

UNIVERSITY OF KWAZULU-NATAL

**Leading from face-to-face to virtual:
Leaders' experiences at the University of KwaZulu-Natal during
the pandemic**

by

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DECLARATION

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Sign



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ABSTRACT

The COVID-19 pandemic lockdown disrupted the usual functioning of businesses and organisations had to operate remotely to continue working. This brought about a unique opportunity for organisations such as traditional Higher Education Institutions (HEIs), who would not have previously considered virtual work arrangements, to explore and experience the opportunities and possibilities of virtual work arrangements. Post-COVID-19 pandemic, organisations are now re-strategising and incorporating elements of virtualness in their operations, which require new structures and leadership beyond traditional face-to-face approaches. This increasing interest in virtual work arrangements and existing virtual leadership challenges necessitates further research to explore leaders' experiences of leading virtually during the COVID-19 pandemic to identify successful approaches and their specific challenges. The study employed the qualitative research approach to explore leaders' experiences of leading virtually during the COVID-19 pandemic at the University of KwaZulu-Natal (UKZN) in South Africa. A purposive sampling technique was used in selecting the study participants. Thirteen participants were interviewed, including academic leaders and directors of professional services. The interviews were recorded via Zoom and subsequently transcribed. Thematic analysis of interview transcripts was undertaken using the NVIVO software. Codes and themes were generated from the analysis to answer the research questions. The study findings revealed that participants adopted and hardened their face-to-face leadership styles upon transitioning to virtual leadership. Amongst the attributes and behaviours exhibited by the leaders were trust, empathy, good communication, consultation, and self-confidence. Some of the challenges participants faced when leading virtually included a lack of participation by subordinates, slow response rates, exhaustion, balancing work and personal life, isolation, and load shedding. Generally, participants expressed both positive and negative feelings toward leading virtually during the COVID-19 pandemic. All participants believed that the era of completely face-to-face work arrangements is over and that a hybrid working model should be adopted and institutionalised in the future. Based on the key findings of the study, a face-to-face-to-virtual leadership transition conceptual framework was developed to illustrate the possible journey of face-to-face leaders to become virtual leaders.

Keywords: COVID-19 pandemic; leadership; transition; University of KwaZulu-Natal, virtual.

TABLE OF CONTENTS

Declaration	i
Acknowledgements	ii
Abstract	iii
List of Figures	xii
List of Tables	xiv
Abbreviations and Acronyms	xv
Chapter 1: Introduction	1
1.1 Introduction.....	1
1.2 Background of the study.....	3
1.3 Research problem	5
1.4 Research aim and objectives.....	6
1.5 Research questions.....	6
1.6 Justification for the study.....	6
1.7 Scope of the study.....	7
1.8 Significance of the study	7
1.9 Limitations of the study	7
1.10 Layout of dissertation	7
1.11 Chapter Summary	8
Chapter 2: Literature Review.....	9
2.1 Introduction.....	9
2.2 Conceptualisation of a virtual team	10
2.2.1 The role of technology in virtual teams.....	11
2.2.2 Benefits of virtual teams.....	12
2.2.3 Contemporary research trends in virtual teams	13
2.2.3.1 Structure and arrangement of virtual teams.....	13
2.2.3.2 Isolation in virtual teams	13
2.2.3.3 Organisational leaders' buy-in and acceptance	14

2.2.3.4	Competencies and selection of virtual workers	14
2.2.3.5	Support and capacity development	15
2.2.3.6	Work-life imbalance	15
2.3	Leadership.....	16
2.3.1	Different leadership styles	16
2.4.	Leadership in virtual teams.....	18
2.4.1	Virtual leadership approaches.....	19
2.4.2	Virtual leadership in higher education.....	21
2.4.3	Virtual leadership challenges.....	22
2.4.3.1	Trust.....	23
2.4.3.2	Active participation	23
2.4.3.3	Communication.....	23
2.4.3.4.	Availability	24
2.4.4	Effective virtual leadership strategies.....	24
2.4.4.1	Improve team productivity	24
2.4.4.2	Maintain shared goals	24
2.4.4.3	Ensure team mental well-being and psychological safety	25
2.4.4.4	Establish members' sense of belonging.....	25
2.4.4.5	Make subordinates feel appreciated and recognised	25
2.4.4.6	Effective communication.....	26
2.5	Leadership Adaptation.....	26
2.5.1	Transition process: From face-to-face to virtual leadership	29
2.5.2	Behavioural change after transitioning to virtual leadership.....	30
2.6	Perceptions of virtual work and intention to continue virtually	31
2.7	Chapter Summary	32
Chapter 3: Research Methodology.....		33
3.1	Introduction.....	33
3.2	Research paradigm.....	34

3.3	Research approach	34
3.4	Research design	35
3.5	Study site	35
3.6	Target population.....	36
3.7	Sampling method	36
3.8	Samples and sample size	37
3.8.1	Participants’ demographics.....	38
3.9	Data collection methods	38
3.10	Semi-structured in-depth interview	39
3.10.1	Interview guide approach	39
3.10.2	Interview schedule	39
3.11	Data quality.....	40
3.12	Data analysis.....	41
3.12.1	Dataset coding approach.....	42
3.13	Ethical issues	43
3.14	Chapter Summary	44
Chapter 4: Presentation of Findings.....		45
4.1	Introduction.....	45
4.2	Research findings.....	45
4.2.1	Virtual leadership approaches.....	46
4.2.1.1	Conventional leadership style.....	47
a)	Collaborative leadership style.....	48
b)	Participatory leadership style.....	48
4.2.1.2	Change in leadership style	49
a)	No change in leadership approach.....	49
b)	Significant change in leadership approach	50
4.2.1.3	Virtual leadership attributes.....	51
a)	Trust.....	52

b)	Empathy	52
c)	Good communication.....	53
d)	Other attributes	53
4.2.1.4	Virtual leadership behaviours	55
a)	Consult subordinates.....	56
b)	Intentional inclusion	56
c)	Leverage collective strength.....	57
d)	Value team members	58
e)	Self-confidence	58
4.2.2	Virtual leadership challenges.....	59
4.2.2.1	Bottom-up challenges	59
a)	Lack of active staff participation	60
b)	Slow response time	61
4.2.2.2	Top-down challenges.....	61
a)	Insufficient information to lead	62
b)	Unavailable leaders.....	62
4.2.2.3	Individual challenges	63
a)	Exhaustion	63
b)	Work-life balance	64
c)	Isolation	64
4.2.2.4	Technical challenges.....	65
a)	Load shedding.....	65
b)	Unstable connectivity	65
4.2.2.5	Structural challenge	66
4.2.3	Virtual leadership enabling factors.....	67
4.2.3.1	Improve digital competency	67
4.2.3.2	Facilitate virtual platform setup.....	68
4.2.3.3	Organise the training of subordinates	68

4.2.3.4	Institutional support.....	69
a)	Provision of data.....	69
b)	Availability of a technical support line.....	70
c)	Moral support from top-level leaders	70
d)	Provision of technology	71
e)	Capacity development initiatives.....	72
4.2.4	Perceptions of the post-pandemic leadership approach.....	74
4.2.4.1	Pandemic virtual leadership experience	74
a)	Positive feelings.....	75
b)	Negative feelings	75
4.2.4.2	Virtual leadership transition experience	76
a)	Discovery phase.....	77
b)	Normalisation phase	77
c)	Stability phase.....	78
4.2.4.3	Virtual leadership continuity	78
4.2.4.4	Future work arrangements	80
4.3	Chapter Summary	82
Chapter 5: Discussion of Findings.....		83
5.1	Introduction.....	83
5.2	Virtual leadership approaches.....	83
5.2.1	Virtual leadership style	84
5.2.1.1	Collaborative virtual leadership style	84
5.2.1.2	Participatory virtual leadership style	84
5.2.2	Virtual leadership attributes.....	85
5.2.2.1	Trust.....	85
5.2.2.2	Empathy	85
5.2.2.3	Good communication.....	86
5.2.2.4	Other attributes	87

a)	Honesty	87
b)	Change agent	87
c)	Exemplar	87
d)	Patience.....	88
e)	Time management	88
5.2.3	Virtual leadership behaviours	88
5.2.3.1	Consult subordinates.....	88
5.2.3.2	Intentional inclusion	89
5.2.3.3	Leverage collective strength	89
5.2.3.4	Value team members	90
5.2.3.5	Self-confidence	90
5.3	Virtual leadership challenges.....	90
5.3.1	Bottom-up challenges	91
5.3.1.1	Lack of active staff participation	91
5.3.1.2	Slow response time	91
5.3.2	Top-down challenges.....	92
5.3.2.1	Insufficient information to lead	92
5.3.2.2	Unavailable leaders.....	92
5.3.3	Individual challenges	93
5.3.3.1	Exhaustion	93
5.3.3.2	Work-life imbalance	93
5.3.3.3	Isolation	93
5.3.4	Technical challenges.....	94
5.3.4.1	Load shedding.....	94
5.3.4.2	Unstable connectivity	94
5.3.5	Structural challenge	95
5.4	Virtual leadership enabling factors	95
5.4.1	Improve digital competency	96

5.4.2	Facilitate virtual platform setup.....	96
5.4.3	Organise the training of subordinates	96
5.4.4	Institutional support	97
5.4.4.1	Providing Internet data	97
5.4.4.2	Availability of a technical support line.....	97
5.4.4.3	Moral support from top-level leaders	98
5.4.4.4	Provision of technology	98
a)	Hardware devices.....	98
b)	Online software applications	98
c)	Workflow management systems.....	98
5.4.4.5	Capacity development initiatives.....	99
a)	Online platform training	99
b)	Psychosocial workshops	99
b)	Online event coordination.....	99
5.5	Perceptions of the post-pandemic leadership approach.....	100
5.5.1	Overall virtual leadership experience	100
5.5.1.1	Positive experiences.....	100
5.5.1.2	Negative experience.....	101
5.5.2	Virtual leadership transition phases.....	101
5.5.2.1	Discovery phase.....	102
5.5.2.2	Normalisation phase	102
5.5.2.3	Stability phase.....	103
5.5.3	Intention to continue leading virtually.....	103
5.5.4	Future work arrangement.....	104
5.6	Chapter Summary	104
Chapter 6: Conclusion and Recommendations.....		106
6.1	Introduction.....	106
6.2	Summary of dissertation	106

6.3	Answering the research questions	107
6.4	From face-to-face to virtual leadership: A conceptual framework.....	109
6.5	Recommendations for leadership practice.....	110
6.6	Recommendations for future research.....	111
6.7	Conclusion	112
References.....		113
Appendices.....		124
Appendix A: Informed consent		125
Appendix B: Interview schedule		127
Appendix C: Ethical clearance		130
Appendix D: Gatekeeper's letter		131
Appendix E: Editor's declaration		132

LIST OF FIGURES

Figure 2.1: Layout of Chapter 2	10
Figure 2.2: Chronological order of virtual teams technology.....	12
Figure 2.3: Nicholson adaptive cycle model	27
Figure 2.4: Six Paths of the Adaptive Cycle.....	28
Figure 2.5: Global workers' transition process	30
Figure 2.6: Opinion of poles on remote work post-COVID-19 pandemic	32
Figure 3.1: Overview of the research methodology (Constructed by the Author)	33
Figure 3.2: Data analysis process	42
Figure 3.3: Nicholson adaptive cycle model	43
Figure 4.1: Theme: Virtual leadership approaches.....	47
Figure 4.2: Sub-theme: Conventional leadership style.....	47
Figure 4.3: Sub-theme: Change in leadership style	49
Figure 4.4: Sub-theme: Virtual leadership attributes.....	51
Figure 4.5: Other virtual leader attributes.....	54
Figure 4.6: Sub-theme: Virtual leadership behaviours.....	56
Figure 4.7: Theme: Virtual leadership challenges.....	59
Figure 4.8: Sub-theme: Bottom-up challenges	59
Figure 4.9: Sub-theme: Top-down challenges.....	61
Figure 4.10: Sub-theme: Individual challenges	63
Figure 4.11: Sub-theme: Technical challenges.....	65
Figure 4.12: Theme: Virtual leadership enabling factors	67
Figure 4.13: Institutional support provided by UKZN	69
Figure 4.14: Theme: Perceptions of the post-pandemic leadership approach	74
Figure 4.15: Sub-theme: Pandemic virtual leadership experience	74
Figure 4.16: Sub-theme: Virtual leadership transition phases.....	76
Figure 4.17: Sub-theme: Virtual leadership continuity	78

Figure 4.18: Word cloud indicating participants' preferred future work arrangement	80
Figure 4.19: Word tree indicating participants' preference for a hybrid approach	81
Figure 5.1: Layout of Chapter 5	83
Figure 5.2: Virtual leadership approaches	84
Figure 5.3: Virtual leadership challenges	91
Figure 5.4: Virtual leadership enabling factors	95
Figure 5.5: Perceptions of post-pandemic leadership approach	100
Figure 5.6: Virtual leadership transition phases	102
Figure 6.1: From face-to-face to virtual leadership: A conceptual framework	110

LIST OF TABLES

Table 2.1: Virtual leadership attributes from recent studies (constructed by the author).....	20
Table 2.2: Work role transition phases (constructed by the author).....	30
Table 3.1: Profile of participants	38
Table 4.1: Study themes and sub-themes	46

ABBREVIATIONS AND ACRONYMS

ALR	Academic Leader of Research
ALTL	Academic Leader of Teaching and Learning
HEI	Higher Education Institution
HDMS	Higher Degree Management System
HSSREC	Humanities and Social Sciences Ethics Committee
ERO	Emergency Remote Operations
UKZN	University of KwaZulu-Natal
UNISA	University of South Africa
VAL	Virtual Academic Leader
VUCA	Volatile, Uncertain, Complex, and Ambiguous

CHAPTER 1: INTRODUCTION

1.1 Introduction

The COVID-19 pandemic necessitated a lockdown that disrupted businesses, and organisations were required to develop disruptive strategies and approaches to continue working (World Health Organization, 2020). The lockdown restricted national and international mobility, with almost all individuals forced to work from home, resulting in the formation of unprecedented and unplanned virtual organisations (Agarwal *et al.*, 2020). The higher education sector was heavily affected, as most South African and global universities previously operated exclusively physical modes of delivery, except for a few open universities (Sioux, 2020). Although disruptions to academic activities are not new to South African higher education, where student protests such as the #feesmustfall and #Rhodesmustfall have required annual revision of the academic structure (Ahmed, 2017), the COVID-19 disruption was large scale, with high uncertainty and complexity. Most higher education institutions (HEIs) struggled during the COVID-19 pandemic due to challenges of access to internet connectivity and a lack of digital skills (Kele & Mzilen, 2021). With the adoption of emergency remote teaching (ERT), HEIs continued operations in a virtual mode. Consequently, face-to-face administrative teams and leaders had to become virtual teams and leaders (Sioux, 2020).

A virtual team is a group of people working from different locations toward a common goal with the aid of technology (Agarwal *et al.*, 2020; Dulebohn & Hoch, 2017). Virtual work arrangements existed before the COVID-19 pandemic, but few service companies had established virtual team practices and standards (Bell, 2012). Before the COVID-19 pandemic lockdown, organisations from different sectors explored various virtual work arrangements and structures, including full-time, part-time, and flexible hours for experimental projects (Contreras, Baykal & Abid, 2020), with the service industry and education sector having the highest and lowest number of virtual workers respectively (He *et al.*, 2020). The unprecedented situation forced organisations to transition to fully virtual operations during the COVID-19 pandemic, as people were mandated to work from home. This led to a breaking of the cultural and structural barriers in organisations such as traditional HEIs that previously would never have experimented with any virtual work arrangement (Guzar, 2022).

The COVID-19 pandemic lockdown virtual work experiment allowed organisations to assess and consider the possibility of adopting post-COVID-19 pandemic virtual work arrangements. During the COVID-19 pandemic, organisations experienced virtual work management through technology. As part of this experience, innovative business models, approaches, infrastructure, skill sets, knowledge, organisational structures and strategies were developed to adapt to the emergency remote and virtual

environment (Agarwal *et al.*, 2020). Although the virtual arrangement was unprecedented and unexpected, lessons were learnt, with the emergence of new opportunities and ideas. Many organisations, including HEIs, began to consider capitalising on the human and technology capital investment made during the COVID-19 pandemic in their post-COVID-19 pandemic strategy and operations. The result of this would be more virtual workers and leaders following the -COVID-19 pandemic than before it began (Contreras *et al.*, 2020). Traditional HEIs, such as the University of Johannesburg (UJ Online, 2022) and the University of Pretoria (UP Online, 2022), are now offering fully online programmes, and it is expected that other institutions will follow suit shortly.

For organisations and HEIs to institutionalise virtual work successfully, they require capable virtual leaders who can influence virtual workers to achieve set goals with the aid of technology (Alward & Phelps, 2019). Studies have shown that virtual leadership affords significant benefits, such as flexibility and skills scalability; however, it comes with challenges that need to be identified and overcome to be successful (Contreras *et al.*, 2020). Multiple studies, such as those of Alward and Phelps (2019) and Longworth and Panteli (2010), have been conducted on virtual leadership in the corporate industry and higher education sector before the COVID-19 pandemic. However, the transition to virtual leadership as a result of the COVID-19 pandemic creates a unique opportunity to explore and further understand leaders' approaches and challenges in leading virtually. Researchers such as Guzar (2022) and Liu (2022) have consequently explored such leadership experiences during the COVID-19 pandemic.

For the same reason, the study explored the lived experience of some leaders at the University of KwaZulu-Natal (UKZN). UKZN is a traditional face-to-face HEI in KwaZulu-Natal, South Africa. It is governed under the leadership of appointed leaders, with the Vice-Chancellor as head supported by other executives such as the Deputy Vice-Chancellors, Executive Directors, Registrar, Deans, Academic Leaders, and Directors (UKZN, 2021a). The traditional model of working at UKZN is face-to-face, with teaching and learning, research, and administrative activities carried out in the five campuses in the KwaZulu-Natal province (UTLO, 2021). In terms of the leadership structure in the institution, the university uses a hierarchical structure with the Vice-Chancellor at the top of the hierarchy. The university is organised into four colleges, headed by the Deputy Vice-Chancellors and other professional divisions led by Executive Directors.

During the COVID-19 pandemic, UKZN was heavily affected as the institution had to move all administrative, research and teaching and learning activities that were previously done physically on campus online (UKZN, 2021b). The university adopted emergency remote operations (ERO), an emergent strategy towards adhering to South Africa's national lockdown regulations (UTOP, 2022). The ERO required staff and students to work virtually, and leaders in various units and departments were responsible for implementing the new strategy while leading virtually. This development resulted in leaders at UKZN adopting technology-mediated leadership approaches to influence, inspire and

encourage subordinates in continuing business under uncertain circumstances toward the institution's mission, vision, and mandate (UTOP, 2022).

Before the COVID-19 pandemic, fully online HEIs were scarce, with few functioning as open or distance institutions (Laufer *et al.*, 2021). Consequently, the studies on virtual leadership in HEI are scanty. Some of the studies on HEI have found that aside from the generic challenges of virtual leaders in other sectors, such as establishing trust, communication, and effective participation, virtual leaders in HEI also face issues of programme flexibility, student size, base, support, and offerings flexibility (Alward & Phelps, 2019). Hence, they require creative and innovative management skills and leadership attributes that include trustworthiness, emotional intelligence, effective communication (Bryant, 2013), technological savviness, shared leadership, the ability to establish a sense of community, and collaboration (Alward & Phelps, 2019).

Most studies on leadership responses to higher education in South Africa during the pandemic focused on executive strategic management and decision-making around social challenges, emergency remote strategies, and online teaching and learning (Coetzee, Neneh, Stemmet, Lamprecht, Motsitsi & Sereeco, 2021; Landa, Zhou & Marongwe, 2021; Menon & Motala, 2021). A few studies (Engelbrecht, 2022; Menon & Motala, 2021) focused on the virtual leadership approaches leaders employed during the pandemic. Menon and Motala (2021) indicated that leadership at the University of Johannesburg used innovative practices, partnerships with universities and government and private sector stakeholders, and servant, communicative, and distributive leadership during the COVID-19 pandemic. Engelbrecht (2022) indicated that managers in a South African private HEI used crisis, transformational and transactional leadership styles as the dominant leadership approaches. However, these studies did not explore the leader's perceptions of virtual leadership during and after the pandemic. This study, using a qualitative research approach through the lens of the Nicholson Adaptive Model, explored the experience of Academic leaders and managers at UKZN to identify the leadership approaches, attributes, behaviours, challenges, and enablers of leading virtually during the COVID-19 pandemic. In addition, participants' perceptions of the future of virtual work arrangements at the institution were explored. This study is necessary as it contributes to the limited literature on virtual leadership in South Africa HEI and provides recommendations for virtual leadership practices. This chapter introduces the study and its background and outlines the research problem, aims and objectives, research questions and methodology.

1.2 Background of the study

Before the 21st century, organisations operated on-site with traditional face-to-face teams. The advent of the internet and communication technologies enabled enhanced flexibility in organisations. Workers could work from anywhere with the aid of information and communication technologies, resulting in

the evolution of teams from proximal to blended and virtual (Agarwal *et al.*, 2020; Contreras *et al.*, 2020). From the 2000s, virtual work arrangements became more commonplace, allowing organisations to respond to the changing work environment influenced by globalisation, increasing competition, scarcity of skills, and the development of technologies (Wojcak *et al.*, 2016). Globally, virtual work arrangements vary from sector to sector. The professional service industry is reported to have the highest proportion of virtual workers (17%), with companies such as IBM having 40% of employees working remotely (He *et al.*, 2020). The healthcare industry has the next highest proportion of virtual workers (12%), followed by insurance and finance (10%), manufacturing (8.5%), and education (7.5%) (He *et al.*, 2020).

The World Health Organisation declared the COVID-19 outbreak a global COVID-19 pandemic on 11 March 2020, which resulted in the enforcement of lockdown regulations to fight the spread of the virus (World Health Organization, 2020). Due to the result of the COVID-19 pandemic, organisations had to develop plans to continue operations during the lockdown, with most employees being required to work from home. This situation led to a rapid increase in remote work across the globe, with over 3.5 billion people using online tools to work entirely remotely (Bouziri *et al.*, 2020). The work arrangement was new and uncomfortable for most workers, who faced professional isolation, anxiety, and lack of experience with virtual work technologies and skills that adversely affected their work performance (Newman & Ford 2021). The situation compounded the challenges faced by leaders who also had to transition from face-to-face to virtual work for the first time while continuing to influence others towards achieving shared goals, especially in higher education.

UKZN, the study site, is one of the top comprehensive universities in South Africa. It is a post-apartheid institution formed from the amalgamation of the University of Durban Westville and the University of Natal in January 2004 (UKZN, 2023). The university has a population of approximately 45,000 students, most of whom come from low-income backgrounds (UKZNAR, 2021). UKZN is a contact institution with teaching and learning, research, and administrative activities carried out on five campuses in the KwaZulu-Natal province (UTLO, 2021). In terms of the leadership structure in the institution, the university uses a hierarchical structure with the Vice-Chancellor at the top of the hierarchy, followed by the Vice-Chancellor, Executive Directors, Deans, Managers, Directors, and Academic Leaders of the four colleges and nineteen schools.

UKZN falls in the category of comprehensive universities in South Africa. Some of the features of comprehensive universities are formed from post-2004/2005 multi-campus mergers, overwhelmed with infrastructural shortfalls such as lack of internet connectivity and conducive student accommodation, and are in service to the community they are (Kele & Mzilen, 2021). With these characteristics, comprehensive universities like UKZN were drastically affected by the transition to virtual work mode during the Covid-19 pandemic due to pre-COVID economic, social justice, and technological issues

(Kele & Mzilen, 2021). These underlining issues made UKZN a no-feasible environment for fully virtual operations, with most students and staff having inadequate internet infrastructure, smart devices, low digital competency, poverty, and residing in rural areas. However, they had to navigate the COVID-19 situation and continue business virtually. The significant role of virtual leadership in the success of fully or partially virtual institutions necessitates research on the unique experiences of leaders leading virtually during the COVID-19 pandemic. The study explored the lived experience of some UKZN leaders who transitioned from face-to-face to virtual leadership during the COVID-19 pandemic to unpack the challenges, approaches, and perceptions of leaders in a virtual environment.

1.3 Research problem

Before COVID-19, HEIs faced disruptions, such as the #RhodesMustFall and #FeesMustFall student protests (Ahmed, 2017). These pre-Covid disruptions were localised in certain institutions, especially the traditional universities, for social, racial, and economic reasons, which resulted in them shutting down and revising their academic calendar (Landa, Zhou & Marongwe, 2021). The regularity of the student protest resulted in some universities, such as the University of Pretoria and UKZN, building technology-enhanced teaching capabilities, such as the adoption of Learning Management Systems (LMS) to aid hybrid and online delivery modes, which was handy during the COVID-19 pandemic (Kupe, 2020). The degree of virtualness in administration, teaching and learning during the pre-COVID disruptions was minor as traditional institutions such as UKZN operated as contact institutions. Hence, did not require virtual leaders. During this period, educational technologies such as Learning Management Systems (LMS) were used sparingly as course content repositories.

The COVID-19 disruption required higher education institutions to switch from face-to-face to fully online due to national restrictions. UKZN operated fully online for the first time, with the unprecedented switch requiring emergency measures as all staff and students were operating fully virtual for the first time (UTOP, 2022). The institution's executive management developed the ERO strategy, implemented virtually by leaders in various directorates who became accidental virtual leaders. Post-covid, most organisations have revised their strategies to accommodate hybrid and online modes of operations to be resilient to future disruptions. This is reflected in the new UKZN corporate strategy 2023-2032, with hybrid and online teaching highlighted as the mode of operation and teaching and learning (UKZN Strategic Plan, 2023). Considering that the COVID-19 virtual experience was unprecedented, not well planned, and the high failure rate (82%) of virtual teams due to ineffective leadership (Darleen, 2019), it is essential to explore stakeholders' experiences towards the effective implementation of hybrid and online modes in HEIs. The study explored the experience of academic leaders and directors at UKZN with the COVID-19 virtual leadership with a focus on the challenges, enablers, and their perspective of future work mode. The study contributed to the practice and limited research on virtual leadership in HEI, especially from the perspective of leaders in a traditional institution in South Africa.

1.4 Research aim and objectives

The study aimed to explore UKZN leaders' experiences leading from face-to-face to virtual during the COVID-19 pandemic to contribute to the body of knowledge surrounding leadership. To achieve this aim, the following objectives were set:

- To examine the leadership approaches employed by UKZN Academic Leaders and Directors of Professional Services in leading their teams virtually during the COVID-19 pandemic.
- To identify the challenges UKZN Academic Leaders and Directors of Professional Services experienced in leading virtual teams during the COVID-19 pandemic.
- To determine the factors that enabled UKZN Academic Leaders and Directors of Professional Services to facilitate the transition from face-to-face to virtual.
- To determine UKZN Academic Leaders and Directors of Professional Services' perceptions of how best to lead their teams post-COVID-19 pandemic.

1.5 Research questions

The research questions this study sought to answer were as follows:

- What are the leadership approaches employed by UKZN Academic Leaders and Directors of Professional Services in leading their teams virtually during the COVID-19 pandemic?
- What challenges did UKZN Academic Leaders and Directors of Professional Services experience in leading virtual teams during the COVID-19 pandemic?
- What factors enabled UKZN Academic Leaders and Directors of Professional Services to facilitate the transition from face-to-face to virtual?
- What are the perceptions of UKZN Academic Leaders and Directors of Professional Services on how best to lead their teams post-COVID-19 pandemic?

1.6 Justification for the study

The interest in virtual leadership research has increased since the COVID-19 pandemic. However, only a few studies have focused on the virtual leadership experiences of leaders in the higher education sector (Guzar, 2022). The speculation that virtual work arrangements will increase post-COVID-19 pandemic (Contreras *et al.*, 2020) and the increasing online programme offerings by traditional universities (Dhawan, 2020) necessitates more empirical research on virtual teams and leadership in a higher education context. The COVID-19 pandemic provided the opportunity to explore leaders' experiences of leading from face-to-face to virtual on a large scale from a higher education perspective, as most institutional leaders had to lead their teams virtually during the COVID-19 pandemic due to the national and international lockdown (Agarwal *et al.*, 2020). Research on leaders' experience of leading in a virtual environment will guide policymakers and management of HEIs and other corporate companies

on the support structures needed by virtual leaders to lead successfully. In addition, leaders will be aware of feasible approaches and challenges they must prepare for in a virtual environment.

1.7 Scope of the study

The study focused on the experiences of leaders who switched from proximal to virtual leadership during the COVID-19 pandemic. The areas explored included the leadership approaches and challenges leaders faced when leading their teams virtually during the COVID-19 pandemic, the facilitating conditions that enabled leaders to lead virtually, and their intention to lead virtual teams after the COVID-19 pandemic. The context of the study was the UKZN, an HEI in the KwaZulu-Natal province of South Africa. The participants were appointed Academic Leaders of schools and Directors of support units who held leadership positions for at least one year before and during the COVID-19 pandemic.

1.8 Significance of the study

There are many studies exploring leadership and virtual teams. However, there are few examining virtual leadership, especially the experiences of leaders who transitioned from face-to-face to virtual leadership in a higher education context. The study adds to the body of literature on virtual leadership in the higher education sector, and the recommendations of the study are relevant to virtual leadership practices. In addition, the outcome of the study can be used by organisational policymakers and management both in a higher education and corporate setting for benchmarking or as insight into institutionalising virtual work arrangements and supporting virtual leaders.

1.9 Limitations of the study

Limitations included the accessibility and availability of participants, as some leaders were not readily available. These limitations were managed by scheduling appointments through their assistants to fit their availability. Another limitation was the generalisation of the research findings. The findings of qualitative studies are usually not generalisable because they represent the lived experience and views of a set of people with particular characteristics (Saunders *et al.*, 2019). There was also limited literature available regarding leaders' experiences transitioning from face-to-face to virtual leadership in the HEI context. Literature on virtual leadership experiences in other contexts was used to supplement the limited literature.

1.10 Layout of dissertation

This dissertation is made up of six chapters, briefly explained below.

Chapter 1 is the introduction of this dissertation. It provides a background on virtual work, teams, and leadership, as well as introduces the research problem and motivation for the study. The research

questions and objectives are also presented, along with a summary of the methodology used to achieve them.

Chapter 2 presents the literature review on virtual teams and leadership. It examines the relevant research, theories and studies on virtual teams and provides a comprehensive understanding of the current state of knowledge on the benefits and challenges of virtual work arrangements, virtual leadership and other leadership approaches

Chapter 3 expands on the research methodology section outlined in the first chapter. This chapter provides a more detailed description of the research methods and data collection and analysis techniques used to achieve the study's research objectives.

Chapter 4 presents the findings of the study, which addresses the research questions. This chapter includes extracts from the interviews and the findings that emerged from the study. It provides insight into the experiences of some leaders at UKZN as they transitioned from face-to-face to virtual leadership during the COVID-19 pandemic.

Chapter 5 presents a discussion of the findings of the study in relation to the existing body of knowledge. It explores how the findings compare to what is already known about virtual teams and leadership, and their implication for practice.

Chapter 6 presents a summary and conclusion of the study as well as recommendations. Considerations for future studies are also highlighted.

1.11 Chapter Summary

This chapter established the context and case for the study. It was found that virtual teams existed before the COVID-19 pandemic and varied from sector to sector. However, the COVID-19 pandemic expanded the sphere of virtual work, with most people in different countries having to work from home because of the lockdown restrictions. The definition of a virtual team was presented. The opportunities for virtual work arrangements for businesses and their high failure rate were established. The main reason for the failure of virtual teams is ineffective leadership, which justifies the need to explore the experiences of virtual leaders to unpack the approaches and challenges they face. The outcome of the study will provide insights into how to create an effective environment for virtual leaders and improve the success rate of virtual teams. Additionally, it will contribute to the existing knowledge about leadership in virtual teams. The next chapter presents the literature review on virtual teams and leadership.

CHAPTER 2: LITERATURE REVIEW

2.1 Introduction

Chapter one, the introduction, established the context, the case of the study, and an overview of the research methodology used. This chapter presents a review of the literature on virtual work and leadership from various perspectives. Virtual work, telework, and remote work are synonyms used interchangeably for work arrangements where employees work away from an organisation's main site and engage via information communication technologies (Michaud & Conceição, 2023). For the study, the literature on teleworks, remote work and virtual work facilitated by technology were considered and referred to as virtual work. Virtual work arrangements existed before the COVID-19 pandemic and are expected to become more prominent post-COVID-19 pandemic (Ford, Piccolo & Ford, 2017). Before the COVID-19 pandemic, traditional face-to-face work arrangements were common, with few experimental virtual work arrangements. The narrative has now changed, with organisations creating more virtual work opportunities after experiencing the unprecedented shift to virtual work necessitated by the global COVID-19 pandemic. Although the COVID-19 pandemic was sudden and unexpected, lessons were learnt from the shifted working paradigm, and new opportunities and ideas emerged. New approaches, methods, infrastructures, skill sets, knowledge, organisational structures, and strategies were developed to adapt to the virtual emergency mode of business operation (Guzar, 2022). Organisations are now considering capitalising on the investment made during the COVID-19 pandemic and the perceived benefits of virtual work in their post-COVID-19 pandemic strategy and operations.

Consequently, virtual teams will likely become a common organisational structure to manage and operationalise virtual work arrangements (Feitosa & Salas, 2021). A virtual team comprises a leader and other members in a virtual work arrangement, collaborating through technology towards successfully achieving a set goal. The success of a virtual team is defined by its performance, which depends upon team cohesion and leadership (Bell, McAlpine & Hill, 2019). Researchers have found virtual leadership to be one of the main success factors of a virtual team (Bell *et al.*, 2019). Conversely, failing leadership has the potential to cause the downfall of a team. Maxwell (2001, p. 37) stated that “everything rises and falls on leadership”. The increasing interest in virtual teams, especially in light of the COVID-19 pandemic, necessitates continuous research into virtual leadership to enhance the performance of virtual teams. The study focuses on virtual leaders' experiences during the COVID-19 pandemic to establish their approaches, challenges, enabling factors, and future aspirations. This chapter presents the literature on virtual teams, leadership, leadership in virtual teams, experience transitioning to virtual leadership, perceptions of virtual leadership and the intention to continue virtually. The layout of this chapter is illustrated in Figure 2.1.

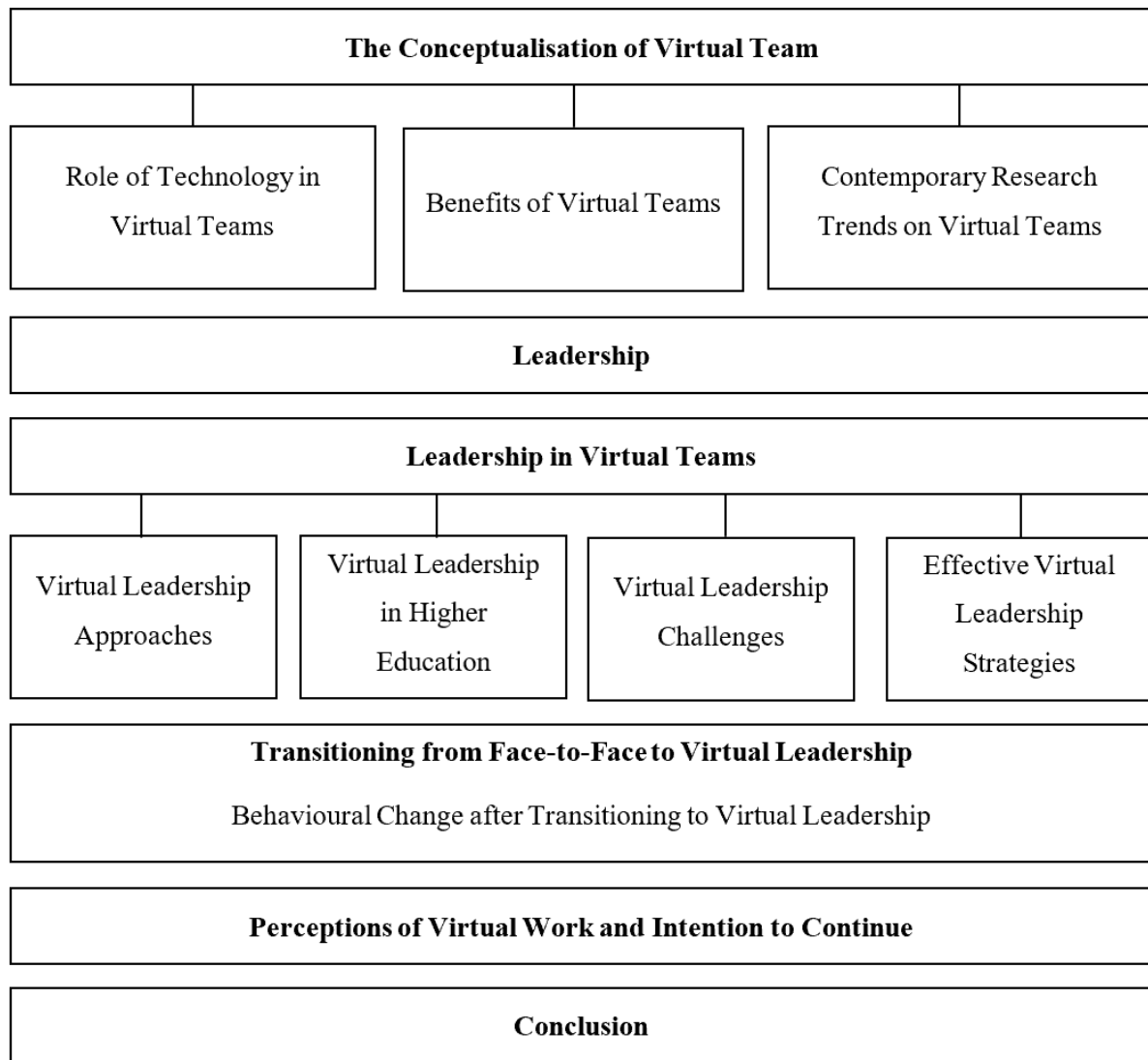


Figure 2.1: Layout of Chapter 2

2.2 Conceptualisation of a virtual team

There are many definitions of a virtual team, as many researchers have conceptualised this concept differently. However, the widely accepted definition of a virtual team, synonymous with a remote team, is a group of people who work together from different geographical locations (national, regional or continental) to achieve a shared goal (Michaud & Conceição, 2023). Miles and Snow (1986) pioneered the idea of a virtual team as a transformative form of networking. Since then, many researchers have contributed to the conceptualisation and development of the phenomenon.

A virtual team is a group of people that leverages communication technology to overcome constraints such as space, time, and organisational boundaries towards achieving shared goals (Michaud and Conceição, 2023). The advancement in information and communication technologies and increasing globalisation have contributed to the proliferation of global virtual teams (Liu, 2022). Liu (2022) based

the existence of virtual teams as the basis of technological development and advancement, characterised by virtualisation, clear goals, flexibility, collaborative operations, and rapid response. In summary, a virtual team comprises members who work in a mutually dependent remote setting and share information and communicate via technology while taking joint responsibility for their outcomes.

2.2.1 *The role of technology in virtual teams*

Technology forms an important element of virtual teams as it is core to their operations (Dulebohn & Hoch, 2017). Technological advancement has thus contributed to the transformation of virtual teams (Frost & Duan, 2020). Asynchronous and synchronous technologies, such as messaging and video conferencing applications, were the pioneer technologies that supported virtual teams (Frost & Duan, 2020). Now, collaborative editing suites such as Onedrive and Google Drive, enterprise social media such as Slack and Microsoft Teams, and robotics are shaping the functionalities and composition of teams (Frost & Duan, 2020). Larson and DeChurch (2020) identified the four perspectives that represent the role of technology in the evolution of teams chronologically as contextual, social-material, creation medium, and teammate.

Since the 1990s, technology has become contextual in virtual teams, as its features define team processes, communication, and information storage (Larson & DeChurch, 2020). Examples of technologies that serve as the context of virtual teams are e-mail, video conferencing, and group decision systems (Frost & Duan, 2020). In the 2000s, technology evolved into having a social-material role in teams, where technological functionalities and team practices were mutually dependent (Orlikowski & Scott, 2008). Some applications in this category were video conferencing, group decision systems, and crowd platforms (Frost & Duan, 2020). In the 2010s, technology began serving as a creative medium as it influenced team formation and composition. During this period, teams were created spontaneously through global access applications such as crowd platforms, enterprise social media, and recommender systems (Larson & DeChurch, 2020). Examples of teams created through this medium are open-source (Larson & DeChurch, 2020) and flash teams (Retelny *et al.*, 2014).

Lastly, from 2020 onward, technology began to take the place of humans in a team (Larson & DeChurch, 2020). Artificial intelligence, intelligent machines, and social robot technologies began to substitute the role of team members in virtual teams, providing intelligence and expertise to teams (Bourton, Lavoie & Vogel, 2018). Figure 2.2 demonstrates the chronological flow of the types of technologies that transformed virtual teams.

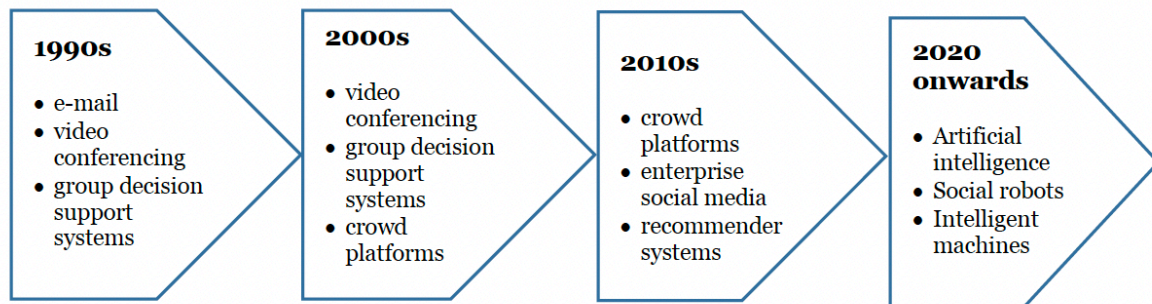


Figure 2.2: Chronological order of virtual teams technology

Source: Frost and Duan (2020:4)

Irrespective of the level of technology involved, virtual teams are formed for different reasons and each comes with its own benefits and challenges. The next sections will highlight some of the benefits of virtual teams and research trends on virtual teams.

2.2.2 Benefits of virtual teams

There are both advantages and disadvantages to every organisation's structure and work arrangement. Virtual teams were used by organisations before the -COVID-19 pandemic, particularly in the technology and service industries, to access global talent. Members comprised of multi-cultural and cross-functional individuals to foster innovation through interdisciplinary research and development (Jooss, Conroy & McDonnell, 2022). Both organisations and employees have been found to enjoy the flexibility of running and participating in a virtual team. Organisations can take on talented employees from anywhere in the world to join their teams to foster innovation by multi-cultural and multi-disciplinary individuals (Liao, 2017). Benefits to employees include the ability to work comfortably and from anywhere (Liao, 2017). Virtual team members have autonomy and work flexibility and can work at their convenience, provided they deliver outcomes as required. These employees do not have to conform to some company rules, such as the dress code (Ramage, 2017).

Virtual team arrangements also have economic benefits for both an organisation and its employees. Organisations save by not having to rent office space for team members who instead work from the comfort of their homes. In addition, employees may use their own equipment, sparing the organisation's equipment expenses. Employees save on the cost of daily travel and time to commute to work (Bernhardsson, Khochaba & Etaix, 2021). Members of virtual teams are permitted to work from the comfort of their homes, fostering an improved work-life balance if managed effectively (Bernhardsson *et al.*, 2021).

2.2.3 *Contemporary research trends in virtual teams*

Research into virtual teams has gained more traction after the COVID-19 pandemic. Researchers and practitioners have studied various aspects of virtual teams, contributing to the current body of knowledge. The following section presents contemporary trends in the literature surrounding virtual teams, including their challenges, structural composition, and leadership.

2.2.3.1 *Structure and arrangement of virtual teams*

Virtual teams have existed for some time, and several studies have been conducted to understand their structure and arrangement (Busch, Nash & Bell, 2011). Preliminary research on virtual team arrangement was centred around the comparison of traditional colocated face-to-face and physically dispersed teams. However, the line between conventional and virtual teams is getting narrower due to the increasing use of and reliance on technology by conventional teams. Conventional teams are using technology to extend their communication, coordination, and organisation effectiveness (Cheshin *et al.*, 2013). Consequently, researchers began focusing on the degree of team virtualness and methods of communication and collaboration. In a study by Busch *et al.* (2011), the nine companies used as case studies had varying degrees of virtualness. One company had 3% while another had 92% of their employees working virtually. There is no defined degree of virtualness that an organisation must implement; however, this can be influenced by its virtual work structure, arrangement and team composition (Busch *et al.*, 2011). In addition, there are mixed variations in the extent to which employees work virtually. Some work virtually on a part-time basis, whilst some do this on a full-time basis. This arrangement is based upon the organisation's policy regarding virtual work, which may be formal or informal.

2.2.3.2 *Isolation in virtual teams*

The literature has shown that individuals in virtual teams feel isolated and disconnected due to less or no social face-to-face interaction with one another. The use of technology to foster engagement, collaboration and social interaction has been explored to manage isolation in virtual teams. However, it does not eliminate the feeling of loneliness among virtual workers (Orhan, 2014). Mulki *et al.* (2009) found that employees feeling isolated and disconnected were influenced by their expertise level and the team leader's support. Team leaders are required to support virtual team members by constantly monitoring and encouraging them to engage in team building and mentoring programs to reduce feelings of isolation.

In a study by Busch *et al.* (2011), participants did not report isolation issues as a result of various strategies established to foster relationship-building and socialisation among remote workers. Some organisations require remote workers to visit the company's physical location to socialise with other workers, either at regular intervals or on special occasions, depending on the work arrangement (Bell,

2012). Some companies provide virtual “buddies” for remote workers, to socialise with them physically and update them on organisational activities. Organisations have also taken advantage of advancements in information and communication technology, providing video conferencing applications for virtual workers to interact with colleagues in real time (Lakhan & Verma, 2023). Another approach to reducing the possibility of loneliness is having regular weekly hybrid meetings of both onsite and virtual workers. Virtual workers have also reported being left out of development opportunities as they are easily forgotten because of their physical absence (Bell, 2012). Although organisations have established strategies to prevent isolation and loneliness, team leaders are responsible for ensuring that their members are utilising the available team-building and career development resources (Busch *et al.*, 2011).

2.2.3.3 Organisational leaders' buy-in and acceptance

Researchers have reported that virtual team arrangement is usually not widely accepted in organisations for different reasons. In some cases, some organisation leaders are less convinced about the viability and success of virtual teams as they believe innovation and creativity can only be achieved in a face-to-face context. For virtual work to be successful, human resource personnel must seek support and acceptance from stakeholders to establish structures around flexible work initiatives.

Bell (2012) proposed an evidence-based approach to convincing organisation leaders of the potential of remote work and its benefit to the organisation. Bell's (2012) strategy was to pilot virtual work with low-impact projects to experiment with and explore its possibilities in the organisation, while performance indicators were captured and analysed for reporting purposes. The report could then establish the case for adopting virtual work where necessary. Another strategy would be to involve those leaders who are open to experimenting with a pilot arrangement, allowing them to advocate and convince other leaders to accept virtual work as an option at an organisational level.

2.2.3.4 Competencies and selection of virtual workers

Research has shown that virtual work is not for everyone. There are specific skills and competencies required to fit into a virtual work environment. Some of the fundamental abilities of virtual workers are self-efficacy, good communication skills, and digital competency (Wang & Haggerty, 2009). Bell (2012) extended the virtual worker competencies list by including that employees need to be self-motivated, result-oriented, self-driven, resourceful and have strong time management skills. Knowing the expected skills of virtual workers aids in developing evaluation criteria for these workers. However, the initial assessment and identification of workers fit for virtual work arrangements can be challenging as most of these competencies are soft skills.

Organisations have established different approaches and policies in identifying possible flexible work arrangements (Busch *et al.*, 2011). In some organisations, new employees are not eligible for flexible work arrangements and are required to have worked for a certain period in a physical work arrangement before they can be considered for a virtual team. Some organisations have formal processes for approving an employee to work virtually. Employees must submit evidence to prove that they meet the flexible work criteria based on their track record in a physical team (Busch *et al.*, 2011). The submitted portfolio is then assessed by a panel to decide on the employee's proposal, which must include a business case that covers the benefit of working remotely to the organisation and the employee (Busch *et al.*, 2011). In other cases, organisations follow a more relaxed process in approving an employee to work virtually, where the decision is made by the employee's line manager after assessing their performance and the viability of work in a remote arrangement.

2.2.3.5 *Support and capacity development*

The support and capacity development of virtual workers is another important aspect of building a successful virtual team. According to Busch *et al.* (2011), once an employee has been selected to work virtually, it is essential to provide the necessary equipment and training to enable them to work effectively, efficiently, and comfortably. The fundamental asset required for a virtual worker is a remote device such as a laptop, tablet, or smartphone, depending on the type of work they do, as well as internet access. It is also important to establish a conducive virtual workplace, either at a remote location or their home, depending on the arrangement (Busch *et al.*, 2011). Organisations must establish an online information hub for virtual workers where they can assess rules, regulations, and guidelines they are to adhere to as well as online training resources for their convenience. The essential forms of training for virtual workers are digital competency, the use of technology tools to work efficiently, time management, and effective relationship building in a virtual environment. Busch *et al.* (2011) noted that it is also necessary for organisations to train on-site workers on how to relate and build relationships with virtual workers. Busch *et al.* (2011) further indicated that establishing all forms of online training and provisioning of assets is not enough, and that team leaders must be available to provide extra support to the team.

2.2.3.6 *Work-life imbalance*

Balancing work and personal life is one of the trends and aspects raised frequently in the extant literature. Researchers have found that virtual workers struggle to effectively manage their work and personal life matters, resulting in one or the other lacking the proper attention required by the virtual worker. Conversely, Busch *et al.* (2011) observed that virtual workers were more satisfied, less stressed and more productive than their on-site counterparts as they were able to work for longer periods, did not struggle with transportation, saved on the cost of commuting, and could work with little distraction from colleagues. However, virtual workers struggled to afford the same attention to their personal and

family life, as more time and focus was spent on work, resulting in disconnection and disagreements with family members (Erskine, 2009). Some employees have consciously tried to pay more attention to their families while working at home, and consequently became less productive, attentive, and focused at work. These workers could not maintain a routine because of the burden of family issues (Mulki *et al.*, 2009).

According to Busch *et al.* (2011), most organisations in their study did not have a formal approach to managing employee work-life balance. However, some organisations with many virtual workers identified some of the approaches they have established to mitigate the risk of work-life imbalance of virtual workers. One of the approaches identified is the establishment of regulations around virtual workspace setup and arrangement. The regulations may include employees having a private room in their home with an office set up and their screens being hidden from others for security and confidentiality purposes. Organisations with such regulations undertake audits of virtual workers' private workspaces to ensure compliance with the regulations and requirements. Another strategy for managing virtual employee work-life balance is training for virtual workers focusing on effective communication and virtual work practices (Mulki *et al.*, 2009). Virtual employees are encouraged to set rules in their virtual workspace, such as a clear end time for work. In addition, they are encouraged to simulate on-site behaviours, such as dressing formally at their workspace to bring them into a work mindset (Busch *et al.*, 2011).

2.3 Leadership

The concept of leadership has been researched for more than a century (Northouse, 2021). There are numerous definitions for leadership in the literature, as different researchers and practitioners from different domains and disciplines have explained what leadership means from different perspectives. Some factors influencing the various definitions and understanding of leadership are culture, law and regulation, organisational complexities, context, working environment, religion, and politics (Amabile *et al.*, 2004). Leadership has been defined as the capacity of an individual to inspire and guide others to contribute towards organisation success (House *et al.*, 1999). Similarly, Wren (2013) explains that leadership is the engagement process between a leader and follower that results in the attainment of shared goals. Generally, leadership comprises a process, a leader and follower(s), and the motive to achieve a shared goal.

2.3.1 Different leadership styles

As a result of the numerous studies on leadership, there are many theories and leadership styles defined by researchers. Popular leadership styles include charismatic, transformational, transactional, *laissez-faire*, autocratic, democratic, level 5 leadership, servant, authentic, full-range, shared, situational, and

e-leadership. The characteristics of leaders who subscribe to these leadership styles are explained as follows:

- **Charismatic leaders** are inspirational. They use the power of communication, persuasiveness, and charm to motivate their followers toward specific goals (Northouse, 2021).
- **Transformational leaders** are people- and change-oriented. They use change management skills to motivate their followers towards innovative goals (Nawaz & Khan, 2016; Northouse, 2021).
- **Transactional leaders** are task-oriented. They emphasise the need to complete work objectives timeously, monitor progress, and reward hardworking subordinates (Nawaz & Khan, 2016).
- **Laissez-faire leaders** are trust-oriented. They are less directive, believe their subordinates can work autonomously, and use their expertise and creativity to achieve their shared goals (Northouse, 2021).
- **Autocratic Leaders** are controlling and manipulative. They are micromanagers and utilise a top-down approach by making decisions independently and instructing subordinates to either comply or face punishment (Northouse, 2021).
- **Democratic leaders** are participatory. They involve everyone and ensure their suggestions are considered during decision-making exercises (Northouse, 2021).
- **Level 5 leaders** are legitimate executives in organisations. They place their organisation's interests first and are humble in their relations with employees (Daft & Marcic, 2016). They take responsibility for the team's outcome and credit subordinates for hard work and team success.
- **Servant leaders** are sacrificial. They sacrifice themselves for the team by transcending self-interest for their team's success (Daft & Marcic, 2016). They believe in serving others and focus on the growth and well-being of subordinates.
- **Authentic leaders** are transparent and trustworthy. They respect the beliefs and values of their subordinates and make decisions based on ethical and shared beliefs and values (Bernhardsson *et al.*, 2021).
- The **full-range leadership** model is a combination of transformational, transactional, and *laissez-faire* leadership styles (Kirkbride, 2006). Full-range leaders exhibit combined behaviours of transformational, transactional, and *laissez-faire* leaders, which include transparency and autonomy while remaining task- and people-driven.
- **Shared leaders** believe in distributive power. They distribute leadership responsibilities among team members and motivate them towards collective shared goals through transparency and openness to subordinates' ideas (Carson, Tesluk & Marrone, 2007).

- **Situational leaders** are adaptive. They adapt their leadership behaviour to suit the situation in which they find themselves (Northouse, 2021). The situational leadership style is highly effective as the leaders adapt to the specific needs of the team or individual they lead (Northouse, 2021).
- **Electronic or E-leadership** is relatively new and is becoming more popular due to the proliferation of technology and organisational reliance on technology (Contreras *et al.*, 2020; Savolainen, 2013). E-leaders influence others through both electronic and traditional methods to achieve shared goals (Savolainen, 2013). They influence others to adopt digitisation and encourage the use of technology.

The above leadership styles can be applied to different work or influential personal roles, which depend upon the leader's ideology and, at times, are influenced by the organisation. Leadership is a critical success factor of virtual teams, and many studies have been conducted to identify which leadership style is most suitable for the virtual environment (Bell *et al.*, 2019). The following section reviews the literature surrounding virtual team leadership.

2.4. Leadership in virtual teams

Researchers such as Bell *et al.* (2019) identified the significance of leadership in the success of a virtual team. Virtual leadership is an opportunity that should be embraced by organisations because every organisation has a fraction of their business that can be managed virtually (Agarwal *et al.*, 2020). Virtual leadership, sometimes called e-leadership, is the practice of influencing a group of dispersed people working together towards achieving shared goals through technology. It can also be referred to as a technology-mediated social influence process towards change in behaviour, attitude, thinking, and performance of a dispersed group of people (Dasgupta, 2011).

The definitions of virtual leadership show that the main responsibility of a virtual leader, which is to influence others, is the same as that of a traditional leader (Iriqat & Khalaf, 2017). Other responsibilities of virtual leaders are to establish team goals, motivate team members towards achieving these shared goals, coach and develop team members' capability, and monitor team performance. The similarities in the responsibilities of a virtual and traditional leader are the reasons researchers such as Liu *et al.* (2020) supported the adoption of traditional approaches in virtual environments. However, Avolio and Kahai (2003) believe e-leadership is a unique concept that cannot be simply extended from traditional leadership, as the virtual environment requires distinct strategies and techniques for leading effectively (Roman *et al.*, 2019).

2.4.1 *Virtual leadership approaches*

Many researchers have investigated approaches used by leaders in leading effectively in virtual settings, including leadership style, behaviours, and attributes. Studies have found that leaders adopt traditional leadership styles when leading virtually, with slight behavioural changes (Bernhardsson *et al.*, 2021). Transactional leadership and E-leadership were the prevalent leadership styles suitable for virtual environments before the COVID-19 pandemic. Madlock (2012) and Ramage (2017) posit that the transactional leadership style is the most appropriate approach to leading in a virtual environment. In a study that explored leaders' transition from face-to-face to remote, it was found that leaders adopted transactional leadership approaches remotely through task-oriented attributes and behaviours (Ramage, 2017). The leaders explained that in a remote environment, it was easier to focus on task-oriented activities and behaviours, such as setting objectives, developing schedules, setting deadlines, and following up or monitoring progress on activities from a distance via email or project management tools (Madlock, 2012; Ramage, 2017). The leaders further explained that the transformational leadership style was more appropriate when they were in contact with subordinates through relational-oriented sociable behaviours such as building relationships, empowering subordinates, and encouraging teamwork (Ramage, 2017; Yukl, 2013).

Another leadership style that was prevalent in the virtual environment literature before the COVID-19 pandemic is E-leadership. Gibson *et al.* (2014) indicated that in addition to influential duties, virtual leaders are expected to be “techno-savvy”. Virtual leaders' responsibilities also include selecting the appropriate technology that fits the team's culture and ensuring that members are technically capable of delivering as expected. Virtual leaders are expected to identify and execute the means of facilitating traditional leadership duties such as team management, learning and development, project management, information management, effective communication, and relationship management using different technological strategies and tools (Lilian, 2014). Hence, newly recruited virtual leaders must develop their technology competencies to lead effectively, which brings about the confidence and trust of subordinates.

On the contrary, recent studies have shown that virtual leaders who led during the COVID-19 pandemic lockdown subscribed to a range of relational-oriented leadership styles, which conform with behaviours that encourage, support, and motivate people on their team. From a psychological perspective, the participatory leadership style is conducive to the virtual environment if team members are allowed to express themselves and have their voices heard contributing to decision-making and the team's success (Liu, 2022). In adopting a participatory leadership style in a virtual environment, a leader must embrace a diversified, inclusive, and shared power environment (Liu, 2022).

Collaborative leadership is another approach that was well-described in COVID-19 pandemic studies. After exploring leadership approaches used in schools in Barbados and Canada, Marshall, Roache and

Moody-Marshall (2020) found that leaders predominantly adopted the collaborative leadership style in leading their COVID-19 pandemic virtual teams. Marshall *et al.* (2020) explained that leaders used the power of the collective strength of the team to expedite problem-solving. The collaborative leadership approach allows for the distribution of leadership responsibilities across different groups, such as committees, to improve the quality of decision-making in an organisation (Fernandez & Shaw, 2020).

In a study that explored the leadership approaches used by leaders in a Swedish service company during the COVID-19 pandemic, Bernhardsson *et al.* (2021) found that most managers subscribed to authentic and charismatic leadership styles. As authentic leaders, the managers indicated that they were transparent with their subordinates and respected their values and beliefs whilst working from home. As charismatic leaders, they were required to put aside their fears and sentiments and focus on empowering and motivating subordinates through the COVID-19 pandemic crisis.

The change in leadership orientation from the task- to relational-oriented leadership approaches observed in the literature examining virtual leadership may be associated with the differences in formation and motive behind virtual teams before and during the COVID-19 pandemic. Pre-COVID-19 virtual teams were deliberately composed of experts capable of working in a structured virtual environment, which made it easy for leaders to focus on team goals and tasks. However, the virtual teams created during the COVID-19 pandemic were unprecedented, spontaneous, and unstructured, and were composed of members with and without technical expertise, with less experienced virtual leaders (Waizenegger *et al.*, 2020). The enforced nature of the COVID-19 virtual team compounded by the Volatile, Uncertain, Complex, and Ambiguous (VUCA) situation brought about a unique context that required the adoption of relational-oriented leadership approaches and attributes. Some of the identified virtual leadership attributes popular among recent studies are listed in Table 2.1 below.

Table 2.1: Virtual leadership attributes from recent studies (constructed by the author)

Virtual Leadership Attributes	Sources
• Empathetic and compassionate	Beilstein <i>et al.</i> , 2021; Yue, Thelen & Walden, 2022
• Flexible, decisiveness and adaptable	Beilstein <i>et al.</i> , 2021; Fernandez & Shaw, 2020; Marshall <i>et al.</i> , 2020
• Collaborative, open, and communicative	Beilstein <i>et al.</i> , 2021; Marshall <i>et al.</i> , 2020
• Strategic and problem-solving	Pramjeeth & Mutambara, 2022
• Techno-savvy	Pramjeeth & Mutambara, 2022
• Diversification and inclusiveness	Bernhardsson <i>et al.</i> , 2021
• Learning and development	Pramjeeth & Mutambara, 2022
• Innovative and creative	Pramjeeth & Mutambara, 2022
• Teamwork	Pramjeeth & Mutambara, 2022
• Transparency	Bernhardsson <i>et al.</i> , 2021

2.4.2 Virtual leadership in higher education

Before the COVID-19 pandemic, fully online HEIs were scarce, with few functioning as open or distance institutions (Laufer *et al.*, 2021). The COVID-19 pandemic disrupted the higher education sector, and the accelerated use of technology increased participation in online institutions, thus challenging traditional institutions (Fullan *et al.*, 2020). Traditional brick-and-mortar universities responded to the business threat posed by online institutions and began to function as hybrid universities in which both physical and online programmes are offered (Alward & Phelps, 2019). The online and hybrid institutional structure is distinct from the traditional higher education structure, as it requires expertise in virtual teams and leadership in achieving successful administration, teaching and learning endeavours (Bonatti & Hörner, 2011). In addition, online institutions require a flexible structure, which differs from the traditional rigid hierarchical structure of professional bureaucracies (Longsworth & Panteli, 2010).

Virtual teams in online universities comprise faculty/college administrators, lecturers, and leaders, such as academic leaders and deans, who influence a team towards success. In achieving virtual academic team objectives, virtual academic leaders (VAL) face similar generic challenges to those of virtual leaders in other sectors, such as establishing trust, communication, and effective participation (Alward & Phelps, 2019). In addition, they are challenged with programme complexities such as programme flexibility, student size, base, support, and offerings flexibility (Alward & Phelps, 2019). Considering these challenges, VAL requires creative and innovative management skills and attributes that include trustworthiness, emotional intelligence, and effective communication (Bryant, 2013). Some of the necessary leadership attributes identified by Alward and Phelps (2019) include technological savviness, shared leadership, the ability to establish a sense of community, and collaboration.

Research on virtual leadership in higher education is scanty. VAL are responsible for student retention and success in the online environment and must be adept in curriculum development, research, legal issues, professional development, pedagogy, and assessment. McInnis, Ramsden and Maconachie (2012) mentioned that as in other domains, solid leadership is required to develop and maintain online faculty and administrators responsible for influencing and inspiring future leaders. VAL must establish new approaches in organising and utilising their virtual team to inspire, inform, educate, train, and support subordinates in being effective and efficient in the virtual environment (McInnis *et al.*, 2012). Bryant (2013) found emotional intelligence to be an essential element of effective virtual academic leadership. Jang (2013) explained that VAL must be emotionally intelligent to establish a virtual educational community with structured communication practices, work processes, and cultural identification. A VAL with a good sense of emotional intelligence and effective communication skills can manage conflict, use communication channels effectively, establish a culture of trust in the team and encourage participation, especially from reserved subordinates (Alward & Phelps, 2019).

In a phenomenological qualitative study, Alward and Phelps (2019) explored the lived experience of ten virtual leaders in an HEI to understand their perception of leadership traits, behaviours, skills, beliefs, and strategies that made them successful. From Alward and Phelps' (2019) findings, participants indicated that the essential elements of successful virtual leadership were emotional intelligence, trust, communication, technology competence, employee recognition and motivation, leadership styles, and training and development, which are similar to those of other non-education virtual leadership studies. Aside from the generic virtual leadership attributes and responsibilities identified by researchers, Arnold and Sangrà (2018) indicated that virtual leaders in the higher education sector must be creative and adopt innovative strategies because online education does not simply involve switching to teaching on online platforms but requires the intentional implementation of technology-enhanced learning initiatives and digital transformation strategies. In addition, Laufer *et al.* (2021) indicated that VAL must consider tackling traditional higher education challenges, such as access, bridging the digital divide, and collaboration in the online space when considering switching to a virtual higher education system. The authors concluded that virtual HEIs would be a failed promise without strong leadership and inclusive strategic approaches.

In the South African context, most studies on leadership responses to higher education in South Africa during the COVID-19 pandemic focused on executive strategic management and decision-making around social challenges, emergency remote strategies, and online teaching and learning (Coetzee, Neneh, Stemmet, Lamprecht, Motsitsi & Sereeco, 2021; Landa, Zhou & Marongwe, 2021; Menon & Motala, 2021). However, a few studies (Engelbrecht, 2022; Menon & Motala, 2021) focused on the virtual leadership approaches leaders employed during the pandemic. Menon and Motala (2021) indicated that leadership at the University of Johannesburg used innovative practices, partnerships with universities and government and private sector stakeholders, and servant, communicative, and distributive leadership during the COVID-19 pandemic. Engelbrecht (2022) indicated that managers in a South African private HEI used crisis, transformational and transactional leadership styles as the dominant leadership approaches.

2.4.3 Virtual leadership challenges

Naturally, leading people comes with challenges, particularly when team members are in different locations. Hoch and Kozlowski (2014) posit that leading a virtual team is more challenging and demanding than leading a team that works together in person (Agarwal *et al.*, 2020). Some elements, such as relationship building and management, occur naturally in traditional teams but artificially in virtual teams (Liao, 2017). Virtual leaders must deliberately invest time and effort into coordinating team activities, improving team processes, and introducing relationship-building initiatives to improve the team's effectiveness, which may contribute to some of the challenges that accompany virtual leadership. Researchers such as Bernhardsson *et al.* (2021), Reyes, Luna and Salas (2021), Manse and

Holmberg (2021), and Morrison-Smith and Ruiz (2020) identified different challenges of leading virtual teams. The most frequently mentioned challenges are trust, active participation, communication, and availability, which are discussed below.

2.4.3.1 Trust

Trust is one of the most frequent challenges leaders face when they lead virtually (Morrison-Smith & Ruiz, 2020). The physical distance between leaders and subordinates renders it difficult for leaders to trust that subordinates will do their work and not use work hours for personal activities (Bernhardsson *et al.*, 2021). The only certain time a leader has sight of subordinates is when they are in synchronous meetings using video conferencing software. Trust issues are reciprocal, as subordinates find it difficult to trust their leaders and are not free to express themselves (Kameneckienė, 2022). For example, recruits that begin working for an institution online may take extra time and effort to socialise with colleagues and their leaders and learn to behave professionally.

2.4.3.2 Active participation

Virtual leaders struggle with the active participation and involvement of subordinates in team activities (Hale & Grenny, 2020). In a traditional setting where team members are in the same physical location, leaders can easily identify who is actively engaged in team activities as they are present in person. (Bernhardsson *et al.*, 2021). However, in the virtual setting, leaders find it difficult to identify who is truly participating or involved in team activities, such as online meetings, as it is easy for subordinates to pretend that they are present in online sessions (Hale & Grenny, 2020). Uninvolved employees hide behind the veil of Zoom or Teams video conferencing and instead concentrate on other activities (Bernhardsson *et al.*, 2021). Morrison-Smith and Ruiz (2020) indicated that isolation is one of the factors that cause a lack of participation in virtual teams.

2.4.3.3 Communication

Communication is an essential element of effective leadership (Northouse, 2021). Naturally, leaders struggle with effective communication in a face-to-face setting (Johnson & Hackman, 2018). The distance in a virtual environment exacerbates these communication challenges when leading virtually (Bernhardsson *et al.*, 2021). In the virtual environment, leaders have no opportunity for a spontaneous discussion over a cup of coffee or impromptu short corridor meeting as they would in an office environment, as communication is restricted to being rigid and strictly professional in virtual settings (Hale & Grenny, 2020). For every meeting, whether short or long, leaders must schedule and check employee availability, then log in and get disconnected from the team when the meeting ends until another meeting is set up. Body language, an important communication element, is lost in virtual settings as subordinates seldom have their camera activated during online meetings (Bernhardsson *et*

al., 2021). Hence, it is difficult for a leader to observe subordinate countenance or to be sure that they are listening (Hale & Grenny, 2020). Good communication flow is also dependent on internet connectivity in the virtual space, which cannot be guaranteed.

2.4.3.4. Availability

Typically, in a face-to-face setting, availability is well structured, as it is strictly during office hours. However, in the virtual environment, leaders have found it challenging to manage their working hours (Bernhardsson *et al.*, 2021; Feitosa & Salas, 2021). In a study by Bernhardsson *et al.* (2021), leaders felt like they needed to be constantly available when they switched to virtual leadership during the COVID-19 pandemic. This is because they needed to be contactable via multiple different communication channels such as emails, Whatsapp, and Teams, which were found to be exhaustive and stressful.

2.4.4 Effective virtual leadership strategies

Considering the challenges and issues faced when leading virtual teams, different researchers have identified strategies for effective virtual leadership. Some of the identified strategies are discussed below.

2.4.4.1 Improve team productivity

In the virtual workspace, there are two members' behaviour possibilities that relate to team productivity. On the one hand, some team members are laid back and use work hours for personal issues, resulting in delayed responses and deliverables, thus affecting team productivity (Stephanie, 2022). On the other hand, some team members work around the clock with no time boundaries, resulting in exhaustion and fatigue, thus affecting their well-being and team productivity (Reyes *et al.*, 2021). To manage these two types of behaviours, Reyes *et al.* (2021) recommend that a virtual leader hold regular periodic catch-up sessions with laid-back team members to ensure they remain focused and resolve issues timeously (Feitosa & Salas, 2021). For overworking team members, virtual leaders must influence work-time boundaries by setting schedules for communications and deadlines by which work should be delivered and must educate members on the need for a good work-life balance (Reyes *et al.*, 2021).

2.4.4.2 Maintain shared goals

Researchers have found that having concordance amongst team members while focusing on shared goals is challenging in virtual settings (Feitosa & Salas, 2021). This is because members are working individually on tasks in their separate locations, and it becomes difficult for them to monitor one another's activities. Reyes *et al.* (2021) explained that team members not working harmoniously could result in the duplication of effort and a reduction in motivation. To ensure team members are congruous,

virtual leaders should regularly check in on their team, reiterate team goals and show how individual members' work fits into the bigger picture (Feitosa & Salas, 2021; Reyes *et al.*, 2021). Virtual leaders should also use online project management tools to capture, monitor and share team progress.

2.4.4.3 Ensure team mental well-being and psychological safety

Reyes *et al.* (2021) established that it is difficult to monitor subordinates' mental well-being and ensure psychological safety when leading physically dispersed groups due to the lack of physical visibility. An example is the global COVID-19 pandemic virtual team scenario, during which many psychosocial issues such as anxiety, job insecurity, and loss of family were experienced, affecting subordinates' mental state, health, and performance (Feitosa & Salas, 2021). In order to take care of the mental well-being and psychological safety of team members, virtual leaders should encourage virtual social meetings as a team and at an individual level to discuss the challenges faced by members (Feitosa & Salas, 2021; Reyes *et al.*, 2021). When members share information and feel that their voices are heard, they become more comfortable and feel protected.

2.4.4.4 Establish members' sense of belonging

Researchers have found that individuals in virtual teams can often experience feelings of isolation and disconnection from the team or organisation (Darics & Cristina Gatti, 2019). This is because they are not situated physically with other colleagues and are without a sense of identification (Reyes *et al.*, 2021). During the COVID-19 pandemic lockdown, workers experienced an extreme level of isolation because, in addition to being away from their colleagues for over a year, they were required to maintain social distance from others in their vicinity (Feitosa & Salas, 2021). Some team members may have felt stagnant in a single position whilst working in a remote setting because of the feeling of constantly performing similar activities from the same workspace. In such situations, virtual leaders should develop closer relationships with subordinates by checking in on them regularly to discuss work-related, career development, and other social events happening at work and in their vicinity (Darics & Cristina Gatti, 2019; Reyes *et al.*, 2021). Virtual leaders should inform subordinates of their availability whenever they need assistance.

2.4.4.5 Make subordinates feel appreciated and recognised

Team recognition and appreciation increase loyalty and engagement between team members and their leaders (Ford *et al.*, 2017). Generally, people wish to be appreciated and recognised for their effort as it encourages them to do more. The absence of vocal and nonverbal cues in virtual settings makes it difficult for a leader to show recognition easily (Reyes *et al.*, 2021). To manage this, virtual leaders should send periodic team accomplishment announcements via email indicating team progress towards their targets and shared goals and show appreciation to exceptional members for their contribution to

the team's success (Reyes et al., 2021). Virtual leaders are recommended to hold physical recognition events for members to socialise and feel appreciated (Ford et al., 2017). Recognising subordinates affords them a sense of belonging, reduces any feelings of disconnection, and fosters relationship-building amongst members.

2.4.4.6 *Effective communication*

Effective communication has been identified as an essential element of managing virtual teams (Marlow, Lacerenza & Salas, 2017). According to Fernandez and Shaw (2020), virtual leaders should ensure that their communication with subordinates is clear, timely, and transparent during crises, as it provides subordinates with reassurance and comfort regarding the ambiguous and complex situation with which they are faced.

Another important aspect of effective communication in a virtual environment is the choice of communication medium, as different media vary in richness (Fernandez & Shaw, 2020). Virtual leaders should utilise the strengths and differences between synchronous and asynchronous media when engaging with team members (Ford *et al.*, 2017). Furthermore, the timing and amount of communication should be considered depending on the situation (Marshall *et al.*, 2020). For instance, Marshall *et al.* (2020) explained that leaders in an HEI in Barbados frequently communicated with staff and students via various channels to inform them of new institutional developments during the COVID-19 pandemic. They held several video conferencing sessions and sent regular emails to keep stakeholders aware of the situation and the implications for the university's strategy and operations (Marshall *et al.*, 2020).

2.5 **Leadership Adaptation**

Successfully long-standing organisations such as IBM have evolved with time, and one of the key elements of a successful leader during organisational change is adaptation. Nicholson (2013) identified three features of an adaptive leader in the Leadership formula introduced in the book *The "I" of Leadership: Strategies for seeing, being and doing*, which are Situation, Qualities, and Process. According to Nicholson (2013), the leadership formula is a general recipe that could be adapted to different change scenarios, such as the adaptive cycle model in Figure 2.3.

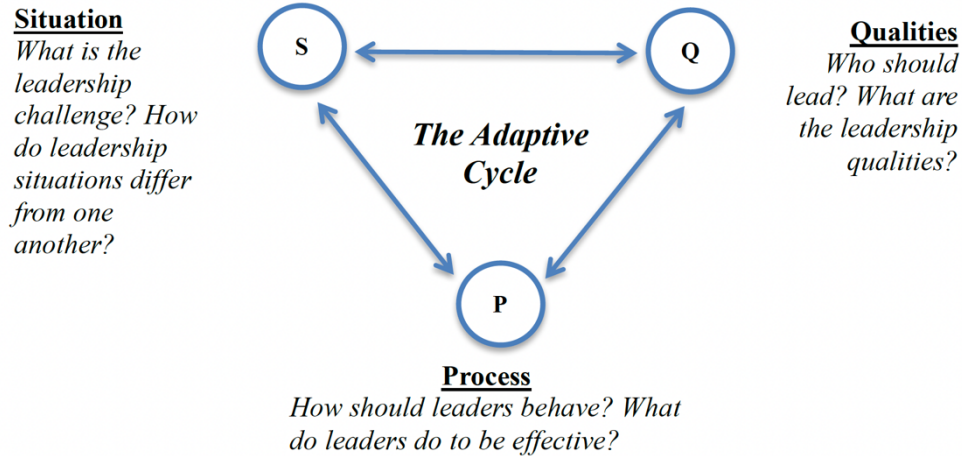


Figure 2.3: Nicholson adaptive cycle model

Source: Ramage (2017: 41)

The adaptive cycle model shows the interplay between the three features of the leadership formula, situation, qualities, and process that determines the success or failure of a leader. The three features of the adaptive cycle model explained by Nicholson (2013) are:

- **Situation** – This is the context of change. The “S” factor defines the leadership context, which includes everything a leader must consider towards change, such as organisational position, structure and culture (Ramage, 2017). According to Nicholson (2013), some underlining areas a leader must unravel in a change situation are the challenges they face and the difference in leadership contexts.
- **Qualities** – These are the personal characteristics of the leader in the change situation. The quality factor includes things like the identity, ability, experience, and personality of the leader (Ramage, 2017). According to Nicholson (2013), some of the underlining things a leader must understand in a change situation are the leadership qualities, such as competencies and the characteristics of the required leader for the situation they find themselves. This will allow them to change and adapt appropriately.
- **Process** – These are the actions, routines, or tactics used by leaders to salvage the situation they find themselves. According to Nicholson (2013), some of the underlining things a leader must identify are the behaviours and actions of a leader to be effective.

Based on the adaptive cycle model, Nicholson (2013) identified six paths a leader can take during the journey of change, which are shaping, discovery, shot selection, situational insight, instinct, and self-development, as illustrated in Figure 2.4.

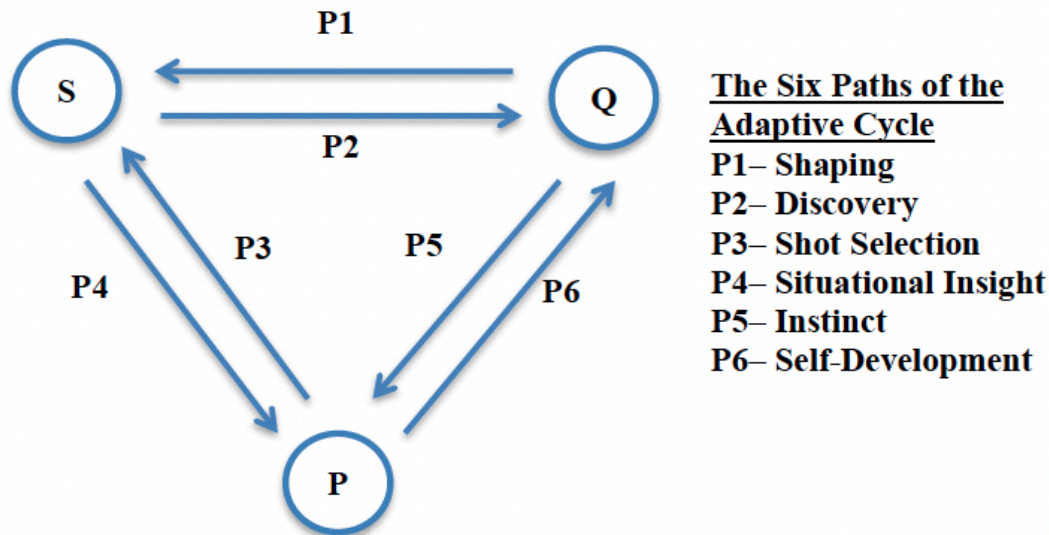


Figure 2.4: Six Paths of the Adaptive Cycle

Source: Ramage (2017: 42)

The six paths to the adaptive cycle are explained by Nicholson (2013):

- **P1 – Shaping:** On this path, a leader uses their personal qualities to manage the situation they find themselves. In this scenario, the leader needs to examine if the situation aligns with who they are and how they can make the situation suit them better.
- **P2 – Discovery:** On this path, the situation refines who the leader is or shapes the leader. In this scenario, leaders learn from experience, and they must understand how challenging or demanding the situation requires them to change.
- **P3 – Shot Selection:** On this path, the process shapes how the situation will be managed. In this scenario, the leader must identify the required tactics or events that are required to salvage the situation they find themselves.
- **P4 – Situational Impact:** On this path, the situation interplays the process. In this scenario, the situation requires a process change. Hence, a leader must examine the situation they find themselves properly to identify the changes that must be effected to make the process effective.
- **P5 – Instinct:** On this path, the leader’s quality interplays the process. In this case, leaders must be aware of their strengths and weaknesses towards taking appropriate actions.
- **P6 – Self-development:** On this path, the process shapes the qualities of the leader. In this scenario, leaders are open to learning from new tactics and actions to shape who they are. Hence, leaders learn new tactics and practice new behaviours to improve their leadership capabilities.

Ramage (2017) adapted paths three and four of the Nicholson six paths of the adaptive cycle to understand the experience of leaders who transitioned from face-to-face to virtual leadership in the retail sales context. They were able to investigate the processes used by the leaders to manage their new virtual context and how the virtual context impacted the processes and actions they take to be effective in their new role. Using a similar approach, the Nicholson adaptive cycle was adopted in this study to understand the challenges, leadership approaches, enablers, and lessons learnt from the face-to-face to virtual leadership transition of UKZN leaders during the pandemic.

2.5.1 Transition process: From face-to-face to virtual leadership

The literature examining leaders' transitioning experiences from leading face-to-face to virtually is scanty. However, studies on work role transition provide insight into similar changes in work conditions as that of leaders' who switched from face-to-face to virtual leadership during the COVID-19 pandemic. Ramage (2017) defines work role transition as the change in a job condition, including type, position, or status. Work role transition is a gradual process from a stable state to an unclear future state that involves the learning of new skillsets, behaviours, and approaches (Ramage, 2017). The switch from face-to-face to virtual work conditions is a form of work role transition because the condition of work, such as the mode of operation, changes from a known state (face-to-face operation) to a future state (virtual operation).

Researchers have studied work transition experiences at both organisational and personal levels, resulting in the development of a transition model that defines the phases experienced by the entity during the transition. Bridges (1986) defines transition as a three-phased gradual psychological change process that takes time. Exploring organisational transition, Bridges (1986) developed a model for managing an organisational transition which involved three phases: the ending, the neutral zone, and the vision. In a study of personal leadership, Scharmer (2009) developed the "Theory U" model that defines the phases of a personal leadership change process. Similar to Bridges' (1986) organisational transition model, Theory U comprises three high-level phases: Downloading, "Presencing", and Performing. These cascade to other sub-processes: co-initiating, co-sensing, co-creating and co-evolving. These explain the gradual process of transitioning from one high-level phase to the other.

Jooss *et al.* (2022) conducted a recent study that examined the transition of global workers who shifted from travelling for work before the COVID-19 pandemic to working remotely during the COVID-19 pandemic and created a process model that describes the experience of this transition for global workers. The model defines three phases experienced by global workers during the transition: the pre-onset, transition, and post transition period, as illustrated in Figure 2.5 below.

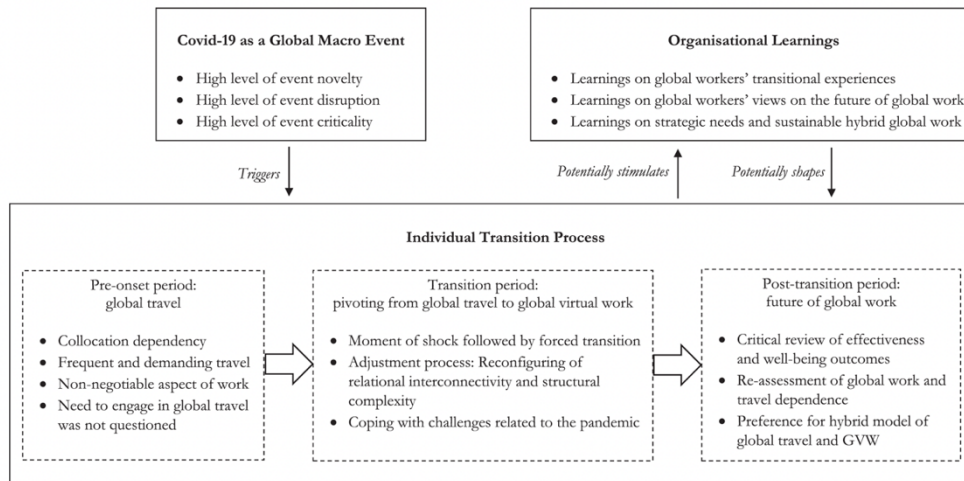


Figure 2.5: Global workers' transition process

Source: Jooss et al. (2022:11)

Based on the various transitioning models identified, Table 2.2 below presents a generic work role transition matrix, which comprises three phases: current, transition, and future states.

Table 2.2: Work role transition phases (constructed by the author)

Transition phases	Transitioning model constructs	Characteristics
Current state	Pre-onset period (Jooss <i>et al.</i> , 2022), Downloading (Scharmer, 2009), the ending (Bridges, 1986).	This state is a known stable phase and is the starting point of all transitioning models, which could be referred to as the normal. This phase is the most difficult because of the fear of the unknown (Bridges, 1986). The general characteristics of the current state are the “unlearning” of old habits, letting go, and becoming open-minded to new ideas.
Transition state	Transition period (Jooss <i>et al.</i> , 2022), Presencing (Scharmer, 2009), the neutral zone (Bridges, 1986).	This is the transformational phase of all transitioning models. During this phase, the entity undergoes development towards reaching and operating in the Future state. The general characteristics of the Transition State are openness, learning, and flexibility.
Future state	Post transition period (Jooss <i>et al.</i> , 2022), Performing (Scharmer, 2009), the vision (Bridges, 1986).	This is the unknown future phase and the destination of all transitioning models, which could be referred to as the “new normal”. According to Bridges (1986), not every individual experiencing a transition reaches this state, as some entities do not transition successfully. The general characteristics of the Future State are stability, growth, adaptability, continuous improvement, and performance

2.5.2 Behavioural change after transitioning to virtual leadership

Changing leadership behaviour to adapt to new conditions and situations is one of the attributes of a contingent or situational leader. Studies have been conducted to investigate leaders' change in

behaviour when they transition from face-to-face to virtual leadership. In a study by Bernhardsson *et al.* (2021) where the leadership approach used when transitioning from face-to-face to virtual leadership was investigated, it was found that leaders hardened and adapted their traditional leadership style when transitioning to virtual leadership. The authors further explained that leaders behaved more professionally and became more task-oriented when they become virtual leaders, as the online setting was not friendly enough to support impromptu discussions such as a face-to-face conversation in a corridor. The advantages and disadvantages of professional and task-oriented behaviours are increased productivity and damaged stakeholder relationships respectively (Bernhardsson *et al.*, 2021).

2.6 Perceptions of virtual work and intention to continue virtually

The virtual work necessitated by the COVID-19 pandemic created a unique context for researchers and practitioners to explore. Many studies have examined employees' and leaders' virtual work experiences, with varying outcomes. In a study by Bernhardsson *et al.* (2021), managers expressed their intention to continue with virtual leadership partially after the COVID-19 pandemic in a hybrid setting where part of their operations, such as meetings involving stakeholders from different locations, would remain virtual to save cost, while other functions would be physical to foster relationship building. Bernhardsson *et al.* (2021) posit that future work will be undertaken in a hybrid setting, as organisations leverage the benefits of both virtual and physical work modes.

In another study that explored intentions to continue working remotely in Poland, Radziukiewicz (2021) found that most people preferred a hybrid workspace for future work arrangements. Radziukiewicz (2021) administered a survey in April 2020, September 2020, and February 2021. The results, as illustrated in Figure 2.6, showed that 79%, 71%, and 75.5% of respondents preferred a form of hybrid work arrangement respectively at each time point. Some respondents indicated a desire to work predominantly virtually and from the office only one day a week, while others wished to spend most of their time in the office and work virtually only one day a month.

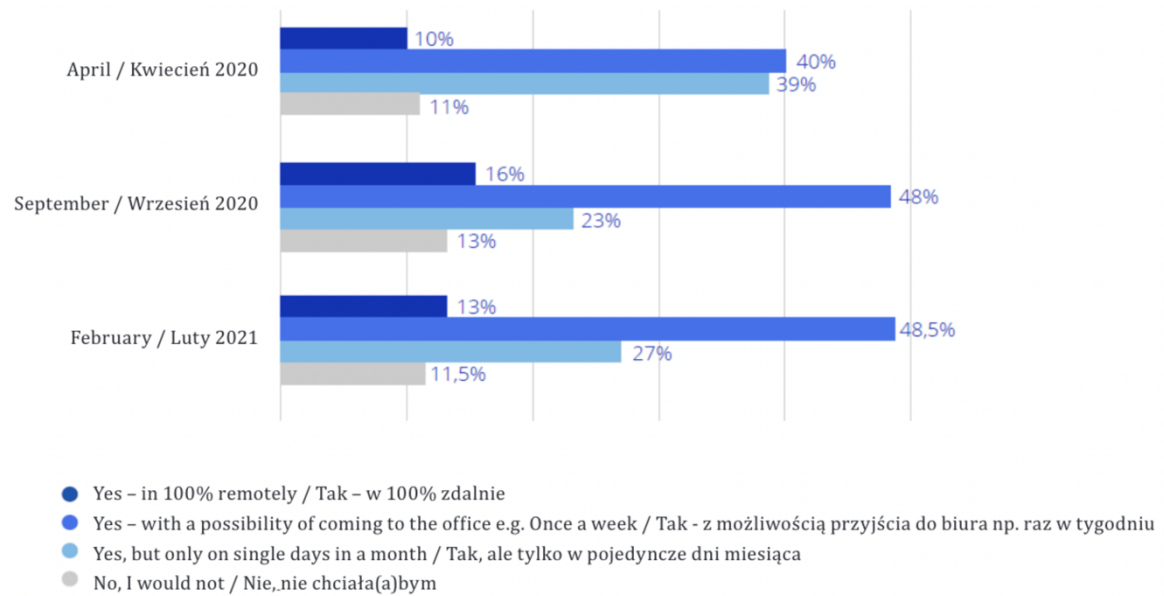


Figure 2.6: Opinion of poles on remote work post-COVID-19 pandemic

Source: Radziukiewicz (2021:424)

2.7 Chapter Summary

This chapter presented the literature on virtual teams, covering the role of technology, benefits, and contemporary trends in virtual teams. The literature surrounding leadership was then highlighted and extended to describe popular leadership styles. Other areas covered in the chapter include leadership in virtual teams, transitioning to virtual leadership, perceptions of virtual leadership and the intention to continue virtually. The next chapter presents the research methodology used to achieve the objectives of the study.

CHAPTER 3: RESEARCH METHODOLOGY

3.1 Introduction

In the preceding chapter, the literature surrounding virtual teams and leadership was presented and reviewed. This chapter will present the research methodology employed in achieving the objectives of the study. Research methodology is the scientific approach to achieving set research objectives or answering specific research questions. A scientific research approach encompasses the plans, procedures, and techniques employed to accomplish the objectives of a study (Bhattacharjee, 2012). The aims and objectives of the study are presented again in this chapter before expanding on the research methodology used in their achievement. The sections included in this chapter are the research paradigm, approach, design, sampling methods, data collection method, and data analysis technique, as illustrated in Figure 3.1 below, adapting Saunders *et al.*'s (2015) research onion model.

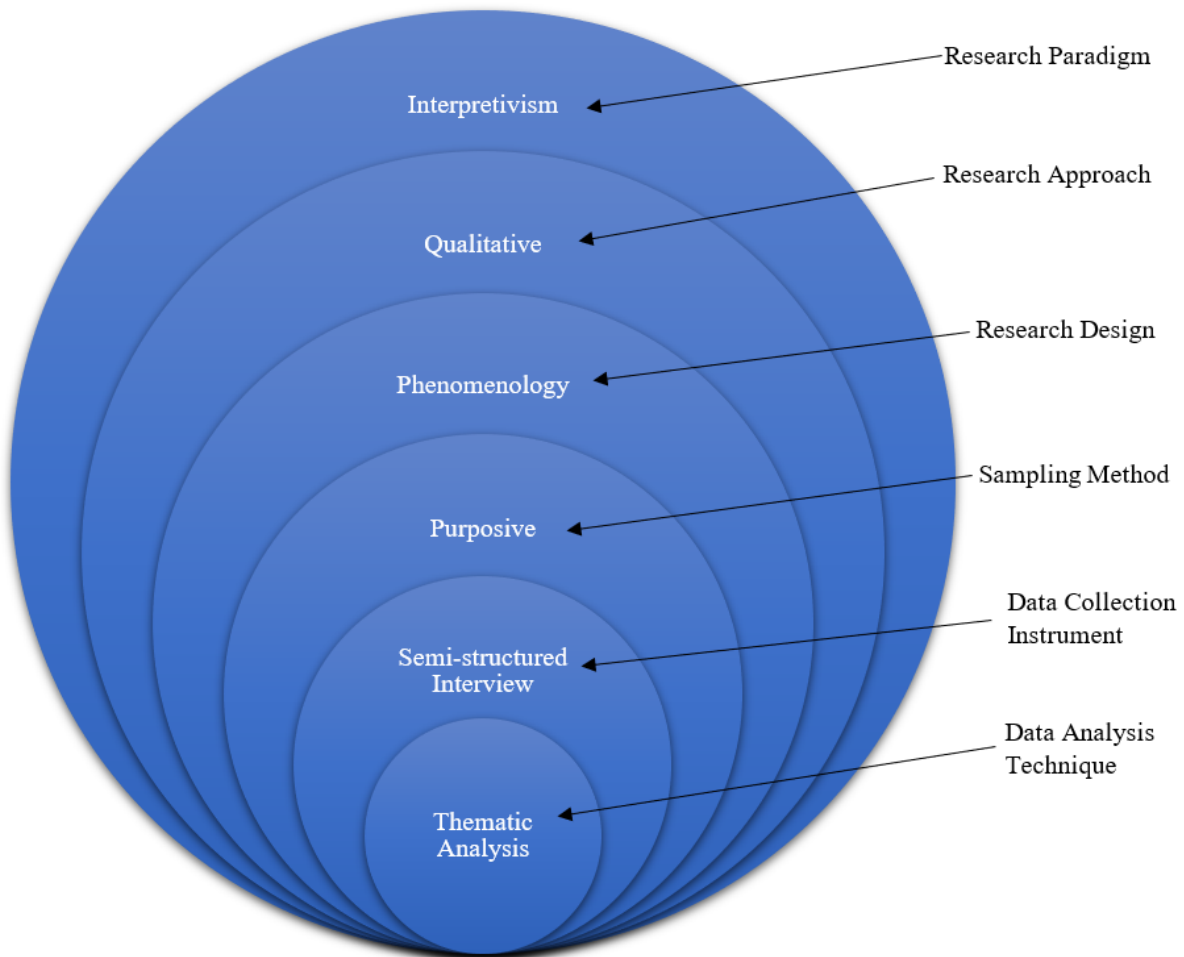


Figure 3.1: Overview of the research methodology (Constructed by the Author)

3.2 Research paradigm

The research paradigm, also known as the researcher's perspective or worldview, is a researcher's philosophical positioning (Creswell & Creswell, 2018). It defines ontology, epistemology, axiology, and typical methods used by a researcher (Saunders *et al.*, 2019). According to Creswell and Creswell (2018), researchers need to identify their philosophical standing as it influences the research methodology used in achieving the objectives of a study. There are five main philosophies in business and management: postmodernism, positivism, pragmatism, critical realism, and interpretivism (Saunders *et al.*, 2019). The positivist research paradigm is popular among scientific researchers intending to test existing theories. Positivist researchers use quantitative methods to achieve research objectives by collecting observations from respondents using questionnaires and analysing data using statistical methods (Saunders *et al.*, 2019). Positivist research is grounded on data validity and truth, and its outcome is generalisable.

The researcher's philosophical positioning for the study is interpretivism. The interpretive school of thought is that humans have diverse realities because of their experiences and background and that these must be considered when investigating people's understanding of a phenomenon (Bhattacharjee, 2012; Saunders *et al.*, 2019). Interpretivist researchers use qualitative methods to achieve objectives by gathering and interpreting participants' experiences in narratives to conceptualise a new understanding of a phenomenon. The researcher of this study is of the interpretive school of thought that believes that human experiences vary due to various conditions such as environment, experience, education etc, which must be considered when studying them. In line with this ideology, using qualitative methods, the researcher conducted in-depth interviews to explore the lived experience of the Academic Leaders and Directors of Professional Services on virtual leadership during the COVID-19 pandemic. Participants' experiences were captured as narratives, then analysed using qualitative analysis techniques, interpreted, and conceptualised to derive a new understanding of virtual leadership.

3.3 Research approach

A research approach encompasses the plans and procedures that will be followed in achieving the objectives of a study (Bhattacharjee, 2012). There are two main research approaches based on the mode of inquiry: the deductive quantitative approach and the inductive qualitative approach (Creswell & Creswell, 2018). The deductive approach allows researchers to test hypotheses and confirm theories, while the inductive approach allows researchers to explore new phenomena towards theory conceptualisation.

The inductive qualitative approach was utilised for the study, which is consistent with the interpretive paradigm. This approach was chosen because it is well-suited for exploring a new phenomenon or when there is limited or no theoretical framework that explains a phenomenon. The qualitative approach was

appropriate for the study because the nature of the leadership transition from face-to-face to virtual that was experienced during the pandemic is relatively new, especially in the higher education context. Using the qualitative approach, qualitative data were collected and analysed to conduct an in-depth investigation of UKZN leaders' experiences of leading virtually during the COVID-19 pandemic, toward a new understanding or discovery of virtual leadership.

3.4 Research design

Research design is a strategy that outlines the methods and techniques that will be employed in answering the research questions of a study (Bhattacharjee, 2012; Creswell & Creswell, 2018). There are different research designs based on varying research approaches and paradigms. Some popular research designs include case studies, experiments, surveys, ethnography, action research, grounded theory and phenomenology (Saunders *et al.*, 2019). The choice of research design defines the sampling method and data collection process to be used in a study.

The phenomenology research design was used for the study as it aligns with the researcher's worldview and allows the research objectives to be achieved. According to Creswell & Creswell (2018), phenomenology is a philosophical design of qualitative inquiry where a researcher describes the individual experiences of participants based on their narrations. Epistemologically, the phenomenology research design considers personal knowledge and subjectivity in understanding a phenomenon (Groenewald, 2004). Using the phenomenology research design, the virtual leadership experiences of some leaders at the UKZN were captured through individual in-depth interviews. The interviews were then analysed thematically to explore, understand, and conceptualise their experiences of virtual leadership.

3.5 Study site

A study site refers to the specific location where a research study will take place. (Creswell & Creswell, 2018). The study site of this research was the UKZN. The UKZN is the premier University of African scholarship and ranks among the top HEIs in South Africa and Africa (UKZN, 2021b). UKZN is governed under the leadership of appointed leaders, with the Vice-Chancellor as head supported by other executives such as the Deputy Vice-Chancellors, registrar, and directors (UKZN, 2021a). The traditional model of working at UKZN was face-to-face, with teaching and learning, research, and administrative activities carried out in the five campuses in KwaZulu-Natal (UTLO, 2021). In terms of the leadership structure in the institution, the university uses a hierarchical structure with the Vice-Chancellor at the top of the hierarchy. The university is organised into four colleges and other support divisions.

The four colleges are the College of Agriculture, Engineering, and Science, College of Law and Management Study, College of Humanities, and College of Health Science, each headed by a Deputy Vice-Chancellor. Each college has deans of teaching, learning and research who work directly with the academic leaders of teaching, learning and research of the 19 schools within the colleges. The Academic Leaders work directly with lecturers towards achieving school and college goals. For the Professional Services division, the Teaching and Learning, and Research and Innovation divisions are led by Vice-Chancellors, and others, such as Corporate Relations, Human Resources, Institutional Planning and Governance, are led by Executive Directors. Professional Service divisions are subdivided into units headed by directors who lead staff members in achieving their unit and divisional goals.

UKZN was chosen as the study site because, in 2020, the model of operation at the institution was switched from fully face-to-face to virtual in compliance with the South Africa COVID-19 lockdown regulations established nationally and globally (UTOP, 2022). This development resulted in leaders at UKZN adopting technology-mediated leadership approaches to influence, inspire and encourage subordinates in continuing business under uncertain circumstances toward the institution's mission, vision, and mandate (UTOP, 2022). UKZN leaders' experiences, which included the challenges, benefits and enabling factors of leading virtually during the COVID-19 pandemic lockdown were explored and documented, and their future aspirations for virtual leadership were examined.

3.6 Target population

A target population is a subset of a population with the specific characteristics of participants to provide meaningful information that will allow a researcher to answer research questions (Saunders *et al.*, 2019). The target population of the study are all Academic Leaders and Directors of Professional Services at UKZN who led a team or unit before the COVID-19 pandemic and continued virtually during the COVID-19 pandemic. The target population size is fifty-nine (59), which includes thirty-eight (38) Academic Leaders of Teaching and Learning and Research of the 19 schools and twenty-one (21) Directors of Professional Services.

3.7 Sampling method

Sampling is the methodical process of selecting individuals or groups to participate in a study (Saunders *et al.*, 2019). A study's research approach determines the choice of a sampling method to be used (Creswell & Creswell, 2018). Probability sampling is used in quantitative research studies, where a representative population sample is selected using a random sampling technique (Bhattacharjee, 2012). On the other hand, purposive, non-probability sampling is used for qualitative research studies, where the participants are selected based on specific characteristics deemed relevant to the research questions (Bhattacharjee, 2012). Using the probability sampling method, all members of the population have a

chance of being selected. Using the non-probability method, only a few individuals meeting specific criteria are eligible to participate in the population frame.

As the study was qualitative, the purposive, non-probability sampling method was used. Non-probability sampling methods are techniques for selecting samples subjectively based on non-random criteria. There are various non-probability sampling techniques, which include snowball, quota, convenience, and purposeful (Shorten & Moorley, 2014). The purposive non-probability sampling technique was employed in selecting the study participants. A purposive sampling technique also referred to as subjective, selective, or judgemental sampling, allows a researcher to select participants with a specific profession, expertise, and knowledge that may provide answers to research questions (Shorten & Moorley, 2014). Using a purposive sampling technique, personalised invitations were sent directly to all Academic Leaders of Teaching and Learning and Research and Directors of Professional Services who held positions at least one year before and during the COVID-19 pandemic. A list of Academic Leaders of Teaching and Learning and Research and Directors of Professional Services who were in their position from 2019 to 2022 was generated as the population frame.

3.8 Samples and sample size

A sample is a subset of a target population that represents the population (Omair, 2014). The sample size of a study is the total number of participants that will participate in a study (Saunders *et al.*, 2019). There are different methods of determining the sample size of a study, which depend on the research approach (Bhattacharjee, 2012). For a quantitative study, statistical principles are applied in determining the sample size representative of the target population for generalisation purposes (Saunders *et al.*, 2019; Shorten & Moorley, 2014). In the case of a qualitative study, there are no rules in determining sample size, however, the dimensions (depth and breadth) of the inquiry need to be considered (Bhattacharjee, 2012; Patton, 1990). Saunders *et al.* (2019) recommended that a method of determining when to stop data collection in a qualitative study is by data saturation. Data saturation occurs when additional interviews do not yield additional information to answer research questions (Saunders *et al.*, 2019). Saunders *et al.* (2019) indicated that four to twelve participants should be sufficient for a homogenous group and 12 to 30 participants for a heterogeneous group. During the data collection phase of the study, the interview exercise was stopped after the thirteenth interview, as there were a lot of repetitions in the response of the participants. While participants had different contexts, the relevant information aligned with the study's objectives, challenges, enablers, and leadership styles became repetitive, denoting data saturation. Hence, the sample size of the study was thirteen (13) participants.

3.8.1 Participants' demographics

The participants of the study were selected based on their role and experience leading their unit/team before and during the COVID-19 pandemic. Table 3.1 below shows the profile of the thirteen participants of the study.

Table 3.1: Profile of participants

Pseudonyms	Length of service at UKZN	Leadership role	Leadership role	Team size
Participant A	9 years	ALR	5 years	15
Participant B	14 years	ALTL	3 years	50
Participant C	13 years	Director	7 years	5
Participant D	5 years	Director	5 years	30
Participant E	13 years	Director	14 years	15
Participant F	15 years	ALR	4 years	70
Participant G	20 years	ALTL	3 years	30
Participant H	15 years	ALTL	2 years	9
Participant I	18 years	Director	3 years	95
Participant J	10 years	Director	9 years	7
Participant K	12 years	ALTL	10 years	20
Participant L	17 years	Director	10 years	7
Participant M	22 years	ALTL	5 years	14

- ALR – academic leader of research
- ALTL – academic leader of teaching and learning

3.9 Data collection methods

A data collection method is the technique used in collecting the required data to answer a study's research questions (Bhattacharjee, 2012). The research approach of a study determines the choice of data collection. Quantitative data are usually collected using structured or unstructured questionnaires (Saunders *et al.*, 2019). Interviews, focus group discussions, and observations are popular qualitative data collection techniques (Creswell & Creswell, 2018). Considering the study was qualitative, the interview data collection technique was utilised. There are three types of interview techniques: structured, semi-structured and unstructured. A semi-structured interview was selected for the study.

3.10 Semi-structured in-depth interview

The semi-structured interview is a purposive dialogue between an interviewer and a participant that allows for a thorough investigation of a phenomenon through probing (Marshall & Rossman, 2014; Saunders, 2012). The semi-structured interview was deemed fit for the study due to its exploratory nature, which allows for further probing during the interviews and enables a thorough investigation of UKZN leaders' virtual leadership experience during the COVID-19 pandemic lockdown. A total of thirteen (13) semi-structured interviews with an average time of 40 minutes were conducted from 9 to 23 June 2022.

Different dimensions of interviews include the number of participants and the communication medium. For the study, a one-to-one internet-mediated interview was used. Zoom, an internet video conference application, was chosen as the communication medium because it allowed for convenience and adherence to social distance regulations during data collection. Also, the feature of cloud recording and voice transcription in Zoom was useful during the analysis of the interviews. Permission to record the interview sessions was obtained from participants. An interview schedule (see Appendix B) was developed to guide the data collection process. Using the interview schedule allowed for consistency in the collection of data from individual participants.

3.10.1 Interview guide approach

The three methods of conducting an interview are standardised open-ended, informal conversation, and interview guide approach (Patton, 1987). When using the standardised open-ended approach, the researcher crafts standardised questions that participants respond to sequentially. In an informal conversation, interview questions are crafted spontaneously based on participants' responses and context. In the interview guide approach, the researcher drafts predetermined questions in an interview schedule that guides the questioning of participants. One of the benefits of the interview guide approach is consistency across interviews of different participants in one or many study sites (Marshall & Rossman, 2014). The interview guide approach was used for the study. It was deemed appropriate for semi-structured interviews because of its flexibility, allowing researchers to probe participants' responses. In using this approach for the study, an interview guide was developed, reviewed, and approved by the ethics committee.

3.10.2 Interview schedule

An interview schedule is a structured document that guides an interview process (Rubbin & Babbie, 2012). It comprises different questions, such as the open-ended and closed question types crafted and organised into sections (Kerlinger, 1966). An interview schedule was crafted to guide the interview of the study. The interview questions were crafted based on the Nicholson adaptive cycle, which was adopted as the lens to understand UKZN leaders' virtual leadership experience during the COVID-19

pandemic. Some of the questions were adapted from previous studies, such as that of Bernhardsson *et al.* (2021), Agarwal *et al.* (2020), and Ramage (2017). A pilot study was undertaken of two leaders to assess the clarity and coherence of questions. The feedback from the pilot study was used in revising the questions, and the final interview guide was drafted and submitted as part of the ethical clearance application.

The interview schedule (See appendix B) comprises open-ended questions grouped as follows:

- **Job & Job Role** – This set of questions allowed the researcher to establish the background of the participants.
- **Leadership Experience** – This set of questions allowed the researcher to confirm participants' eligibility to participate in the study.
- **Main Research Questions** – This set of questions was grouped into four sections that aligned with the main research questions of the study. The responses to these questions informed the study inferences drawn from the analysis phase.

3.11 Data quality

Data quality in research is collecting credible data to address research questions appropriately (Saunders *et al.*, 2019). There are various data quality issues for both quantitative and qualitative research. In the case of quantitative research, the issues revolve around internal and external reliability, objectivity and validity, while qualitative research is concerned with data trustworthiness and bias (Saunders *et al.*, 2019). To increase trustworthiness and reduce bias during the data collection and analysis phase of the study, the following measures were used:

- **Transferability:** Thick descriptions, purposive sampling methods, and the selection of appropriate participants were used to increase the study's transferability (Berg, 1998; Saunders *et al.*, 2019).
- **Credibility:** Member checking and persistent observations were used to increase the study's credibility (Lincoln, Lynham & Guba, 2011; Saunders *et al.*, 2019). After transcribing the interviews, participants were sent their transcripts to validate their experience.
- **Confirmability:** An audit trail was kept and is available if required to increase the confirmability of the study, thereby reducing the possibility of bias during the data collection and analysis phase (Cohen & Crabtree, 2006). Some resources available include the raw interview data, transcripts, email trail, notes used during brainstorming and conceptualisation, and communication with the study supervisor.
- **Dependability:** An experienced researcher was requested to conduct a dependability audit of the research process to examine the stability and consistency of the inquiry process (Lincoln *et*

al., 2011; Saunders *et al.*, 2019). The researcher's duty was to check that the conceptualisation of this study, collection of data, data analysis, and presentation of findings were properly done in line with established research standards.

3.12 Data analysis

Data analysis is the systematic approach to examining and extracting information from a data set that helps achieve a study's objectives (Bhattacharjee, 2012). Statistical analysis techniques are used for quantitative research, while narrative analysis techniques, like content and thematic analysis, are used for qualitative research (Creswell & Creswell, 2018). The thematic narrative analysis technique was used for the study. Using the thematic analysis, interviews were transcribed, and the inductive analysis approach was used to generate the codes and themes that helped address the study objectives. The qualitative data analysis procedure described by Strauss and Corbin (1998) and Braun and Clarke (2006) was utilised to guide the data analysis process. The procedure contains six steps, which are explained as follows:

1. **Data familiarisation** – This is the process of becoming acquainted with interview transcripts in preparation for exploratory coding. To achieve data familiarisation for the study, the researcher self-cleaned and read the Zoom-generated transcripts before initiating the coding exercise.
2. **Coding** – This is the process of generating ideas, patterns, and relations from the transcript data set. Nvivo software was used to facilitate the coding of the data set of the study as it allowed for easy labelling and organisation of codes. The coding exercise was guided by the research questions and objectives.
3. **Theme generation** – At this stage, the researcher generates the first level of themes by discarding redundant labels and merging similar ones. For the study, the 136 generated labels from the coding exercise were reviewed and revised into descriptive themes.
4. **Theme review** – This is the process of fine-tuning the initial set of themes by repeating the process of discarding redundant labels and merging similar ones. For the study, the first level of themes was reassessed for appropriateness and revised and regrouped where necessary. Mind mapping and hierarchical charts were used to visualise the relationship between themes.
5. **Theme finalisation** – This is the final theme review and revision of whether the results are fit for purpose. For the study, candidate themes were reconceptualised in line with the research questions, and the final themes and sub-themes were generated.
6. **Writing up** – This is the composition of narratives of the study themes with the existing literature. The themes were presented, discussed, and supplemented with the literature on virtual leadership.

3.12.1 Dataset coding approach

Two cycles of coding, as illustrated in Figure 3.2 below and recommended by Saldana (2021), were used to generate the study's themes. During the first cycle, a combination of the initial, in vivo, and process coding methods was used to generate the first set of codes. The initial coding, also referred to as open coding, allowed for exploration and openness in the generation of the initial labels (Charmaz, 2006). In vivo coding, also known as verbatim coding, involves using the exact words and terms used by the participants as part of the labels (Saldana, 2021). The process code allowed for the coding of actions and processes as described by the participants using gerund ("-ing") words as part of the labels.

For the second cycle of coding, the axial coding approach was used in conceptualising and grouping the initial cycle codes based on patterns and relationship mapping. The initial codes that emerged from the first cycle coding were categorised and grouped based on how they relate with one another and the objectives of the study. This second coding exercise allowed for the development of conceptual approaches used by UKZN leaders in leading virtually during the COVID-19 pandemic, as indicated in Figure 3.2 below.

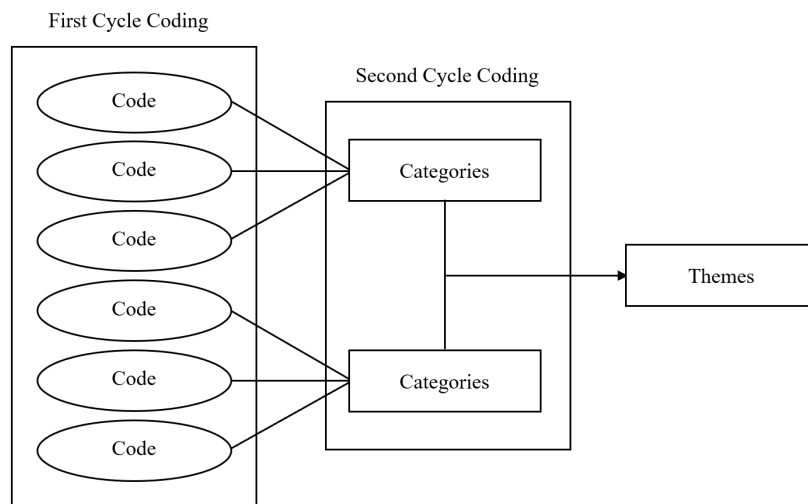


Figure 3.2: Data analysis process

The Nicholson adaptive cycle model was adapted as the lens by which to explore the experiences of UKZN leaders during the COVID-19 pandemic. The Nicholson adaptive cycle has been used in other studies, such as Ramage (2017), when investigating leaders' experience transitioning from proximal to virtual leadership in a retail sales context. The model has three main constructs: situation, quality, and process, as shown in Figure 3.3 below.

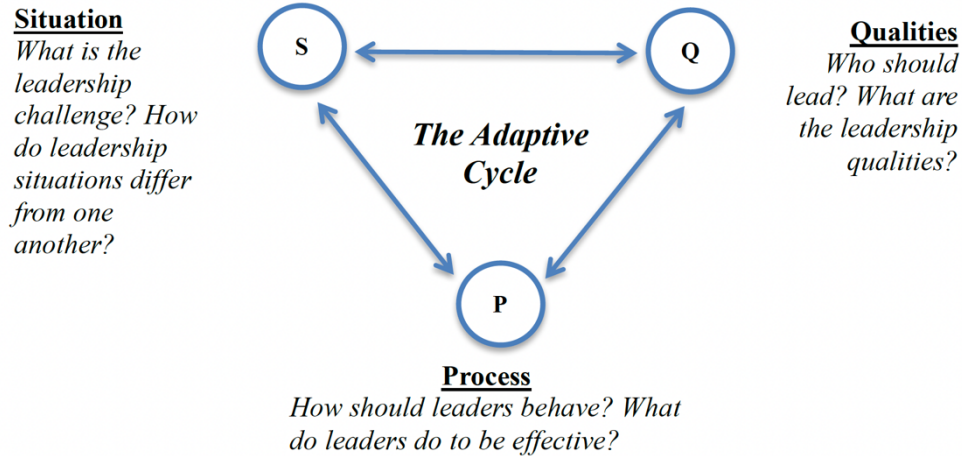


Figure 3.3: Nicholson adaptive cycle model

Source: Ramage (2017: 41)

- **Situation construct** refers to the new challenges and context in which leaders found themselves (Nicholson, 2013). This was adapted in the study to identify the challenges faced by UKZN leaders as virtual leaders during the COVID-19 pandemic.
- **Process construct** refers to the behaviours exhibited by leaders to adapt to and be effective in their new situation (Nicholson, 2013). This was adapted to determine the enabling factors that allowed UKZN leaders to lead virtually during the COVID-19 pandemic.
- **Quality construct** refers to the qualities surrounding the new situation that leaders have to adapt (Nicholson, 2013). This was adapted to explore the leadership approaches adopted by UKZN to lead virtually during the COVID-19 pandemic.

3.13 Ethical issues

To conform to research ethics, a gatekeeper's letter and ethical clearance were obtained before data collection. The gatekeeper's letter (see appendix D) was obtained from the UKZN registrar giving the researcher permission to engage leaders at the university about their virtual leadership experiences. Ethical approval (see Appendix C) to conduct this research was obtained from the UKZN Humanities and Social Sciences Ethics Committee (HSSREC) before data collection. During the data collection process, participants were sent an informed consent form (see Appendix A) to be informed of the study's purpose, which allowed them to opt out at any time. Participants also provided consent for the recording of interviews and were assured of anonymity. Pseudonyms (Participants A, B, C etc) were used to represent participants' identities, and specific information, such as the College or School of the participants, was not presented to ensure anonymity during data presentation and discussion.

3.14 Chapter Summary

This chapter expanded upon the research methodology presented in Chapter 1. The research methodology defines the systematic steps followed in achieving the study objectives. The research approaches, methods and techniques were chosen based on the researcher's interpretivism worldview. The research approach used was qualitative, and the design phenomenology. Interviews were used for data collection, and a purposive sampling method was adopted in selecting the appropriate participants for the study. The interviews were conducted and recorded on Zoom and subsequently transcribed. Nvivo software was utilised to aid the analysis process, and a thematic analysis technique was employed to create codes and themes to address the research questions. The following chapter presents the findings and discussions resulting from the analysis phase.

CHAPTER 4: PRESENTATION OF FINDINGS

4.1 Introduction

In the preceding chapter, the research methodology, which encompasses the plans, procedures, and techniques used in achieving the goals of the study, was presented. In this chapter, the findings from the data analysis exercise are presented. During the analysis phase, the interview transcripts were populated in Nvivo analysis software and analysed using the thematic analysis technique. The coding and generation of themes were guided by the objectives of the study. Similarly, the study findings were structured to address the study's objectives. This chapter presents the study findings, which comprise the generated themes supported by participants' interview excerpts.

4.2 Research findings

From the analysis of the interview transcripts, twenty-one (21) themes and forty (40) sub-themes emerged. Table 4.1 presents the themes and sub-themes that emerged from the data analysis.

Table 4.1: Study themes and sub-themes

Study Objectives	Main Themes	Sub-Themes
Virtual leadership approaches	Conventional leadership styles	<ol style="list-style-type: none"> 1. Collaborative leadership style 2. Participatory leadership style
	Change in leadership style	<ol style="list-style-type: none"> 1. No change in leadership 2. Significant change in leadership approach
	Virtual leadership attributes	<ol style="list-style-type: none"> 1. Trust 2. Empathy 3. Good communication 4. Other attributes <ul style="list-style-type: none"> • <i>Honesty</i> • <i>Change agent</i> • <i>Lead by example</i> • <i>Patience</i> • <i>Time management</i>
	Virtual leadership behaviours	<ol style="list-style-type: none"> 1. Consult subordinates 2. Intentional inclusion 3. Leverage collective strength 4. Value team members 5. Self-confidence
Virtual leadership challenges	Bottom-up challenges	<ol style="list-style-type: none"> 1. Lack of active staff participation 2. Slow response time
	Top-down challenges	<ol style="list-style-type: none"> 1. Insufficient information to lead 2. Unavailable leaders
	Individual challenges	<ol style="list-style-type: none"> 1. Exhaustion 2. Work-life balance 3. Isolation
	Technical challenges	<ol style="list-style-type: none"> 1. Load shedding 2. Unstable connectivity
	Structural challenges	<ol style="list-style-type: none"> 1. Lack of virtual work structure
Virtual leadership enabling factors	Improve digital competency	
	Facilitate virtual platform setup	
	Organise the training of subordinates	
	Institutional support	<ol style="list-style-type: none"> 1. Provision of data 2. Availability of technical support line 3. Provision of technologies <ul style="list-style-type: none"> • <i>Hardware devices</i> • <i>Online software applications</i> • <i>Workflow management systems</i> 4. Capacity development initiatives <ul style="list-style-type: none"> • <i>Online platform training</i> • <i>Psychosocial workshops</i> • <i>Online event coordination</i>
Leaders' perceptions of post-COVID-19 pandemic leadership approach	Pandemic virtual leadership experience	<ol style="list-style-type: none"> 1. Positive feelings 2. Negative feelings
	Virtual leadership transition phases	<ol style="list-style-type: none"> 1. Discovery phase 2. Normalisation phase 3. Stability phase
	Virtual leadership continuity	<ol style="list-style-type: none"> 1. Prefer contact leadership 2. Prefer virtual leadership 3. Prefer hybrid leadership
	Future work arrangement	<ol style="list-style-type: none"> 1. Hybrid approach

4.2.1 Virtual leadership approaches

The first research objective was to examine the leadership approaches employed by UKZN leaders in leading their teams virtually during the COVID-19 pandemic. To achieve this objective, participants were asked about their specific leadership approaches. The themes that emerged from the analysis were

conventional leadership style, changes made to lead virtually, leadership behaviours and virtual leadership attributes, as illustrated in Figure 4.1 below.

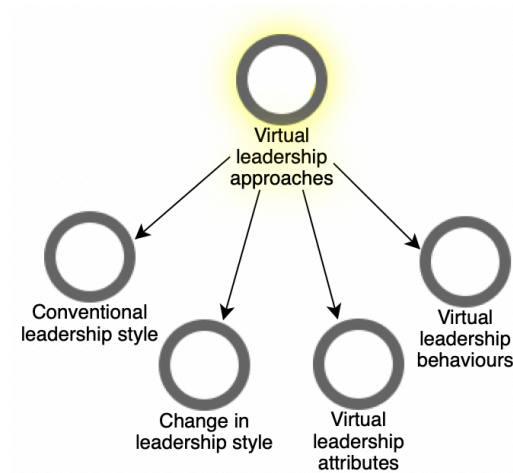


Figure 4.1: Theme: Virtual leadership approaches

4.2.1.1 *Conventional leadership style*

In identifying UKZN leaders' conventional leadership style, the participants of the study were asked about the leadership style to which they subscribed as face-to-face leaders before the COVID-19 pandemic. From the interview analysis, the sub-themes that emerged were collaborative and participatory leadership styles, as illustrated in Figure 4.2. below Some participants identified their conventional leadership styles as collaborative, and others indicated that they used the participatory leadership approach.

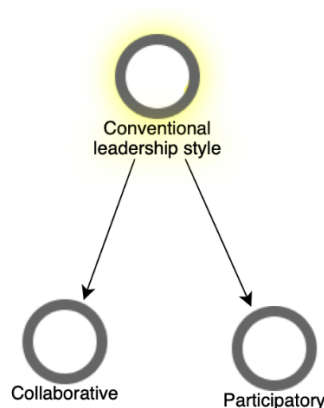


Figure 4.2: Sub-theme: Conventional leadership style

a) *Collaborative leadership style*

Some participants indicated that they subscribed to the collaborative leadership style before leading virtually during the COVID-19 pandemic. They indicated that they worked with other team players to achieve shared goals and objectives, as narrated by participants who said:

My leadership before the COVID-19 pandemic has always been collaborative, consultative, and transparent. The leadership style recognised individual member skills and strengthened those skills. (Participant E)

If you want to give it a term, it's probably a collaborative type of solid leadership where I work with people to achieve objectives, as opposed to telling them what to do. (Participant B).

b) *Participatory leadership style*

Some participants utilised the participatory leadership style. They indicated that their leadership style was inclusive as they involved all team members and ensured that everyone's contribution and voice was heard, as narrated by two of the participants who said:

My leadership approach has always been participatory in the sense that we discuss issues, and then we agree on the way forward. Obviously, as a leader, I have to assume a leadership role in those interactions, but the reason why I was saying its participatory is that we invite the inputs of all the stakeholders, and all views that are expressed are evaluated in terms of their feasibility and with regards to the issue at hand. We agree on the best way forward that would be to the benefit of the unit. (Participant I)

It was more of a participatory leadership where everyone knows exactly what their role is and whenever they are required to take a lead they will do so. (Participant A)

A similar approach was echoed by other participants who indicated the following:

I take the idea of dialogue seriously, and I don't believe in hierarchies too much. I believe that everybody has something valuable to offer, so I involve everyone. (Participant M)

I'm always there to provide strategic direction, but at the same time, consult and engage with colleagues and get them to participate. (Participant L)

The analysis and narratives show that UKZN leaders who participated in the study either used the participatory or collaborative leadership style before the COVID-19 pandemic. In the following section, the changes these leaders had to make to lead virtually during the COVID-19 pandemic are presented.

4.2.1.2 Change in leadership style

In examining the changes UKZN leaders undertook to lead virtually, participants were asked about specific changes they had to make. The sub-themes that emerged were those of no changes and significant changes, as illustrated in Figure 4.3 below.

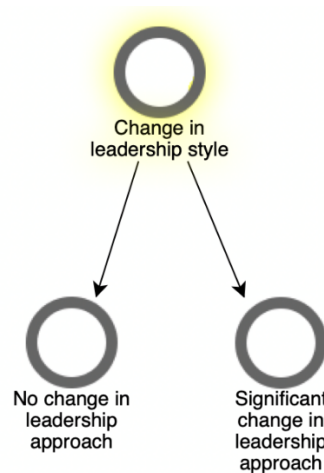


Figure 4.3: Sub-theme: Change in leadership style

a) No change in leadership approach

Most participants indicated that their leadership style did not change from their conventional leadership style when they changed to leading virtually. They indicated that their participatory and collaborative leadership approaches fit the virtual environment, as seen in some of their narratives:

No, my approach didn't change. The participatory style of leadership that I've always used continued even during the COVID-19 pandemic. The only difference was that it was being carried out now in an online environment. (Participant I)

It is not the leadership style that changed, but rather the platform changed as a result of this new environment. (Participant K)

Some participants indicated that because of the switch to a virtual platform, they had to step up as a leader and be more intentional in their approach. This was narrated in some of the responses of the participants, who said:

I think my approach just intensified. My ideas around service-centred and open channels of communication intensified at that moment... Fundamentally, the ideas behind the approach did not change. (Participant M)

Some were more deliberate about their communication, as indicated by a participant:

Well, I don't think my approach changed. If anything else, it forced me to pay more attention to my emails because that was now the mode of communication with the academics and myself, so you know you can't just leave your emails to pile up for maybe the next day to respond, you have to respond to them, hopefully within the day or as soon as you could. (Participant G)

One other participant indicated a need to develop closer relationships with subordinates to provide clearer guidance during the transition:

I wouldn't say my approach changed. I found that my team were able to transition, but I had to provide very clear guidance. So I can say as much as maybe before the COVID-19 pandemic, I was a more hands-off oversight leader, but then during the COVID-19 pandemic, I had to be closer to the team because they were in transition. (Participant C)

Another participant mentioned that he/she had to intensify his/her trust in individuals:

My leadership approaches which are skills and styles are part of who I am. So it didn't necessarily change... I had to place a lot of reliance on people doing what is expected of them. You know those leaders who micromanage people, I think it is very difficult in this environment because everybody is spread all over the place, but I'm not one of those people. I didn't struggle with the fact that people were spread all over the place. (Participant B)

b) Significant change in leadership approach

Two of the participants indicated that there was a significant change in their leadership approach, which was because they felt their leadership approach was not efficient in the online environment. One leader switched from being less involved to being more hands-on:

So yes, my approach changed because people needed a direction, and people needed advice on how to proceed because everything was so new. I had to be more involved as a leader. I got more involved with the staff and advised on the minimum standard. Whereas I wouldn't have had to do that before because people knew their jobs and just

got on with it. I needed to be almost more hands-on but in a virtual way than what I were before. (Participant B)

Another leader changed from being more involved to being led because of their technological deficiency, as explained by the participant who said:

My approach changed because, as I said earlier, I was providing strategic direction, but at the same time, my shortfall or shortcoming was that I was not technologically savvy. I was forced to change to adapt quickly and allowed team members to lead by coming up with solutions at that time. (Participant L)

From the analysis of the changes UKZN leaders made to lead virtually during the COVID-19 pandemic, it is clear that most participants adapted their traditional leadership approaches to the virtual environment while ensuring team members were more involved in these changes. The attributes and behaviours of UKZN leaders leading virtually are presented below.

4.2.1.3 Virtual leadership attributes

To explore the characteristics of a virtual leader, UKZN leaders were asked about the attributes that they felt allowed them to lead effectively during the COVID-19 pandemic. From the analysis of the interviews, most participants identified empathy, trust, and communication as the attributes that rendered them most effective when leading virtually. Other attributes that were infrequently mentioned were honesty, monitoring, change agent, time management, patience, and leading by example. The sub-themes that emerged from this analysis are illustrated in Figure 4.4 below and explained in the next section as narrated by the participants of the study.

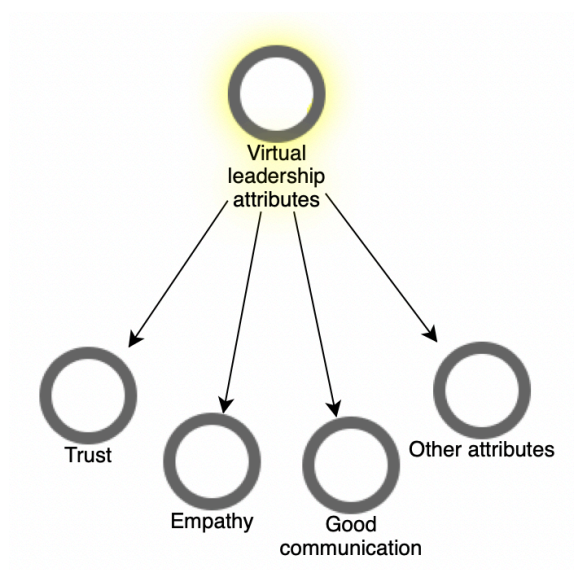


Figure 4.4: Sub-theme: Virtual leadership attributes

a) *Trust*

The element of trust was a prominent factor gleaned from the analysis of the interviews. Most participants indicated that a virtual leader must be ready to trust that subordinates would do their responsibilities as expected because they have no direct access to them. Some participants explained the following:

Virtual leadership requires letting go and not being obsessive (Participant E)

Not having direct access to people on a daily basis means I have to rely a lot on their sense of doing the right thing. I have to trust a lot more because I don't have physical contact with them. (Participant B)

Another participant indicated that in as much as a virtual leader provides subordinates with autonomy, they need to establish a way in which to measure the work that is being done. She explained the following:

In an online environment when people are working from home, we had to function on the basis of trust and trust that every member of the team is pulling their weight and are doing what they expected to do, but we had to agree on deliverables that were measured in terms of people's performance. For example, there were regular reports that needed to be submitted. (Participant I)

b) *Empathy*

Many participants identified empathy as an important attribute of a virtual leader to lead effectively during the COVID-19 pandemic. This is because subordinates suffered many work- and health-related issues such as anxiety, fear, and illness. To deal with such situations, virtual leaders should be compassionate, sympathetic, caring, understanding, and flexible, as narrated by some of the participants who said:

I needed to check in on the team's well-being that's another thing I forgot to mention. I have to say, Busi, are you okay? How are you doing? How are you coping? Some of them got COVID-19. So, I then had to check how they were doing. (Participant C)

I'm not sure what to call it, but the ability to be compassionate and show empathy. I think I develop that skill a lot more than I had before because it's a need. I needed to also understand that it wasn't just about delivering the goal or the goals, but it was also about taking care of the staff and their mental well-being... I think my emotional side grew a lot yeah developed a lot yeah. (Participant L)

Some participants emphasised being understanding and caring about subordinates' non-office related challenges, such as family, illness and loss of life. A participant explained that

people were going through stuff with their parents being sick and all that, so I had to provide that support. We showed more empathy as a leader, ... what I'm saying is that we do not see people every day, so we had to check in on them. If they say their family members are sick, we allow them to go home. I tell them that it's fine to deal with the elements of ensuring their family is OK. But they must make themselves available for work or take time off. (Participant D)

c) *Good communication*

Good communication was a major characteristic identified of a virtual leader during the COVID-19 pandemic. Many participants indicated that they had to improve their written and verbal communication skills because that was their only means of communication in a virtual setting. Participants explained that virtual leaders had to be clear, positive, open, and timely with their written and verbal communication as it was the only means of relaying instructions or information to subordinates. This is evident in some of their narratives:

A lot of communication was done through email correspondence, and I had to be explicit in the way I write. (Participant E)

The one aspect of the behaviour I adopted was to make sure that I respond to emails... reading emails carefully because there was no opportunity for a face-to-face for additional explanation, so those are the change I paid attention to. (Participant F)

In terms of positive communication, a participant indicated as follows:

If there's something that I think, what comes closest to answering that question is probably just having a positive communication style... in a face-to-face situation, people can see from my body language that I'm really not impressed. Regardless of my situation I just try and keep people positive through just the way that I communicate. (Participant H)

d) *Other attributes*

Empathy, trust, and communication were the dominant attributes mentioned by many participants. In addition, participants infrequently added other attributes that they exhibited to lead virtually during the COVID-19 pandemic. These themes included honesty, monitoring, change agent, time management,

patience, and leading by example. These attributes are illustrated in Figure 4.5 and presented in the following section.

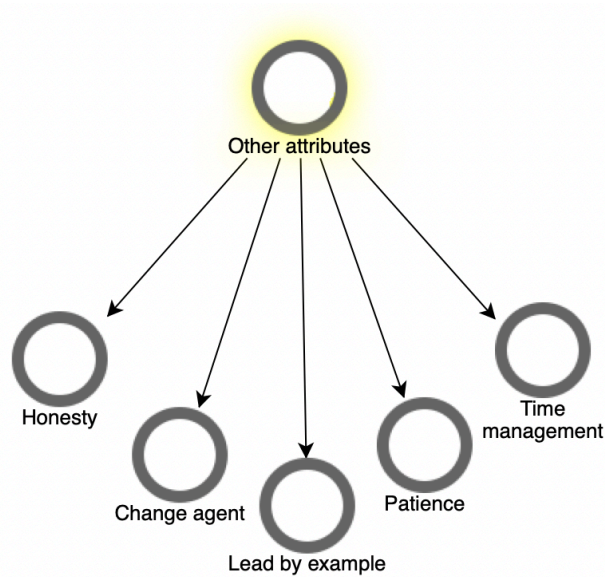


Figure 4.5: Other virtual leader attributes

One of the participants of the study identified honesty as an attribute a virtual leader should exhibit in a complex and uncertain situation such as the COVID-19 pandemic. He explained that being honest earned him more respect from his subordinates when he explained as follows:

I remember sometimes we would go to these meetings and everybody was just really overwhelmed and depressed. As a leader, I was thinking what do I say? I don't have the answers and I just kind of just lead with honesty and just say, I don't have the answers, but I understand how you feel and I respect how you feel and all we can do is carry on, and there was this kind of silence afterwards and I thought that would lose my respect because I didn't have the answers. But, actually, it shifted it to another level, because, of course, they knew that I didn't have all the answers but they just wanted to be heard and listened to. (Participant M)

A participant identified change agent as an important attribute of a virtual leader in a transition situation such as the COVID-19 pandemic. The participant explained that a virtual leader could promote new ways of working and encourage colleagues to accept change:

How do you motivate a person who has been working for perhaps 40 years in UKZN and tell them that things are changing, and they have to do things in this new way? You have to teach them the basics, remember, this is a person that is supposed to be maybe sharing their wisdom with us or educating us, but it changed to us educating them, and it was a complete set of skills in terms of our role and mostly has to do with how we get

everyone going. So, I would say, those are the new set of skills that we had to learn.
(Participant A)

A participant indicated that a virtual leader should lead by example, particularly in situations of change such as the COVID-19 pandemic. During her interview, she explained that whenever she did what was expected of her subordinates, such as attend training or use new virtual approaches, her subordinates would state something like the following:

Oh, if you people can do it, and do it so quickly, then we are going to adapt and then we are going to make it through. (Participant A)

Another participant identified patience as an essential attribute of a virtual leader in attending to and resolving issues of the subordinates:

Perhaps learning to be more patient in answering the queries that academics had and learning to answer the same question over and over again even though I've already sent out an email explaining everything, but some people would send me an email asking the same question. So, you have to learn a lot of patience. (Participant G)

Lastly, time management was a skill identified by another participant to manage engagement in virtual platforms when leading virtually:

The one thing we had to learn very quickly was time management. Unlike face-to-face meetings, where these meetings could go beyond the scheduled time, here we had limited time online for the conversations, which have to be very focused. (Participant K)

This section presented the themes of the attributes of UKZN virtual leaders during the COVID-19 pandemic. The next section discusses the behaviours actioned by UKZN leaders to lead virtually.

4.2.1.4 Virtual leadership behaviours

In examining the characteristics of UKZN virtual leaders' approaches during the COVID-19 pandemic, participants were asked about their behaviours used to influence team members towards achieving shared goals. The identified sub-themes from the analysis were consulting subordinates, intentional inclusion, leveraging collective strength, valuing team members, and self-confidence. These themes illustrated in Figure 4.6 will be expanded in the next section.

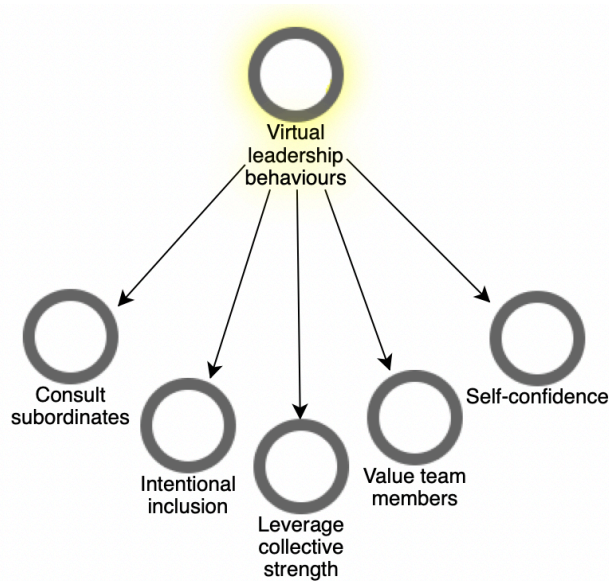


Figure 4.6: Sub-theme: Virtual leadership behaviours

a) *Consult subordinates*

Most participants indicated that they continuously consulted subordinates to brainstorm ideas and discuss possibilities and options towards achieving shared goals during the change. Some of them explained that consultation formed an element of their participatory leadership lifestyle and was facilitated by technology during the COVID-19 pandemic. They further explained that consulting with the team aided in obtaining improved engagement of subordinates and encouraging them to contribute to the success of the team. Some of the participants explained this when they said:

I got together a team of interested, committed persons from each of the sections in the school, each of the disciplines, and we brainstormed on how we were going to proceed with the changes. (Participant B)

So, of course, we develop procedures by discussing with the team. I came up with the plan in terms of the draft, but I had to consult with the procurement officers who will implement for feasibility. (Participant D)

b) *Intentional inclusion*

Participants in the study identified intentional inclusion as one of the behaviours they had to learn and action to maximise their team's strength when leading virtually during the COVID-19 pandemic. This is one way participants were able to ensure that all team members were involved when making decisions around shared goals. Some of the participants explained this when they said:

In the online space, I never have contact with people, so I had to be more of an intentional leader by reaching out to people. I had to ask for involvement, I have to be intentional about what it is I wanted to achieve and bringing people in to help me to achieve it. (Participant B)

So it's very important that when we have goals setting or when we have strategic planning sessions, the information comes from the team. I allow for inclusivity and robust discussion. Not listening to the people around you creates challenges, specifically in terms of people buying into the idea that you want to project or you want to perpetuate. When the idea is developed by the team, then there would be a shared responsibility towards work. (Participant K)

Some participants indicated that intentional inclusion actions such as holding subordinates accountable during online meetings and checking on less active subordinates allowed them to include individuals who were hiding and taking advantage of the distance in working virtually. A participant explained as follows:

There are people that needed to be followed because they don't just work on their own. So, I had to make sure that with those, I set up weekly meetings for feedback, just so that we don't get lost. And also, things don't fall through the cracks. (Participant D)

c) Leverage collective strength

Most participants of the study indicated that using a participatory leadership style in a virtual setting allowed them to leverage the strength of the collective in achieving team objectives and goals. In a virtual setting where all parties were learning new approaches, it was important to gather individual contributions and work collectively, as explained by participants who said:

I think the important thing is not doing work on my own. I worked with a group of people who wanted to be involved and showed initiative in learning about this new approach. ... I was able to influence because it wasn't working top-down, it was collaborative, and that helped. (Participant B)

We talk about more agile teams... I think adopting that teamwork terminology in everything that we did in terms of the teaching and learning efforts was powerful. We were able to galvanise the strength of the collective. (Participant H)

d) *Value team members*

Participants in the study identified that as a virtual leader, it was important to value, acknowledge and appreciate team members' contributions as it fostered the culture of sharing and encouraged continuous team participation. Some of the participants explained as follows:

My team members under my leadership know that they are important. They know that their views and ideas are valued. Any organisation performs best when those values are shared amongst team members. So, my leadership style always values team performance above anything. (Participant E)

We were able to galvanise and use the strength of the collective by acknowledging what people did and how they did it and the conditions under which they managed to produce whatever results. (Participant H)

e) *Self-confidence*

It was identified that self-confidence was an essential element of a virtual leader under uncertain and complex situations such as the COVID-19 pandemic. A participant explained as follows:

Specific behaviour that I have to exhibit is appearing as a person who already figured it out just for the sake of my team. Whereas I know that we are all in the space of not knowing what will happen tomorrow. For instance, every meeting will start with people trying to check how much you know about the COVID-19 pandemic and the best thing you could do there is to try to put in something that will motivate everyone and keep them hopeful that whatever you're going to be discussing thereafter is just to path a way forward for the school and to adopt these new changes so that the next person can also be motivated. (Participant A)

The themes and sub-themes presented in this section addressed the first objective of the study, which was to examine the leadership approach used by UKZN leaders in leading virtually during the COVID-19 pandemic. The participants of the study subscribed to the participatory and collaborative leadership styles, which they adopted when they began leading virtually during the COVID-19 pandemic. Some of the attributes and behaviours that were featured were trust, empathy, good communication, consultation, self-confidence, valuing team members and leveraging collective strength. The following section presents the challenges faced by UKZN leaders while leading virtually during the COVID-19 pandemic.

4.2.2 Virtual leadership challenges

The second research objective was to identify the challenges experienced by UKZN leaders in leading virtual teams during the COVID-19 pandemic. To achieve this objective, participants were asked about the specific issues and problems they encountered. The themes that emerged from the analysis of the interview responses were bottom-up, personal, top-down, technical, and structural challenges as illustrated in Figure 4.7 below.

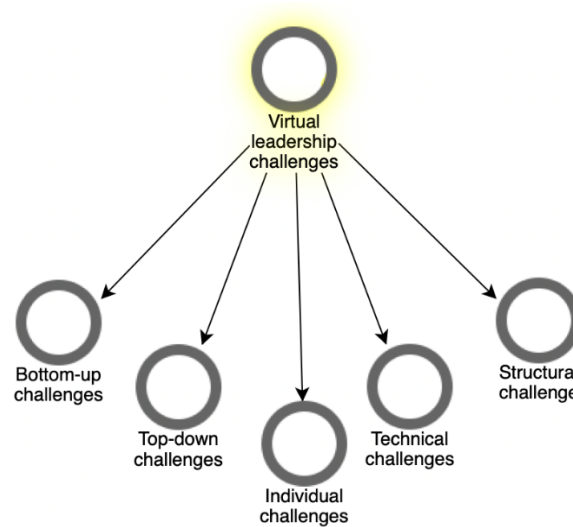


Figure 4.7: Theme: Virtual leadership challenges

4.2.2.1 Bottom-up challenges

Bottom-up challenges represent the issues and problems faced by UKZN leaders that were subordinate-driven. Participants identified different challenges encountered when dealing with subordinates in the COVID-19 pandemic virtual settings, which were related to staff participation and slow response rate. These bottom-up challenges are illustrated in Figure 4.8 below and explained thereafter.

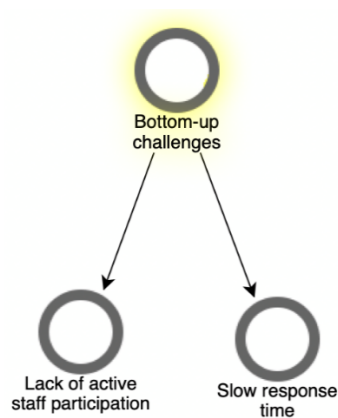


Figure 4.8: Sub-theme: Bottom-up challenges

a) *Lack of active staff participation*

Most participants identified inconsistent levels of staff participation in the virtual environment. Some staff members were readily available and active, while some were not. These inactive staff members were thought to have prioritised personal issues over work. Participants explained this “ghosting” of staff differently when they said:

I think the biggest challenge is the lack of active participation from all team members. I have some people that are very vociferous and would lead the discussion. But others just remain silent, and even when I ask for input, they remain silent. It's like hiding behind the virtual veil, which has been a bit of a challenge. (Participant K)

And then I had some junior team members who struggled with the freedom of working from home. When we work physically, they were able to thrive, but when they are on their own at home their work starts to flutter, and then I have to chase up. (Participant C)

In terms of staff not being readily available, some participants explained the following:

Well, of course, there's always those few that are not available and not willing. We did battle with some of those because I think COVID also provide an opportunity for those staff members who have other agenda to carry on. (Participant M)

We had people who constantly became disconnected from everyday activities, and I couldn't get them to be team players again. That's an ongoing challenge, even today. (Participant A)

Some participants explained how some staff did not prioritise work when working virtually and had to be followed up for deliverables:

And also another challenge is people tended to prioritise personal matters over work. When I expect a person to be working, they say they are taking care of their child at this time and will join the meeting late. (Participant J)

Then the second one for me, which I don't prefer, is chasing after people. My leadership style is that you know your work, so I give you a space to innovate and drive your work. I don't like chasing after people. So for me, that's also a disadvantage that you now have to be more frequently checking with people. (Participant C)

b) *Slow response time*

It was identified that participants of the study struggled with the response time of some of their team members, who were often delayed in responding to their emails whilst working from home, impacting operations and client satisfaction:

Another challenge was to convince colleagues that it is important to respond to emails because some of the colleagues will not respond to emails, and that will create a lot of unhappiness for the students. We had to ask what were the challenges of not responding to emails, and then we have to deal with it and try to convince our colleagues that responding to emails as fast as possible will resolve many issues. (Participant F)

During our practicals, there was a lot of information which academics needed to provide but some people didn't respond. I couldn't just walk to the office and say send me this information now. I had to send them numerous emails to get that information and get it in the format that I want. Sometimes they misinterpret the information that's required and give you something that is not what's needed. I have to go through and make sure that the information provided was correct and revise that information if it was not correct, which was a lot of work. (Participant G)

The presented narratives in this section explained the subordinate-driven issues faced by UKZN leaders when leading virtually. The next set of challenges was leadership-driven and is described below.

4.2.2.2 *Top-down challenges*

Top-down challenges represent issues inflicted by individuals in leadership roles higher in the hierarchy than the UKZN leaders who participated in the study. Participants explained that the transition was not easy for them as they lacked information from higher management members to lead their team, as everyone was new to the remote mode of operation. The top-down challenges identified by participants were insufficient information to lead and unavailable leaders, as illustrated in Figure 4.9 below.

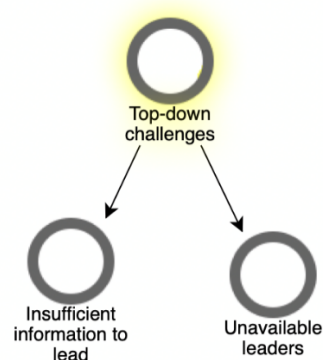


Figure 4.9: Sub-theme: Top-down challenges

a) *Insufficient information to lead*

Most participants complained of not having sufficient information at hand to lead effectively during the COVID-19 pandemic. They explained that not having adequate guidance or information from higher management was a frustrating experience because it made them look incapable, as they could not provide their subordinates with sufficient information or responses to their queries. Some of the participants expressed this frustration when they said:

I think the challenges we met with was huge, and I think principally because everybody was new to it, and changing new ground, so it was an extremely difficult time and very challenging because I had questions coming at me constantly and a lot of the time I didn't have the answers to those questions. In fact, the people in leadership above me didn't have the answers either because they too were finding their way. It was immensely challenging, largely because the territory was unknown to everybody. So everybody had lots of questions, and nobody had any answers. (Participant B)

In meetings with my leadership, they also didn't have answers to queries because it was a tricky period where everyone was trying to navigate and make sense of. So it was a challenge for me because decision-making was longer. (Participant L)

This is a low-down leadership role in the university, so a lot of the time we have to carry out the instructions that we get, and it's difficult when I know things would not work as instructed. And then I get the frustrations of the staff coming up to me because they're trying to implement unworkable things. So we have, through learning, be able to manage the challenges. (Participant B)

b) *Unavailable leaders*

Some participants indicated that the unavailability of higher leaders during crucial moments was a challenge faced while leading virtually. A participant expressed this frustration when she said:

I must say that my boss, I feel like she let me down... She was not available to support me. I had to figure out a lot on my own. What I needed was somebody who is actually available so that I can ask the questions and resolve issues on time. (Participant M)

The top-down challenges mentioned by participants made virtual leading frustrating as it rendered the leader incapable of making decisions when required, which could result in subordinates losing confidence in them. The following set of challenges was the personal issues faced by UKZN leaders.

4.2.2.3 Individual challenges

Individual challenges represent the issues and problems faced personally by UZKN leaders while leading virtually during the COVID-19 pandemic. Participants indicated they were exhausted, struggled with balancing work and personal life and felt isolated, especially at the beginning of the COVID-19 pandemic. These individual challenges are illustrated in Figure 4.10 below.

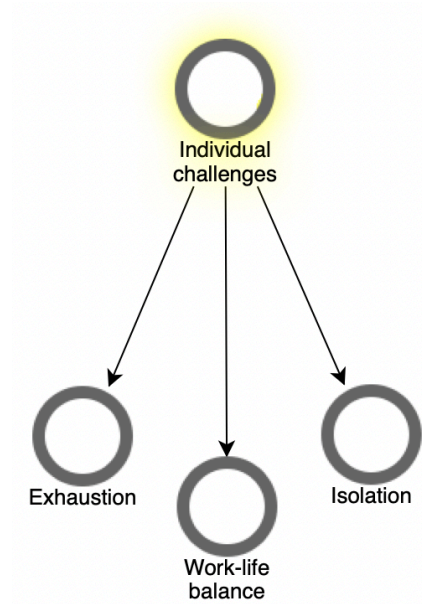


Figure 4.10: Sub-theme: Individual challenges

a) *Exhaustion*

The participants of the study indicated that they were exhausted and overwhelmed, particularly at the outset of the COVID-19 pandemic, because of the sudden change in their mode of operation. At the beginning of the transition, leaders had to make themselves readily available via several exhaustive online meetings. Some of the participants narrated this overwhelming experience when they said:

In the beginning, I would answer emails late into the night, and maybe sometimes on the weekends, but towards the end of it, I was exhausted. I later had to set time for myself and say I'm not answering any more emails after this point, and people can wait till the next morning if they needed an answer for something or if it was urgent enough, they would call me. (Participant G)

One of the big challenges we've had using the virtual platform is that, firstly, we have too many meetings scheduled in a day... We have champions of various activities and responsibilities who try to engage everybody and believe that they are the only ones that are trying to do so, and this does become overwhelming for members of the team and leaders. (Participant K)

b) *Work-life balance*

Participants in the study indicated that while leading virtually and working from home, they struggled to balance their work and personal life as it was challenging to be strict about work and home hours. One of the participants explained as follows:

I do find myself sitting at the desk until seven pm. When it started, I didn't notice it because I would be like, let me go and grab something, grab a coffee and come back. After all, you are in the same environment, so that break between work and home was lost. I can say also it added to the stress, so I had to be conscious of time as I realised this was not sustainable to continue. I had to create an off-space and take breaks and tell myself now I am going home. Even though going home is still in the same environment. And then, as a woman leader, I have a household. One of the very common things is that as a woman leader, you are always struggling with the caregiving responsibilities at home, which increased when working virtually because of the kids. And I remember there was a time when we couldn't even have a house help. We were trying to balance work and everything else that needs to be done in the house. (Participant C)

c) *Isolation*

Participants identified a lack of social engagement as a major challenge that made them feel isolated when working virtually, as they could not freely meet colleagues or subordinates for discussions. The following remarks were made:

I think, for me, the biggest disadvantage is the loss of engagement. (Participant C)

When I was working on campus, I can just walk down the hall to sign something or complain, but it was very isolating working from home, especially in the beginning. I couldn't even meet somebody for coffee. So I think those were the challenges. (Participant M)

Yes, there are disadvantages. The social aspect is really not there because you lead people from behind the screen and that social interaction is not there. That is one of the challenges of leading virtually. (Participant F)

The individual challenges mentioned by participants were personal problems faced by leaders while leading virtually. The following set of challenges is technical-driven issues faced by UKZN leaders.

4.2.2.4 Technical challenges

Technical challenges represent the technical issues that hindered the smooth transition and operations of working virtually, as experienced by UKZN leaders during the COVID-19 pandemic. The technical challenges identified by participants were load shedding and unstable connectivity. These challenges are illustrated in Figure 4.11 below.

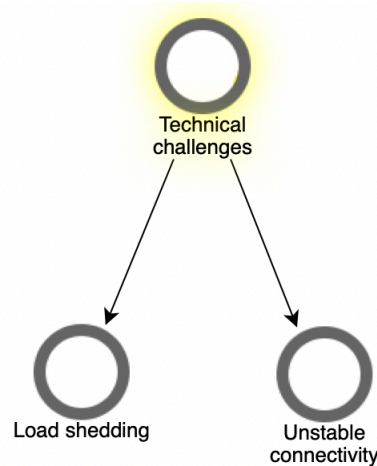


Figure 4.11: Sub-theme: Technical challenges

a) Load shedding

Participants indicated that frequent scheduled power interruptions experienced nationwide, known in South Africa as load shedding, were a hindrance when they were working virtually, as it interrupted their flow of work. One of the participants commented as follows:

One of the challenges that we do know at present would be load shedding that we experience so often, and this itself can be a detriment or a hindrance. For us to continue working uninterrupted, we were given routers with batteries, which played a huge role, but there has got to be support on that. (Participant K)

b) Unstable connectivity

Unstable network connectivity was another issue faced by UKZN leaders as virtual leaders. Participants indicated that poor network connectivity hindered their workflow, especially in terms of communication, which was a frustrating experience. Some of the participants said:

Of course, challenges of technology. A couple of connection that was disrupted by not having a network or technology that is stable was one of the most challenging things. (Participant F)

Another participant explained the following:

Maintaining constant communication was a challenge because of network connectivity. I remember when we have meetings virtually, it's easy for a team member to get disconnected not just from the meeting, but from work entirely. They will just tell you they do not have internet connectivity, and you end up shifting the work from one person to another. (Participant A)

Technical challenges can be a hindrance to effective remote work and leadership as a virtual workplace is reliant on technology and a stable internet connection. The below challenge is related to the governance of virtual work.

4.2.2.5 Structural challenge

Structural challenges represent governance-related issues identified by UKZN leaders as stumbling blocks to effective virtual leadership during the COVID-19 pandemic. Participants mentioned that the lack of a virtual work structure with defined procedures, policies, and guidelines was challenging as they had no measures or standards upon which to fall back or to which to refer subordinates. Some of the participants expressed this frustration when they said:

I mean, certainly, it's still a challenging environment, and I think one of the reasons is that our structure and our rules and everything is still designed for the face-to-face environment. We haven't got rules for the online environment, so decisions are made and implemented but not incorporated into a new set of rules... The challenge is that we didn't have a structure, and the structure is very important. (Participant B)

I think one challenge we faced was that the system wasn't set up for virtual work. It's not a virtual university but a face-to-face university. If the university were to be virtual, our structures would be supportive of that, but now structures were not set up to be virtual. So we were constantly trying to catch up and put in place the necessary systems and tools and things as we went along. If I were in any kind of organisation designed to be run virtually, it would be fine, but this system isn't designed to be run virtually. (Participant B)

The themes and sub-themes presented in this section addressed the second objective of the study, which was to identify the challenges faced by UKZN leaders while leading virtually during the COVID-19 pandemic. The identified challenges were categorised into bottom-up, top-down, individual, technical, and structural challenges. The next section presents the enabling factors that allowed UKZN leaders to manage the transition situation and lead virtually.

4.2.3 Virtual leadership enabling factors

The third research objective was to determine the factors that enabled UKZN leaders to facilitate the transition from face-to-face to virtual. To achieve this objective, participants were asked about their actions taken to manage the transition and the challenges they faced in shifting from face-to-face to virtual leadership, as well as other elements that made them effective virtual leaders. From the analysis of participants' responses, four themes emerged: improving digital competency, facilitating virtual platforms set up, organising the training of subordinates, and institutional support initiatives. These themes are illustrated in Figure 4.11 below.

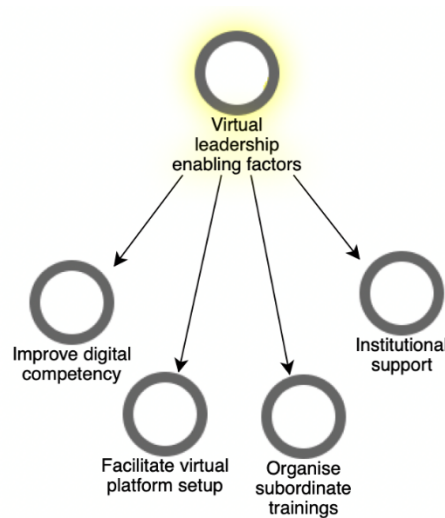


Figure 4.12: Theme: Virtual leadership enabling factors

4.2.3.1 Improve digital competency

Participants in the study indicated that it was essential for a virtual leader to be technologically competent. Participants explained that they were required to improve their digital competency, particularly in the use of online technologies for facilitating meetings. Furthermore, some of the participants said:

I think learning to navigate these online platforms helped me because, as a leader, people expect that I should know how to use the platforms. I should know how Google works and have the answers to all the questions. (Participant G)

Well, I had to up my knowledge of technology. I think all of us had to learn very quickly how to use zoom and how to use Microsoft teams. I think those were the most crucial skills that we all had to learn. And we had to learn them very quickly. (Participant I)

Some participants indicated that a virtual leader should also be an e-leader, as this boosted the leader's confidence and team respect:

Yes, there are skills that we needed to be learned because we were now using technology-assisted learning platforms to communicate. To lead properly, I had to also be a leader on this platform because it's not easy to be a leader if you are struggling with technology. For example, not knowing where to record, where the chat function and reactions are, etc. That, then, creates doubt in your team and the people around you. (Participant K)

The narratives presented indicated that it was essential for a virtual leader to be technologically competent as this provides the leader with confidence and the ability to lead effectively. The following enabling factor is the setting up of virtual platforms.

4.2.3.2 Facilitate virtual platform setup

It was identified that one of the roles of a virtual leader was to make decisions regarding the virtual platform and applications that were to be used by the team. Participants indicated that they were involved in the set-up of the platform used for communicating and managing their team virtually. They indicated that the many applications with similar features caused disorganisation and confusion for the team if not agreed upon. Some of the participants described this role when they said:

When we moved online, there was much more information and document sharing. So I had to ensure we set up team folders to which everyone had access. Deciding on the online platform to adopt helped to coordinate the team very quickly. (Participant G)

So, I really sort of kicked into gear at that point, and for the first year of 2020, we had meetings every single week... to ensure we are on the same page, we had to establish the preferred medium and online platform for the team as they were many similar applications out there. (Participant M)

The presented narratives showed that a virtual leader should make decisions regarding the virtual platform used by the team for all members to work harmoniously. The following enabling factor described is the training of subordinates.

4.2.3.3 Organise the training of subordinates

Participants indicated that it was their role to perform an analysis of the needs of their team to identify the training required and make arrangements for training:

One thing we had to do first was to identify what the team needed to work from home. For example, for people using a desktop, we had to secure laptops and data routers so they could work from home. We also ensure they had the necessary training to use the devices and applications used for online engagement. (Participant D)

Yes, when we got into lockdown, we had to arrange sessions and workshops to get team members to learn how to use virtual platforms as we worked with a lot of senior people that didn't know much about online platforms. (Participant A)

The narratives presented showed that virtual leaders were required to ensure that subordinates had the required resources and training to work effectively online. The following described enabling factor is support provided by the institution.

4.2.3.4 Institutional support

Participants indicated that the support received from the institution helped them and their team to navigate the changes effectively when they started working from home. From the analysis, the institutional support provided by UKZN included the provisioning of internet data bundles, a technical support line, top-level leader moral support, provisioning of technologies, and capacity development initiatives. These support elements are illustrated in Figure 4.13 below.

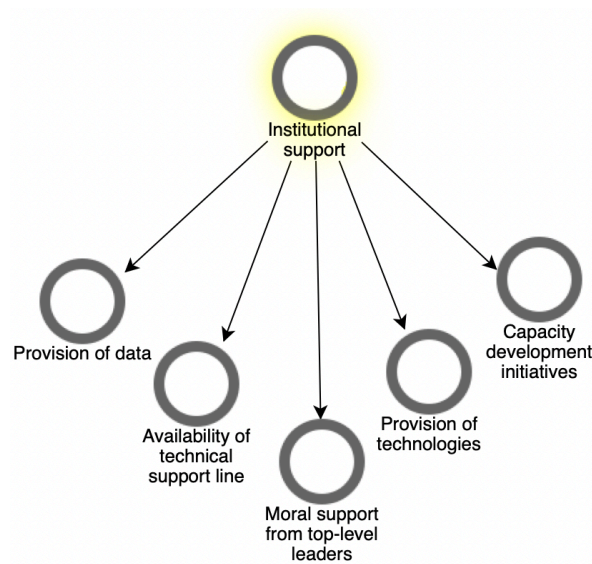


Figure 4.13: Institutional support provided by UKZN

a) Provision of data

Most participants of the study reported that the university provided them and their team members with a data router and monthly subscription when they were asked to work from home. Participants explained

that the provisioning of internet subscriptions by the university was a key support and enabler when they said:

I would say, maybe the issue of data was a key thing that the university did. When we also did our survey, we found that staff members that had the resources to work online experienced less stress during the pandemic. The fact that the university ran into action making sure that we had data to continue working from home enabled us to switch virtually. (Participant C)

The university provided support in different ways. For example, when we left during the first hard lockdown, we were all given the dongle to connect and work virtually. Then later, we were given a device like a power bank that allowed us to continue working during load shedding. (Participant L)

The above narratives showed that providing internet subscriptions is key to any virtual or remote work arrangement. The following described institutional support is the availability of technical support.

b) Availability of a technical support line

Participants identified that the availability of information and communication services and a technical support line was another necessary form of support provided by the institution. Some of the participants reported the following:

ICS was there to assist with technical issues... during the hard lockdown, the WhatsApp support number helped. (Participant L)

We had the helpdesk in terms of academics support for using the learn platform. (Participant G)

The above narratives revealed that UKZN staff members were able to access technical support on different channels, ensuring the resolution of computer and software-related issues from home whenever required. The following identified institutional support is the moral support provided by top leaders.

c) Moral support from top-level leaders

Some participants mentioned that they received moral support and praise from their leaders, which encouraged them to persevere amidst all the challenges they were facing:

Well, in the beginning, we had more meetings with the senior management, one level up from me, that we hadn't had before we went virtual. The College teaching and learning

team met weekly in the beginning. As much as possible, then the DVC and the Dean tried to give us the small support that we needed and to answer questions... We had contact with the DVC and the Dean, and that helped, and they verbally gave support, (Participant B)

The presented narrative showed the impact of moral support from higher management on virtual leaders in coping with difficult situations such as the COVID-19 pandemic. The following identified institutional support is the provision of technology.

d) Provision of technology

The provision of essential technology, such as laptops, communication devices and online software, by the institution, was identified as an enabler to rapid and easy transitioning to working online and from home. The technologies that were identified are explained as follows:

- *Hardware devices*

The institution provided UKZN staff with devices that allowed them to work effectively from home. Participants made the following remarks:

Also, I shouldn't forget that there was different equipment that they gave us, like cameras and earphones, that we had to take home. So those help us set up our own office spaces at home, so that did assist. (Participant A)

Most of our circulation staff when we're working on campus, before the lockdown, were using desktops. We had to request laptops for all the staff to make work comfortably from home. (Participant I)

- *Online software applications*

Participants indicated that the institution made provisions for the necessary licences to online applications required to communicate and work virtually. These applications ranged from synchronous to asynchronous applications, as mentioned by participants:

At the beginning of the lockdown, we were given access to use Zoom and Teams. Zoom was our first platform. And we've fully transitioned into Teams at the moment. We are able to use different functionalities on Zoom and Teams to coordinate the team. For example, some of the functionalities on Teams allow us to create group dynamics and tasks, to keep track of the action items and to keep track of projects etc. (Participant H)

We used the UKZN email in terms of official communication to make sure that we are on the same page. Another application we use is WhatsApp groups because we can communicate in real time. And sometimes, we got a lot more decision-making occurring using WhatsApp features because we're able to get a lot of people to respond quickly and in real-time. (Participant K)

- *Workflow management systems*

Participants indicated that the access and use of workflow management systems aided in the simplification of document review and decision-making, as explained by a participant:

We have other software like the Higher Degree Management System (HDMS) which assist with things like application submission. During the COVID-19 pandemic they enhanced the system with more online functionalities so that team members can make decisions using the HDMS. For example, the academic leader can look at student applications and decide without meeting the rest of the team, which will then be sent to other approval actors who read the comment of the academic leader and make their decision based on that. So everything just started becoming more functional because of these types of online systems, which support us to lead virtually. (Participant A)

The provision of hardware, software, and management systems that suited the virtual work arrangement by the institution was a key enabler to effective virtual leadership.

e) *Capacity development initiatives*

Participants in the study indicated that different capacity development initiatives were provided at different levels: college, school, and institution-wide. From the analysis, online platform training, psychosocial workshops, and online facilitation training were identified.

- *Online platform training*

Participants indicated that they were trained in the use of online communication applications such as Zoom and Teams, which they used for online meetings and team engagement, as explained by some participants:

Yes, there is some support like training us on the usage of Zoom, Teams. Those were the kind of transition support we received. (Participant F)

The training we got that is associated with people who are struggling with the virtual meetings helped a great deal. (Participant J)

- *Psychosocial workshops*

Participants reported that at the earlier stage of the COVID-19 pandemic, various workshops on stress management, emotional intelligence, and healthy lifestyle were available for both leaders and their subordinates to attend. These workshops aided in the navigation of the changing, volatile and uncertain situation of the COVID-19 pandemic they were facing, as captured in some of their statements:

I was able to manage some of the challenges by attending webinar sessions that are provided by the University on managing stress, how to keep healthy, and how to eat healthily. This helped a lot because we were not going out and stayed in one place for long. (Participant L)

There were workshops relating to psychological issues like how to deal with a loss of a loved ones. Many of us lost loved ones. These workshops helped with emotional intelligence and be mindful of what my staff was going through. (Participant L)

- *Online event coordination*

Participants mentioned that they attended a training course hosted by their colleges and support units on how to set up, manage, and run live seminars, meetings, and other similar online events. The training was focused on the use of features in online communication applications to run events virtually. Participants explained their experiences as follows:

We were introduced to how to set webinars up, invite people to our online event, run online sessions, and online meeting etiquettes. It was just training because we have never used those platforms before. (Participant L)

One support would be the training that the UKZN management organised. There are far too many trainings in 2020 from using virtual platforms to how to coordinate online sessions. The training did help, so that's the support that we got from the institution. (Participant A)

The themes and sub-themes presented in this section addressed the third objective of the study, which was to determine the enabling factors that allowed UKZN leaders to lead virtually during the COVID-19 pandemic. The enabling factors identified were improving digital competency, facilitating virtual platform setup, organising the training of subordinates, and institutional support initiatives. The following section examines the perceptions of UKZN leaders regarding their post-COVID-19 pandemic leadership approach.

4.2.4 Perceptions of the post-pandemic leadership approach

The fourth research objective was to determine UKZN leaders' perceptions of how best to lead their teams after the COVID-19 pandemic. To achieve this objective, participants were asked about their experiences with virtual leadership. The themes that emerged from the analysis were the pandemic virtual leadership experience, the pandemic virtual leadership transition experience, virtual leadership continuity and future work arrangement, as illustrated in Figure 4.14 below.

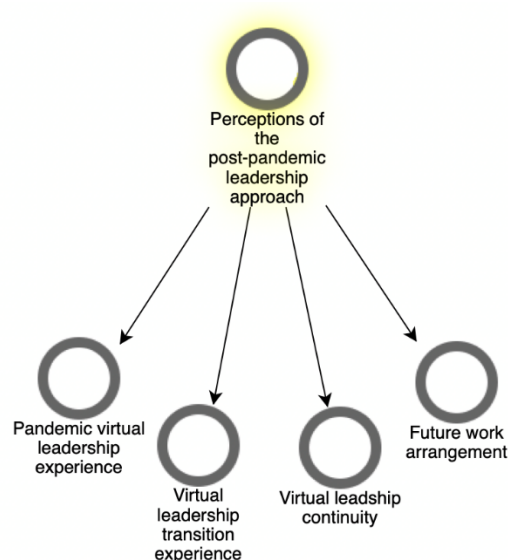


Figure 4.14: Theme: Perceptions of the post-pandemic leadership approach

4.2.4.1 Pandemic virtual leadership experience

Participants expressed mixed feelings regarding their experience with virtual leadership during the COVID-19 pandemic. The themes that emerged were both positive and negative feelings, as illustrated in Figure 4.15 below.

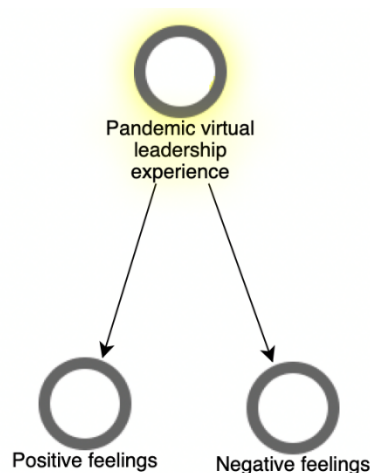


Figure 4.15: Sub-theme: Pandemic virtual leadership experience

a) *Positive feelings*

Most participants expressed positive feelings regarding their virtual leadership experience. Some noted it to have been an interesting learning experience, as mentioned in the following narratives:

It was a good learning experience, where we had to learn technology and then other aspects of work during the transition to virtual environments. (Participant I)

We learnt a lot, it was a good learning experience, and now I think we feel more confident that, should we have another pandemic, or we have some other disaster, we would be able to manage virtually. (Participant G)

Some participants indicated that they achieved more leading virtually during the COVID-19 pandemic, as captured in a participant's statement:

I would regard this as being a positive experience in the sense that I was able to live up to all of my responsibilities. So my work did not suffer because the platform changed. I was still able to function as normal I think I can go on and say my outputs are actually more than what they should have been. (Participant K)

Some participants felt it was an excellent and fun experience for them. They said:

Overall, I think it was excellent. I have no serious complaints, and I think these two and a half years have succeeded in strengthening and building the team's confidence. It has forced individuals to innovate and develop new technologies and approaches. So I think overall what we achieved has been excellent, which we could not have achieved in normal mode. (Participant E)

My experience of virtual leadership was fun. I would say it saves time because a lot of decisions could be made very quickly... when you are leading you get to see people who are wholeheartedly supporting the team because they will go an extra mile in their participation. (Participant A)

b) *Negative feelings*

Some participants felt unhappy about the COVID-19 pandemic virtual leadership experience. They felt it was stressful and exhaustive, as the following statements revealed:

It was stressful with lots of uncertainty. Having to change. Well, it took a while for decisions to be made. I found myself working long hours, hosting events in the evening and going to promote the university after hours and on weekends. Also, the economy

wasn't looking good, so I wasn't too sure whether the university would be able to keep us, then I found myself working even harder to demonstrate that I am needed.
(Participant L)

I think it was completely consuming. It took up pretty much every minute of every day.
(Participant M)

Another participant described the experience as traumatic:

My experience was traumatic. It always feels like you're making decisions in a vacuum because of the lack of interaction with staff directly, which posed a little doubt about what we are doing, and that was very hard for me. (Participant H)

Most participants had good feelings about their pandemic virtual leadership experience as they described it as interesting, a learning curve, fun-filled, and exciting. Contrastingly, other participants felt stressed, exhausted, and traumatised following the experience. In the following section, UKZN leaders' willingness to continue leading virtually is presented.

4.2.4.2 Virtual leadership transition experience

A trend that was observed amongst participants was the process by which UKZN leaders experienced their virtual leadership transition. The sub-themes that emerged under the transition theme were discovery, normalisation, and stability phases, as illustrated in Figure 4.16 below and discussed in the following sections.

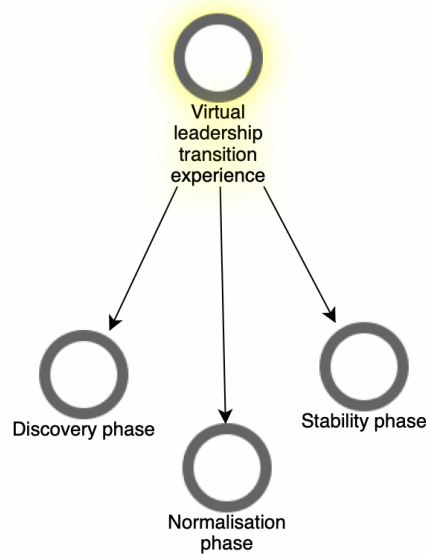


Figure 4.16: Sub-theme: Virtual leadership transition phases

a) *Discovery phase*

At the outset of the COVID-19 pandemic, participants of the study experienced a learning phase to discover how to navigate the new mode of working and leading virtually. Participants narrated their experiences as follows:

The first time in 2020, it was very challenging because everything was new, and nobody knew what to expect. (Participant G)

It's important that we don't adopt a holier-than-thou attitude during a transition like this. It was a trying time for everybody. Nobody knew the right answers. It was a period of discovery, so we kept an open mind. I sometimes tie my hands in the back and let things unfold, and you troubleshoot as you go along. (Participant E)

I think we're all anxious in the beginning because of the high level of uncertainty, but once we all got used to the situation and everyone had an understanding of how things were going to work, then it was fine. (Participant D)

Transitioning from face-to-face to virtual leadership during turbulent times was initially highly demanding. During this early stage, leaders learned how to navigate the new work conditions and guide other teammates towards shared goals. An important characteristic of a leader at this stage was to be open-minded to allow for the required changes to take effect.

b) *Normalisation phase*

This phase is referred to as the normalisation phase because, from the analysis, it was expressed that after some time, leaders, and team members became accustomed to the newly established approach to work. The new process of leading virtually became the “new normal”, and everyone began to learn the new virtual condition of work, as explained by some participants:

But perhaps at the end of 2021, we had seen it all and were now trying to get back to some normality in 22, so things sort of started to even out of burden, settle down, and the academics also knew what was expected. (Participant G)

Over time, of course, the challenges were diminishing because everybody was getting used to it, and we were better off as time moved on because everybody was getting used to what we were supposed to be doing. (Participant F)

After a turbulent start, UKZN leaders managed to handle this situation and established the “new normal”, which team members became accustomed to in the following year.

c) *Stability phase*

Participants expressed that in the third year of leading virtually, the “new normal” was now referred to as the norm, as work became stable and smooth. During this phase, all parties knew what to expect and how to manage change and uncertainty in the virtual work environment. Some of the participants expressed this when they said:

Through no conscious effort, we have improved, and things are operating more smoothly now. I think that the uncertainty that we had in the initial period have become the new normal so now everybody's sort of on the same page. (Participant H)

Like anything, you become more proficient over time and more able to handle the situation. (Participant M)

The above statements suggested that in the stability phase, participants still faced some challenges; however, they were comprehensible and manageable. During this phase, leaders were required to be adaptive, as the change was constant.

4.2.4.3 *Virtual leadership continuity*

Participants were asked if they would like to continue leading virtually after the COVID-19 pandemic. From the interview analysis, the sub-themes that emerged were preferences for contact leadership, the continuation of virtual work, and a hybrid approach, as illustrated in Figure 4.17 below.

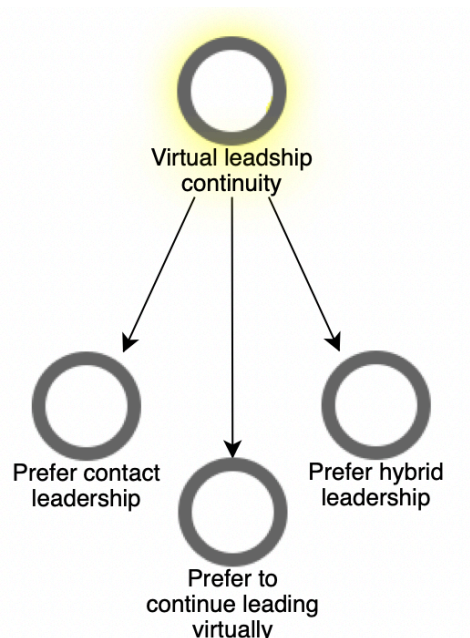


Figure 4.17: Sub-theme: Virtual leadership continuity

Two participants who indicated a preference to return to contact leadership indicated the following:

I don't think virtual leadership is the best way of leading. Even though we did it, I still prefer the contact. We probably will revert to the partial virtual meetings we used to have because we are based across two campuses, so we will still use video conferencing during the meetings and things like that... I like to just stop in someone's office to ask them a question. So, contact is very important for me. (Participant G)

I think if you had to ask me before the COVID-19 pandemic, I would have said I prefer to work from home, but after having done it, I don't think I prefer working from home. (Participant C)

Two participants who expressed a preference to continue leading virtually said:

Yes, I would like to continue leading virtually, but I don't think that is my decision as a leader of a unit. I think it will be a university decision. (Participant I)

Yes, I would like to continue to lead teams virtually even if everything becomes normal. I would because sharing information becomes so easy if everyone else is part of the team and knows how to use technologies. It saved us a lot of money which is what our leadership role has to do. It makes organising things so super easy. For instance, if we had to invite people from different parts of the world before the pandemic, it used to cost thousands of Rands, but now we can just pay the person an honorarium to present, motivate staff, and participate in our events. I think technology made the world look very small and made things happen quite quickly. (Participant A)

Most of the participants indicated a preference for a blend of virtual and contact leadership, as expressed by the following participants:

If it means either, or I'll say no, I would prefer a hybrid model where you give individuals the flexibility. The old model of having people in the office all the time is dead and gone, and we have to accept the new reality of giving people the flexibility of working from wherever they are comfortable working. What we would require is to define more clearly roles, responsibilities, strategy, targets, deliverables and outcomes. When you define that clearly, the vision is clear, and it doesn't matter where people work. But I would like the experience of having people around a boardroom table at least periodically, once a fortnight possibly or more often, if possible. (Participant E)

"I think we have proved that we can run things virtually. Based on all the challenges mentioned earlier, some things will work better face-to-face, such as the intangibles like

Using the word tree tool to explore the word “hybrid”, as illustrated in Figure 4.19, demonstrated the frequent mention of the need for a hybrid approach for future work arrangements.

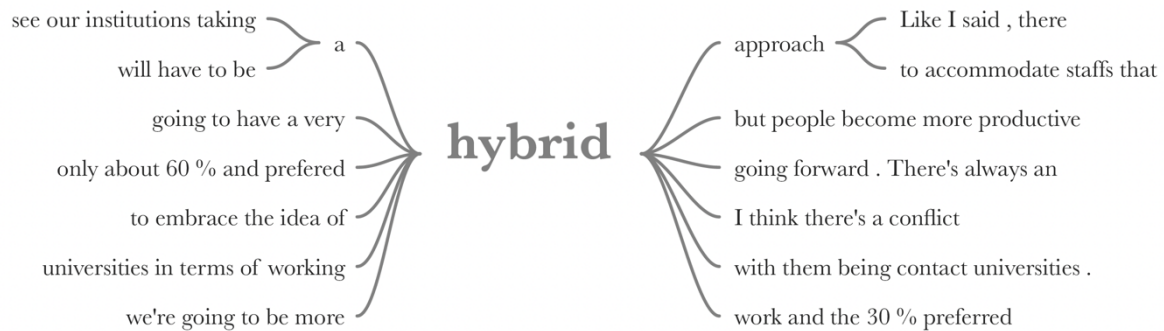


Figure 4.19: Word tree indicating participants’ preference for a hybrid approach

Participants thought that the era of fully physical work is over and that organisations should take advantage of the resources and experience gained from the pre- and post-COVID-19 pandemic periods to establish hybrid work arrangements that leverage the benefits of the physical and virtual mode of working. The following are some of the participants’ explanations.

I think that one needs to find a balance. A balance between the virtual platform, as well as face-to-face contact. Face-to-face is important for human interaction, building relationships, collaboration, etc. I would like to see a blended approach, where we have a combination of the virtual platform, as well as the face-to-face contact. (Participant K)

I have read in the literature that people are much more productive working from home than working from the office, and I think that's why some companies now are even thinking of implementing dual systems of working, where people will be expected to be in the office, maybe for certain days during the week and then spend the rest of the week, working from home because it has been found that there's much productivity from home, rather than from the office but I don't think that the university is going to adopt that kind of working soon. (Participant I)

The above narratives revealed that participants supported a hybrid work arrangement or a blended approach that leverages the benefit of physical work arrangements, such as social engagement, and virtual work arrangements, such as higher productivity and flexibility.

4.3 Chapter Summary

This chapter presented the findings from the analysis of the interviews while addressing the objectives of the study. Participants used participatory and collaborative leadership styles as virtual leaders. Some of the attributes of virtual leaders that were identified included trust, empathy, good communication, intentional inclusion, self-confidence and leverage collective strength. Participants faced different challenges while leading virtually, which were categorised into bottom-up, top-down, individual, technical, and structural challenges. Participants indicated that they had improved their digital competency, organised the training of subordinates, facilitated virtual platform setup and accessed institutional support to enable them to lead effectively. Finally, participants expressed different experiences as virtual leaders. Most of the participants felt positive, while a few felt negative. Participants believed that future work arrangements should be hybrid to support both physical and virtual work conditions. The next chapter presents a discussion of the study findings.

CHAPTER 5: DISCUSSION OF FINDINGS

5.1 Introduction

The preceding chapter presented the findings from the data analysis process. In this chapter, a discussion of the findings of the study is presented. The discussion references the extant literature that corroborates the study findings. This chapter is structured in the same manner as Chapter 4, according to the main themes and sub-themes that were generated in addressing the objectives of the study. The study objectives are highlighted before a discussion of the findings is presented. The layout of this chapter is illustrated in Figure 5.1 below.

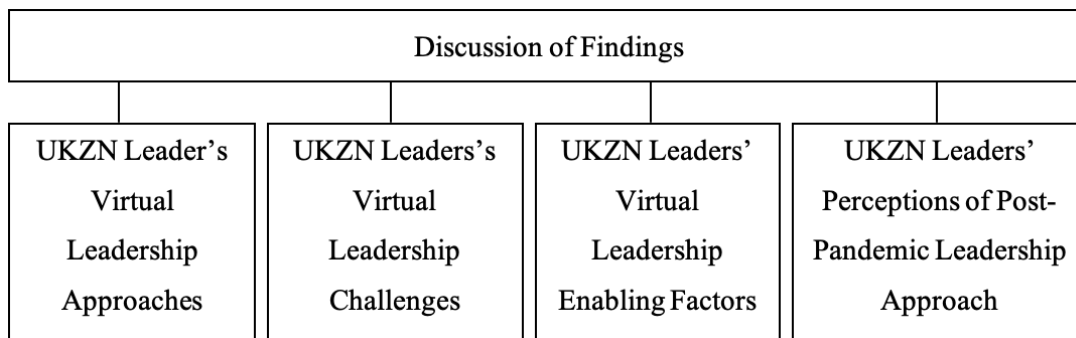


Figure 5.1: Layout of Chapter 5

5.2 Virtual leadership approaches

The first objective of the study was to examine the leadership approaches employed by UKZN leaders in leading their teams virtually during the COVID-19 pandemic. The leadership approaches of the participants of the study were investigated to conceptualise their virtual leadership style, behaviours, and attributes before exploring their virtual leadership experiences. Participants subscribed to the participatory and collaborative leadership styles, and some of the attributes and behaviours exhibited were trust, empathy, good communication, consultation, self-confidence, valuing team members and leveraging collective strength. These are discussed in the following sections. Figure 5.2 below illustrates the outcome of the first objective, which was to examine UKZN leaders' virtual leadership approaches.

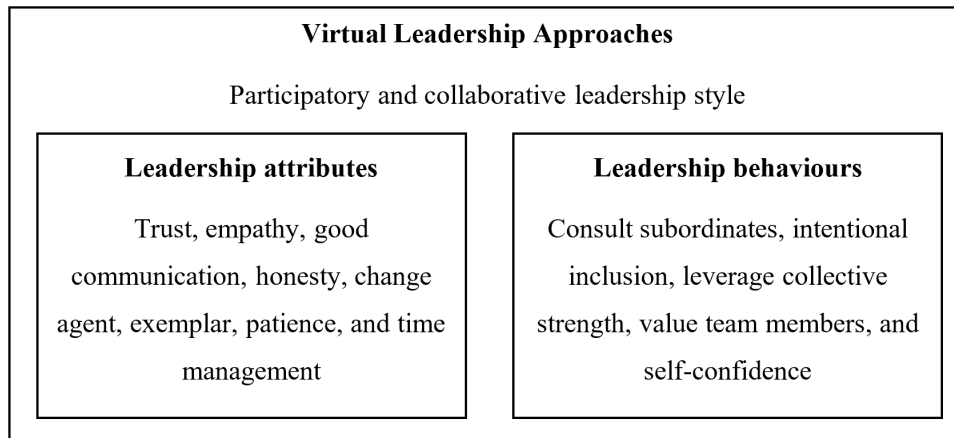


Figure 5.2: Virtual leadership approaches

5.2.1 Virtual leadership style

Participants adopted their previously established face-to-face leadership style when transitioning to virtual leadership. However, they hardened their leadership attributes and behaviours to be more intentional and effective when dealing with subordinates virtually. This finding is consistent with Bernhardsson *et al.* (2021), who found that leaders adapt their traditional leadership style when transitioning from face-to-face to virtual leadership when investigating leaders' transition from face-to-face to virtual work in a distribution center company in Sweden during the pandemic. Bernhardsson *et al.* (2021) further indicated that in adapting leadership style, leaders make changes to their attributes and behaviours to become more effective. Most participants subscribed to participatory and collaborative leadership styles before and during the COVID-19 pandemic, which is discussed below.

5.2.1.1 Collaborative virtual leadership style

Participants in the study indicated that as collaborative virtual leaders, they promoted teamwork by capitalising on the strength of the collective to achieve shared goals and objectives using technology. Some features of a collaborative leader, as identified by participants, were the ability to be consultative, transparent, and collaborative. This finding is supported by Marshall *et al.* (2020), who found collaborative leadership to be a suitable approach in a crisis after critically assessing education leadership in Barbados and Canada during the COVID-19 pandemic. In these countries, higher education leaders worked collaboratively in committees and drew from the strength of other colleagues to make effective decisions during the pandemic (Marshall *et al.*, 2020).

5.2.1.2 Participatory virtual leadership style

Participants in the study indicated that as participatory virtual leaders, they promoted intentional inclusion by involving all team members and ensuring all contributions and voices were heard through technology. Some of the features of a participatory leader, as identified by participants, were dialogue,

inclusiveness, and democracy. This conforms with Liu (2022), who found participatory leadership to be a conducive leadership style for virtual team development after using a multi-agent simulation model to assess the conduciveness of participatory leadership in the construction of virtual teams. Liu (2022) affirms that a participatory leadership style features democratic, inclusive, and development management modes, which allows employees to develop and increases their sense of responsibility and freedom to participate in team activities. However, the level of democracy practised by a participatory leader needs to be controlled because a highly democratic space provides minimal support for employees, which increases anxiety levels and reduces room for personal development (Li Yi, 2022).

5.2.2 Virtual leadership attributes

Empathy, trust, and good communication were key attributes exhibited by study participants to lead effectively and virtually during the COVID-19 pandemic. Other attributes that were identified were honesty, being an agent for change, time management, patience, and leading by example. These attributes are explained further below.

5.2.2.1 Trust

The element of trust emerged strongly as an important attribute of a virtual leader in the study. Participants indicated a need for trust in their subordinates to meet expectations and keep to their responsibilities because they had no direct access to them. They explained that in as much as subordinates were trusted, however, they had to devise monitoring mechanisms such as the submission of regular progress reports to measure the progress of the work being done. This finding resonates with many researchers (De Jong & Dirks, 2012; Ford *et al.*, 2017; Liu, 2022) who report trust to be an essential element of a successful virtual team.

Ford *et al.* (2017), after a review of the literature on the strategies for building effective virtual teams, confirmed that trust is required between the virtual leader and team members and amongst members of a virtual team to be effective and productive. Liu (2022) agrees that trust in a virtual team is essential but must be controlled, as excessive trust levels can burden team members and result in emotional exhaustion and reduced performance. De Jong and Dirks (2012) explain that it is critical to consider the dispersion between the level of trust and monitoring because a high level of job autonomy with reduced regulation is detrimental to performance due to social passivity.

5.2.2.2 Empathy

Empathy was identified in the study to be an important attribute of a virtual leader, especially in situations such as the COVID-19 pandemic. Participants were required to become more compassionate, caring, understanding, and flexible towards subordinates because they were experiencing multiple works and health-related issues such as anxiety, fear, depression, and illness. In expressing this

empathy, participants regularly checked in on subordinates to discuss work and family-related issues to ease their anxiety and stress.

This finding is related to Yue *et al.* (2022), who report that empathetic leadership communication positively correlated with affective subordinate trust after surveying 417 US-based employees in examining the influence of empathetic leadership communication on employee turnover. The authors explain that leaders who are respectful, encouraging, supportive and compassionate towards their subordinates during challenging times build strong emotional and personal bonds with subordinates. Yue *et al.* (2022) further explain that leaders who express empathy, compassion, and appreciative concern for well-being, and discuss work and nonwork-related issues with subordinates, contribute positively to subordinates' psychological safety (Edmondson & Lei, 2014), job satisfaction and increased performance (Mukhtar & Tahir, 2022). An empathetic leader maintains a positive interpersonal relationship with subordinates who, in turn, trust and commit to organisational changes during difficult times such as the COVID-19 pandemic (Lawton-Misra & Pretorius, 2021; Men, Yue & Liu, 2020).

5.2.2.3 *Good communication*

Good communication is an essential attribute of an effective virtual leader. Participants in the study were required to improve their written and verbal communication skills to effectively communicate with subordinates via emails or synchronous video or audio calls. Virtual leaders should be clear, positive, open, and timely with their online communication as it forms the main platform for providing instructions or information to subordinates. This finding is similar to that of Fernandez and Shaw (2020), who, after assessing the approaches used by Academic leaders in the US to migrate their teaching online during the COVID-19 pandemic, indicated that leaders must ensure their communication with subordinates is clear, timely, and transparent during crises, as it provides subordinates with reassurance and comfort regarding the ambiguous and complex situation they are experiencing.

The authors further affirm that it is not only the quality of the message communicated that is important, but the medium of communication is critical, as different media vary in richness (Fernandez & Shaw, 2020). In Barbados, the leaders in the HEIs frequently communicated with staff and students via various channels (Marshall *et al.*, 2020). They had several video conferencing sessions and sent regular emails to maintain stakeholder awareness of the situation and the implications for the university's strategy and operations (Marshall *et al.*, 2020).

5.2.2.4 *Other attributes*

Other attributes of a virtual leader described in the study were honesty, being an agent for change, time management, exemplar, patience, and time management. These attributes are highlighted below according to the findings of the study.

a) Honesty

A virtual leader must be sincere and truthful when dealing with subordinates in a complex and uncertain situation such as the COVID-19 pandemic. According to participants of the study, being honest earns a virtual leader their subordinates' respect and trust. This finding corroborates that of Pramjeeth and Mutambara (2022), who, after surveying 113 state-owned enterprise leaders in South Africa on the essential qualities of a leader during the COVID-19 pandemic, mentions that honesty is one of the essential attributes of leaders during the COVID-19 pandemic, as it increases the integrity of the leader and trust between leaders and subordinates, which subsequently fosters change.

b) Change agent

Participants explained that as virtual leaders during the COVID-19 pandemic, they served as agents of change in leading their team's transformation. It is the responsibility of a virtual leader to promote and advocate the method or approach of work and encourage colleagues to accept change. This finding is similar to the study of Schwarzmüller *et al.* (2018), where E-leaders were expected to identify the needs and changes of their virtual team members and promote the expected transformation. After surveying 49 recognised digitisation experts, Schwarzmüller *et al.* (2018) concluded that an E-leader must be innovative and flexible to adapt to new technologies. Pramjeeth and Mutambara (2022), after surveying 113 state-owned enterprise leaders in South Africa on the essential qualities of a leader during the COVID-19 pandemic, concur that leaders must be agents for change during VUCA situations to accelerate change among team members.

c) Exemplar

The findings of the study show that a virtual leader must serve as an exemplar to influence and encourage subordinates to adopt organisational changes, particularly in situations such as the COVID-19 pandemic. Participants attended training and workshops required of their subordinates to influence them to also avail themselves of the sessions. This finding conforms with that of Schraeder, Tears and Jordan (2005) who indicate that exemplary leadership is an effective method to promote organisational change. In the context of the COVID-19 pandemic, Bojadjev and Vaneva (2021) recommend that leaders serve a role in promoting the change expected from subordinates, which may include communication approaches and operational methodology.

d) Patience

Participants in the study indicated that they learnt to be patient in attending to and resolving the issues of their subordinates, as at the beginning of the transition, subordinates experienced a learning phase and required time to adapt to change, which delayed response time and deliverables. This finding resonates with that of Marshall *et al.* (2020) regarding leaders preparing to be comfortable with subordinates making mistakes and asking many questions during a transition phase. Leaders are required to be resilient and ready to endure this process with them.

e) Time management

According to participants of the study, a virtual leader should learn how to effectively manage time, as the convenience of virtual meetings led to many engagements, training sessions, workshops, and meetings during the transition to working virtually. They explained that at times, some of their meetings conflicted if a digital scheduler or diary application was not used. In addition, they indicated that it was easy for an online meeting to continue unexpectedly over its allotted time if not well managed. This finding concurs with those of Newman and Ford (2021) and Goldsby *et al.* (2020), who indicate that time is scarce and leaders must devise a means to manage their workload within the limited time available, considering varying deliverable periods.

Newman and Ford (2021) identify time management as an essential skill to be upgraded by a virtual leader during the COVID-19 pandemic as their workload became compounded by the drastic change needed to transition operations to the virtual environment, the series of necessary consultations and subordinate engagement. Goldsby *et al.* (2020), while investigating time pressure in a healthcare context, explain that nurse leaders should use time management skills such as prioritisation, checklists, and sequencing of activities to prevent increased anxiety, negative emotions, and emotional exhaustion among subordinates.

5.2.3 Virtual leadership behaviours

UKZN leaders exhibited specific behaviours that enhanced their quality as virtual leaders during the COVID-19 pandemic. These behaviours, which include consulting subordinates, intentional inclusion, leveraging collective strength, valuing team members, and self-confidence, are explained below.

5.2.3.1 Consult subordinates

Participants in the study indicated that they constantly consulted with their subordinates online during the transition from a face-to-face work arrangement to a virtual one. They explained that consultation was a part of their participatory leadership style and was facilitated through technology during the COVID-19 pandemic. During online consultation sessions, participants brainstormed ideas and discussed possibilities and options towards achieving their shared goals during the change. Participants

affirmed that consulting with subordinates helped in increasing engagement and support from subordinates, which contributed to the success of the team. This finding conforms with the employee-centred strategy proposed by Tran (2022), where leaders should seek employee input regarding needs and possible responses during a crisis.

Using this strategy, Tran, Hardie and Cunningham (2020) presented how the school district overseer in Sheffield met with school principals to develop a COVID-19 response framework. The principals then presented the framework to the teachers in the school and gathered feedback for the overseer to finalise the framework for implementation. Tran *et al.* (2020) further identified media of subordinate consultation and engagement, which included hosting of faculty advisory meetings, question and answer sessions, and surveys that were used in interrogating developed COVID-19 response guidelines.

5.2.3.2 *Intentional inclusion*

Intentional inclusion was identified in the study as one of the behaviours required of virtual leaders to exhibit to maximise their team's strength when leading virtually. Participants were democratic by ensuring all team members were involved when making decisions surrounding shared goals. They explained that during an online engagement, they called upon team members to contribute to discussions to improve inclusivity and participation in virtual meetings. This finding aligns with the view of Fernandez and Shaw (2020), who indicate that leaders who connect with members at all levels and involve them in planning and decision-making during a crisis are more well-trusted, and their decisions are respected and adhered to.

Using an inclusive leadership framework initially developed by Fournier, Scott and Scott (2016), these authors (Fournier, Scott & Scott, 2020) examined the use of inclusionary leadership by a Canadian principal in a rural school to develop innovative pedagogy solutions that catered for all students amidst COVID-19 challenges. According to Fournier *et al.* (2020), the deliberate inclusion of all stakeholders in solving problems fosters innovation and increases engagement and support towards achieving shared goals.

5.2.3.3 *Leverage collective strength*

Adopting the participatory leadership style in a virtual setting, participants leveraged the strength of the collective in achieving team objectives and goals. They explained that teamwork was important to lead effectively online as they gathered individual contributions and worked collectively towards change undergone during the COVID-19 pandemic. This finding is in agreement with that of Fernandez and Shaw (2020), who assessing the approaches used by Academic leaders in the US to migrate teaching online during the COVID-19 pandemic reported that Academic leaders should distribute power amongst other team members to improve the quality of decision-making during a time of crisis such as the

COVID-19 pandemic. Berjaoui and Karami-Akkary (2020) also affirm that in a complex and uncertain context such as the COVID-19 pandemic, leaders should distribute leadership responsibilities amongst subordinates to get a broader perspective of resolving challenges or a more holistic solution to problems faced by the team (Archer-Kuhn *et al.*, 2020).

5.2.3.4 *Value team members*

The study's findings revealed that participants learnt to acknowledge, respect, and appreciate team members' contributions in the virtual environment to foster a culture of sharing and encourage continuous team participation. They explained that virtual leaders could encourage the best work from their subordinates by respecting, appreciating, and acknowledging their work and the conditions under which it was performed. This finding aligns with the talent-centred approach proposed by Tran (2022), where leaders are advised to respect employees and appreciate their effort in managing change and crisis by sending out appreciation messages via email or live sessions with employees. Respecting employees solidifies the loyalty and commitment between subordinates and leaders (Reyes *et al.*, 2021; Tran *et al.*, 2020).

5.2.3.5 *Self-confidence*

According to participants of the study, virtual leaders should behave confidently in their actions and decisions during uncertain and complex situations such as the COVID-19 pandemic. Being confident provides a leader with the strength and ability required to motivate other teammates towards delivering as expected. This resonates with the study of Axelrod (2017), who identified the role of self-confidence in a leader's behaviour. According to Axelrod (2017), confident leaders have trust in their ability to achieve goals and objectives even when the chances of failure are high.

Leaders should believe in themselves to motivate and direct subordinates towards shared goals during times of crisis. Having confidence as a leader engenders trust and respect from subordinates because they take risks, are not afraid to challenge the status quo, are accountable, and are persistent in achieving set goals (Axelrod, 2017).

5.3 **Virtual leadership challenges**

The second objective of the study was to identify the challenges faced by UKZN leaders as virtual leaders during the COVID-19 pandemic. The challenges identified were categorised as bottom-up, personal, top-down, technical, and structural. These challenges are illustrated in Figure 5.3.

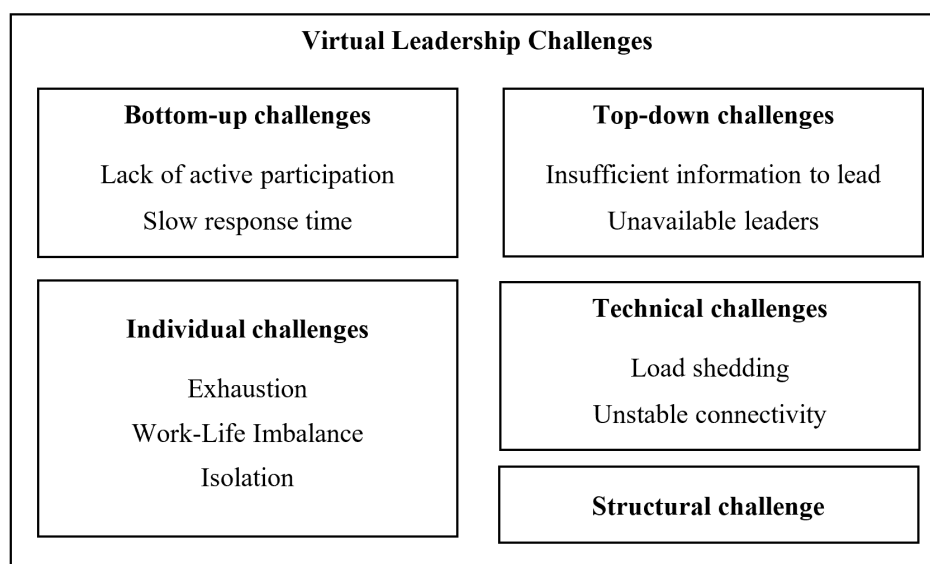


Figure 5.3: Virtual leadership challenges

5.3.1 Bottom-up challenges

Bottom-up challenges represent subordinate-driven issues and problems participants faced while leading virtually. Participants identified challenges faced when dealing with subordinates in the COVID-19 pandemic virtual settings related to staff participation and a slow response rate. These challenges are discussed further below.

5.3.1.1 Lack of active staff participation

Participants faced inconsistent levels of staff participation when leading virtually. They reported that while some staff members were readily available and active, some were not. The inactive staff members hid behind the virtual veil, provided minimal contribution during discussions, and prioritised personal issues over work. Some junior staff members struggled with being able to work from home and believed that they were on paid holiday. Participants had to closely monitor subordinates and call upon them during sessions to ensure that all members participated, which was noted to be stressful and exhausting. This finding was also reported by Vallin (2020), who found a lack of active participation to be a challenge in leading large global virtual teams. One approach to increase the participation level in a global team is to break a team into smaller teams to reduce the chances of team members hiding behind the technology veil (Vallin, 2020). Nydegger and Nydegger (2010) note that not all team members of a virtual team are active, as some see it as an opportunity to hide from work.

5.3.1.2 Slow response time

Participants struggled with the response time of some of their team members, who were often delayed in responding to emails when working from home, which impacted operations and client satisfaction.

They explained that this slow response had a negative impact on deliverables as most of their work was interrelated and interdependent. Some participants found it tiring to convince subordinates to respond to their emails timeously. This finding conforms with that of Stephanie (2022), who indicates that a slow response rate from team members is a common challenge that can be anticipated by leaders when leading a virtual team (Kaplan *et al.*, 2018). Stephanie (2022) proposes the use of strict deadlines, milestones, and semi-regular meetings to obtain regular updates on tasks and operations. Newman and Ford (2021) affirm that responsiveness from both leaders and team members is essential to the success of a virtual team.

5.3.2 *Top-down challenges*

Top-down challenges represent issues inflicted by leadership at a higher level than that of the participants of the study. Participants explained that the transition was challenging as a result of a lack of information from higher management to lead their team, as everyone was new to the remote mode of operation. The top-down challenges identified by participants were insufficient information to lead and unavailable leaders, which are discussed further below.

5.3.2.1 *Insufficient information to lead*

Participants complained of having insufficient information at hand to lead effectively during the COVID-19 pandemic. They explained that they often lacked adequate guidance or information from higher leadership, which was a frustrating experience because it made them look incapable, as they could not provide their subordinates with sufficient information or responses to their queries. The extent of this challenge diminished over time as participants learned how to navigate the new work condition.

This finding is in line with that of Marshall *et al.* (2020), regarding the need for vision from top leaders during a change situation such as the switch to remote teaching during the COVID-19 pandemic. Marshall *et al.* (2020) indicate that leaders must provide a clear direction and guidelines on change modalities and must be available to answer stakeholders' questions. Higher management members unable to do this may lead to stakeholders struggling to navigate through the confusing and difficult change.

5.3.2.2 *Unavailable leaders*

Some participants of the study expressed disappointment in their leaders. They indicated that their leaders were not readily available during crucial moments to resolve issues faced while leading virtually, which represented a significant challenge. This finding resonates with the claim of Marshall *et al.* (2020) that during a time of change or crisis, leaders must be visible and available to give subordinates clear directions.

5.3.3 *Individual challenges*

Individual challenges represent issues and problems personally faced by participants while leading virtually during the COVID-19 pandemic. Participants indicated that they were exhausted, struggled with balancing work and personal life and felt isolated, especially at the beginning of the COVID-19 pandemic. These individual challenges are discussed further below.

5.3.3.1 *Exhaustion*

Participants in the study felt exhausted and overwhelmed, particularly at the beginning of the COVID-19 pandemic because of the sudden change in the mode of operation. They reported that at the beginning of the transition, they had to make themselves readily available for several exhaustive online meetings. Exhaustion is also identified by Marshall *et al.* (2020) as a known challenge that leaders can expect to experience during times of crisis. The authors indicate that during such times, leaders are often overwhelmed as they are bombarded with questions, criticisms, and comments from various stakeholders in combination with the uncertainty and ambiguity of the situation (Marshall *et al.*, 2020). Koehn (2020) agrees that a crisis is exhausting and takes a toll on leaders, who must be determined and strong, as their followers rely on their energy and emotion to be hopeful of the future.

5.3.3.2 *Work-life imbalance*

Some participants struggled to balance their work and personal life as it was not easy to be strict about work and home hours whilst working from home. They indicated that it was easy to continue to work after work hours had ended. At times, meetings stretched into the evenings or were scheduled for late in the evening, affecting their personal and family time and adding to their stress. Some had to consciously leave their workstation at closing time to focus on personal and family matters. This finding resonates with that of Manse and Holmberg (2021), where work-life balance was found to be a major challenge for leaders and subordinates in a global virtual team during the COVID-19 pandemic.

This was because of working from home with many related distractions, especially for those who had no private space in their houses in which to set up restricted workstations. However, the same participants in the abovementioned study did not find a work-life balance to be a challenge when they were working virtually before the COVID-19 pandemic because they were working in remote offices in their regions or countries and could distinguish and separate work time from other personal time (Manse & Holmberg, 2021).

5.3.3.3 *Isolation*

Isolation was identified to be a significant challenge for participants when leading virtually as they lacked social engagement while working from home. They indicated that being unable to meet colleagues or subordinates freely for discussions contributed to anxiety. This is similar to the findings

of Newman and Ford (2021) and Manse and Holmberg (2021), who identify isolation as a common challenge among both leaders and team members. Newman and Ford (2021) reported isolation to be common amongst workers who lived alone, while Manse and Holmberg (2021) found isolation more challenging among leaders and team members who lived in areas with stricter lockdown levels during the COVID-19 pandemic. This isolation may be managed by scheduling social discussions with subordinates before or after formal meetings to informally converse about activities happening in their household, families, or global topics.

5.3.4 Technical challenges

Technical challenges represent technical issues that hindered the smooth transition and operations of working virtually, as experienced by participants during the COVID-19 pandemic. The technical challenges identified by participants were load shedding and unstable connectivity. These challenges are discussed further below.

5.3.4.1 Load shedding

Participants mentioned that frequent load shedding experienced nationwide hindered remote work and virtual leadership. The loss of power affected internet connectivity, and some laptop batteries could not last sufficiently long to continue with uninterrupted work while their electricity was switched off. Hence, there were frequent interruptions during online meetings or delays in deliverables. In addition, subordinates used load shedding as an excuse for not delivering timeously. Participants reported obtaining battery-powered routers and laptop power banks for subordinates to reduce the challenge brought about by load shedding. This finding is corroborated by Prabashini (2021), who found load shedding to hinder homework strategies by affecting work productivity during the COVID-19 pandemic in South Africa. Employees in South Africa were noted to have struggled with increasing load shedding, which became frustrating as people were forced to access alternative power supplies such as power banks and inverters (Nadine, 2022). Furthermore, the interrupted power supply affects internet power stations, leading to poor internet connectivity (Prabashini, 2021).

5.3.4.2 Unstable connectivity

Unstable network connectivity was another issue faced by participants as virtual leaders. They indicated that some subordinates struggled with internet connection because of location, which hindered their workflow, response time, and deliverables. It also served as an excuse for subordinates who did not want to engage and work, which was a frustrating experience. This finding is similar to that of Manse and Holmberg (2021), where internet connectivity was identified as a challenge for leaders and subordinates when working from home during the COVID-19 pandemic. Manse and Holmberg (2021) indicated that the participants of their study, mainly Americans and Swedish, did not have internet

connectivity issues before the COVID-19 pandemic because they had dedicated Internet access from their office workstations.

5.3.5 Structural challenge

Participants identified governance-related issues as stumbling blocks to effective virtual leadership during the COVID-19 pandemic. They mentioned that the lack of a virtual work structure with defined procedures, policies, and guidelines was challenging as they had no measures or standards upon which to fall back or refer subordinates when issues arose. They further indicated that had the university been a traditionally virtual institution, governance-related issues would be minimal. This finding supports the recommendation of Liu (2022), who, after surveying 243 and 318 people from the US and Korea, respectively, on the effect of national cultures on national advancement using the case of E-leadership indicated that organisations need to establish rules, tighten supervision, and promote innovation and creativity by leveraging the opportunities that accompany the virtual era.

Liu (2022) further recommends that organisations continuously develop corresponding regulations as teams develop to restrain and prevent an excess of autonomy. Furthermore, Marshall *et al.* (2020) note the importance of having a defined structure for achieving work that would have been done in a face-to-face operation in the virtual environment using the example of student integrity as it relates to online assessment.

5.4 Virtual leadership enabling factors

The third objective of the study was to determine the factors that enabled participants to lead virtually during the COVID-19 pandemic. Four main virtual leadership enablers were identified by participants: improving digital competency, facilitating virtual platforms set up, organising the training of subordinates, and institutional support initiatives. These enablers are illustrated in Figure 5.4 below.

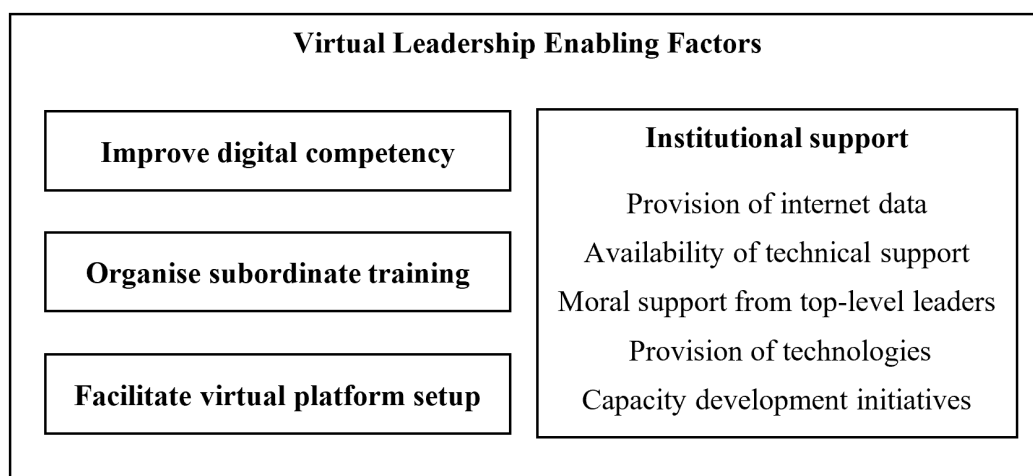


Figure 5.4: Virtual leadership enabling factors

5.4.1 *Improve digital competency*

The study's findings show that a virtual leader must be technologically competent to lead effectively. Participants mentioned that they had to improve their digital competency, especially in the use of online technologies for facilitating meetings. Being technologically competent enables virtual leaders to advise on subordinates' technical issues or answer technology-related questions, boosting their confidence and gaining the respect of their team.

This finding is in line with that of Alfehaid and Mohamed (2019), who suggest that E-leaders develop their technical competencies to facilitate, coordinate, and monitor activities in the virtual environment through novel technologies that foster effectiveness and efficiency. Pramjeeth and Mutambara (2022), who, after surveying 113 state-owned enterprise leaders in South Africa on the essential qualities of a leader during the COVID-19 pandemic, indicated that in a crisis such as the COVID-19 pandemic, leaders must constantly up and reskill themselves to deal with the change required to continue working effectively.

5.4.2 *Facilitate virtual platform setup*

The study suggested that a virtual leader should be involved in the decision-making of which online platform and applications is to be used by the team. According to participants of the study, the facilitation of the online platform by the virtual leader brings about governance and orderliness in the team as there are many applications with similar features available, which can cause disorganisation and confusion for the team if not agreed upon. Participants indicated that they were involved in the set-up of the individual platforms used for communicating and managing their team virtually.

This finding conforms with that of Fernandez and Shaw (2020), who, after assessing the approaches used by Academic leaders in the US to migrate their teaching online during the COVID-19 pandemic, indicated that leaders indicate that leaders must be involved in selecting online platforms to use in a virtual setting and should consider stakeholder preferences when deciding on the virtual application or communication medium. For example, in the study of Fernandez and Shaw (2020), it was found that staff members preferred email communication, while students preferred communication via various social media applications.

5.4.3 *Organise the training of subordinates*

The study shows that a virtual leader should organise the necessary technical and soft-skills training required for team members to work effectively and efficiently. Participants indicated that at the outset of the COVID-19 pandemic, they performed a needs analysis of their subordinates to identify the training required and arranged for them to be trained. They further explained that they ensured that their subordinates had the devices required to work from home. Similarly, in the study of Agarwal *et al.*

(2020), virtual team members were required to be technologically competent as they spent most of their time and engagement using technology to work. Thambusamy and Bekiroğulları (2020) mention that it is the role of virtual leaders to identify the needs and challenges of team members and ensure that they receive the required training and tools to improve their skillset and competencies that enable them to work effectively and efficiently in a virtual setting.

5.4.4 Institutional support

It was identified that institutional support was a major enabler in the successful transition from face-to-face to virtual work arrangements. Participants indicated that the support received from their institution helped them and their team to navigate changes effectively when they began working from home. The institutional support provided by UKZN, as identified by participants, included providing internet data, a technical support line, top-level leader moral support, provisioning of technologies, and capacity development initiatives, which are discussed further below.

5.4.4.1 Providing Internet data

Participants indicated that the university provided a data router and monthly subscription for them and their team members when they were asked to work from home. This served as a key enabler to the virtual work arrangement as online communication and work depend upon internet data. This finding corroborates the recommendation of Asio *et al.* (2021) that institutions and government provide pocket Wi-Fi and free data access to students and staff in an institution in the Philippines, after identifying access to the internet as a major barrier to online teaching and learning. Faturoti (2022) identifies strategic partnership as one of the strategies used by institutions and government agencies in Africa in managing the challenges of internet access faced during the COVID-19 pandemic online learning and remote work period. The partnership between institutions, government agencies, and internet service providers results in discounted rates for students and staff and zero ratings on public educational resources.

5.4.4.2 Availability of a technical support line

Participants noted that various technical support lines were available to assist them with technology-related issues. The availability of technical support on different channels ensured that staff and students' computer and software-related issues were resolved from home whenever required. The support line was available via Whatsapp, cellphone and scheduled walk-in sessions. This finding is supported by the study of Morrison-Smith and Ruiz (2020), where after conducting a literature review on the challenges and barriers in virtual teams, it was identified that virtual work failed without effective technical support. Roache, Rowe-Holder and Muschette (2020) recommend that virtual leaders provide technical support for their team to resolve any technology issues.

5.4.4.3 *Moral support from top-level leaders*

Participants of the study indicated that they received moral support and praise from their leaders, which encouraged them to persevere amidst the challenges they faced. The support from top-level leaders provided team members with the strength required to keep working during the challenging situation of the COVID-19 pandemic. This finding is supported by Tran *et al.* (2020), who suggest that humanitarian support from top leaders has motivational and encouraging effects on employees during the COVID-19 pandemic virtual work, based on the talent-centered education leadership approach. One of the approaches used by top leaders to show support, as mentioned in the study of Tran *et al.* (2020), is attending virtual meetings at random to monitor the team's well-being, express appreciation for their work, and encourage them to persevere.

5.4.4.4 *Provision of technology*

Another institutional support identified by participants as an enabler of virtual leadership was the provisioning of technology required to work from home. The provisioning of essential technology, such as laptops, communication devices, and online software facilitated the transition to an online and homework environment. The technology that was identified is explained as follows:

a) *Hardware devices*

These include laptops, cameras, printers, headphones, and other mobile gadgets required to function effectively from home. This mirrors the recommendation of Rudnicka *et al.*, (2020) that employers provide hardware and other equipment, such as screens, chairs, and keyboards, for remote or hybrid workers to set up their home workspace for comfortable work conditions.

b) *Online software applications*

These are online applications such as Zoom, Microsoft package with Teams, SharePoint, and other proprietary apps for communication and information sharing. This finding conforms with the study of Tran *et al.* (2020), where online applications such as Screencastify, Zoom, and Google Classroom were made available to staff and students to enable online classrooms during the COVID-19 pandemic.

c) *Workflow management systems*

These are cloud-based custom applications used to streamline a process and automate tasks. These types of applications have incorporated approval features. This finding concurs with the study of Pramjeeth and Mutambara (2022), where after surveying 113 state-owned enterprise leaders in South Africa on the essential qualities of a leader during the COVID-19 pandemic, organisations were encouraged to develop and utilise technologies that streamlined their operations in situations such as the COVID-19 pandemic, as this increased performance, overall team efficiency, and effectiveness.

5.4.4.5 *Capacity development initiatives*

Participants identified different capacity development initiatives initiated and provided at college, school, and institution-wide levels, which aided in the online transition. This corresponds to the study of Marshall *et al.* (2020), where the management of Canadian and Barbadian institutions provided training for both staff and students to facilitate the transition from face-to-face to online teaching and learning. The capacity development initiatives identified in the study were online platform training, psychosocial workshops, and online facilitation training.

a) *Online platform training*

Participants and other staff members were trained to use online communication applications such as Zoom and Teams, which they used for online meetings and team engagement. This finding is in keeping with that of Tran *et al.* (2020), where administrative staff trained teachers on the use of synchronous and asynchronous applications for online teaching. Some applications used include Screencastify, Zoom, and Google classroom. This training on various information-sharing and communication platforms made transitioning to the virtual environment less stressful and more comfortable for teachers and students (Marshall *et al.*, 2020; Tran *et al.*, 2020).

b) *Psychosocial workshops*

UKZN hosted various workshops on stress management, emotional intelligence, and healthy lifestyle for leaders and their subordinates. These workshops helped them to better navigate the volatile and uncertain situation of the COVID-19 pandemic they were facing. This finding is in line with the study of Burgess *et al.* (2022), who, after exploring the well-being of research staff in different countries, identified the need for psychosocial support strategies for employees. Burgess *et al.* (2022) explained that employees experienced psychosocial problems such as job security, health issues, stress, and anxiety, which were exacerbated by the COVID-19 pandemic. Burgess *et al.* (2022) recommended that organisations develop training and support initiatives to educate staff on mental health risks, coping with anxiety, crisis and stress management, and emotional trauma to help employees to cope and be productive.

b) *Online event coordination*

Participants indicated that colleges and support units hosted a series of workshops regarding the setup, management, and running of live seminars, meetings and similar online events for leaders and administrators. These online events allowed leaders to set up and run online events effectively. This finding is supported by Rudnicka *et al.* (2020), who, after surveying 347 respondents in the United Kingdom on the challenges people face in managing digital self-control and work-life balance during the COVID-19 pandemic indicated that during the transition to remote work, organisations trained

employees in how to set up online meetings and established online meeting etiquette to manage the resulting challenges and barriers.

5.5 Perceptions of the post-pandemic leadership approach

The fourth objective of the study was to determine participants' perceptions of the post-COVID-19 pandemic leadership approach. As illustrated in Figure 5.5, the findings, which include UKZN leaders' virtual leadership experience, virtual leadership transition experience, intention to continue virtual leadership and perceptions of future work arrangement, are discussed in this section.

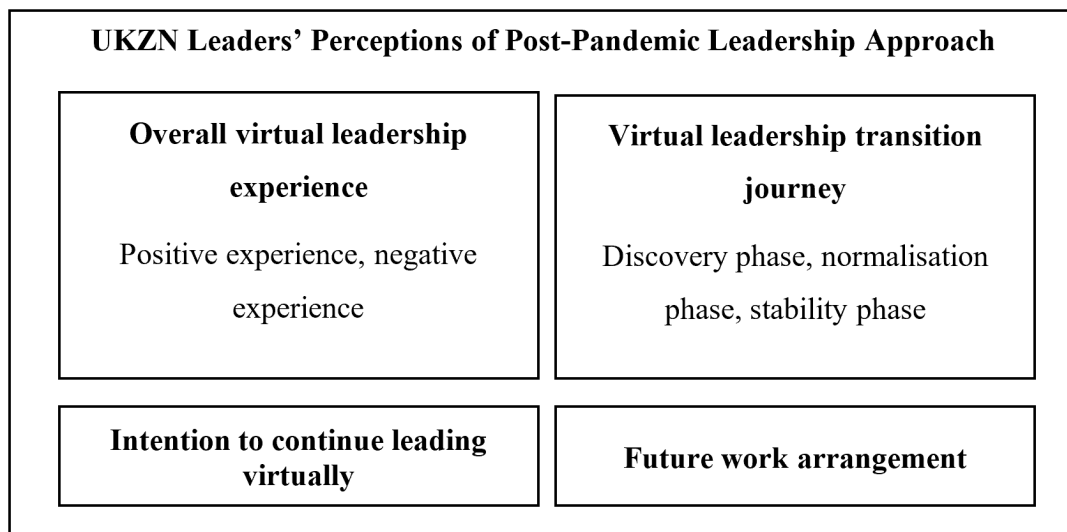


Figure 5.5: Perceptions of post-pandemic leadership approach

5.5.1 Overall virtual leadership experience

UKZN leaders who participated in the study expressed mixed feelings regarding their experience with virtual leadership. Some participants sounded positive, and others negative. This finding is supported by Bolisani *et al.* (2020), who surveyed 931 professional Italian people, which resulted in a mixed distribution of feelings about their virtual work experience during the COVID-19 pandemic. In the study of Bolisani *et al.* (2020), 29% reported negative feelings, 26% had positive feelings, and 45% felt neutral about their virtual work experience. These views are discussed further below.

5.5.1.1 Positive experiences

Most UKZN leaders who participated in the study expressed positive feelings about their virtual leadership experience. The reasons identified were as follows:

- They had an interesting learning experience, which included learning new leadership skills, approaches, and technology.
- They achieved more deliverables while leading virtually during the COVID-19 pandemic.

- It was excellent and fun as it saved time and cost and strengthened their team.

This finding is similar to the factors that contributed to the positive feelings in a study by Bolisani *et al.* (2020), where 931 professional Italian people were surveyed, which were being able to save commuting time, focus on work with fewer distractions, and feed on delicacies in the comfort of their homes. Similarly, in a study by Hilberath *et al.* (2020), three-quarters of respondents were at least as productive at their tasks, and half were better at collaborative tasks when working virtually than when working physically.

5.5.1.2 *Negative experience*

A few participants expressed negative feelings about their virtual leadership experience because it was stressful, exhaustive, and traumatic. This was for the following reasons:

- High level of uncertainty
- Job insecurity
- Stress from the drastic level of change required

This finding is similar to the factors that contributed to the negative feelings in the study of Bolisani *et al.* (2020), where 931 professional Italian people were surveyed, which were “technostress”, isolation, not being able to complete some tasks virtually and the inability to access physical equipment.

5.5.2 *Virtual leadership transition phases*

UKZN leaders who participated in the study journeyed through three main phases during their virtual leadership transition. These phases, namely discovery, normalisation, and stability, are illustrated in Figure 5.6. This finding is supported by Jooss *et al.*'s (2022) global worker transition process, Scharmer's (2009) Theory U and the model of managing an organisational transition by Bridges (1986).

In Jooss *et al.*'s (2022) global transition process, global workers transition through three phases when they switched from work-related travelling before the COVID-19 pandemic to virtual work during the COVID-19 pandemic: the pre-onset period, the transition period, and the post-transition period. Scharmer (2009) posited in Theory U that leaders transition through three high-level phases during a personal leadership change process: downloading, presencing and performing. Lastly, Bridges's (1986) model of managing an organisational transition identifies an entity's journey through a three-phased process when transitioning from a known state to an unknown future state: the Ending, the Neutral Zone, and the Vision. The alignment between these models and the transition model of the study will be discussed further in the section, which follows Figure 5.6.

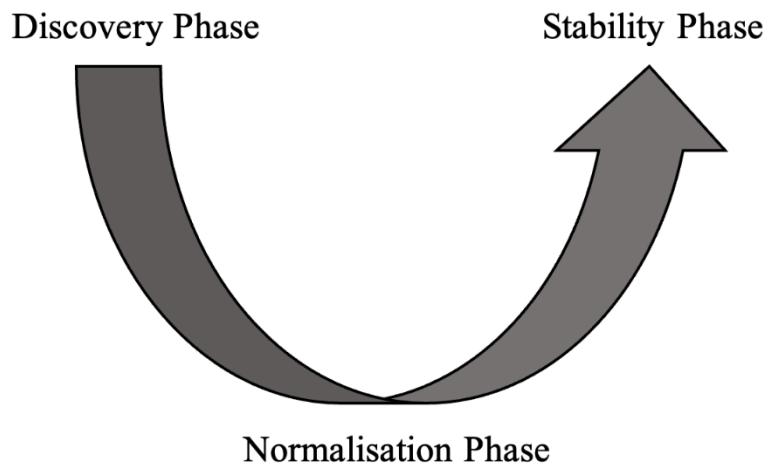


Figure 5.6: Virtual leadership transition phases

5.5.2.1 Discovery phase

The Discovery phase is the initial phase of the transition, which in the case of the study refers to the beginning of the COVID-19 pandemic. In this phase, participants underwent a series of learning processes to discover how to navigate the new mode of work and leadership. This phase was challenging and demanding as this was the first time that participants experienced virtual leadership coupled with the VUCA context. During this stage, leaders assessed the fitness of their traditional leadership approach to the new condition of work. They unlearned their “old normal” and learned elements of the “new normal”, which comprised approaches, behaviours, skills, and tools. Important characteristics of a leader at this stage were to be sufficiently open-minded to allow for the required change to take effect.

This finding is supported by the first phase of Theory U by Scharmer (2009), referred to as Downloading. In the Downloading phase, leaders must let go of existing ideas to discover themselves (Scharmer, 2009). The discovery phase of the study corresponds to the first phase of the model of managing the organisational transition by Bridges (1986), referred to as “The Ending”. In the Ending phase, the most difficult stage of a transition, an organisation or individual must let go of existing practices and culture to open up to an unknown future (Bridges, 1986).

5.5.2.2 Normalisation phase

This is the normalisation of the transition from face-to-face to virtual leadership. During this phase, participants applied their new leadership approach that was established in the discovery phase as the “new normal”, continuously learning from the experience. The expectation at this phase was an improvement in work performance, application of new skills and approaches, reduction in levels of anxiety and confusion, tackling of known challenges with workarounds, development of new

challenges, and continuous learning. The characteristics of a virtual leader at this phase were self-confidence, flexibility, adaptability, and the ability to coach subordinates on the new condition of work and performance monitoring.

This finding is supported by the second phase of Theory U by Scharmer (2009), referred to as presencing. In the presencing phase, a leader learns about their roots and begins to open up to new ideas (Scharmer, 2009). The normalisation phase of the study also corresponds to the second phase of Bridges's (1986) model of managing organisational transition referred to as a neutral zone. The neutral zone is the phase between the old and the new reality in which an organisation or individual capacitates and experiments towards a new reality (Bridges, 1986).

5.5.2.3 Stability phase

This is the next level to the “new normal” stage of the transition from face-to-face to virtual leadership. During this phase, the new approaches, systems, and work conditions were fully in operation and leaders and subordinates were acquainted with the mode of operation. Participants experienced this phase in the third year of leading virtually, where the “new normal” began to be seen as the norm, and work became stable and smooth. At this phase, all parties knew what to expect and how to manage change and uncertainty in the virtual work environment. However, they were also required to be adaptive and prepared for the “next normal”, as the situation remained uncertain. The characteristics of a virtual leader at this phase were monitoring, controlling, “techno-savvy”, influential, and agile.

This finding is supported by the third phase of Theory U by Scharmer (2009), referred to as Performing. In the Performing phase, after experimentation and prototyping, a leader starts acting in their new reality (Scharmer, 2009). The Stability phase of the study also corresponded to the last phase of the model of managing the organisational transition by Bridges (1986), referred to as “The Vision (New beginning)”. In the Vision phase, the organisation or individual has reached a stable state and feels comfortable in the new role or enterprise after undergoing personal development (Bridges, 1986).

5.5.3 Intention to continue leading virtually

In the study, the intention to continue leading virtually among participants varied. Some participants preferred to return to contact leadership, and some indicated a desire to continue virtually. The majority preferred a hybrid approach. Those who preferred to return to contact leadership wished to do so for social interaction reasons. Those who preferred to continue to lead virtually believed that working virtually made information sharing easier, operation cheaper and engaging with people internationally more feasible, as technology made the world smaller. Most participants preferred a blend of virtual and contact leadership, allowing them the flexibility to capitalise on the strength of both face-to-face and virtual leadership. This finding corresponds with that of Bernhardsson *et al.* (2021), who, after

investigating leaders' transition from face-to-face to virtual work in a distribution center company in Sweden during the pandemic, indicated that managers said they would continue to use the virtual approaches learnt during the COVID-19 pandemic in a hybrid setting because of the benefits of the virtual environment, which included cost reduction and increased productivity. The finding is also similar to that of Radziukiewicz (2021), where employees were surveyed about their intention to continue working remotely after the COVID-19 pandemic, thirteen per cent indicated a preference to continue working virtually, 75% preferred a mix of virtual and physical work, and 12% preferred to return to face-to-face work. Respondents' judgments were based on their perceived advantages and disadvantages of working remotely based on their experience during the COVID-19 pandemic (Radziukiewicz, 2021).

5.5.4 *Future work arrangement*

From the findings, there was a consensus that future work arrangements should be hybrid at the university. Participants believed that the era of entirely physical work arrangement was gone and that organisations should capitalise upon the resources and experience from both the pre-COVID-19 pandemic and COVID-19 pandemic work modes of operation to establish hybrid work arrangements that leverage the benefits of both. Organisations should develop the structure and policy on hybrid work arrangements such that face-to-face work fosters human interaction, relationship building, and collaboration, and working from home increases productivity and efficiency in deliverables.

This finding is similar to that of Guzar (2022), who reported that leaders in an HEI indicated that the future of work at their institution will be hybrid because staff and students had become adept at both online and physical modes of working. In addition, Radziukiewicz (2021) indicated that respondents preferred a hybrid arrangement for future work in a study on the intentions to continue working remotely in Poland. Surveys administered by Radziukiewicz (2021), administered in April 2020, September 2020, and February 2021, showed that 79%, 71%, and 75.5% of respondents indicated a preference for a form of hybrid work arrangement, respectively. Some of the respondents indicated a preference to work predominantly virtually and from the office one day per week, while others indicated a preference to spend most of their time in the office and work virtually only one day per month.

5.6 Chapter Summary

This chapter presented a discussion of the findings of the study in the same order as the findings chapter for clarity purposes. In the discussion, the existing literature on virtual leadership and recent studies on leadership during the COVID-19 COVID-19 pandemic supporting the findings of the study were presented. The discussion covered UKZN leaders' virtual leadership approaches, the enabling factors that aided their virtual leadership transition, their challenges during the transition, and their perceptions

regarding the COVID-19 pandemic virtual leadership experience. Other recommendations by participants were also discussed. The next chapter concludes the dissertation.

CHAPTER 6: CONCLUSION AND RECOMMENDATIONS

6.1 Introduction

The preceding chapter presented a discussion of the findings of the study. This chapter presents the conclusion and recommendations. Firstly, the dissertation is summarised by presenting a synopsis of previous chapters. The key findings of the study in response to the research questions are then presented. This is followed by a presentation of a conceptual framework for the transition from face-to-face to virtual leadership. This chapter concludes with recommendations for practice and future research recommendations.

6.2 Summary of dissertation

A summary of the preceding chapters is presented in this section.

Chapter 1: This was the introduction chapter that presented the context and case for the study. In the chapter, it was established that virtual teams existed before the COVID-19 pandemic and became prominent globally due to work-from-home regulations. The definition, opportunities, and risks of a virtual team were presented. It was discussed that the main reason for the failure of virtual teams was ineffective leadership, which justified the need to explore the experiences of virtual leaders to unpack the approaches, enablers, and challenges they face. This chapter concluded by reporting that the study will contribute to both practice and research on virtual leadership by presenting insights into virtual leaders' experiences during the COVID-19 pandemic.

Chapter 2: This chapter presented the literature on virtual teams, which comprised the definition, role of technology, benefits, and contemporary trends of virtual teams. The literature on leadership was highlighted and extended to popular leadership styles. Other areas covered in the chapter were leadership in virtual teams, transitioning to virtual leadership, perceptions of virtual leadership and the intention to continue working virtually.

Chapter 3: This chapter presented the research methodology of the study. Research methodology is the systematic approach followed in achieving the research objectives of a study. The research approaches, methods and techniques were influenced by the researcher's worldview, which is interpretivism. The research approach used was qualitative and the design phenomenology. Interviews were used for data collection and a purposive sampling method was adopted in selecting the appropriate participants for the study. The interviews were performed and recorded on Zoom and transcribed. Nvivo software was used to facilitate the analysis process, and a thematic analysis technique was used to generate codes and themes to answer the research questions.

Chapter 4: This chapter presented the findings from the analysis of the interviews and addressed the objectives of the study. Regarding the first objective, participatory and collaborative leadership styles were dominant among the participants of the study and the prevalent leadership attributes were trust, empathy, good communication, intentional inclusion, self-confidence and the leveraging of collective strength. Regarding the second objective, participants indicated that they faced challenges while leading virtually, categorised into bottom-up, top-down, individual, technical, and structural challenges. Regarding the third objective, participants indicated that they improved their digital competency, organised the training of subordinates, facilitated virtual platform setup and accessed institutional support to enable them to lead effectively. Regarding the fourth objective, most participants felt positive, while a few felt negative about their virtual leadership experience and believed that future work arrangements should be hybrid to support both physical and virtual work conditions.

Chapter 5: This chapter presented a discussion of the findings of the study. In the discussion, the existing literature on virtual leadership and recent studies on leadership during the COVID-19 COVID-19 pandemic supporting the findings of the study were presented. The discussion covered UKZN leaders' virtual leadership approaches, the enabling factors that aided their virtual leadership transition, their challenges during the transition, and their perceptions regarding the COVID-19 pandemic virtual leadership experience. Other recommendations by the participants were also discussed.

6.3 Answering the research questions

The study explored UKZN leaders' experiences in transitioning from leading face-to-face to virtually during the COVID-19 pandemic to contribute to the body of knowledge surrounding leadership. To achieve this aim, the following research questions were answered:

- **Research Question 1:** What are the leadership approaches employed by UKZN leaders in leading their teams virtually during the COVID-19 pandemic?

The findings showed that participants adapted their traditional face-to-face leadership style by being more intentional in their behaviours when they switched to the virtual environment due to the COVID-19 COVID-19 pandemic work-from-home regulations. The UKZN leaders who participated in the study subscribed to participatory and collaborative leadership styles. As participatory and collaborative virtual leaders during the COVID-19 pandemic, they promoted and practised teamwork, transparency, collaboration, dialogue, inclusiveness, and democracy in their virtual teams.

In leading virtually, participants indicated that some of their adaptive leadership attributes included trust, empathy, good communication, honesty, being an agent for change, time management, patience, and leading by example. Behaviours exhibited by participants included consultation, inclusivity, self-confidence, valuing team members, and leveraging collective strength.

- **Research Question 2:** What challenges did UKZN leaders experience in leading virtual teams during the COVID-19 pandemic?

The challenges faced by UKZN leaders who participated in the study were divided into five categories: bottom-up, personal, top-down, technical, and structural. The bottom-up challenges were subordinate-driven issues such as the lack of active staff participation and their slow response rate. The top-down challenges were issues inflicted by the higher management leaders of the participants of the study, which included unavailable leaders and insufficient information to lead.

The individual challenges were issues faced personally by participants while leading virtually during the COVID-19 pandemic, which comprised exhaustion, balancing work and personal life, and isolation. The technical challenges were technical issues that hindered the smooth transition and operations of participants when leading virtually, which included load shedding and unstable connectivity. The structural challenges were governance-related issues as a result of the lack of a virtual work structure with defined procedures, policies, and guidelines, as they had no measures or standards to support them or refer subordinates to when issues arose.

- **Research Question 3:** What factors enabled UKZN leaders to facilitate the transition from face-to-face to virtual?

The virtual leadership enablers identified by participants were improving digital competency, facilitating virtual platforms set up, organising the training of subordinates, and institutional support initiatives. UKZN leaders who participated in the study had to improve their digital competency, especially in the use of online technologies for facilitating meetings to adapt to the new virtual environment. They were involved in the decision-making of which online platform and applications were to be used by the team, ensuring the best platform that suited the people and culture of their team was selected. Participants ensured that subordinates were capacitated with the necessary technical skills, soft skills and devices required to operate in the virtual environment.

Lastly, participants identified institutional support as a major enabler in the successful transition from face-to-face to virtual work arrangements. The support received from the institution included providing internet data, a technical support line, top-level leader moral support, provisioning of technologies, and capacity development initiatives to staff members during the transition.

- **Research Question 4:** What are the perceptions of UKZN leaders on how best to lead their teams post-COVID-19 pandemic?

The findings included participants' overall virtual leadership experience, virtual leadership transition phases, intention to continue virtual leadership, and perception of future work arrangements. Most

UKZN leaders who participated in the study had a positive feeling about their virtual leadership experience because they found it interesting, efficient, and cost- and timesaving. Some participants had negative feelings regarding the experience because of the high level of uncertainty, job insecurity, and stress. Participants journeyed through three phases towards becoming a virtual leader: discovery, normalisation, and stability.

During the discovery phase, participants had to unlearn the “old normal” and learn elements of the “new normal”, which comprised approaches, behaviours, skills, and tools. In the normalisation phase, the virtual environment became a “new normal” space for participants as they applied the new approaches, behaviours, skills, and tools learnt in the discovery phase. In the stability phase, the “new normal” stabilised, and operations ran smoothly with established governance structures.

Regarding the intention to continue leading virtually, most participants indicated a preference for a hybrid setup with the flexibility of working from home and at work at their discretion. A few participants wished to return to contact leadership for social engagement reasons, while those that preferred to continue completely virtually wished this for ease of information sharing, flexibility, and convenience purposes. Participants believed that the era of entirely face-to-face work arrangements had been concluded and that organisations should take advantage of the benefits of both face-to-face and virtual leadership while managing the challenges and risks involved.

6.4 From face-to-face to virtual leadership: A conceptual framework

Based on the key findings of the study, a conceptual framework for the transition from face-to-face to virtual leadership is presented in Figure 6.1. The framework shows the transition phases and characteristics a leader must have while becoming a virtual leader. The attributes and behaviour that must be exhibited by a leader are encapsulated at the centre. The enablers and possible challenges of which a transitioning leader needs to be aware are highlighted because they serve as factors that could facilitate or hinder a successful transition.

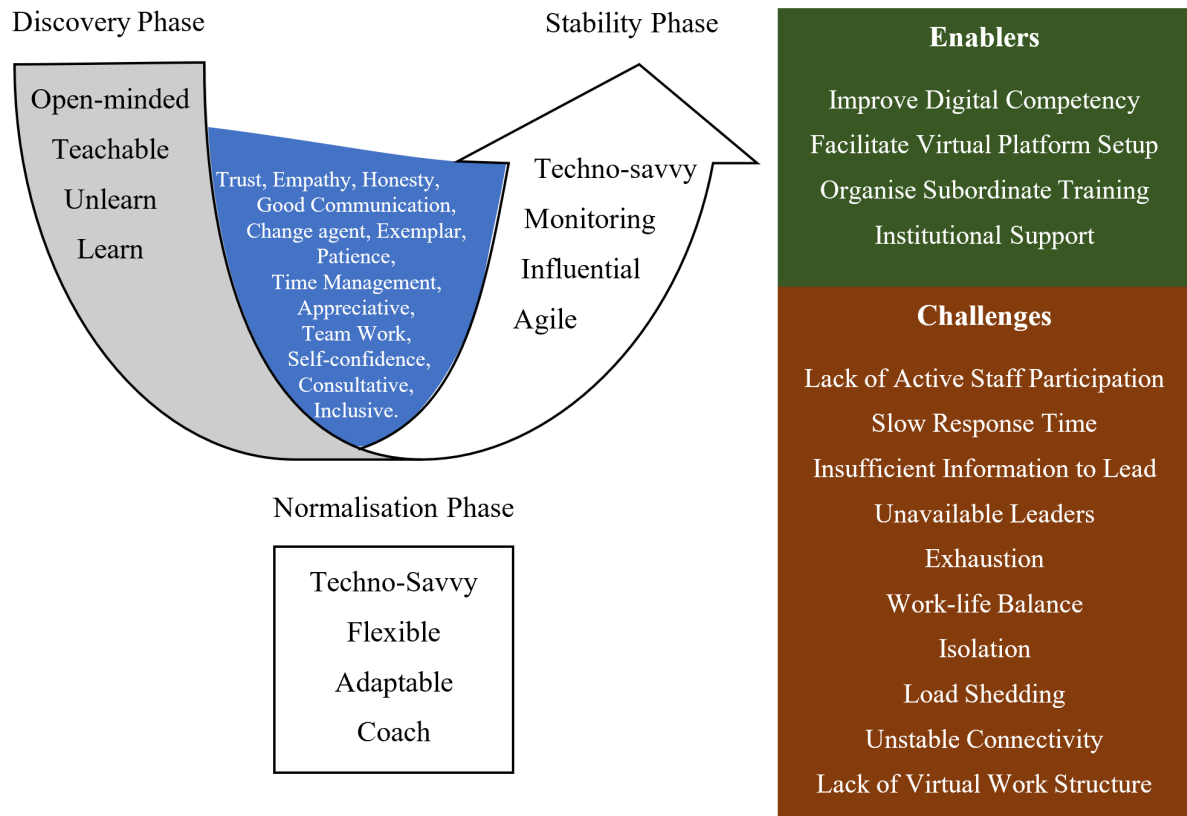


Figure 6.1: From face-to-face to virtual leadership: A conceptual framework

6.5 Recommendations for leadership practice

The findings of the study will be of benefit to HEIs and other organisations willing to adopt virtual work arrangements in future. The study will also be useful to leaders who are presently or will be leading virtual teams in future. The following are recommendations to organisations:

- **Relationship Building:** Institutions should establish virtual team policies that enforce periodic physical bonding exercises of virtual teams to foster relationship building among members.
- **Team Flexibility:** Institutions should adopt hybrid work arrangements that allow for team flexibility in capitalising on the benefits of virtual and face-to-face work arrangements.
- **Ease of Adoption/Transition:** Institutions should establish virtual team governance structures by defining policies and standards of procedures and developing support initiatives, such as training, data subscription, and device provisioning for all virtual team members. This will allow for the ease of adopting or transitioning into virtual leadership when needed.
- **Staff Fit for Purpose:** Institutions should carefully select leaders and team members when setting up a virtual team, as not all individuals are fit to work in a virtual environment.
- **Virtual Leadership Training:** Institutions should ensure that virtual leaders are trained on different aspects of virtual leadership, such as team leadership, conflict resolution, team

collaboration, team building, role clarification, delegation, self-management, digital competency and goal setting. This will equip leaders to lead efficiently and effectively in a virtual/remote setting.

- **Task Fit for Purpose:** Institutions should assess the virtual fitness of work to be done before preparing this work to be performed virtually, as not all types of work are suitable for a virtual environment.

The findings of the study will also be useful to leaders transitioning to virtual leadership in an HEI. The following are recommendations to leaders:

- Leaders should be open-minded, ready to learn, creative, and patient when transitioning from a face-to-face to a virtual leader.
- Leaders should advocate for an initial in-person bonding session before moving to a fully virtual workspace to build and solidify the relationships and synergy between the leader and team members and amongst individual team members.
- Leaders should capacitate themselves with technological skills that enhance their virtual leadership capabilities.
- Leaders should research the challenges of virtual leadership to identify the potential risks that could hinder their journey as virtual leaders and establish mitigating strategies to manage these challenges.
- Leaders should research enabling factors and attributes that they can emulate to allow for a better transition from face-to-face to virtual leadership.

6.6 Recommendations for future research

It is recommended that future research around virtual leadership and face-to-face transitioning to virtual leadership focus on the following areas:

- Considering that the study was qualitative, its findings could not be generalised. Researchers should conduct similar studies in other HEIs and organisations in other sectors to confirm the findings of the study.
- Future studies could use a quantitative approach to carry out a more generalisable study on the experience of face-to-face leaders who transition into virtual leaders. Internal and external factors such as age, profession, education, domain, and training could be correlated with a leader's use of technology-mediated leadership and intention to continue using virtual leadership to determine factors influencing leaders' adoption of virtual leadership.
- The participants of the study were leaders who worked directly with operational staff members. Future studies could sample leaders at the middle or highest leadership ranks, such as C-suite

officials and executive directors to investigate if their experience with virtual leadership is different.

6.7 Conclusion

The study was motivated by the unique opportunity of global and large-scale virtual work experience brought about by the COVID-19 pandemic, the impact of virtual leadership on the success of virtual teams, and the limited literature on virtual leadership in a higher education context. The study explored UKZN leaders' experiences of transitioning from leading in a face-to-face to a virtual context during the COVID-19 pandemic. The Nicholson adaptive cycle model was used as the basis upon which the aim of the study was achieved. The constructs of the model, situation, quality, and process were used in crafting the research questions that were answered during the study.

Based on interpretivism, a qualitative research approach and a phenomenological paradigm, interviews were conducted with thirteen (13) appointed leaders at the UKZN. The interviews were transcribed and analysed thematically using Nvivo software. The research objectives were addressed by the themes that emerged from the analysis. The concluding section of the study presented the answers to the research questions. In addition, a conceptual framework for the transition from face-to-face to virtual leadership was developed to highlight the journey of a leader towards becoming a virtual leader. Finally, recommendations based on the research findings were made for leadership practice and future research was presented.

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APPENDICES

Appendix A: Informed consent

UKZN HUMANITIES AND SOCIAL SCIENCES RESEARCH ETHICS COMMITTEE (HSSREC)

Information Sheet and Consent to Participate in Research

Date:

Greetings Sir/Ma.

My name is Abdulbaqi badru from the Graduate School of Business and Leadership, with contact number 0768216798 and email address 215065196@stu.ukzn.ac.za. My research supervisor, Professor Cecile Gerwel Proches contact number is 0312608318, and her email address is gerwel@ukzn.ac.za.

You are being invited to consider participating in a study titled "Leading from face-to-face to virtual: Leaders' experiences at the University of KwaZulu-Natal during the pandemic". The aim and purpose of this research is to explore the experience of UKZN leaders' transition from leading face-to-face to virtual during the Coronavirus pandemic lockdown. The study is expected to enrol 15 participants at UKZN. It will involve the following procedures, your acceptance to participate, scheduling the interview, and conducting and recording the interview via Zoom. The duration of your participation, if you choose to enroll and remain in the study, is expected to be 45-60mins.

The study will not involve any form of risks and/or discomforts. The study will provide no direct benefits to participants. Through your participation, I hope to understand how UKZN leaders transitioned from face-to-face to virtual leadership. This interview will help me gain insight into the approaches, behaviours, skills and challenges involved in switching from a face-to-face leader to a virtual leader towards contributing to the leadership body of knowledge.

This study has been ethically reviewed and approved by the UKZN Humanities and Social Sciences Research Ethics Committee (approval number HSSREC/00004132/2022).

In the event of any problems or concerns/questions you may contact the researcher at 0768216798 or 215065196@stu.ukzn.ac.za or the UKZN Humanities & Social Sciences Research Ethics Committee, contact details as follows:

HUMANITIES & SOCIAL SCIENCES RESEARCH ETHICS ADMINISTRATION

Research Office, Westville Campus
Govan Mbeki Building
Private Bag X 54001
Durban
4000
KwaZulu-Natal, SOUTH AFRICA
Tel: 27 31 2604557- Fax: 27 31 2604609
Email: HSSREC@ukzn.ac.za

Your participation in the study is voluntary and by participating, you are granting the researcher permission to use your responses. You may refuse to participate or withdraw from the study at any time with no negative consequence. The researcher might terminate your participation if you are not available with the data collection timeframe.

You will not incur any cost as a participant of this study. There will be no monetary gain from participating in the study.

Your anonymity will be maintained by the researcher using pseudonyms for referencing and the Graduate School of Business and Leadership, and your responses will not be used for any purposes outside of this study. All data, both electronic and hard copy will be securely stored during the study and archived for 5 years. After this time, all data will be destroyed.

Please note that the interview will be for about 45-60 minutes.

Thank you for your willingness to participate!

CONSENT

I _____ have been informed about the study entitled "Leading from face-to-face to virtual: Leaders' experiences at the University of KwaZulu-Natal during the pandemic" by Abdulbaqi Badru.

I understand the purpose and procedures of the study (add these again if appropriate).

I have been given an opportunity to answer questions about the study and have had answers to my satisfaction.

I declare that my participation in this study is entirely voluntary and that I may withdraw at any time without affecting any of the benefits that I usually am entitled to.

If I have any further questions/concerns or queries related to the study I understand that I may contact the researcher at 0768216798 or 215065196@stu.ukzn.ac.za.

If I have any questions or concerns about my rights as a study participant, or if I am concerned about an aspect of the study or the researchers then I may contact:

HUMANITIES & SOCIAL SCIENCES RESEARCH ETHICS ADMINISTRATION

Research Office, Westville Campus
Govan Mbeki Building
Private Bag X 54001
Durban
4000
KwaZulu-Natal, SOUTH AFRICA
Tel: 27 31 2604557 - Fax: 27 31 2604609
Email: HSSREC@ukzn.ac.za

Additional consent, where applicable

I hereby provide consent to:

Audio-record my interview	YES / NO
---------------------------	----------

Signature of Participant

Date

Appendix B: Interview schedule

Topic: Leading from face-to-face to virtual: Leaders' experiences at the University of KwaZulu-Natal during the pandemic

MBA Research Project

Graduate School of Business and Leadership

College of Law and Management Studies

University of KwaZulu-Natal

Researcher: Badru Abdulbaqi (0768216798)

Supervisor: Professor Cecile Gerwel Proches (0312608318)

Introduction

My name is Badru Abdulbaqi. I am a Master in Business Administration student in the Graduate School of Business and leadership, University of KwaZulu-Natal. I want to ask you some questions about your background, job, and experience, particularly your experience leading your team virtually during the pandemic lockdown. This inquiry will enable me to understand how UKZN leaders transitioned from face-to-face to virtual leadership. This interview will help me gain insight into the approaches, behaviours, skills and challenges involved in switching from a face-to-face leader to a virtual leader towards contributing to the leadership body of knowledge.

In the course of this interview, the following keywords will be used: leadership, team, virtual team, and virtual leadership.

As used in the research, each can be briefly described as:

Leadership: is a social influence process that maximises other people's effort towards achieving a shared goal.

Team: is a group of people working together towards a shared goal.

Virtual Team: people in different locations working together towards a shared goal.

Virtual Leadership: a social influence process through information technology and communication to maximise other people's efforts towards shared goals.

Interview questions

The interview should take about 45 to 60 minutes.

Job & Job role

- a) How long have you worked at UKZN?
- b) What position do you hold at UKZN?
- c) How long have you worked in your current position?
- d) What is the size of your team?

Leadership Experience

- a) Have you been leading your team virtually before the pandemic?
- b) What type of organisational changes did you and your team go through during the pandemic?

Virtual Leadership Approaches

- 1. How would you describe your leadership approach before the pandemic?
- 2. How did you respond to the change from a face-to-face to a virtual leader?
- 3. Do you think your leadership approach changed during the pandemic? If yes, kindly share the changes with me.
- 4. How were you able to influence your team members towards achieving shared goals in a virtual setting?
- 5. How did your team members handle the change from face-to-face to virtual?
- 6. Were there specific skills you had to learn as a leader during the switch to virtual? If yes, kindly share them with me.
- 7. Are there specific behaviours you had to exhibit to lead virtually? If yes, kindly share them with me.

Virtual Leadership Challenges

- 1. What challenges did you face as a leader during the transition from face to face to virtual?
- 2. How have you been able to manage the challenges over time?
- 3. Do you think there are disadvantages to leading a virtual team? If yes, please share.

Virtual leadership Enabling Factors

1. Was there any support from the institution that enabled you to lead virtually? If yes, please share.
2. Did you go through any training to lead virtually? If yes, kindly share with me.
3. What forms/types of technology did you use to facilitate virtual leadership?
4. Can you please describe the role of technology in leading virtually?

Perceptions on Virtual Leadership after the Pandemic

1. How would you describe your virtual leadership experience?
2. Would you like to continue leading your team virtually post-pandemic? If yes or otherwise, give reasons.
3. What are your thoughts on what will happen post-pandemic in terms of how teams are led in the organization – e.g. from the side of the institution, the followers, etc.

Is there anything else that you would like to add?

Thank you

Appendix C: Ethical clearance



12 May 2022

Abdulbaqi Eyitayo Badru (215065196)
Grad School Of Bus & Leadership
Westville Campus

Dear AE Badru,

Protocol reference number: HSSREC/00004132/2022

Project title: Leading from face-to-face to virtual: Leaders' experiences at the University of KwaZulu-Natal during the pandemic

Degree: Masters

Approval Notification – Expedited Application

This letter serves to notify you that your application received on 25 April 2022 in connection with the above, was reviewed by the Humanities and Social Sciences Research Ethics Committee (HSSREC) and the protocol has been granted **FULL APPROVAL**.

Any alteration/s to the approved research protocol i.e. Questionnaire/Interview Schedule, Informed Consent Form, Title of the Project, Location of the Study, Research Approach and Methods must be reviewed and approved through the amendment/modification prior to its implementation. In case you have further queries, please quote the above reference number. PLEASE NOTE: Research data should be securely stored in the discipline/department for a period of 5 years.

This approval is valid until 12 May 2023.

To ensure uninterrupted approval of this study beyond the approval expiry date, a progress report must be submitted to the Research Office on the appropriate form 2 - 3 months before the expiry date. A close-out report to be submitted when study is finished.

All research conducted during the COVID-19 period must adhere to the national and UKZN guidelines.

HSSREC is registered with the South African National Research Ethics Council (REC-040414-040).

Yours sincerely,



Professor Dipane Hlalele (Chair)

/dd

Humanities and Social Sciences Research Ethics Committee

Postal Address: Private Bag X54001, Durban, 4000, South Africa

Telephone: +27 (0)31 260 8350/4557/3587 Email: hssrec@ukzn.ac.za Website: <http://research.ukzn.ac.za/Research-Ethics>

Founding Campuses: ■ Edgewood ■ Howard College ■ Medical School ■ Pietermaritzburg ■ Westville

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Appendix D: Gatekeeper's letter



6 May 2022

Mr Abdulbaqi Badru (SN 215065196)
Graduate School of Business and Leaderships
College of Law and Management Studies
Westville Campus
UKZN
Email: 215065196@stu.ukzn.ac.za

Dear Mr Badru

RE: PERMISSION TO CONDUCT RESEARCH

Gatekeeper's permission is hereby granted for you to conduct research at the University of KwaZulu-Natal (UKZN) towards your postgraduate studies, provided Ethical clearance has been obtained. We note the title of your research project is:

"Leading from face-to-face to virtual: Leaders' experiences at the University of KwaZulu-Natal during the pandemic."

It is noted that you will be constituting your sample by conducting interviews with directors of professional services and/or academic leaders at UKZN.

Please ensure that the following appears on your notice/questionnaire:

- Ethical clearance number;
- Research title and details of the research, the researcher and the supervisor;
- Consent form is attached to the notice/questionnaire and to be signed by user before he/she fills in questionnaire;
- gatekeepers approval by the Registrar.

You are not authorized to contact staff and students using the 'Microsoft Outlook' address book. Identity numbers and email addresses of individuals are not a matter of public record and are protected according to Section 14 of the South African Constitution, as well as the PAIA and POPI Act. For the release of such information over to yourself for research purposes, the University of KwaZulu-Natal will need express consent from the relevant data subjects. Data collected must be treated with due confidentiality and anonymity.






Yours sincerely

Dr KE Cleland
Registrar

Office of the Registrar

Postal Address: Private Bag X54001, Durban, 4000, South Africa

Telephone: +27 (0)31 260 7971 Email: registrar@ukzn.ac.za Website: www.ukzn.ac.za

Founding Campuses:  Edgewood  Howard College  Medical School  Pietermaritzburg  Westville

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Appendix E: Editor's declaration



DR MAUREEN LILIAN KLOS
PROFESSIONAL EDITOR
BA; STD; BEd (*cum laude*); MEd (*cum laude*); DEd
Registered with the SAPEG (reg. no. KLO004)
maureenklos@gmail.com

EDITOR'S DECLARATION

I,

DR MAUREEN LILIAN KLOS,

Being the holder of the following qualifications:

BA; STD; BEd (*cum laude*); MEd (*cum laude*); DEd

Hereby certify that I am the English language editor of the following document:

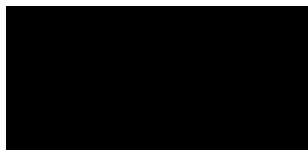
**LEADING FROM FACE-TO-FACE TO VIRTUAL: LEADERS' EXPERIENCES AT
THE UNIVERSITY OF KWAZULU-NATAL DURING THE PANDEMIC**

by

Abdulbaqi Eyitayo Badru

215065196

I hereby certify that I have edited the language, formatting and referencing in the above-mentioned document in their entirety. However, I assume no responsibility or liability for any post-editing changes, errors or omissions.



13 January 2023