiency, productivity, and legitimacy. *The Modern Law Review*, 81(3), 421-447.
- Fullan, M. (2021). *Leading in a Culture of Change*. John Wiley & Sons.
- Fullan, M. (2014). *The principal: Three Keys to Maximizing Impact*. John Wiley & Sons.
- Fullan, M. (2005). *Leadership & sustainability: System thinkers in action*. Thousand Oaks, CA: Corwin Press.
- Gilson, L. L., Maynard, M. T., Jones Y., N. C., Vartiainen, M., & Hakonen, M. (2015). Virtual teams research: 10 years, 10 themes, and 10 opportunities. *Journal of Management Studies*, 52(8), 1188-1227.
- Gronn, P. (2020). *The new work of educational leaders: Changing leadership practice in an era of school reform*. Sage Publications.
- Gronn, P. (2009). *Distributed leadership: A concise guide*. Sage Publications.
- Guilherme, A. (2015). Michel Serres' Le Parasite and Martin Buber's I and Thou: Noise in informal education affecting dialogue between communities in conflict in the Middle East. *Educational Philosophy and Theory*, 47:10, 1052-1068. <https://doi.org/10.1080/00131857.2015.1031066>

- Harris, A., Muijs, D., & Chapman, C. (2018). *Improving schools through distributed leadership*. Routledge.
- Harris A. (2002). *Distributed leadership in schools: A conceptual analysis*. the Open University Press
- Hallinger, P., & Heck, R. H. (2010). Collaborative leadership and school improvement: Understanding the impact on school capacity and student learning. *School Leadership & Management*, 30(2), 95-110.
- Hallinger, P. (2011). Leadership for 21st century schools: From instructional leadership to leadership for learning. *Journal of Education and Training Studies*, 1(1), 1-17.
- Hallinger, P., & Heck, R. H. (1996). Reassessing the principal's role in school effectiveness: A review of empirical research, 1980-1995. *Educational Administration Quarterly*, 32(1), 5-44.
- Halverson, R., Grigg, J., Prichett, R., & Thomas, C. (2015). The new instructional leadership: Creating data-driven instructional systems in schools. *Journal of School Leadership*, 25(4), 709-735.
- Hargreaves, A., & Fink, D. (2003). The seven principles of sustainable leadership. *Educational Leadership*, 61(7), 8-13.
- Harris, A., Jones M., & Ismail N. (2022). Distributed leadership: taking a retrospective and contemporary view of the evidence base. *School Leadership & Management*, 42:5, 438-456. <https://doi.org/10.1080/13632434.2022.2109620>
- Harris, A. (2014). Distributed leadership: Implications for the role of the principal. *Journal of Management Development*, 33(4), 374-383.
- Harris, A., Jones, M., & Hadfield, M. (2013). *Distributed leadership: A review of literature*. National College for School Leadership.
- Hesselink, F., & Schalk, R. (2007). E-HRM: Innovative human resource management or a way to re-establish managerial control? *International Journal of Human Resource Management*, 18(11), 1844-1859.
- Herzberg, F. (1959). *The motivation of work*. New York: John Wiley and Sons Inc. 2nd ed.

- Ian, P. & Stephanie C. (2021). Professional development for school leaders in England: decision-making for social justice. *Professional Development in Education*, 47(1), 63-74. <https://doi.org/10.1080/19415257.2020.1787197>
- Inam, A., Ho J. A., Zafar H., Khan, U., Sheikh, A. A., & Najam U. (2021). Fostering creativity and work engagement through perceived organizational support: The interactive role of stressors. *SAGE Open*, 11(3). <https://doi.org/10.1177/21582440211046937>
- Jæger, K. (2021). New-style higher education: Disciplinarity, interdisciplinarity and transdisciplinary in the EHEA qualifications framework. *High Educ Policy*, 34, 155–174. <https://doi.org/10.1057/s41307-018-00126-w>
- Kameron, M. Carter Greg L. S. Solimeo S. (2021). Matched delegation: When the leader delegates the right tasks, how does the team benefit? *Academy of Management Proceedings* 2021(1), 11580. <https://doi.org/10.5465/AMBPP.2021.11580>
- Khanyile, H. G. & Mpuangnan, K. N. (2023). Dilemma of school management teams in balancing discipline and multiple deprivations among learners through integrated management approach. *Research in Educational Policy and Management*, 5(2), 312-327. <https://doi.org/10.46303/repam.2023.33>
- Kwan, P. (2020). Is transformational leadership theory passé? Revisiting the integrative effect of instructional leadership and transformational leadership on student outcomes. *Educational Administration Quarterly*, 56(2), 321–349. <https://doi.org/10.1177/0013161X19861137>
- Leithwood, K., Harris, A., & Hopkins, D. (2008). Seven strong claims about successful school leadership. *School Leadership & Management*, 28(1), 27-42.
- Leithwood, K., Louis, K. S., Anderson, S., & Wahlstrom, K. (2004). *How leadership influences student learning*. New York: The Wallace Foundation.
- Leithwood, K., & Riehl, C. (2003). *What we know about successful school leadership*. Philadelphia, PA: Laboratory for Student Success.
- Leithwood, K., Jantzi, D., & Steinbach, R. (1999). *Changing leadership for changing times*. Open University Press.
- Luthans, F., & Peterson, S. J. (2019). The role of job satisfaction in the relationship between employee wellbeing and job performance: A moderated mediation model. *Journal of Occupational Health Psychology*.

- Lai, K. W., & Bower, M. (2019). How collaborative technology-enhanced learning can facilitate creativity in the classroom. *Journal of Educational Technology & Society*, 22(1), 33-47.
- Li, X. (2023). Literature review on employee motivation. *International Journal of Education and Humanities* 10(1), 31-47.
- Liu, J., Watabe, Y. & Goto, T. (2022). Integrating sustainability themes for enhancing interdisciplinarity: a case study of a comprehensive research university in Japan. *Asia Pacific Educ. Rev.* 23, 695–710. <https://doi.org/10.1007/s12564-022-09788-z>
- Liu, J. (2021). Building education groups as school collaboration for education improvement: a case study of stakeholder interactions in District A of Chengdu. *Asia Pacific Educ. Rev.* 22, 427–439. <https://doi.org/10.1007/s12564-021-09682-0>
- Lu, Y.-H. (2022). A case study of EMI teachers' professional development: The impact of interdisciplinary teacher collaboration. *RELC Journal*, 53(3), 642–656. <https://doi.org/10.1177/0033688220950888>
- Ma, M., Chen, J., Chng, E. S., & Chen, S. Y. (2018). Big data analytics in government: Lessons learned from an implementation of predictive analytics in child protective services. *Government Information Quarterly*, 35(4), 561-570.
- Mbatha, L., Grobler, B., & Loock, C. (2006). Delegation of authority by school principals — an education law perspective. *Education as Change*, 10(1), 3-15. <https://doi.org/10.1080/16823200609487125>
- Mia, O., Montgomery R., Zoe J., Karon H., Sally T. (2022). Exploring the expansive properties of interpretive description: An invitation to anti-oppressive researchers. *International Journal of Qualitative Methods*, 46(6), 448-451. <https://doi.org/10.1080/10668926.2021.1920069>
- Mankoe, J., O. (2007). *Educational administration and management in Ghana, second edition*. Payless Publication Ltd., Kumasi.
- Ming-Hong, T. (2017). A leader's decision vigilance and subordinates' creativity: Creativity requirement as a mediator. *Academy of Management Proceedings*, 2015(101). <https://doi.org/10.5465/ambpp.2015.10057>

- Meyers, C. V., Wronowski, M. L., & LaMonica, L. (2023). Evidence that in-service professional learning for educational leaders matters. *Journal of Research on Leadership Education*, 18(1), 103–131. <https://doi.org/10.1177/19427751211042060>
- Mpuangnan, K.N., & Dick-Segoe C. Adu A. G., & Ennim F., (2022). School improvement and support officer as curriculum leader in Pru East district- Ghana: roles, challenges, and the way forward. *Journal of Positive School Psychology*, 6(3), 1337–1351.
- Mpuangnan, N.K., Amegbanu V.A. & Padhan S. (2021). Analysing the methods and approaches for transacting diploma in basic education curriculum in Ghana. *International Journal of Curriculum and Instruction*, 13(2), 1006-1023.
- Nerur, S., Mahapatra, R., & Mangalaraj, G. (2005). Challenges of migrating to agile methodologies. *Communications of the ACM*, 48(5), 72-78.
- Ndijuye, L. G. (2022). Developing conflict resolution skills among pre-primary children: Views and practices of naturalized refugee parents and teachers in Tanzania. *Global Studies of Childhood*, 12(2), 159–169. <https://doi.org/10.1177/2043610619832895>
- Nguyen, D. T., Nguyen, Q. H., Nguyen, T. D., & Nguyen, T. H. (2021). Impact of school leadership practices on teachers' job satisfaction and retention: Evidence from Vietnam. *International Journal of Educational Management*, 35(4), 825-841.
- Noe, R. A., & Winkler, C. (2012). *Employee training and development*. McGraw-Hill Higher Education.
- Noriey, M. I. (2023). Senior managers in the UK: The development of educational leaders in further education institutions. *International Journal of Educational Management and Development Studies*, 4 (3), 63-89. <https://doi.org/10.53378/353004>
- Oliveira, S., Olsen, L., Malki-Epshtein, L. et al. (2022). Transcending disciplines in architecture, structural and building services engineering: a new multidisciplinary educational approach. *Int J Technol Des Educ* 32, 1247–1265. <https://doi.org/10.1007/s10798-020-09645-3>
- Owens, R. G. & Steinhoff, C. R. (1987). Towards a theory of organizational culture. *Journal of Educational Administration*, 27(3), p6-16.

- Patel, J. (2023). The role of dissent, conflict, and open dialogue in learning to live together harmoniously, *Educational Philosophy and Theory*, 55:6, 707-718. <https://doi.org/10.1080/00131857.2021.2006057>
- Park, J., Han, S.J., Kim, J. & Kim, W. (2022), Structural relationships among transformational leadership, affective organizational commitment, and job performance: the mediating role of employee engagement, *European Journal of Training and Development*, 46(9), 920-936. <https://doi.org/10.1108/EJTD-10-2020-0149>
- Pentang, J., Perez D., Cuanan K., Recla M., Dacanay R., Bober R., Dela C., C., Egger, S., Herrera R., Illescas C., Salmo J., Bucad J. M. L., Agasa J., & Abaca N. (2022). Tracer study of teacher education graduates of Western Philippines University - Puerto Princesa Campus: Basis for curriculum review and revision. *International Journal of Multidisciplinary Applied Business and Education Research*, 3(3), 419-432. <https://doi.org/10.11594/ijmaber.03.03.12>
- Peterson, D., Finley A., & Jackson D. (2020). The impact of flexible work arrangements on employee satisfaction and retention. *Journal of Organizational Behavior*, 43(3), 234-248.
- Potnuru, R.K.G., Sahoo C.K. & Sharma, R. (2019). Team building, employee empowerment and employee competencies: Moderating role of organizational learning culture. *European Journal of Training and Development*, 43 (1), 39-60. <https://doi.org/10.1108/EJTD-08-2018-0086>
- Robinson, V. M., Hohepa M., & Lloyd C. (2009). *School leadership and student outcomes: Identifying what works and why. Best Evidence Synthesis Iteration [BES]*. Ministry of Education.
- Rust, C. (1998). The impact of educational development workshops on teachers' practice. *International Journal for Academic Development*, 3:1, 72-80. <https://doi.org/10.1080/1360144980030110>
- Saeid K., Farzaneh A. M., & Ahmad Yaghoubi F. (2022). The relationship between proactive personality and employees' creativity: the mediating role of intrinsic motivation and creative self-efficacy. *Economic Research-Ekonomska Istraživanja*, 35:1, 4500-4519. <https://doi.org/10.1080/1331677X.2021.2013913>

- Sawyer, R. K. (2007). *Group genius: The creative power of collaboration*. Basic Books.
- Scherer, M., & Teasley, S. D. (2017). *Technology and the future of school leadership*. Routledge.
- Sheng-Ju, C., Cheng-Cheng Y., William Y., Wai L. (2023). Adopting neoliberal values in Taiwan's higher education governance: a hybridization process. *Discourse: Studies in the Cultural Politics of Education*, 44(3), 425-440.
- Siau, K., Wang, W., & Soh, C. (2021). Robotic process automation for business process outsourcing. *Journal of Database Management*, 32(1), 1-20.
- Spillane, J. P., Halverson, R., & Diamond, J. B. (2004). Towards a theory of leadership practice: A distributed perspective. *Journal of Curriculum Studies*, 36(1), 3-34.
- UNESCO, (2021). Global Education Coalition explores the digital learning turn in Africa.
- Vassallo, B. (2022). Leading the multicultural school: Some insights from dedicated school leaders. *Management in Education*, 36(4), 159–166. <https://doi.org/10.1177/0892020620973041>
- White, P.J., Deevy, C. (2020). Designing an interdisciplinary research culture in higher education: A case study. *Interchange* 51, 499–515 (2020). <https://doi.org/10.1007/s10780-020-09406-0>
- World Bank (2023). *World bank annual report 2023: A new era in development*. Washington, DC: World Bank. <http://hdl.handle.net/10986/40219>
- Ya-Ting, H., Hao L., & Liang H. (2021). How transformational and contingent reward leaderships influence university faculty's organizational commitment: the mediating effect of psychological empowerment. *Studies in Higher Education*, 46 (11), 2473-2490. <https://doi.org/10.1080/03075079.2020.1723534>