‘It was a dream, and it happens’: Saudi academics’ discursive construction of blended learning integration:

CHAT-inspired DBR

A thesis submitted to the University of Manchester for the degree of Doctor of Philosophy

In the Faculty of Humanities

2018

Sahar S Alghanmi

Manchester Institute of Education,
School of Environment, Education and Development
TABLE OF CONTENTS

LIST OF TABLES .......................................................................................................................... 8
LIST OF FIGURES .......................................................................................................................... 9
GLOSSARY ........................................................................................................................................ 10
DECLARATION ............................................................................................................................... 11
DEDICATION .................................................................................................................................... 12
ACKNOWLEDGEMENTS ................................................................................................................ 13
ABSTRACT ....................................................................................................................................... 14
DECLARATION ............................................................................................................................... 15
PREFACE ........................................................................................................................................... 16

CHAPTER 1: INTRODUCTION ................................................................................................. 17
  1.1 INTRODUCTION ...................................................................................................................... 17
  1.2 BACKGROUND OF THE STUDY ............................................................................................ 17
    1.2.1 Overview and background of Saudi Arabia ................................................................. 17
    1.2.2 Higher education in Saudi Arabia ............................................................................... 18
    1.2.3 The integration of ICT in Saudi higher education ....................................................... 20
    1.2.4 BL in Saudi Higher Education ..................................................................................... 20
  1.3 STATEMENT OF THE PROBLEM: WHY THIS RESEARCH FOCUSES ON BL GAPS IN THE LITERATURE ...................... 21
  1.4 SIGNIFICANCE OF THE RESEARCH .................................................................................... 23
  1.5 STRUCTURE OF THE THESIS AND RESEARCH QUESTIONS ............................................... 24
  1.6 SUMMARY ............................................................................................................................. 25

CHAPTER 2: REVIEW OF LITERATURE ABOUT BL .................................................................. 26
  2.1 INTRODUCTION ...................................................................................................................... 26
  2.2 TOWARDS A DEFINITION OF BL ........................................................................................ 26
  2.3 LEVELS AND CATEGORIES OF BL ....................................................................................... 28
  2.4 ESSENTIAL PROCESS OF INTEGRATING BL ...................................................................... 29
    2.4.1 Analysis of learning environment for BL integration and CHAT as analytical framework .......................................................................................................................... 29
    2.4.2 Instructional design for BL integration and CHAT as the designing framework .......... 31
      2.4.2.1 Method one: Designing of Learning ......................................................................... 31
      2.4.2.2 Method two: Designing for Learning ........................................................................ 34
2.4.3 The implementation of BL and CHAT as the analytical framework of BL implementation

2.4.4 Articulating BL principles and CHAT as the evaluative framework

2.5 SUMMARY

CHAPTER 3: THE RESEARCH’S THEORETICAL FOUNDATION, DESIGN AND METHODOLOGY

3.1 INTRODUCTION

3.2 BRINGING CULTURAL-HISTORICAL ACTIVITY THEORY (CHAT) INTERVENTION APPROACH AND DESIGN-BASED RESEARCH (DBR) TOGETHER

3.2.1 What is the methodological approach of design-based research (DBR)?

3.2.2 The function of DBR in this research

3.2.3 Background information about Cultural-Historical Activity Theory (CHAT)

3.2.4 Why DBR and CHAT should be combined: CHAT-inspired DBR methodology

3.3 CHAT-INSPIRED DBR METHODOLOGY AND METHOD OF DATA ANALYSIS

3.3.1 Stemming from social-cultural planes of data analysis

3.3.2 CHAT-inspired DBR methodology and the role of dialectical contradictions in this research

3.3.3 Dialectical contradictions require an appropriate method of data analysis

3.3.4 Method of data analysis: Discursive Psychology DP

3.4 EPistemological foundation of the research; social constructionism

3.5 PARTICIPANTS

3.6 TRUSTWORTHINESS

3.7 ETHICAL CONSIDERATIONS

CHAPTER 4: STAGE ONE; ANALYSIS OF PRACTICAL PROBLEMS

4.1 INTRODUCTION

4.2 ACADEMICS STRUGGLE TO SOLVE PEDAGOGICALLY AND SOCIOLOGICALLY CHALLENGING STUDENTS’ SITUATIONS WHILE TRYING TO SUSTAIN THEIR TEACHING PEDAGOGIC VALUES

4.2.1 Academics’ criticism about students being inadequately prepared for university level

4.2.2 Academics’ criticism about students’ attitude regarding collaborative learning

4.2.3 Academics’ criticism about students’ low motivation and self-confidence

4.3 ACADEMICS STRUGGLE ENGAGING WITH AN UNSUPPORTIVE COMMUNITY WHILE ATTEMPTING TO MOVE BEYOND TRADITIONAL TEACHING PRACTICE
4.3.1 The need for idealized self-development opportunities and supportive community

4.3.2 Technical support plays an uncooperative role in solving technical problems

4.4 Academics are constrained by ineffective mediated-artefacts while attempting to produce the object of technology-best-practice

4.4.1 Repetitive problems associated with lecture rooms lead to lack of effective preparation

4.4.2 Academics experiencing insufficient Technological, pedagogical and content knowledge (TPACK) which affected their mediation actions towards desired objective of teaching

4.5 Academics are strained maintaining a sense of professional agency within the negative socio-cultural ideology of traditional-based teaching practice

4.6 Summary

CHAPTER 5: STAGE TWO: DESIGN SOLUTIONS

5.1 Introduction

5.2 As academics form a clearer vision around BL they become hesitant about the community of students’ ability to participate in the designed BL-based activities

5.3 The designing of BL is being narrowed by what is perceived as more socio-culturally proper practice, while attempting to accommodate proper BL design

5.4 Academics struggle to design BL as a new pedagogical tool while facing the pressing need to develop TPACK

5.5 Academics struggle to sustain a sense of transformative agency while designing BL-based solutions within a traditionalist socio-cultural environment

5.5.1 Academics are conflicted between the excitement of changing pedagogical practice and the fear of putting the design into practice

5.5.2 Academics faced difficulty sustaining innovative and responsible roles when designing BL with a need to expand their profession

5.6 Summary

CHAPTER 6: STAGE THREE: IMPLEMENTING BL DESIGN

6.1 Introduction

6.2 Contradiction governs the implementation of BL when students’ negativity clashes with academics’ objectives

6.2.1 Students’ slow transition from traditional to BL – academics face struggles maintaining students’ enthusiasm in a BL environment
6.2.2 “The kind of worries I have, I think I cannot trust students’ behaviour” – academics face challenges managing expectations in a BL environment

6.3 ACADEMICS STRUGGLE TO SUSTAIN CREATIVE BL IMPLEMENTATION AS STAFF WHO NEED TO FOLLOW THE UNIVERSITY POLICY; ACADEMICS AS SELF-GOVERNING THINKERS

6.3.1 Academics faced a situation where their creativity and efforts came into conflict with the university values and policy on technological use

6.3.2 Pressing need for continuous support throughout the implementation stage

6.4 IMPLEMENTING BL AS A NEW PEDAGOGICAL TOOL FOR TEACHING AND LEARNING

6.4.1 “The problem with the technicality of it” – academics faced difficulty overcoming the technological requirement of BL

6.4.2 Course-based BL: building online communities and the implementation of a virtual learning environment

6.4.3 BL-based activity: the implementation of flipped classroom instruction, YouTube videos and online tools (Edpuzzle, eduCanon, Joomag)

6.4.4 BL-based activity: the implementation of CBL– Twitter, Etherpad, and Edublog in real-life situations

6.4.5 BL-based activity: the implementation of PBL and team project mind-mapping software (Mindmeister, Piktochart and Padlet)

6.4.6 Academics’ construction of a new professional self as a resolution between previous practice and new practice

6.5 SUMMARY

CHAPTER 7: STAGE FOUR: ARTICULATING BL PRINCIPLES

7.1 INTRODUCTION

7.2 CONSTRUCTED PRINCIPLES WITHIN THE UNIVERSITY’S COMMUNITY COMPONENT FOR INNOVATIVE BL PRACTICES

7.2.1 Training as a principle to provide a suitable environment for innovative BL practices

7.2.2 Support as a principle for innovative BL practices

7.2.3 The need to build a community for practitioners as a key principle for innovative BL practices

7.3 CONSTRUCTED PRINCIPLES WITHIN THE STUDENT COMMUNITY FOR BL BEST PRACTICE

7.3.1 Get traditionalists and influential students to believe in BL

7.3.2 Motivation is constructed as a principle to overcome students’ resistance to BL

7.3.3 Provide students with well-structured guidance

7.4 CONSTRUCTED PRINCIPLES WITHIN ARTEFACT-MEDIATED TOOLS FOR EFFECTIVE BL PRACTICE
7.4.1 The availability of unlimited access to the Internet around the university for effective practice ........................................................................................................................................................................ 162
7.4.2 Accurate decision-making about what tools to use for effective practice ........................................ 163
7.4.3 Developing instructional design knowledge for effective practice ........................................ 166
7.5 Constructed principles within academics’ sense of transformative agency for attaining the object of transformative BL practice ........................................................................................................................................... 167
7.6 Summary ......................................................................................................................................................... 170

CHAPTER 8: HOW IS THE TRANSFORMATIVE EXPERIENCE OF BL INTEGRATION CONSTRUCTED WITHIN SAUDI ACADEMICS’ DISCOURSES? ........................................................................................................................................... 172
8.1 Introduction ......................................................................................................................................................... 172
8.2 Academics’ construction of the ‘community of students’ as inherently the main discourse in their BL integration activities ........................................................................................................................................... 172
8.3 Academics’ construction of the ‘institutional community of the university’ component in their BL integration activities ........................................................................................................................................... 177
8.4 The construction of tool-mediated BL integration instruction ........................................................................ 181
8.5 The construction of transformative agency of an activity system’s subject in BL organisational change ........................................................................................................................................... 187

CHAPTER NINE: CONCLUSION ........................................................................................................................................... 190
9.1 Introduction ......................................................................................................................................................... 190
9.2 Summary of the background and objectives of the study .............................................................................. 190
9.3 Summary of research methodological approach ............................................................................................. 190
9.4 Summary of the study findings .......................................................................................................................... 191
9.5 The study’s contribution ...................................................................................................................................... 199
9.6 Limitations and challenges conducting this study ............................................................................................. 201
9.7 Conclusion ......................................................................................................................................................... 202
References .............................................................................................................................................................. 203

APPENDICES .......................................................................................................................................................... 215
Appendix 1: participants’ invitation letter ........................................................................................................... 215
Appendix 2: participants’ consent form .................................................................................................................. 216
Appendix 3: timeline of the research data collection .............................................................................................. 219
Appendix 4: profile of research participants ........................................................................................................ 220
Appendix 5: lists of discursive devices ................................................................................................................ 221
Appendix 6: transcription key ................................................................................................................................... 226
Appendix 7: activity system analysis of contradictions ........................................................................................ 227
Appendix 8: technological tools glossary ............................................................................................................ 242
List of Tables

**Table 1:** Structure of the stages, aims, and research questions ........................................... ERROR! BOOKMARK NOT DEFINED.

**Table 2:** Level of contradictions, adapted from *(Yamagata-Lynch & Haudenschild, 2009, p. 510)* .................................. 49

**Table 3:** Bringing DBR and CHAT together .................................................................................. 51
List of Figures

Figure 1: Map of Saudi Arabia adapted from (Alrashidi & Phan, 2015, p. 33) ........................................... 18
Figure 2: The tension between traditional Saudi learning approaches and the needs of a global knowledge economy adapted from (Smith & Abuamoh, 2013a, p. 183) ................................................................. 21
Figure 3: E-learning general types ........................................................................................................... 27
Figure 4: Picciano’s conceptual model of BL (Picciano, 2009, p. 11) .............................................................. 27
Figure 5: Central levels of BL adapted from (Graham, 2006, p. 376) ............................................................. 28
Figure 6: Needs analysis factors ............................................................................................................. 30
Figure 7: An outline for a learning activity; adopted from (Beetham & Sharpe, 2013, p. 34) for designing active learning in technology-rich contexts ......................................................................................... 36
Figure 8: Professional agency from a subject-centred socio-cultural perspective. Adapted from (Etäläpelto et al., 2013, p. 659) ........................................................................................................ 38
Figure 9: Design-based research methodology (Reeves, 2006, p. 59) ............................................................. 43
Figure 10: Model of scientific research and knowledge generation adapted from (Shah et al., 2015, p. 154, p. 156) ........................................................................................................................................ 46
Figure 11: Vygotsky’s model of activity theory, adapted from (Engeström, 2001, p. 134) ...................................... 47
Figure 12: Second generation of activity theory adapted from (Engeström, 2001, p. 135) ....................................... 48
Figure 13: Adapted from (Engeström, 2001, p. 136) ....................................................................................... 50
Figure 14: Methodological onion for analysing contradictions in discourse data; adapted from (Engeström & Sannino, 2011, p. 375) ......................................................................................................... 56
Figure 15: Analytical steps adapted from (Wiggins, 2016, p. 115) .................................................................. 60
Figure 16: Photograph of using need analysis ............................................................................................. 63
Figure 17: Saudi WhatsApp users adapted from, (Social, 2017) : https://www.statista.com/statistics/291540/mob... 64
Figure 18: Screenshot the interactive word tree in MAXQDA ........................................................................ 66
Figure 19: Screenshot: Blackboard content (A3) .......................................................................................... 121
Figure 20: Screenshot eduCanon video (A1) .................................................................................................. 129
Figure 21 & Figure 22: Screenshots: A2’s flipped classroom activity on reinforcement theory (A2) ........... 131
Figure 23: Screenshot: The use of Joomag as a Flipped Learning tool (A1) .................................................... 132
Figure 24: Screenshot: The use of Edublog in A1 teaching practice of CBL ................................................... 133
Figure 25, Figure 26 & Figure 27: Screenshots: The use of Etherpad in A2 teaching practice of CBL ............ 135
Figure 28 & Figure 29: Screenshots: Students’ contribution of Twitter in on A3 practice of CBL ............... 137
Figure 30: Screenshot: PBL using Mindmeister in A1 practice ................................................................... 138
Figure 31: Screenshots: PBL practiced in A2’s context ............................................................................. 140
Figure 32: Screenshot: PBL practiced in A3’s context .............................................................................. 141
<table>
<thead>
<tr>
<th>Acronym</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bb</td>
<td>Blackboard</td>
</tr>
<tr>
<td>BL</td>
<td>Blended Learning</td>
</tr>
<tr>
<td>CBL</td>
<td>Case-Based Learning</td>
</tr>
<tr>
<td>CHAT</td>
<td>Cultural-Historical Activity Theory</td>
</tr>
<tr>
<td>AT</td>
<td>Activity Theory</td>
</tr>
<tr>
<td>DBR</td>
<td>Design-Based Research</td>
</tr>
<tr>
<td>DDs</td>
<td>Discursive Devices</td>
</tr>
<tr>
<td>DP</td>
<td>Discursive Psychology</td>
</tr>
<tr>
<td>ECF</td>
<td>Extreme Case Formulation</td>
</tr>
<tr>
<td>F2F</td>
<td>Face-to-Face</td>
</tr>
<tr>
<td>FL</td>
<td>Flipped Learning</td>
</tr>
<tr>
<td>ICT</td>
<td>Information and Communication Technology</td>
</tr>
<tr>
<td>ID</td>
<td>Instructional Design</td>
</tr>
<tr>
<td>KSA</td>
<td>Kingdom of Saudi Arabia</td>
</tr>
<tr>
<td>LMS</td>
<td>Learning Management System</td>
</tr>
<tr>
<td>PBL</td>
<td>Project-Based Learning</td>
</tr>
<tr>
<td>PD</td>
<td>Professional Development</td>
</tr>
<tr>
<td>VLE</td>
<td>Virtual Learning Environment</td>
</tr>
<tr>
<td>TPACK</td>
<td>Technological pedagogical and content knowledge</td>
</tr>
<tr>
<td>RSR</td>
<td>Recall Stimulus Response</td>
</tr>
<tr>
<td>HEIs</td>
<td>Higher education institutions</td>
</tr>
<tr>
<td>R</td>
<td>Researcher</td>
</tr>
<tr>
<td>A1</td>
<td>Academic one</td>
</tr>
<tr>
<td>A2</td>
<td>Academic two</td>
</tr>
<tr>
<td>A3</td>
<td>Academic three</td>
</tr>
</tbody>
</table>
DECLARATION

COPYRIGHT STATEMENT

i. The author of this thesis (including any appendices and/or schedules to this thesis) owns certain copyright or related rights in it (the “Copyright”) and s/he has given The University of Manchester certain rights to use such Copyright, including for administrative purposes.

ii. Copies of this thesis, either in full or in extracts and whether in hard or electronic copy, may be made only in accordance with the Copyright, Designs and Patents Act 1988 (as amended) and regulations issued under it or, where appropriate, in accordance with licensing agreements which the University has from time to time. This page must form part of any such copies made.

iii. The ownership of certain Copyright, patents, designs, trade marks and other intellectual property (the “Intellectual Property”) and any reproductions of copyright works in the thesis, for example graphs and tables (“Reproductions”), which may be described in this thesis, may not be owned by the author and may be owned by third parties. Such Intellectual Property and Reproductions cannot and must not be made available for use without the prior written permission of the owner(s) of the relevant Intellectual Property and/or Reproductions.

iv. Further information on the conditions under which disclosure, publication and commercialisation of this thesis, the Copyright and any Intellectual Property University IP Policy (see http://documents.manchester.ac.uk/display.aspx?DocID=24420), in any relevant Thesis restriction declarations deposited in the University Library, The University Library’s regulations (see http://www.library.manchester.ac.uk/about/regulations/) and in The University’s policy on Presentation of Theses.
DEDICATION

My success would not have been achievable without the people who have supported and encouraged me to be who I am today. You have shaped my life in ways I cannot forget.

My beloved Mother and Father, your dua’ and prayers lies behind my success, in every single step in my life.

My loving Husband Waleed, all of my success would never have been possible without your support.

To the treasures of my heart, Khalid, Noor and Wajed, Thank you for your patience, support and sacrifice.

This is dedicated to my Brothers and Sisters as well, for their support and encouragement.

Friends, I am fortunate to have a truthful friend.

For all of those who hold my name in their dua’ out of love.

May Allah bless all of them with faith.
ACKNOWLEDGEMENTS

In the Name of Allah, the Beneficent, the Merciful

My Lord, increase me in knowledge — The Holy Qu’ran (20.114)

Primarily, I want to give thanks to the Almighty God for keeping me on the right direction, and arming me with power and will to complete this work. I owe everything to him.

My gratitude turns to King Abdullah Bin Abdul-Aziz (may his soul rest in peace) for providing me with this sponsorship. I would also like to lengthen my thankfulness to King Salman bin Abdul-Aziz, for the maintenance of the scholarship and support.

The deepest heartfelt is extended for my supervisor Dr. Gary Motteram, thank you for your invaluable guidance and support which lightening my road to complete this work. My sincere appreciation is also extended to Dr. Pauline Prevett for her support.

This work would not be possible, nor completed without the participation of my research participants, who gave me the time and invested their efforts to participate in my research, my sincerest thanks and appreciation to them.

My sincere gratitude to people who work at the University of Manchester for their unfailing support at all stages of this work.
ABSTRACT
Sahar Alghanmi: The University of Manchester, PhD, Faculty of Humanities
Title: ‘It was a dream and it happens’: Saudi academics’ discursive construction of Blended Learning integration: CHAT-inspired DBR.

This study aims to understand how Saudi academics construct meaning about Blended Learning (BL) integration in their teaching activities. It grew from the importance of conducting baseline research that moves beyond repeating or reinforcing existing practices. Design-Based Research, matched with different stages of the evolution of Cultural Historical Activity Theory (CHAT-inspired DBR) was chosen as a methodological framework, because it presents activities as stages – analysis, design, implementation and reflection about principles – that enable access to more real-world practical data. This brings new insights into the development and knowledge generation experienced by academics in everyday practices and how they expand knowledge about BL as a new concept.

The findings of this study contribute to a growing body of knowledge in the field of BL in higher education. It adds more understanding about academics’ construction of the students’ community, considering students’ beliefs, motivation and emotional and social support at all levels as vital factors to ensure academics’ success in integrating BL. Moreover, it demonstrates universities must implement specific institutional support as a way to minimise the gap between the real and anticipated practices. Well-organised and quality professional development helps sustained quality practice of BL; importantly, where universities’ strategic orientation of BL contradicts academics’ orientation, strategy needs to be reformed so academics can play an active role applying their creative version of BL practice. From the construction of tool-mediated BL it is evident that tools in academics’ activities constitute a central discourse; as academics developed more knowledge they experienced conflicting professional needs between the vagueness of BL and the need to move on from traditional-based teaching practice. The lack of instructional design knowledge contributes to this feeling. Yet these academics, with minimum university support, were able to implement BL and its non-traditional approaches quite effectively. Furthermore, the transformative agency is shown to be an integral part of the activity, as it is the subjects who drive the activity. Academics’ use of tool-mediated activities to break away from the particular frame of action is understood as transformative agency; thus they initiate commitment to transform their activity, embracing more possibilities for expansive learning. It can be said that BL as an object is an expansion of the academics’ professional agency.

Thus, this thesis’s contribution to knowledge is twofold; first, it is hoped that the research findings will make a contribution to the implementation of BL in higher education. These findings will help stakeholders understand patterns of struggle caused by contradictions for academics planning to teach using BL and what kinds of support will be most beneficial. The study also has implications for policy-makers who influence legislation governing the kinds of faculty preparation appropriate for university students. The study suggests several areas to be investigated in the future. Second, it aims to methodologically advance baseline research through the integration of CHAT for different purposes in different stages of DBR, where multiple qualitative methods of data collection are employed to be responsive to the needs of these stages. In addition the analytical framework of Discursive Psychology (DP) adds to the understanding of the ways in which academics construct the meaning of BL, which in turn reveals what discourses surround how professional agency is practiced and can underpin the change from traditional to BL teaching. This analytical framework of DP helps reveals how contradictions are constructed within academics’ discourses and how emotion and agency are formed from these contradictions.
DECLARATION

I declare that no portion of the work referred to in this thesis has been submitted in support of an application for another degree or qualification of this or any other university or other institute of learning.
PREFACE

Some sections of certain chapters in this dissertation have appeared, or may appear in publications as follows:

Chapter 1: Introduction

1.1 Introduction

This thesis aims to investigate the kind of contradictions that emerged while Saudi academics’ constructed through discourse their experiences of the Blended Learning (BL) integration process, covering the shifting of their teaching practice from traditional to BL. This chapter begins by providing background to the Saudi Arabian context, discussing its higher education sector, the current state of integrated ICT, and the integration of BL. It proceeds to explore related gaps in the literature to identify and contextualise the research problems. Moreover, in light of these problems, the significance of the research is discussed. Finally, the research questions are presented along with the structure of the entire thesis.

1.2 Background of the study

1.2.1 Overview and background of Saudi Arabia

The Kingdom of Saudi Arabia (KSA) is the official name of the country of study; it is a monarchy ruled by the Al-Saud Royal Family. The KSA was established in the early 20th century (1932) (Alrashidi & Phan, 2015), when King Abdul-Aziz accomplished the unification of various separate regions into one kingdom (Alexander, 2011). The KSA is located at a strategic location in the centre of the world between the three major continents (Asia, Africa and Europe) and at the furthestmost part of South-Western Asia. The kingdom dominates four-fifths (80%) of what is known as the Arabian Peninsula (Wynbrandt, 2010), and covers approximately 2,250,000 square kilometers (Brook, Al Shoukri, Amer, Böer, & Krupp, 2006) (see Figure 1). The KSA borders Iraq, Jordan and Kuwait to the north, and Yemen and Oman to the south. It is bordered by the Red Sea to the west and at the east by the United Arab Emirates, Qatar and the Gulf Coast (Alexander, 2011). Official government statistics recorded the Saudi population in 2017 as 20,408,362 (Saudi National Portal, 2018). Arabic is the primary language spoken by the population (Al-Sadan, 2000).

Saudi Arabia is the birthplace of Islam and the homeland of the two holy cities “Mecca” and “Medina”; therefore the country occupies a position of religious significance (Alrashidi & Phan, 2015). The religion of Islam has fundamentally influenced all aspects of Saudi society; according to Al-Saggaf (2004) “Islam plays a central role in defining the culture, and acts as a major force in determining the social norms, patterns, traditions, obligations, privileges and practices of society” (p. 1). Indeed, Saudi culture and Islam are intertwined and hard to separate (Al Lily, 2011). The government system is based on the Islamic principle of “Al Shura” (consultation) (Ehteshami & Wright, 2007), which plays a comparable role to parliaments in the Western world; the law system of the Kingdom is Sharia, which is based on Islamic rules (Al-Sadan, 2000).
Undoubtedly, since King Abdul-Aziz Al-Saud founded the KSA in 1932, the country has witnessed outstanding growth. When founded, the kingdom was of limited significance to the wider world apart from its Islamic importance, but it is now demonstrating an active role, whether in politics or in international trade; for example, Saudi Arabia provides 60% of the world’s oil (Smith & Abouammoh, 2013a). The country is experiencing a huge social and cultural change led by the Saudi Crown Prince Mohammad bin Salman guiding the country and its people towards the vision of 2030. The core aim of this vision is an economic transformation to move beyond being an “oil-dependent economy” (Yusuf, 2017, p. 112). Including cultural change projects and business investments endeavours at the heart of this vision is the Saudi education system, including the need for BL (Abouammoh, 2018; Yusuf, 2017).

1.2.2 Higher education in Saudi Arabia

The introduction of higher education in the country happened in early 1975, with the government stating its aim of planning, supervising, supporting and coordinating such as system (Hamdan, 2017). Emerging from the belief that education is an important pillar for the Saudi nation, the sector of higher education in the KSA perceived consistently developmental stages at all levels (Abouammoh, 2018). The first-born university in the kingdom is King Saud University (KSU), opened in 1975 in the capital city of Riyadh with only nine lecturers and 21 students (Alsubaihi, 2016). The country now has 29 public and ten private universities (Aldiab, Chowdhury, Kootsookos, & Alam, 2017). In 2015, the Saudi king decided to combine two ministries (Ministry of Education and Ministry of Higher Education) into one ministry (Abouammoh, 2018), to obtain faster progress and improve educational outcomes (Sheerah & Goodwyn, 2016).

Worldwide, higher education institutions (HEIs) face similar challenges, driven by societal and economic factors. However, each country has individual challenges that need to be discussed from its context perspective. Abouammoh (2018) argues the new Saudi 2030 vision has dealt
with pressing of challenges facing the Saudi higher education sector, which gives hope that this vision will result in a bright future for Saudis. However, Hamdan (2017) argues that to meet the demands of 2030, the educational curriculum in Saudi higher education requires a number of considerations. In the KSA, although education is almost free, there are challenges that have driven Saudi decision-makers to search for opportunities and solutions (Hamdan, 2017; Smith & Abouammoh, 2013a). Higher education in Saudi Arabia is enduring unique changes that have been created by an increased population of students, driven by the gender-segregation culture (Hamdan, 2017), and the demands of the job market (Mishrif & Alabduljabbar, 2018). Ensuring educational accommodation for ever-increasing numbers of secondary school graduate students has been a central concern for the higher education sector, with 1.5 million Saudi students are currently joining Saudi universities (Abouammoh, 2018). Because of such huge demand, the pressure on Saudi higher education has increased. Moreover, previous studies have underlined the mismatch between the outputs of the education system and the requirements of the economic sectors in the KSA, particularly that of the private sector, where high-skilled labour is required (Mishrif & Alabduljabbar, 2018, p. 105).

The government of KSA has set high expectations of its universities to meet these challenges. Acting on this, the Ministry of Higher Education has approached a number of important initiatives planned to expand the quality and functioning of higher education. To pursue radical improvements in these universities, a significant initiative is initiated (The National Commission for Academic Accreditation and Assessment) NCAAA (Onsman, 2010). It began in 2004, aiming for enhancing the quality of higher education delivery, through defining benchmarks and measures for academic effectiveness, and the accreditation of academic programmes. The Ninth Development Plan of the KSA (2010–2015) showed that, still, there is inadequate education provision that meets the necessities of the labour market (Ninth National Development Plan, 2009). It suggested that new approaches to meet the economy and labour market’s demands, mainly, extend the employability chances of Saudis. However, nearly a decade later the strategy is not meeting its goal; one reason may be, as Mishrif and Alabduljabbar (2018) argue, that the strategy “lacks a satisfactory level of engagement by key stakeholders such as students, educators, employees, employers, professional associations and other civil society organizations” (p. 109).

Furthermore, the higher education sector faces challenges because of the country’s gender-segregation laws (Hamdan, 2017; Sheerah & Goodwyn, 2016; Smith & Abouammoh, 2013a). Thus, at all educational levels, males and females are separated in different buildings. Both sexes attend universities, but at different campuses. Female staff teach female students, although in limited cases males deliver lectures through closed circuit TV (Sheerah & Goodwyn, 2016).

According to Hamdan (2017), there are many opportunities for women in education despite such segregation, as they have access to all public universities, with the exception of the King Fahd University for Petroleum and Minerals. Similarly, males have no access to Princess Norah University, which is one of the largest all-female universities in the world.
1.2.3 The integration of ICT in Saudi higher education

Saudi Arabia is considered the leading ICT market in the Middle East (Alali, 2015). Great steps in improving the higher education sector have been attempted by the Saudi government and initiating technology into the learning-teaching practices (Anthony & Abdul Cader, 2014) is one of those steps. This ICT infrastructure was adopted late in the kingdom compared with other developing countries. In 2011, the founding of Saudi’s e-university is considered as a main achievement. It focuses on delivering distance education for all Saudi society-members, which enhances the life-long education (Marinakou & Giousmpasoglou, 2015). Recent years have seen major developments in the ICT infrastructure available to academics, staff and students (Alali, 2015; Sajid et al., 2016). This has been achieved through a number of projects and initiatives (Al-Shahrani, 2016); the most significant are below:

- The National Centre for E-Learning and Distance Education
- The Learning Portal of the National Centre for E-Learning and Distance Education
- JUSUR (a Learning Management System)
- Saudi Digital Library
- Saudi Centre for Support and Counselling to all beneficiaries of E-learning (SANEED) (Al-Shahrani, 2016, p. 8).

1.2.4 BL in Saudi Higher Education

The Ministry of Higher Education encourages the application of BL in its academic programmes (Alebaikan, 2010b). However, although the BL method is highly recommended, the literature shows that relatively few studies on BL have been conducted in Saudi Arabia (Sheerah & Goodwyn, 2016). This government-driven goal is still in its primary phases, with only a minority of universities delivering eLearning programmes targeted at certain student populations, whereas the rest is campus/traditional-based teaching (Alebaikan, 2010b; Moukali, 2012). To shift the traditional culture in Saudi higher education, the introduction of BL is essential. Many scholars emphasise that BL provides a series of easy steps towards change for traditional universities to transform into modern universities (Garrison & Kanuka, 2004; Graham & Robison, 2007). Almalki (2011) stresses that to fulfil the need of understanding the strengths and limitations of BL in the Saudi setting, potential research must embrace evaluative and experimental approaches. Importantly, therefore, more research that will illuminate the academic experiences of blended practice in its real setting is required to formulate plans and development. Thus, studying the impact of BL in shifting Saudi academics’ pedagogical practice, through the investigation of the ways they construct meaning and talk about it, will therefore support this aim.
1.3 Statement of the problem: why this research focuses on BL gaps in the literature.

- The need for more groundwork to shift traditional beliefs amongst Saudi academics

Smith and Abouammoh (2013b) identified the “tension between [the] traditional Saudi approach to teaching, learning and student assessment, and the need for [a] global knowledge economy” (p. 186) as one of the main barriers hindering Saudi universities’ progression to having a world-class reputation (Figure 2). They argue that this problem is due to Saudi academics having only been exposed to traditional methods, and that changing pedagogical practices cannot happen unless “the academics themselves believe in that change and want it to happen” (p. 186). Indeed, such tension is a subject of concern in higher education, not only in the Saudi context but internationally (Vasileiou, 2010). As a result, BL has been introduced as a strategy of change in many universities (Garrison & Vaughan, 2007; Hofmann, 2011). Smith and Abouammoh (2013a) stress that much groundwork has to be done to change the current ingrained, traditional beliefs amongst Saudi academics by focusing on demonstrating the effective use of other methods of teaching, learning and assessment. Thus, studying the impact of BL in shifting Saudi academics pedagogical practice is therefore essential to investigate. Although Saudi higher education has been one of the fastest growing education systems in the world over the past decade, the traditionalist style of education that has been rooted for years presents a challenge (Smith & Abouammoh, 2013a).

\[\text{Figure 2: The tension between traditional Saudi learning approaches and the needs of a global knowledge economy}\]

Adapted from (Smith & Abouammoh, 2013a, p. 183)

- The need to enhance the quality of Saudi higher education

The key challenge being encountered by Saudi universities is attaining a high quality of teaching-learning standards (Smith & Abouammoh, 2013a). The importance of BL, it is argued, comes
from its potential in creating more learning opportunities and improved pedagogy. Garrison and Vaughan (2007) state that BL “addresses the issue of quality of teaching and learning. It is an opportunity to address pressing pedagogical concerns, while distinguishing and enhancing the reputation of institutions of higher education as innovative and quality learning institutions” (p. 153).

Graham (2006) asserts that the importance of BL lies in three main outcomes: 1) improved pedagogy; 2) increased access/flexibility; 3) increased cost-effectiveness. At their essence, these factors represent solutions to tackle the challenges that higher education institutions are facing. Darandari and Murphy (2013) suggest that in order to provide quality education, Saudi universities must consider the provision of student-centred approaches and outcome-based assessment models. As a result, studying the strengths and limitations of BL in enhancing the quality for delivering education in the Saudi context is a critical step to meet the emerging need of quality in education. Yusuf (2017) argues that BL could be a vital player in achieving the country’s 2030 vision of educational improvement.

- **The need for thinking beyond Learning Management Systems:**

  The key issue with the existing literature on the Saudi context is that it has focused on the use of learning management systems (LMS) such as Blackboard and Jusur, which have been criticised as simply replicating methods of traditional learning. Simultaneously, there have been deficiencies in the literature discussing the usage of Web 2.0 and digital technologies as a means to mediate BL in the Saudi context. Internationally, there has been a sizeable body of literature that emphasised the role of Web 2.0 technologies in driving a sustainable and successful BL environment (Bower, Hedberg, & Kuswara, 2009; Stepanyan, Littlejohn, & Margaryan, 2010). However, there is a need for Saudi-specific studies about integrating BL-based web2.0 (Alebaikan, 2010b).

- **The need to study academic experiences of practicing BL in real settings**

  Educational technology research has attempted to establish the relationship between technology and teaching-learning outcomes, but there is a need for more research to address individuals’ experiences with technology (Cilesiz, 2011). In terms of BL research, Garrison and Vaughan (2007) have observed, “although the concept of blended learning may be intuitively apparent and simple, the practical application is more complex” (p. 5). This complexity means BL sometimes fails in its implementation to accomplish its promises mentioned above (Hofmann, 2006). On the other hand, Torrisi-Steele and Drew (2013) observed that the lack of literature concerning the academic practice of BL creates an obstacle to developing accurate professional development and support for academics. “A few studies have suggested a relationship between instructors’ views on and use of blended learning and the epistemological view underlying their approach to teaching” (Schoonenboom, 2014, p. 248). Therefore, due to the complex nature of BL, and the lack of literature addressing the academic practice of BL, research in this particular field must be reformulated. In the Saudi context, Smith and Abouammoh (2013a) indicated that “expanding the range of teaching, learning and assessment approaches used by Saudi academics will not be
Based on these gaps, the problems this research attempts to address are in response to several recent reform movements in which this research is contextualised. There has been a need to change the rooted traditional beliefs amongst Saudi academics; inseparable from this the need to enhance the quality of teaching, learning and assessment in Saudi higher education, in which BL is seen as a way ahead. Furthermore, the integration of BL as a catalyst for change to pedagogical foundations is seen as a means to achieve the country’s 2030 vision. To meet these goals, study of academics’ blended practice in the real-world setting is required. Addressing these gaps requires an understanding of the educator experience. To provide the field with a way to rethink its challenges, a cohesive guiding theory is needed A CHAT-inspired DBR approach offers the best way to address these aspects (more details on methodology are covered in Chapter 3).

1.4 Significance of the research

The significance of this research comes from its attempts to overcome a number of gaps in the literature, seeking a socio-cultural historical examination of everyday discourses while experiencing the change of BL integration. Given the importance of BL for Saudi higher education and the lack of literature providing meaningful accounts about its usage, studying the integration of BL in its real context is essential to achieve BL’s promised outcomes. The research is, therefore, significant to those at leadership level because the study may empower leaders in higher education organisations with information on the best ways to prepare and motivate academic staff to integrate BL. Moreover, addressing how BL might be influenced by people’s culture in the community helps to understand the link between culture and technology, supporting the effective implementation of BL in Saudi universities. Hopefully, this study is of significance to the interpretation of the BL environment in the Saudi context concerning benefits, challenges, and future plans.

A design-based research DBR methodology will be used to provide a comprehensive examination of discourses around the analysis, design, development, implementation and evaluation stages of BL integration, which will be informed by a conceptualisation of Cultural-Historical Activity Theory (CHAT). It is therefore hoped that this research will contribute to the development of this qualitative research methodology, which adds to the significance of this research. This approach facilitates a coherent understanding of BL integration as a dialogue between theory and practice, and between the past, the present, and the future. Discursive Psychology (DP) as a method of analysis helps conceptualise “how people use the available discourses flexibly in creating and negotiating representations of the world” (Jørgensen & Phillips, 2002, p. 7) and allows practitioners to analyse the social consequences. This research takes an intensive research methodological design to search for discursive contradictions that emerge when participants become active agents in their organisation to promote BL integration and transform their pedagogical practice.

This research is also significant because it seeks to reveal aspects of academics’ self-construction of agentive self that have otherwise remained hidden. For example, the research
may reveal the contradictions as moments of tension when academics detect competing self-positions, revealing their contradictory voices. Therefore, the importance of the study can come from understanding academics’ reflections on the experiences they had throughout the BL integration process. This thesis seeks to explore the connections between Cultural-Historical Activity Theory (CHAT) and Design-Based Research (DBR) in understanding BL as a transformative pedagogical tool that provides a coherent and consistent theoretical framework to better support the goal of cultivating environmental agency among practitioners.

1.5 Structure of the thesis and research questions

**Chapter 1** is the introduction chapter, which introduces the context of Saudi Arabia by giving an overview of the country, its education and the general integration of ICTs initiatives, and the state of BL in Saudi higher education. Moreover, this chapter gives an overview of the thesis, giving the reader an orientation in terms of positioning the research problem, its significance and how it has been addressed. Additionally, detail on the structure of the thesis is given.

**Chapter 2** discusses the existing literature, the concept of BL and its levels and types. It also highlights the four essential stages of BL integration: 1) the needs analysis of practical teaching problems; 2) designing BL solutions; 3) implementation of BL, and 4) articulating BL principles. Lastly, the importance and challenges of BL integration in Saudi higher education are reviewed.

**Chapter 3** is divided into two parts. The first discusses the combination of DBR and CHAT with DP as a method of data analysis to identify discursive contradictions. Part two presents the research design, including the epistemological stance, participants’ recruitment and their profiles, methods of data collection and the research trustworthiness.

**Chapter 4** is built around the ‘analysis of practical problems’ stage of DBR and aims to understand the current practice and context. It also seeks to understand the research participants and their motivation towards BL as a novel alternative to the traditional method. This stage is essentially ‘activity analysis’, focusing on participants’ interpretations about their current practices, knowledge, needs, beliefs and usage of tools and technologies. More importantly, this reflects their thinking about BL before they actually use it. The analysis is obtained through a number of methods of data collection, aiming to answer RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourse?

**Chapter 5** addresses the design and development stage, which is formed by the data collected from the first stage of DBR. This study is not focused on particular software design; rather it is based around the idea of instructional design as a pedagogical tool that necessitates the application of technology and forms new practices (refer to Chapter 2). Nevertheless, a fundamental aspect of BL is the designing of technological innovation based on a pedagogical foundation, which is sensitive to different courses as well as participants. Thus, a number of considerations are taken into account during the design stage, where a number of design activities were conducted. Different methods of data collection are employed to investigate RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourse?
The accomplishment of the design stage leads to the implementation (iterative testing and refinement) stage of DBR, which forms the basis for Chapter 6. However, for the purpose of this research, the idea of iteration is not the central consideration; instead, it is open to the participants. For example, if they wish to reuse a particular design activity in different contexts. The aim is to examine the discourses of these academics in the implementation stage. Significantly, to ensure the ability of the participants to apply the design, a number of BL coaching sessions were carried out using various supportive materials. The examination of BL implementation leads to the answer of RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics' discourses?

Chapter 7 is the final stage of DBR. At the end of the implementation stage, participants engaged in reflection about BL principles. At this stage, they have the capability to set a future-ideal BL state based on their experiences. Their responses address RQ4: How are future design principles of BL constructed within Saudi academics’ discourses?

Chapter 8, the discussion chapter, aims to answer the main research question RQ: How is the transformative experience of BL integration constructed within Saudi academics’ discourses? Answering this question involves a discussion across the research questions on one hand and links those findings to the extended body of related findings from literature.

Chapter 9 is the conclusion of the study; it summarises the key findings and examines them against the research aims and objectives. Moreover, it presents the contributions, limitations, and recommendations for future research.

1.6 Summary
This chapter introduced the research by giving background information about the research context: the KSA, its higher education system and attempts to integrate ICT infrastructure and BL. The main gaps in the related literature were presented, which not only formed the research problems and significance, but also stated the need for a methodological approach that could lead to better understanding of BL integration.
Chapter 2: Review of Literature about BL

2.1 Introduction

The research concerns a concept termed BL, which essentially involves innovative pedagogy focused on constructing agentive collaboration within academics’ sociocultural settings with others, in which they form and reform their object transformation of pedagogical practices. To situate this study within the existing body of research, this literature review focuses on two broad areas: first, highlighting the meaning, types and models of BL; second, highlighting the essential processes of integrating BL – analysis, design, implementation and evaluation.

2.2 Towards a definition of BL

Internationally, e-learning has gradually invaded/become a part of higher education institutions, where the adoption of online practices has become more commonplace. Under the umbrella of “e-learning”, definitions and concepts overlap. E-learning is defined as the “use of internet technologies to deliver a broad array of solutions that enhance knowledge and performance” (Khamparia & Pandey, 2017, p. 200). It can be categorised into three main types: first, according to the mode of transmission (synchronous and asynchronous); second, according to the amount of e-learning within the course (distance, blended and enhanced learning); third, according to the role of users (instructor-led learning, student-centered learning) (Figure 3). Although BL is often understood from the perspective of an amount of e-learning means combined with face-to-face interaction, this understanding limits the potential of BL. While the term ‘BL’ is used widely in the literature, it still lacks a shared and broadly agreed-upon definition (Grgurović, 2017; Sheerah & Goodwyn, 2016). Historically, the innovatory expansion of both technology and learning theories, in part results from the development of BL. There have been overlapping labels attached to the terms “blended”, “mixed models” and “hybrid” (Abdelrahman & Irby, 2016). Thus, BL “is a broad concept that can be defined differently based on many dimensions” (Alzahrani, 2017a, p. 83), in which “there is no generally accepted definition” (Picciano, Graham, & Dziuban, 2013, p. 3). However, BL is considered the strongest incarnation of the e-learning phenomenon (Garrison, 2011). The best explanation of BL that echoes its historical origin is “the combination of instruction from two historically separate models of teaching and learning: traditional F2F systems and distributed learning systems” (Bonk & Graham, 2012, p. 3).

Fundamentally, BL is implemented in response to a wish to enhance learning in the best way achievable (Huang, Ma, & Zhang, 2008). Therefore, BL is not just additional technological tools that are used to improve the old traditional practice. It is important to distinguish between the integration of technology – where the traditional role is still a part of the teaching-learning process – and the integration of BL – where changes in the teachers’ and learners’ roles, curriculum design, assessment and feedback are evolving.
The Conceptual Model of BL as presented by Picciano (2009) (Figure 4) shows that BL is a continuum, using synchronous and asynchronous technology to deliver teaching and learning continually from fully online to full conventional practices, where students and instructors take different roles. Thus, BL is defined in this research as an innovative way to teach creatively, combining technology, pedagogy and content knowledge to create more teaching-learning opportunities that link both inside and outside classroom experiences in a meaningful way. Therefore, the continuum of technology, pedagogy, space and place, and the scale of the learning activity is employed in a creative decision-making process about the way in which F2F instructions and online instructions are designed and practiced by academics, where the two environments are combined in meaningful methods.
2.3 Levels and categories of BL

BL methods have significantly improved, and thus four central levels have been developmentally advanced (Graham, 2006). According to Graham (2006), the levels of Course and Activity are usually under the academics’ domain of responsibility; thus, these underpin instructors’ decision-making processes, in which learning effectiveness and productivity are the causes of academics’ interest. The Program and Institutional levels are usually under the administrative stakeholders’ domain, where cost-effectiveness is the cause that drives administrators to implement BL. (Figure 5) illustrates a clear explanation of Graham (2006)’s classification of BL levels.

- **Levels of BL:**

  1. **Activity level:** at the activity level, instructors design learning activities with technology as a supportive means.
  2. **Course level:** the course level is where instructors make decisions about how the activities will be delivered over the course, and determine the mix of F2F instruction and online instruction activities.
  3. **Program level:** at the program level, some complete education programs comprise online courses and others are traditional F2F courses.
  4. **Institutional level:** at the institutional level, both F2F and online delivery courses are required to graduate (Graham, 2006).

- **Categories of BL:** Graham (2009) also provided three major categorisations of BL, namely: Enabling, Enhancing and Transforming:

  1. **Enabling:** the attention is mainly oriented on tackling accessibility and flexibility problems (Graham, 2009). Thus, this category is likely to occur at program level as an additional option for on-campus students. ICT is often used as a method to deliver comparable learning experiences to F2F instruction (Alebaikan, 2010b).
  2. **Enhancing:** this change is recognised as small in scale, in which ICT means are less used compared with the whole course (Graham, 2009). Enhancing BL might occur at the course level, at which it gains huge attention amongst traditional universities as a catalyst of change (Graham, 2009). Alebaikan (2010b) observed that Saudi universities as well have focused on enhancing BL as a way to enable the integration
of transformative BL.

3- **Transforming**: this is oriented to create major change in the pedagogical practice, wherein students are actively engaged in knowledge creation (Graham, 2009). F2F and online instructions are fully combined to deliver teaching and learning. This relies on the creation of a number of activities that allow the creative combination of both instructions. It could occur at institutional level where the redesign of pedagogical activities is initiated by administrators, or it could be at the activity level where instructors integrate ICT to achieve particular learning objectives of the course, such as case-based learning (CBL).

The type of BL discussed in this research is related to the instructor domain, namely activity-level and course-level.

### 2.4 Essential process of integrating BL

This study is employing a Design-Based Research (DBR) approach, where four stages are consequently approached that broadly reflect the success factors above: 1) analysis of practical problems, where need analysis is an integral part; 2) design solutions, where instructional design is a fundamental component; 3) implementation, in which BL interacts with socio-cultural settings, and finally 4) articulation of BL principles by academics who experienced the change. These four essential stages will be reviewed in the related literature.

#### 2.4.1 Analysis of learning environment for BL integration and CHAT as analytical framework

To answer the question ‘What are the practical problems in the current learning environment?’, a process of creativity and productivity is required to lead to “new ideas, concepts, and models as solutions” (Colpaert, 2006, p. 481). The literature was reviewed to find an effective framework to help the analysis process of the educational setting and to successfully formulate a fundamental understanding of its practical problems and therefore its needs, to establish a powerful linkage between the analysis and the design. While the literature is rich in detailed accounts of the practice and examples of BL, less practical information is available about the analysis phase of the design. Therefore, two main criteria for the analysis stage were identified as critical. Firstly, the “analysis needs to be able to capture what exists already, not just what success would look like. Design activity can then make proposals that will work within, and improve upon, an existing set of constraints and possibilities” (Goodyear & Carvalho, 2013, p. 50). Secondly, the complexity of any learning environments must be understood and represent the whole picture of influences, such as people, setting, locations and usage of tools and resources as a system.

Good design depends on consistency between the curriculums, assessments, teaching methods and the chosen learning environments (Biggs & Tang, 2011). Thus, to achieve a desirable design the alignment between these factors must be analysed and studied carefully (Mayes & de Freitas, 2013). In addition, and more importantly, the learners’ characteristics and diverse differences
between each relating to their knowledge and skills must be considered in order to create a learner-centred approach (Beetham & Sharpe, 2013). Importantly, the role that the organisation plays in supporting or hindering the transformative potential of BL is well addressed in the literature (Garrison & Vaughan, 2013; Tucker, 2012), as the main factor of analysis. One main success factor of BL integration recommended by Maarop and Embi (2016) is to “conduct a proper needs analysis concerning the institution deliverables and support mechanism prior to designing a blended course” (p. 50). Thus, the factors of 1) curriculum, 2) assessment and feedback, 3) pedagogical methods, 4) the learning environment, 5) organisational factors, and 6) learners’ characteristics are the central inputs of the needs analysis (Figure 6). Thus, the curriculum’s goals and objectives were identified, the teaching-learning methods were classified, and the methods of assessment and feedback were clarified. The learners’ characteristics of knowledge and skills, in addition to the characteristics of the learning environment itself, were identified and all these factors’ implications in redesigning the course were highlighted.

![Figure 6: Needs Analysis Factors](image)

However, all of these factors are human activity that takes place in a sociocultural setting. Therefore, to make sense of them, Cultural-Historical Activity Theory (CHAT) has been applied as an analytical framework, as the identification of the contradictions of activity systems will be the source of change. Jonassen and Rohrer-Murphy (1999) along with others state that CHAT is able to provide a different lens for researchers with regard to the analysis of a learning environment and its processes and outcomes, especially for the aim of designing instruction. They articulate two main considerations when using CHAT as an analytical framework: first, the relevant context(s) within which the activity operates must be understood; second, the system’s contradictions must be understood from the subjects’ motivations and interpretations. CHAT is used at this stage as a lens to investigate practical problems of the oriented learning environment and acquire comprehensive insight to guide the design of BL for such an environment, through the identification of contradictions of the academics’ activities.
2.4.2 Instructional design for BL integration and CHAT as the designing framework

In design education, there has been a struggle on how to best incorporate technology, while maintaining focus on conceptual thinking and theory. With an aim of preparing students for the future, programmes face the challenging query of ‘How can we best integrate and utilize technology?’ (Coorey, 2016, p. 337).

Eder (1999) portrays the process of design as advancing of simple or complex object with an envisioned purpose. To successfully develop the right solution for the defined practical problems, a comprehensive and robust instructional design framework must be selected. Hutchinson and Karsnitz (1994) defined design as simply “the planned process of change” (p. 18). In the literature, there has been a shared agreement that there is a lack of specific and definite principles for designing BL courses that are able to meet the needs of learners (Kerres & Witt, 2003). In addition, there has been a lack of guidance on the literature that could assist higher education institutions to transition from traditional to blended-based programmes (Partridge, Ponting, & McCay, 2011). Clear theoretical principles must inform the decisions of the design (Beetham & Sharpe, 2013; Fowler & Mayes, 1999). The Community of Inquiry (CoI) framework developed by Garrison, Anderson, and Archer (2001) is one of the well-known models. Although, “Quality Matters” (https://www.qualitymatters.org/qa-resources/rubric-standards) provides guidelines and standards, these are more US-based in focus and do not respond to KSA context. Moreover, CoI has been widely used and validated by different researchers to design BL. However, it has been criticised by Rourke and Kanuka (2009) on the grounds that it does not raise the issue of profound and meaningful learning experiences, which is critical in this study. The development of BL design includes rational processes that creatively build learning activities (Lawson & Dorst, 2009). Importantly, C. Bonk, Kim, and Zeng (2005) argue that pedagogy and learning are the imperative and crucial concerns in BL, not the used technologies. Besides, there is a shared view in the literature that successful BL is more than combining information and communication technologies with F2F interaction (George-Walker & Keeffe, 2010). Singh and Reed (2001) state that: ‘Blended Learning focuses on optimizing achievement of learning objectives by applying the “right’ learning technologies to match the ‘right’ personal learning style to transfer the ‘right’ skills to the ‘right’ person at the ‘right’ time” (p. 2). Thus, two methods have been identified to design the BL landscapes, following Beetham and Sharpe (2013) suggestion of designing active learning in technology-rich contexts: Designing of Learning, and Designing for Learning.

2.4.2.1 Method one: Designing of Learning

In this method the concern was oriented towards building a solid foundation for BL to be integrated, primarily by rethinking the learning outcomes and promoting learning theories to encourage a higher order of thinking, considering Bloom’s taxonomy. The designing of BL is not an easy task, but necessitates an important rethinking process of learning objectives and instructional approaches, including a move into subjective theories of teaching. For example, a move from teacher-centred to student-centred, particularly in designing learning environments
that emphasise active learning approaches for learners (Moskal, Dziuban, & Hartman, 2013). Designing authentic learning activities involves considering non-traditional approaches such as CBL. Bazelais and Doleck (2018) state “Blended learning is rooted in the constructivist view that learners ought to be actively involved in their learning” (p. 73). Moreover, this method should involve the rethinking of teaching strategies and support summative, formative and peer assessment to provide meaningful feedback. Garrison and Kanuka (2004) state, “Blended Learning is inherently about rethinking and redesigning the teaching and learning relationship.” (p. 99). Thus, changing such a relationship to BL requires academics to re-visualise the strategies of teaching with BL, incorporating appropriate assessments methods.

- **Designing of Learning: active learning methods and Bloom’s taxonomy**

To rethink the learning outcomes, the design of learning activities needs to be adjusted by using Bloom’s taxonomy of learning objectives as “a framework for classifying statements of what we expect or intend students to learn as a result of instruction” (Krathwohl, 2002, p. 212). Bloom’s taxonomy purposefully helps involve students’ higher- and lower-order thinking skills, where the activities characteristically determine essential functions like remembering and understanding, and new, sophisticated functions such as evaluating and creating, as students advance through learning.

- **Designing of Learning: pedagogical active learning methods**

Active learning is an instructional design method that functions to provide participation mechanisms for students to actively engage in the learning process, empowering students’ agency as the learning becomes more student-centred in approach, and the teacher to be more of a facilitator while students are given more opportunity to structure, reflect, and actively control (Barkley & Major, 2018; Prince, 2004). Active learning is old as a “philosophy and movement”, but new as a “practice and phenomenon” (Misseyanni, Papadopoulou, Marouli, & Lytras, 2018, pp. 77-78). There have been a number of emerging pedagogical active learning methods gaining popularity in higher education (Coorey, 2016), since these methods respond to most of the challenges facing higher education by offering new insights into how pedagogy is practised (Misseyanni et al., 2018). Active learning is concerned with the concepts of “student-centred learning” and “pedagogies of engagement” that can occur in and out of the classroom (Misseyanni et al., 2018). Wolff, Wagner, Poznanski, Schiller, and Santen (2015) state that when using active learning strategies, the traditional materials can turn into effective teaching tools “to contextualize content, explain difficult concepts, and improve student learning from simply remembering to applying and analyzing” (p. 85). Therefore, the application of active learning strategies requires a rethink of learning objectives in lights of Bloom’s taxonomy, which as mentioned earlier is a framework that classifies learning objectives. Essentially, the provision of active learning links to the provision of quality education, which makes it difficult to approach (Barkley & Major, 2018; Misseyanni et al., 2018). Misseyanni et al. (2018) stress that academics’ commitment and
inspiration is the key factor to ensure students become involved in these methods. This literature review focuses on three methods, namely CBL, project-based learning and Flipped Learning.

1- Active learning method of Case-Based Learning (CBL)

CBL is a well-known method of the active-learning pedagogy, employed across disciplines and expressed differently according to different fields of study. CBL is an instructional method within the context of student-centred teaching, derived from constructivist learning (Yoo & Park, 2014). Through the use of case studies, students’ learning can be facilitated to create an opportunity for students to learn through real-world cases (Kaddoura, 2011). The philosophical pedagogy behind the inquiry-based learning of CBL positions an emphasis on the systems’ students use to produce meaning of the world over a sequence of individual constructs, inspiring learning and acquirement of knowledge (Jonassen & Hernandez-Serrano, 2002). According to Cummings, Mason, Shelton, and Baur (2017), CBL “is described as self-narrated stories (case study) that were written for classroom analysis and discussion” (p. 65). Thus, CBL aims to engage students through the use of real-world, complex situations, events, or problems to arouse critical thinking skills application in which an authentic learning experience can be obtained. Where students are left on their own to discover the material provided to them, using a case to stimulate learning and acquisition of knowledge to promote deeper learning experiences through discussions.

2- Active learning method of Project-Based Learning (PBL)

PBL is another active learning strategy that is constructivist-based and student-centred (Bell, 2010). It is not new (Gary, 2015), and was initiated in the sixties (Biasutti & EL-Deghaidy, 2015). It is similar to CBL, but it is broader, longer and gives students more flexibility in organising their work; the outcome also necessitates the production of a final project (Clark, 2017; Cummings et al., 2017). However, “the successful implementation of PBL in the classroom relies on the teacher’s ability to effectively scaffold students’ learning, motivate, support and guide them along the way” (Kokotsaki, Menzies, & Wiggins, 2016, p. 272). PBL constitutes a number of elements (Kokotsaki et al., 2016), where designing successful PBL comprises: 1) a real-world problem that is significant to the students; 2) extended control given to the students; 3) teachers accelerating and motivating students during the development of the project; 4) students acquiring knowledge in different ways through active involvement in communicative, collaborative, and individualistic learning, reflection, the use of technological aids and opportunities for feedback, and 5) the public circulation of the final project to the broader community. The combination of advanced technologies within PBL can support the effectiveness of PBL positively (Biasutti & EL-Deghaidy, 2015).

3- Active learning method of Flipped Learning (FL)

Flipped Learning FL entails a type of BL, using a technology-based teaching and active learning model (Khan, 2012). The fundamental conception of FL is not a new one. It was initiated in 2007
by two chemistry teachers, but became well known in 2012 (Brewer & Movahedazarhouligh, 2018). The application of FL enables students’ critical and independent thinking, where employing innovative technologies expands the opportunities for students to learn before F2F time and thus devote lecturing time to more active activities. FL is usually built around a web-based environment that students review prior to F2F lectures and meetings (Thai, De Wever, & Valcke, 2017). Students are required to explore pre-lecture material in a self-directed manner, which promotes deep learning across active and constructive practices rather than focusing on memorising skills only. Thus, “the Flipped Learning approach to instruction permitted the teacher to guide in-depth discussions and offers opportunities for students to seek clarity of concepts” (Cummings et al., 2017, p. 70). It is believed that FL attracts students' attention; Tucker (2012) observed that the application of a FL strategy formed unexpected but positive student results.

2.4.2.2 Method two: Designing for Learning

Designing for Learning is concerned with the use of technology that enables constructivist-learning approaches to meet the needs of the course. This involves two main parts: technologies to create a course-centralised Virtual Learning Environment (VLE), and technologies to design the active learning activities.

1- Designing a course-centralised virtual learning environment as an online learning community

The usage of technology here is to create a course-centralised VLE to provide all essential information and course-related resources to students. Although VLEs were primarily established for distance learning they are now usually used as a BL system (Hart & Rush, 2007). VLEs are an online learning space that simulates the real-presence of F2F teaching-learning practices used in a variety of ways to support student learning. They not only act as a repository for resources but also as a place to complete learning activities. They are also a social space where students communicate with each other. According to Cassidy (2016), VLEs are “a collection of tools and applications that enable online communication, collaborative learning, uploading of instructional content, student assessment and feedback, and course administration” (p. 113). The main drivers for developing the use of VLEs are to enhance the quality of learning and teaching, to meet student expectations and to improve student satisfaction (Barker & Gossman, 2013). Learning Management Systems (LMSs) are “web-based software system[s] designed to support teaching and learning in an educational setting, providing a collection of tools for assessment, communication, the delivery of content, group work, and the administration of student groups” (Kukulska-Hulme & Jones, 2011, p. 78). Thus, LMSs have become a fundamental element of todays’ Higher Education Institutions (HEIs), whether to support distance education or as a means to support BL (Washington, 2017). LMSs offer a virtual space for BL users to interact, communicate and discuss shared information (Schoonenboom, 2014). Hodges and Grant (2015) indicate that through effective use of LMSs, instructors can carry out constructivist-learning activities. How LMSs are implemented, how course material is planned, what strategies are used
to deliver the content, how students’ progress is assessed, and how their participation is monitored are integral concerns when LMS-mediated learning is integrated (Coates, James, & Baldwin, 2005). Therefore, although this software was created to manage users’ learning activities processes, instructors’ practice of LMSs must also meet the need of BL users to achieve this positive outcome (Tsolis et al., 2010; Washington, 2017). Therefore, without strong institutional and socio-cultural support and commitment including all stakeholders, it will not be possible to achieve the integrative, connective and interactive learning experiences LMSs promise (Dias & Diniz, 2014). Moreover, there has been little known about how LMSs are used by academics within BL environments (Beams, 2017).

2- Designing for activities based on active learning strategies

The usage of technology here is to expand learning opportunities and to enhance the quality of the teaching-learning experience, by designing interactive and authentic learning activities that consider the provision of meaningful assessment and feedback, support student-centred learning and also involve the use of interactive and collaborative learning activities. A learning activity is defined as “a specific interaction of learner(s) with other(s) using specific tools and recourses, oriented towards specific outcomes” (Beetham & Sharpe, 2013, p. 34) (Figure 7). This outline of a learning activity helps construct the design as a system. A number of social media or Web 2.0 tools are used to carry out these activities. The sphere of digital technologies has increased exponentially in the last decade, which makes it impractical to follow developments in every single technology. Thus, to focus on the most promising and appropriate ones, a critical decision is needed. It is essential to evaluate the fitness of each available technology for the oriented environment. In addition, deciding on a pedagogical approach builds up the learning objectives. Social media is defined as ”a group of Internet-based applications that build on the ideological and technological foundations of Web 2.0, and that allow the creation and exchange of user-generated content” (Kaplan & Haenlein, 2010, p. 61). Thus, social media is an expression to define a variety of technologies allied to collaboration and community (Joosten, 2012), where anytime, anywhere, on any device users can obtain collaborative, interactive and participative real-time content (Alasfor, 2016). The significance of social media in enabling effective teaching-learning practices in HEIs has been demonstrated by a number of studies (Manca & Ranieri, 2017). Students’ learning experience through social media can be enriched in different ways. Connectivism offers “a new perspective on how learning takes place in digital learning spaces” (Kathleen Dunaway, 2011, p. 683). According to Saeter (2015), from the constructivists’ understanding of interactions between students and their instructor, students can articulate meaning and improve understanding. Moreover, the student-centred approach or student-driven learning is more possible to obtain through social media means. Such an approach can develop students’ communicative ability, collaborative skills, critical thinking and creative aptitude, and promote life-long learning (Alasfor, 2016; Bussert, Brown, & Armstrong, 2008; Chayko, 2008; Collins & Halverson, 2009; Zgheib, 2014). Social media plays a vital role in enhancing the application of student-centred approaches in innovative and creative methods (Manca & Ranieri, 2017).
2.4.3 The implementation of BL and CHAT as the analytical framework of BL implementation

The implementation stage begins when users use an intervention (Rogers, 2003). “[The] implementation stage provides an opportunity for the instruction designed to be put to work in the environment where the need has been identified” (Onguko, Jepchumba, & Gaceri, 2013, p. 626). According to Wang, Han, and Yang (2015), “Blended Learning is dynamic to any complex system, on one hand, Blended Learning has the ability to maintain its inner structure and stability, and on the other hand, it has never been static” (p. 390). In this stage of the BL integration process, BL design is put into practice, allowing in-depth and dynamic interactions between BL design and other evolving structural, technical and socio-cultural elements, where academics as change agents play a vital role. The previous stages were a “strictly mental exercise of thinking and deciding. But implementation involves overt behavior change as the new idea is actually put into practice” (Rogers, 2003, p. 179). Through these interactions academics form greater understanding about the BL design they implemented and critically evaluate the outcomes from implementation. BL is described “as a living system” (Wang et al., 2015, p. 390), which has the power to reorganise itself within the spontaneous expansion of learning within and between its subsystems. Literature around the implementation of BL reveals a number of positive educational outcomes and at the same time explains a number of the challenges involved (Maarop & Embi, 2016). Implementing BL combines a mixture of instructional conception (e.g. Flipped Learning), contextualised sensitive issues affecting the implementation (e.g. the cultural acceptance of intervention), and time availability (wherein the nature of the intervention can impact the length of the implementation). Thus, utilising the CHAT perspective helps to provide a mechanism to

---

**Figure 7: An outline for a learning activity; adopted from (Beetham & Sharpe, 2013, p. 34) for designing active learning in technology-rich contexts**
understand the complexity of implementing BL. According to Karasavvidis (2009), CHAT “affords a holistic description of an activity system in terms of its basic components and interrelations” (p. 438).

- **Challenges facing universities implementing BL: focus on the Saudi context**

The literature reveals a number of BL activity-tools challenges facing Saudi academics in the transition to a BL approach in Saudi universities. Having inadequate knowledge when implementing suitable BL design creates a practical concern for Saudi academics (Alebaikan & Troudi, 2010). The deficiency of IT skills amongst Saudi academics is also problematic (Al-Sarrani, 2010). Asiri (2012) supports this view, observing that Saudi academics must gain fundamental skills and knowledge to successfully deal with technology in general and virtual environments in particular. Alhabeeb and Rowley (2017) identified instructional design knowledge as a critical factor, giving greater emphasis on developing academics’ knowledge about learning objectives and recommending that “decision makers should extend their focus beyond the technology to the instructional design and in particular to clear definition of learning objectives” (p. 145).

Moreover, the availability of technical infrastructure is a key need for Saudi universities; this includes the “LMS, networking, communication tools, and other facilities” (Alhabeeb & Rowley, 2017, p. 145). A comparative study by Alturise, Calder, and Wilkinson (2016) about ICT infrastructure between Gulf State and Saudi Arabian universities suggests that universities in Saudi Arabia require a further advance in their ICT infrastructure, comprising the establishment of appropriate Internet connection and proper training in the usage of ICT supplies. However, Alzahrani (2017a) reviews that Saudi universities have adequate ICT infrastructure, yet staff in these universities are not trained to use these ICT resources.

Regarding the activity subject (Saudi Academics), higher education academics worldwide appear to be concerned and apprehensive about BL as a teaching method (Brooks, 2008). According to Keengwe & Kidd, (2010), “faculty members may be hesitant about this shift due to the fact that they may lose autonomy and control of the curriculum, lack of technical training and support, and lack of release time for planning” (p. 3). In the Saudi context, although suitable ICT infrastructure has been more obtainable for Saudi academics than ever before, many academics are still unwilling to adopt educational technologies into the teaching-learning process (Al-Shammari, 2016). Therefore, Nash (2016) stresses that “the crisis of academic underachievement in Saudi Arabia is only going to get worse over time if neither faculty nor students are motivated to make a change” (p. 4). Notably, academics – as the subject of the activity – find their transformative agency and integration activity “evolves with its multimodal environment to produce learners with new learning behaviours, teachers with fresh skills and identities, and enhanced learning outcomes” (Wang et al., 2015, p. 390).

This presents the vital importance of understanding subjects’ transformative agency. This concept has been extensively acknowledged within educational practice; recognised “in its most active and positive forms, manifestations of transformative agency can be seen as subjects’ creative initiatives and suggestions for developing existing work practices” (Eteläpelto, Vähäsantanen,
Hökkä, & Paloniemi, 2013, p. 658). Thus, Eteläpelto et al. (2013) put forward an understanding of professional agency from a subject-centred socio-cultural perspective: “perspective understands individuals as being embedded in and imbued by their socio-cultural contexts; however, they are not seen as passive carriers of their contextual conditions, but rather as capable of transforming these conditions” (p. 47). (Figure 8) illustrates the definition of professional agency from a subject-centred socio-cultural perspective. However, within BL integration practices, the connection between socio-cultural aspects and subject-centred changes, and the effects of many of these changes on academics and teaching practices, are commonly undocumented (Ocak, 2011). Consequently, understanding the transformative agency of these academics can enhance our understanding of such a connection through the ways in which they construct discursive contradictions while talking about the changes towards BL. Haapasaari & Kerosuo, (2015) explain that “Transformative agency manifests itself when practitioners solve conflicts and disturbances during the development of their local activity and work practices” (p. 37).

The **object** of change to move educational practice from traditional to BL practices is affected by Saudi culture. Alebaikan and Troudi (2010) have observed that the dominant traditional culture within Saudi university challenges the new intervention of BL; it considers technology a hazard to norms and traditions. Although Saudi academics presented great awareness of technology integration’s importance and a willingness to employ new approaches based on technologies, this positivity appeared to be obstructed by traditionalist teaching. According to Al-Zahrani (2015a) “despite the fact that technology is seen [as] a high priority and a catalyst for improving levels of Saudi teacher preparation, traditionalism controls the process of technology implementation” (p. 8). Alzahrani (2017b) relates this phenomenon to the fact that a lecture-based teaching practice appears to be the central approach preferred by Saudi academics. Another challenge is the lack of definition about BL, as it is still in its early stage in the Saudi higher education context (Alebaikan & Troudi, 2010; Alghanmi, 2014; Alshathri & Male, 2015). As a result of the immaturity of BL in Saudi higher education it is challenging to access comprehensive literature (Al-Hassan & Shukri, 2017). According to Abdelrahman and Irby (2016), academic staff do not have one

---

**Figure 8: Professional Agency from a Subject-Centred Socio-Cultural Perspective.** Adapted from (Eteläpelto et al., 2013, p. 659).
definite definition of BL, but rather they have various definitions of it. Consequently, there are constant challenges when implementing any new method within the Saudi context.

The University Community: besides a deficiency of skills, academics worldwide identified the absence of support and training as the main obstacle to employing BL (Robinson, Myran, Strauss, & Reed, 2014). In Saudi higher education the fundamental challenge is providing professional development such as training and support (Hamdan, 2014). Almalki and Gruba (2013) emphasise that there is “a need to have a keen awareness of what was required to build a robust system for blended assessments, including technical, professional and pedagogical training resources for ongoing professional development” (p. 45). There should be continuous training for academics around the required skills necessary to construct BL and to constantly improve the usefulness of BL (Maarop & Embi, 2016). Essentially, proposing a range of professional development opportunities over a lengthier time scale might ensure a superior impact on academics’ long-standing technology-based teaching practices (Al-Madani & Allaafiajy, 2014; Alzahrani, 2017a; Kopcha, 2012). This view is stressed by Alabaddi, Rahahleh, and Al-Omoush (2016), who observe that both training and workshops were displayed to be the best approaches to grow academics’ abilities for dealing with e-learning systems. Further, Alabaddi et al. (2016) illustrate that the lack of cooperation and exchange of experiences among faculty members in Saudi Arabia has contributed to this problem of deficiency in professional development, and slows the positive change of technology-mediated pedagogy practice. All in all, “a major conclusion is that the implementation of BL in Saudi higher education requires a radical shift in the educational system, including changes to policy, curriculum, infrastructure, and university culture. The development should involve instructors, students, and administrators” (Almalki, 2011, p. 2).

The Community of Students: Saudi academics have a low estimation of students’ IT skills This problem has been recognised in the work of Alothman, Robertson, and Michaelson (2017) who indicate that there has in fact been a positive attitude about the use of technology amongst undergraduate students in Saudi Arabia, who use technology for an average of 45 hours per week. Despite this considerable use of technology in their daily lives, students did not frequently use technology to support their learning. A qualitative interview with students investigating the use of computers at university reported that computer skills were not a requirement for these students, and that in some cases the universities did not make available computing facilities, or indeed banned technology usage.

New roles and responsibilities: online teaching using technologies puts academics in a new, unfamiliar situation including diverse roles, obligations, and aptitudes (Almalki & Gruba, 2013). The needed time for developing online content presents a challenge for Saudi academics. Therefore, Alebaikan and Troudi (2010) recommended that professional development such as training programmes must be employed to mature Saudi academics and students to construct an effective BL practice. The study’s results indicated that adequate time to improve and continue course’s materials was found to be the biggest fear held amongst these academics. For these
academics, being able to carry out their teaching duties is challenging when facing such technological barriers, leading to a reluctance to introduce BL for fear that such technological issues would increase.

- **Benefits of implementing BL for universities: the Saudi context**

Worldwide HEIs have recognised a movement towards BL, moving away from both traditional practice and fully online teaching methods (Tayebnik & Puteh, 2013). Saudi HEIs are following this international movement (Alaidarous & Madini, 2016). Although there are extensive challenges present within the Saudi context while implementing BL, successful implementation has proven a number of beneficial outcomes for this context. Given the fact that the number of Saudi students has increased in recent years, with “more than 100,000 students annually” (Alzahrani, 2017a, p. 83), Saudi higher education would benefit from BL as it provides flexible learning styles to this increasing number of students; as different learners have different preferred methods to learn, one single method of delivering the content would not lead to positive outcomes. Previous studies within the Saudi context illustrate a positive perspective about BL amongst Saudi students (Alzahrani & O’Toole, 2017; Ja’ashan, 2015), and previous research also indicates the impact of different learning styles in Saudi students’ educational outcomes (Al-Saud, 2013; Alzahrani, 2017a). BL is important for Saudi students, not only to provide flexibility of delivering solutions that recognise the different needs of individuals but, as the literature demonstrates, to provide a possible solution to overcome the challenges facing Saudi higher education regarding promoting a higher order of thinking and moving beyond memorisation, by promoting critical thinking skills through active learning activities that incorporate different learning theories and innovative technologies (Aljohani, Davis, Ally, & Jalal, 2016; Hamdan, 2014; Sheerah & Goodwyn, 2016). Furthermore, Manwaring, Larsen, Graham, Henrie, and Halverson (2017) stress that instruction based on BL develops the possibility to expand students’ engagement and motivation to achieve better learning. It has been supported in the literature that engaging students in technology-enhanced learning environments that are well structured and responsive to their needs could help increase their ability to effectively engage in group-work: “Blended Learning connects people, activities and events through technology. It is a key tool for building and sharing cultural understanding on a global basis” (Azizan, 2010, p. 460). This would allow the practice of non-traditional teaching methods, as traditional teaching has been criticised as the main reason behind the weakness of Saudi education outcomes that have been rooted for years (Al-Zahrani, 2015b; Alebaikan & Troudi, 2010; Alzahrani, 2017a; Sheerah & Goodwyn, 2016).

2.4.4 **Articulating BL principles and CHAT as the evaluative framework**

Articulating BL principles occurs in the final evaluation stage of the process of BL integration. Evaluation is defined as “a procedure that involves the comparison between a real situation and what is (highly) expected... and what is expected of the evaluation object” (Pombo & Moreira, 2012, p. 203). This reflects Engeström’s (2018) comments about expected new activities: “In important transformations of our personal lives and organisational practices, we must learn new
forms of activity which are not yet there. They are literally learned as they are being created” (p. 58). Thus, this phase is considered a vital one, and at the same time it is a broad and complex topic. Academics at this stage might form some experiences about BL which gives them a tool to evaluate the kind of challenges and opportunities that they experienced in previous stages, both throughout the process of BL integration in developing their teaching and creating the move from the traditional teaching to BL. “The purposes for evaluation may be many, but always evaluation attempts to describe something and to indicate its perceived merits and shortcomings” (Kemmis, 1986, p. 117). Therefore, there has been recognition of the need for an appropriate framework to approach the evaluation of educational innovations such as BL. Pombo and Moreira (2012) suggest four main questions to guide the process: “who should evaluate?, how and when to evaluate?, what should be evaluated?, and what to evaluate for?” (p. 201). Literature in this area has shown that CHAT helps evaluate such complex, broad and important stages of educational innovation such as BL integration (Feldman & Weiss, 2010; Karasavvidis, 2009).

2.5 Summary

In the last decades, BL has been argued to be the future of higher education; the rationale behind such a view emerges from the fact that BL integrates the best features of F2F and online-based practices with more opportunities to enhance the educational system’s quality. At the heart of such an integration process is the role of academics in adopting educational technology innovations. This literature review chapter aimed to explore the concept of BL and its essential integration stages of analysis, design, implementation and evaluation. It also explained the role CHAT plays in conceptualising these stages. For example, using CHAT in the first stage of DBR (analysis of practical problems) helps the teachers and the researcher to examine a complicated activity system through the identification of the activity’s contradictions. These contradictions are forces to shape to the second stage (designing of solutions) and further expand understanding of the object of BL. While designing solutions, the introduction of new knowledge and new elements brings about additional contradictions. Moving the design into practice in stage three of DBR (implementation) takes the academics activities of integrating BL into more interactional and practical activities where new contradictions are formed. Having experienced such activities helps academics to form future-practice principles in the last stage of DBR (produce design principles) as they were able to identify the kind of contradictions that might govern the obtainment of desire future practice. The next chapter discusses this in a more methodological sense (see section 3.2.3 in chapter 3 for more details about why CHAT and DBR are combined).
Chapter 3: The Research’s Theoretical Foundation, Design and Methodology

3.1 Introduction

This chapter presents the research design planned to understand discourses around integrating BL in a complex real-world learning organisation. It seeks to shed light on how practitioners construct the meaning of change efforts towards BL. The integration of BL means transforming practitioners’ daily activities from traditional practices by moving to the creation of blended-based instructions of teaching activities, thereby creating a transformative agency. This involves practitioners moving their stance of being passive actors of traditional education to activist educators pursuing change through BL practice. This chapter discusses the research assumptions, informed by the CHAT-inspired DBR methodology and how these methodologies informed the conduct of the research.

3.2 Bringing Cultural-Historical Activity Theory (CHAT) intervention approach and Design-Based Research (DBR) together

3.2.1 What is the methodological approach of design-based research (DBR)?

The methodological approach of DBR is defined as:

A systematic but flexible methodology aimed to improve educational practices through iterative analysis, design, development, and implementation, based on collaboration among researchers and practitioners in real-world settings, and leading to contextually-sensitive design principles and theories (F. Wang & Hannafin, 2005, p. 6).

The methodology of (DBR) has been used to conduct this study due to its consistency with the landscape of the research aims and objectives (Figure 9). For over a decade, in technology-enhanced learning research, a methodology of DBR’s has been a beneficial approach (F. Wang & Hannafin, 2005). DBR is used interchangeably in the literature with other terms like ‘research development’ and ‘design experiments’ (Brown, 1992; Kelly, 2004; Reimann, 2011). Despite the number of terms used to refer to DBR or its conceptualisation, all of them share a common theme, which consists of three core elements required to engage in its research approach: (a) a designer (researcher), (b) a practitioner (lecturers) and (c) an artefact (Blended Learning) (Juuti et al., 2006).

DBR has been a helpful tool in bridging the gap between research and educational practices through active engagement in a real-world educational setting, by making research more relevant to the learning environment (Anderson & Shattuck, 2012). It is particularly useful in education when integrating interventions to bring an understanding about real-world learning environments (Joseph, 2004). A DBR approach is most promising with regard to: (a) investigating possible ways to produce innovative teaching-learning settings; (b) developing contextual learning and
instruction theories; (c) developing design knowledge, and (d) raising the ability for innovative education (Collective, 2003). The central concern in DBR is innovation in teaching and learning that prioritises the pedagogical practice of technology, addressing the problem (Kelly, 2004). DBR is related to the notion of the ‘semantic turn’, where design in DBR as an artefact holds a specific meaning that can be interpreted by practitioners within a specific context in relation to a specific practice (Luckin et al., 2013). Intervention within DBR can involve a variety of methods: tool-based interventions, learning-based activities or the curriculum (Collective, 2003).

![Design-based research methodology](image)

**Figure 9: Design-based research methodology (Reeves, 2006, p. 59)**

### 3.2.2 The function of DBR in this research

Through DBR, this research provides an opportunity to understand the discourses around BL in Saudi higher education, opening the door for research to enter the real-world problem of analysing, designing, implementing and evaluating BL. The stages of DBR are taken as activities or sets of sequence events in which the research participants (Saudi academics) have an active role. Hence, it supports the understanding of how these academics make sense of and construct meaning from what appear to be contradictions around BL-integration activities as a novel event in their teaching practice, and how these contradictions shape their transformative agency. The systematic and flexible nature of DBR makes it an effective tool to study BL in its real setting, given the complex nature of BL that can take a place in a complex learning environment (Garrison & Kanuka, 2004). This helps by extracting evidence and meaning from different means in a systematic method. In a review by Anderson and Shattuck (2012) about the application of DBR over the last decade, a number of criteria are identified that enhance the quality of DBR. These criteria have been used to illustrate how DBR is applied in this research.

- **DBR is essentially situated within the educational context**

The drive or inspiration behind DBR is closing the gap between learning research and classroom practice by situating the research in a certain context (Reimann, 2011). DBR situated in an educational context can generate validity for the research (Anderson & Shattuck, 2012). This research is situated in Saudi higher education institutions, where three academics were asked to enter the stages of DBR and therefore shift their teaching practices from traditional to blended based teaching. Thus, it is typical of similar contexts.
• **Major intervention is the focus of designing and testing activities**

The intervention is built around collaborative efforts between researchers and practitioners. The intervention is selected and created based on analysis of current practices on related literature, theoretical relevance, and applicable practice from different contexts (Anderson & Shattuck, 2012). Quality of design is an important factor that can impact the quality of the research, where the primary concern of the intervention is to solve specific identified practical educational problems (Anderson & Shattuck, 2012). The design encompasses the whole learning environment, including all possible elements – software, hardware, human-technology interactions and curriculum – at different levels (i.e. the teacher level or student level) (Reimann, 2011). In this research, however, BL is taken as a general solution; the design of BL has taken into account the fact that different courses need different design agendas. According to (Collective, 2003):

> Design-based research goes beyond perfecting a particular product. The intention of design-based research in education is to inquire more broadly into the nature of learning in a complex system and to refine generative or predictive theories of learning (Collective, 2003, p. 7).

Thus, the design seeks to be more responsive to the nature of the course and the needs of practitioners, rather than perfecting the design of BL.

• **DBR allows the use of mixed methods**

DBR favours the use of mixed methods (qualitative and quantitative), which gives researchers an option to engage with design in a real-world setting. However, this research approaches DBR entirely qualitatively, building on the main concern of the research, which is to understand how the differing approaches of Saudi academics towards BL integration are socially constructed, and how they are professionally constructed by such approaches during the integration process of BL. The argumentative grammar stance, which is defined as the logic behind the research method and the fundamental reasoning of its data (Kelly, 2004), the argumentative grammar of DBR is based on qualitative research and its inherent strengths and weaknesses (Reimann, 2011). Andriessen (2006) points out that the nature of design-based research is that it allows the use of various methodologies. DBR allows researchers to be methodologically creative due to the pragmatic nature of DBR (Shah, Ensminger, and Their, 2015). The work of Godino et al. (2013) and Barab (2006) produces other images of DBR, presenting it as a family of methodological approaches where design and research symbiotically target solutions to practical educational problems. DBR is more suitable for a PhD project than an experimental study (Luckin et al. (2013). DBR usually takes on an open-ended format of data collection, such as the ‘semi-structured interview’. Herrington, McKenney, Reeves, and Oliver (2007) suggest different methods of data generation for different stages of DBR. Thus, a number of methods for data generation are used at different stages of DBR to meet different needs. Moreover, in terms of data analysis, different methods of data analysis have been adapted to DBR, such as content analysis, discourse analysis and interaction analysis (Luckin et al., 2013). This research uses the DP method of
analysing the data as it meets the research’s epistemological stance.

- **DBR involves iterative cycles**

  The iterative element of DBR is both a methodological strength and challenge. It is challenging in the sense that it is not possible to assume if the project is completed and has come to an end, or whether more iteration is needed because, in theory, iteration never ends. Moreover, it exceeds the time and resources available (Anderson & Shattuck, 2012). On the other hand, it brings strength, due to the fact that it enhances research validity (Collective, 2003). Importantly, when conducting DBR methodology in PhD study, one iteration has been argued to be appropriate (Luckin et al., 2013). Nevertheless, the iteration in this research could be described as case iteration, where three practitioners applied BL in their courses with their students. Different technological and pedagogical tools were used in different educational contexts by different practitioners, which demonstrated a number of iterations of the design. Furthermore, through the process of design and implementation, a number of adjustments were made to modify the initial design to make it more responsive to the practical problems.

- **Researchers and practitioners can work collaboratively**

  DBR can be fitted within the participatory research principle, where researchers and practitioners collaboratively engage in an activity aimed at achieving a shared objective. As for the researcher in DBR, he/she plays two main roles, the first being design and the second being research (Reimann, 2011). This dual function is also true of research participants who perform two main activities, namely design and implementation. Moreover, in DBR, research participants and the context in which they carry out their daily activities cannot be studied in isolation (Herrington et al., 2007). Participants in DBR are not only allocated to be treated in a certain way, but they are also co-participants actively participating in the activities of DBR stages (Barab & Squire, 2004). Researchers in DBR also actively participate in both design and research (Barab & Squire, 2004; Wang & Hannafin, 2005). Both participatory modes of researcher and participants are oriented towards two simultaneous activities: the activity of designing new solutions and the activity of producing new theoretical understanding. Such partnerships help to bring validity to the research (Collective, 2003). This active participation of research participants and the researcher in a real-world setting can reveal the hidden discourses of BL. Working collaboratively allows the phenomenon to be understood from different points of view and also allows for the professional development of both researchers and practitioners (Shah et al., 2015).

- **Design principles must be evaluated in DBR**

  The evaluation of design principles is a key aim and key strength of DBR, which typically occurs in the final stage (Anderson & Shattuck, 2012). For this research, a focus group is used to evaluate the design, but more importantly to understand the discourses that these academics construct when they evaluate their experiences by integrating BL. Such evaluative discourses
support the understanding of a contextualised need for intervention to be adjusted and for further work to be conducted effectively.

- **DBR in comparison to Action Research and other types of education research**

Researchers and practitioners barely differentiate between DBR and action research, as both share common epistemological, ontological and methodological foundations (Anderson & Shattuck, 2012). Although, DBR draws from diverse types of research, there are unique aspects that distinguish it from research such as applied or evaluation education research (Shah et al., 2015). These include the fact that DBR allows the interactive generation of theoretical and practical knowledge, where both contribute to developing each other. Using Stoke’s model of scientific research and knowledge generation (Figure 10), this truly places DBR on Pasteur’s quadrant, which aims to develop both theoretical and practical knowledge (Shah et al., 2015). This makes DBR more appropriate to this study comparing with action research.

![Figure 10: Model of Scientific Research and Knowledge Generation Adapted From Shah et al., 2015, P. 154, P. 154](image)

- **Practical impact on practice**

In comparison with other qualitative research, DBR aims to provide an account of practical theory (Reimann, 2011). Shah et al. (2015) assert that the ultimate aim of DBR is to link theory, innovation and practice together to bridge the divide between theory and practice as the main sources of scientific knowledge identified by Stokes (1997). Thus, “relevance to practice” is one of the core criteria for DBR, where the researcher needs to demonstrate the impact of the theory and intervention in the local practices and allow the reader to make sense of how the conclusion has been reached (Gutiérrez & Penuel, 2014). In this study, the main research question is to understand how Saudi academics construct meaning in their different approaches towards BL integration during different stages of DBR. The identification of discursive contradictions from the various academics has allowed the understanding of how the intervention has been applied.
3.2.3 Background information about Cultural-Historical Activity Theory (CHAT)

Cultural-historical Activity Theory is defined as a:

"philosophical and multi-disciplinary framework for studying different forms of human practices as developmental process, with both the individual and social level interlinked at the same time" (Kuutti, 1996, p. 25).

It has been used extensively in the educational setting, especially its well-known triangular representation produced by Engeström. Literature in CHAT refers to three phases or generations (Engeström, 2001; Roth & Lee, 2007). The Russian philosopher Vygotsky proposed what is called the first generation of Activity Theory (AT). This phase originated during the 1920s to 1930s, and was deeply rooted in the classical German philosophy of Kant and Hegel. Additionally, Vygotsky based his theory on the Marxist political theory of collective exchange and material production to examine the dialectic between individuals and their environment (Luria, 1979; Scanlon & Issroff, 2005; Stetsenko, 2005). Vygotsky’s AT is centred on the idea of tool-mediation in humans. This idea has been presented in his well-known triangular model to explain the social formation of the human mind; the relationship between the stimulus (S) and response (R) (Engeström, 2001). This relationship is never direct, but there is always a conditioned cultural connection which leads to complex human actions; such an addition of the culture artefact into human actions is a progressive idea that links the individual to their society (Engeström, 2001; Wertsch, Tulviste, & Hagstrom, 1993). This can be seen in (Figure 11), which presents the basic graphic of mediated-action. Both the subjective and objective world are mediated by material that has been produced by individuals or society.

![Figure 11: Vygotsky’s model of activity theory, adapted from (Engeström, 2001, p. 134)](image)

Vygotsky addressed many areas in psychology; the main ones are human consciousness, language and higher levels of mental functioning, the development of the scientific concepts, and childhood development including the concepts of ‘internalisation’ and the ‘zone of proximal development’. He was one of the first psychologists to contribute to a constructivist epistemology. He said that the way in which individuals construct knowledge and meaning of their world is by actively interacting and engaging with their environment in goal-oriented activities while they network with artefacts and social others within that environment (Yamagata-Lynch, 2003). The social construction of human minds results in the interaction between individuals, artefacts and social others (Wertsch, 1988). However, Vygotsky’s work has been criticised for being individual-centred and for not sufficiently expressing cultural developments (Yamagata-Lynch, 2010).
The second generation of CHAT was developed by two of Vygotsky's students, Luria and Leontiev, both of whom strove to encompass social, cultural and historical dimensions to further understand human mental function, as was first proposed by Vygotsky. This led to what constituted the second generation of AT (Eilam, 2003; Roth & Lee, 2007; Stetsenko, 2003; Stetsenko & Arievitch, 2004). The second generation, which was centred around the Soviet psychologist Leontiev, has come to be known as the cornerstone of AT (Roth & Lee, 2007). While the dyadic interaction between a child and an adult or a superior other is the focus of Vygotsky's work, Leontiev's work distinguishes between the actions of individuals and collective activity, as exemplified in his famous 'primeval collective hunt' (Engeström, 2001). He argued that object-oriented activity should be the object of the study, not objective behaviour or subjective conciseness. For Leontiev, in human activity, the subject-object relationship was not considered different anymore, but more interdependent (Davydov, 1999), a dialectic. When looking at the division of labour in human activity, Leontiev differentiates three levels of object-oriented activity: activity, action and operation. The graphical presentation of the second generation below has been illustrated by Engeström to present Leontiev's ideas (Figure 12).

Engeström (1987) formulated the third generation of AT, which is known as activity system analysis, and is based on both Vygotsky's tool-mediated activity and Leontiev's work on object-oriented action into collective activities. In addition, Engeström's model is utilized to map the development of change and practice through the interactions between individuals or a group of individuals and their context, and how they affect each other (Yamagata-Lynch, 2010). This model takes into account the dialogue, multiple perspectives and networks of interacting activities to explain learning and the facilitation of transformative change. In this model, the object-oriented activity is the unit of analysis, which moves from being too person-focused, when compared to the last generations of AT (Engeström, 1987).

Engeström's model is presented in a triangle diagram, where the top triangle presents Vygotskian mediated-action and the subject of the activity stands for an individual or a group of individuals participating in the activity (Figure 13). The tool of the activity is the resource of artefacts, tools and social others in the activity within the environment. The object is the activity's motive. Thus,
Activity system components are not secure and are subject to inner contradictions, which may occur as a result of tensions. Tensions are inherently attached to human activities and do not occur by chance (Engeström, 1987; Engeström, 1996). Tensions can hinder or help the accomplishment of the object of activity when the subject experiences a contradictory situation. Wherein, being conditioned by the activity component’s governing the subject from attaining the object of the action or affecting the way in which subject is participating towards achieving the object (Engeström, 1993). Engeström identified five principles that underpin the CHAT foundation:

- The first is the main unit of analysis and is the “collective, artefact-mediated and object orientated activity system” (Engeström, 2001, p. 136)
- The second principle is the multivoicedness involved in the activity systems. Within an activity, diverse positions for participants are formed as they take different divisions of labour. The participants in an activity bring their own distinct histories, wherein the activity system brings several levels and components of history inherent within its artefacts, and rules (Engeström, 2001)
- Historicity is the third principle. For Engeström, any activity being formed and developed takes extensive time. Thus, the relevant history of the activity and its objects requires careful attention (Engeström, 2001)
- The central role of contradiction is the fourth principle of CHAT; contradictions are seen as causes of change and growth for the activity. These contradictions can be found at different levels of the activity systems: primary, secondary, tertiary and quaternary contradiction levels, as presented in Yamagata-Lynch and Haudenschild (2009) in the following table:

<table>
<thead>
<tr>
<th>Primary contradiction</th>
<th>When activity participants, encounter more than one value system attached to an element within an activity that brings about conflict</th>
</tr>
</thead>
<tbody>
<tr>
<td>Secondary contradiction</td>
<td>When activity participants encounter a new element of an activity, and the process of assembling the new elements into the activity brings about conflict</td>
</tr>
<tr>
<td>Tertiary contradiction</td>
<td>When activity participants face conflicting situations by adopting what is believed to be a newly advanced method for achieving the object</td>
</tr>
<tr>
<td>Quarternary contradiction</td>
<td>When activity participants encounter new changes to an activity that result in creating conflicts with adjacent activities</td>
</tr>
</tbody>
</table>

Table 1: Level of contradictions, adapted from (Yamagata-Lynch & Haudenschild, 2009, p. 510).
The fifth principle asserts the opportunity of expansive transformations in activity systems. This happens when the activity object is reconceptualised to comprise new possibilities for development to meet the need of individuals who questioned the norms of the previous activity. This expansive transformation can be pictured during the journey of individuals’ collective change efforts (Engeström, 2001).

3.2.4 Why DBR and CHAT should be combined: CHAT-inspired DBR methodology

Combining DBR and CHAT has its place of discussion within recent literature. Engeström claims that DBR “suffers from serious built-in weaknesses” (Engeström, 2011, p. 602). However, he does state that discourse around combining DBR and CHAT is useful, as he states that “bringing design-based research and activity-theoretical formative intervention research into dialogue is commendable” (Engeström, Sannino, & Virkkunen, 2014, p. 118). Similarly, Penuel (2014) asserts that the dialogue between DBR and CHAT can add more value to the knowledge generated from design research. Although, DBR presents numerous benefits for research in educational technology, it also presents methodological challenges for researchers. Some of the challenges associated with DBR can be found in its methodology or method approach, or in the presenting and reporting of findings. Most of these challenges have emerged due in part to the fact that DBR is in its infancy, which largely explains why its methodological foundations are still being challenged (Barab & Squire, 2004; Collective, 2003). From the methodological and method perspective, articulating argumentative grammar for DBR is challenging, and establishing a methodological underpinning is a constant task (Reimann, 2011).

In this research, it could be argued that the flexibility of DBR and its theory-driven nature allows the DBR researcher to develop argumentation based on the need and the nature of the research agenda to solve the above problems. Moreover, the use of CHAT in different stages of DBR could provide strength to the research’s argumentative grammar. In DBR, researchers are interested in studying a phenomenon as sequences of events, which constitute the learning trajectory of

![Figure 13: Adapted from (Engeström, 2001, p. 136).](image-url)
participants. The appropriate argumentative grammar for DBR is that which represents a direct investigation of a causal process (Reimann, 2011). This research has adopted CHAT to drive the understanding of the causality mechanism in its concept of contradictions and to frame the research stages with the necessary theory of analysis, design, implementation and evaluation. DBR involves a set of human activities that take place in a certain context where human interaction, whether personal or contextual, must be taken into consideration. CHAT can provide a useful theoretical framework to understand such interactions. The following section will address the main reasons relevant to bringing DBR and CHAT together (Table 3).

<table>
<thead>
<tr>
<th>Design-Based Research</th>
<th>The importance of CHAT</th>
</tr>
</thead>
<tbody>
<tr>
<td>DBR deals with complex learning</td>
<td>CHAT helps understand the complexity of the learning environment by mapping human activity into components that reflect the relationship between the subject and the sociocultural setting</td>
</tr>
<tr>
<td>environments</td>
<td></td>
</tr>
<tr>
<td>DBR produces huge amounts of data</td>
<td>CHAT helps abstract the essence of complex data sets</td>
</tr>
<tr>
<td>DBR deals with technological</td>
<td>CHAT helps avoid ‘technological determinism’ by focusing on the activity system rather than technologies</td>
</tr>
<tr>
<td>innovation</td>
<td></td>
</tr>
<tr>
<td>DBR aims to improve educational</td>
<td>CHAT allows investigators to be involved in future-making practice by understanding systemic contradictions and tensions</td>
</tr>
<tr>
<td>practice</td>
<td></td>
</tr>
<tr>
<td>DBR includes researchers</td>
<td>CHAT helps the researcher to focus the design on the identified contradictions framed from practical problems faced by practitioners, rather than shaped by the researcher’s own perceptions</td>
</tr>
<tr>
<td>within the intervention process</td>
<td></td>
</tr>
</tbody>
</table>

**Table 2: bringing DBR and CHAT together**

- CHAT helps understand the complexity of the learning environment when employing DBR

The implementation of DBR takes place in a complex learning environment where controlling human activities in its social-cultural setting is unmanageable. The ability to sustain interventions in a complex setting where the prediction of problems is difficult is one of the challenging factors which BDR researchers have to face (Collective, 2003). In this research, although DBR provides a systemic and flexible methodology to incorporate design into research in practice, it does not provide researchers with the essential tools, frameworks or theory of analysing, designing or even methods of evaluation of the design. In this sense, it leaves the door open to researchers and practitioners to adopt contextualised, localised and responsive theory that could help answer the research’s specific questions around DBR. In addition, both the triangulation of data generation methods and the length of fieldwork provide tools to deal with such complexity. This is described
as a salient feature of DBR in which the researcher can contextualise the research agenda by utilising different theories (Brown, 1992). Moreover, one of the problems faced by the DBR researcher is the dual demands of improving educational practice and understanding the learning process (Sandoval, 2014). Thus, combining CHAT with DBR offers a foundation to capture human activities in their real setting, as CHAT provides a well-structured map of human interaction in the natural setting. Jonassen and Rohrer-Murphy (1999) suggest that CHAT is able to provide a different lens for researchers, with regard to the analysis of the learning environment, and its process and outcomes, especially for the aim of designing instruction. Applying CHAT as a theoretical framework to studying individual activities allows researchers to overcome the lack in DBR for managing the complexity of the learning environment (Yamagata-Lynch, 2010).

**CHAT helps extract the essence of the complex data set generated when employing DBR**

The presentation of DBR findings is another challenging factor for the DBR researcher (Barab, 2006). Presenting findings in ways that represent the contextualised research problem, but can be generalised to other contexts, is known to be a problem in DBR (Kali, 2008). Others such as Barab and Squire (2004) have suggested that the findings need to reflect the aim of DBR by dialectically presenting the theory, design and relative literature in the reporting of the research findings. The challenges for DBR are:

How do we know that the effects observed are causally related to the design? How do we know that they are not related to any of the other elements of the context, or what the specific combination of design and context was? How do we know that the effect did not occur purely by chance? (Reimann, 2011, p. 43)

Although DBR has the potential to provide insight into the real-world complicated activity of BL, it may pose challenges to researchers. These challenges relate to managing, analysing and presenting the collected data, as DBR usually produces complex data sets. Yamagata-Lynch (2007) suggests that using CHAT for activity systems analysis provides plentiful potential to manage the complex data sets generated from qualitative DBR. Yamagata-Lynch observed:

Activity systems analysis provides a new method to extract meaningful information from massive and complex qualitative data sets and to conceptualize how real-world phenomena are entrenched within the situation that is being examined. (Yamagata-Lynch, 2007, p. 6).

**CHAT helps avoid ‘technological determinism’ that might be derived from only employing DBR**

The design of the solution is the definite aim of DBR, where creative ideas and tools are integrated together as a way of studying educational technology’s impact in real-world settings (Markauskaite, Freebody, & Irwin, 2010). Engeström (2011) criticises that the concept of the
‘learning environment’ leads DBR to focus on learning technologies more than the activity systems (Penuel, 2014). Oliver (2011) argues that educational technology researchers in their studies discuss technology in a ‘technologically deterministic’ manner. In order to avoid this, an approach that sees technology as only one element of the research process is required (Kaptelinin and Nardi, 2006). From the CHAT perspective, technology is a tool that assists participants in the transformation of the object and facilitates the interaction. Engeström’s criticism of DBR is based on the concept of ‘learning environment’ driving the DBR researcher to focus their efforts on technology, rather than the activity system (Engeström, 2009, 2011), hence, his rationale that the CHAT-based concept of activity is more methodologically and theoretically valuable to understanding interventions.

- CHAT allows investigators to be involved in future-making practice by understanding systemic contradictions and tension

Engeström (1990) portrays an activity system as "a virtual disturbance-and-innovation-producing machine" (p. 11), putting the emphasis on the significance of contradictions in driving change and innovation. In alignment with this, Robertson (2007) indicates the importance of Activity Theory in the field of BL: "Activity Theory [has been] shown to be successful in identifying the tensions/contradictions that emerge when the two activity systems of face-to-face teaching and e-learning technologies come into juxtaposition" (Robertson, 2007, p. 77). CHAT provides richer evaluations of learning settings than other available evaluation tools when attempting to identify the contradictions within the activity systems (Scanlon & Issroff, 2005). The rationale behind the use of CHAT is because of its potential as a practice-based theory that encourages investigators to get involved with ‘future-making’ practices (Sannino, Daniels, & Gutiérrez, 2009).

- DBR includes researchers within the intervention process

Engeström (2011) asks “who does the design and why?” (p. 3), claiming that the problem of DBR objects is that design is driven by the researcher’s desire to finish and complete the research, paying less attention to the research participants. From Engeström’s view, such a desire is certain to lead to failure, in particular when the design solution ignores the agency of its associated members, such as teachers or students (Penuel, 2014). Furthermore, Penuel states that “if agency is not a central concern in methodology, there is something seriously wrong with it” (Engeström, 2011, p. 603). There is also the notion that causality is neglected in DBR literature, while the variable-oriented approach is implicitly enclosed within DBR (Engeström, 2011). DBR researchers usually give less attention to the activity of design (Reimann, 2011). CHAT helps the researcher to focus the design on the identified contradictions that are framed from practical problems faced by practitioners, rather than shaped by the researcher’s own perceptions. The researcher plays the double role of designing and researching; therefore, the researcher needs to control their desire to lead the change and engage practitioner-led change.
3.3 CHAT-inspired DBR methodology and method of data analysis

3.3.1 Stemming from social-cultural planes of data analysis

Three planes for sociocultural data analysis are suggested by Rogoff (2008): personal, interpersonal and institutional/community planes. In this research, the drive behind using CHAT is to understand human activities related to academics’ activities of analysing, designing, implementing and evaluating aspects of BL integration amongst individual members of the historically accommodating and collective educational setting. However, these activities occur in a setting in which it is challenging to capture all of its complex aspects. In the personal plane, the subject of activity is individual. In the interpersonal plane, the subject is a group of individuals, while the collective goals of the community are the subject of the community plane. Rogoff (2008) articulates that researchers tend to focus on one plane and ignore others due to the complexity of data. She suggests that, for the researcher to avoid being overwhelmed in the analysis, as an alternative, they could zoom into one plane of analysis during research, thus blurring the other two. In her view, blurring does not mean ignoring, but rather shadowing the relevant characters of the unstudied planes that are still crucial and related to the zoomed-in plane of analysis to assist the understating of intricate activities, as these planes are inseparable (Yamagata-Lynch, 2003, 2010). Thus, it is critical for researchers to clarify for both themselves and readers of their work which plane is being used in their studies.

The objective of this study is to consider the three planes of sociocultural analysis and generate data that captures all of them, although this study attempts to zoom in to focus on the interpersonal plane where the subject of the activity is a particular group of individuals (in this case, Saudi academics). Therefore the study seeks to understand the phenomenon under study by zooming in on the interpersonal plane, whilst referring to aspects from other planes where relevant. The interpersonal plane is described by Rogoff (2008) thus:

[It] stresses the mutual involvement of individuals and their social partners, communicating and coordinating their involvement as they participate in socioculturally structured collective activity [...] whether or not they are in each other’s presence or even know of each other’s existence [...] Participation requires engagement in some aspect of the meaning of shared endeavors, but not necessarily in symmetrical or even joint action (p. 6).

In this plane perspective, the transformation of sociocultural activity is a consequence of the interaction amongst all personal, interpersonal and institutional processes (Rogoff, 2008). Notably, each component of the activity system is dialectically unified to both the individual others and to the whole at the same time, in the logic that tensions tend to cause ground-breaking changes to the activity system. Commonly, CHAT researchers follow Engeström’s model for the activity system, which comprises subject, object, meditational tools, rules, community, division of labour and the activity’s outcome. However, Engeström and Sannino (2011) indicate that “there is a risk that contradiction becomes a fashionable catchword with little theoretical content and analytical power” (p. 368). Thus, using appropriate analytical method is needed to identify
contradictions in effective way. This leads to the discussion about the appropriate method of data analysis to identify contradictions.

3.3.2 CHAT-inspired DBR methodology and the role of dialectical contradictions in this research

This research adapts CHAT-inspired DBR as a methodological approach; to understand the discourses around how Saudi academics integrate BL as a transformative pedagogical tool where they construct new social practice within their social-cultural environment, and how as a result such a change constructs their transformative agency. The active quality of human beings and becoming throughout change and contradiction is the fundamental principle within dialectical thinking (Ilyenkov, 1977). This emphasises the role of dialectical contradictions as a central concern in this research, and as a dynamic resolution of understanding the discourses around the ‘being’ and ‘becoming’ of research participants during the change efforts in DBR stages and the contradictions that they face. BL integration is not a cognitive activity; however, it is a practical activity that occurs within a structure of activity systems, in which subjects’ agency and the sociocultural materials constitute each other. (Grimmett, 2014) states that:

Agency is not only a socioculturally mediated awareness of the possibility for changing our current position and competences within the existing expectations and limits of our sociocultural situations; but also the mediated capacity to act, by using cultural resources, in order to actually transcend these (Grimmett, 2014).

Contradictions are contextualised within dialectical approaches and change over time (Roth & Lee, 2007), in which structural conditions of the activity system therefore empower or restrict the activity’s subject. Dialectically, in the subject’s transformative agency, such structural conditions (the components of the activity) are formed and reformed. The dialectical approach of thinking has its roots in the traditions of Hegel and Marx and has its own place with a number of critical thinkers, such as Bakhtin (Mumby, 2005). Hegel in his concept of sublation rejects the separation between subject-object as two different entities and argues that they actually constitute each other. The dialectical contradiction is the unity of two opposite forces, intertwined in their shared opposition.

Dialectics aims to understand phenomena concretely, in all their movement, change and interconnection, with opposite and contradictory sides as constitutive parts of the same unit … In dialectical logic, contradictions are not evils but the engine of development. That is, development arises from the resolution of contradictions and conflict. (Roth, 2002, p. 165).

Although this idea of the dialectical approach is not an easy task to master given its historical origin, going back to Hegel and Marx, it explains the increasing interest in CHAT as a theoretical framework (Langemeyer & Roth, 2006).
3.3.3 Dialectical contradictions require an appropriate method of data analysis

The concept of contradiction is crucial to this research as a causal mechanism of change and development towards the object of BL integration. Contradiction is defined by Kuutti (1996) as “a misfit within elements, between them, between different activities, or between different developmental phases of a single activity” (p. 34). However, there has been an ambiguous and indefinite meaning linked to the understanding of contradictions in recent literature. Engeström and Sannino (2011) highlight three common shared misunderstandings of contradictions where their core nature has been ‘watered down’ in recent research. Firstly, due to the lack of theoretical clarity for contradictions, commonly occurring tensions or noticed problems appear to be regarded as contradictions, which weakens and loosens its actual meaning. In addition, the use of terms that have been substituted and associated with the notion of contradiction, such as ‘paradox’, ‘conflict’, ‘dilemma’ and ‘double bind’ have been troublesome to research. Secondly, contradiction is prototyped within research ambiguously, with a lack of the historical and constructional socioeconomic materialisation of capitalism. Thirdly, research tends to present contradictions in unbalanced and uncombined collections of conflicting priorities. This vagueness about the use of contradiction, theoretically and analytically within research, encouraged Engeström and Sannino (2011) to develop a framework for identifying contradictions, given the fact that it is not possible to directly observe them. Thus, the developed framework suggested that contradictions could be identified through their manifestations. The main aim is to provide the CHAT researcher with a more robust and rigorous framework for analysing contradictions (Figure 14). According to Engeström and Sannino (2011), contradictions never present themselves, but they can become recognisable when the activity’s subjects construct and exhibit them within the talks and actions through which they attempt to develop a sense of master skills, and transform the emergent contradictions. “As contradictions are historically emergent and systemic phenomena, in empirical studies we have no direct access to them. Contradictions must therefore be approached through their manifestation” (Engeström & Sannino, 2011, p. 371).

![Figure 14: Methodological onion for analysing contradictions in discourse data; adapted from (Engeström & Sannino, 2011, p. 375)](image)

Organisations are discursively constructed social realities, and discourses are the builders of contradictions, focusing on irony or the humorous remarks of discourses (Hatch, 1997). Nevertheless, Engeström and Sannino (2011) describe this approach as an interesting way to
analyse contradictions; they assert that it is a restrictive approach and, as such, a methodology that is comprehensive is required to analyse contradictions in CHAT. Therefore, Engeström and Sannino (2011) identify four types of discursive manifestations of contradiction based on their link with the concept of contradiction. However, these manifestations are not the only ones capable of functioning as an approach to locate contradictions, as there could be other manifestations (Engeström & Sannino, 2011). Although Engeström and Sannino (2011) have provided a useful framework for analysis through the discursive manifestation of contradictions, the discursive part of it is not clearly defined within the discourse analysis field. Thus, based on the discussion above, the Discursive Psychology (DP) data analysis approach, which is helpful in identifying discursive contradictions within discourse data, is the most appropriate methodology for this study. This leads to the discussion about DP.

3.3.4 Method of data analysis: Discursive Psychology DP

According to Phillips “Whereas other qualitative methodologies work to understand or interpret social reality, as it exists, discursive analysis endeavours to uncover the way in which it is produced” (Phillips & Hardy, 2002, p. 6). Discourse Analysis (DA) has become increasingly popular in recent years, in particular within educational research. The concept of discourse, however, can be challenging to comprehend due to the various definitions of it (Tenorio, 2011). DA is “an approach embedded in a web of theoretical and metatheoretical assumptions” (Potter, 2003, pp. 784–785). One of the most common definitions for DA sees it as "all forms of spoken interaction, formal and informal, and written texts of all kinds" (Potter & Wetherell, 1987, p. 7).

Discursive Psychology (DP) is an approach within Discourse Analysis that was developed by (Potter & Wetherell, 1987), which purports that both psychologists and sociologists have been searching for the subjective matter in psychology in the wrong place. It is claimed that psychological phenomena are discursive actions, rather than cognitive functions (Willig, 2013). DP regards discourse as both object and practice, due to the fact that it defines discourse as talk and text to study social practices (Potter & Edwards, 2001). In this sense, within DP, discourse is central to social life. It is well established within social psychology to criticise the concept of cognitivism (Jørgensen & Phillips, 2002). Edwards (2007) indicates that one of the main DP features is managing subject-object, mind-world relations in everyday talk. According to this view, people’s accounts of social reality discursively construct their personal positions, informed by discursive practices embedded in their socio-cultural environment. DP “takes language as its topic, examining the ways in which people talk about—or construct—things like attitudes, memories and emotions” (Edley, 2001, p. 190). This makes DP different to other psychological approaches that deal with language as resources to understand what is inside an individual’s mind (Wetherell, Taylor, & Yates, 2001).

- Discourse is situated occasionally and rhetorically

DP analysis considers discourses which are both occasional and rhetorical in nature, thus it pays close attention to both (Potter & Edwards, 2001). It is situated occasionally, in that talk and text
are rooted within the chain of social interaction and specific context. This in turn is rooted in the conversational analysis perspective (Potter & Edwards, 2001; Wiggins & Potter, 2008), which reflects the significance of the context in which discourse is carried, so participants’ accounts and constructions are primarily formed by such a context (Adjei, 2013). DP is about language in context; therefore, careful attention is required for the discursive specific socio-cultural context (Adjei, 2013). It is situated rhetorically, in the fact that discourses are inherent within a specific argumentative framework (Wiggins & Potter, 2008). The way in which people think shapes their evaluative discourses; therefore, analysis takes into consideration both the occasioned and rhetorical nature of discourse.

- **Language is constructed**

Talk is the central theoretical aspect of DP; within individual activity talk is both the context and the tool. “Talk therefore not only establishes and maintains the topic, but also establishes and maintains the activity in which participants talk about a particular topic” (Roth, 2013, p. 103). For DP, the object is constructed within texts, and language constructs the reality as opposed to representing it. A range of linguistic resources builds up a particular discourse, such as specific words, metaphors and rhetorical devices. This is how discourse is constructed. In this sense, language is a product of reality. Therefore, the first step of analysis is to examine how the object under study is constructed in the texts. Notably, this is in line with Vygotsky’s view of language as a mediating tool of human actions, thoughts and feelings in everyday practices within their social settings in his developmental psychology (Edwards & Potter, 1992).

- **Discourse is action-orientation**

Discourse is action-orientation as its focus is in the ways in which talk performs actions. People, in their talk, express a variety of practical and interpersonal aspects of their actions. DP in particular emphasises the way in which action is conducted implicitly within various descriptions (Hepburn & Wiggins, 2007). These descriptions could be a form of agreement or blaming. Therefore, analysts prioritise attention on the action orientation of the speaker’s talk. Examining the ways in which speakers manage their stake of interest through the use of discursive devices can invoke the action-orientation of speakers’ practice (Wetherell & Potter, 1988). The analytical emphases of DP include understanding of meaning, conversational analysis, the use of narrative and anecdotes (Bergström & Boréus, 2017). This research focuses on the most recent work in DP: the use of discursive devices. Discursive agency can be understood through DP analytical methods; Sannino et al. (2009) states that “discursive agency fulfils its agentive nature by progressively transcending the situated confines of discourse and taking the form of concrete developmental actions” (p. 255).
• **Discursive devices as analytical tools**

Discursive devices can be defined as “a lexicon or register of terms and metaphors drawn upon to characterise and evaluate actions and events” (Potter & Wetherell, 1987, p. 138). At the heart of this, DP emphasises the way in which speakers employ their agency through a range of devices to present themselves and their position in the world. These language-based devices are employed to manage the interactional business and constitute speakers’ sense-making of his/her experiences (Mueller & Whittle, 2011). People, whether in talk or text, consider others using discursive devices as being faithful, believable and responsible (Potter & Wetherell, 1987). These devices also facilitate human interaction; they “allow social life to go on” (Whittle, Mueller, & Mangan, 2008, p. 103). However, ‘discursive devices’ lack stability, as participants’ constructions could vary in different contexts, as observed by Edwards and Potter (1992): “versions are likely to show variability according to the different interactional contexts they are constructed to serve” (p. 28). These devices are identifiable and recurring within diverse contexts of interaction; whether within ways of talking and writing, the purpose of these devices is to interpret and analyse data and provide an explanation of what is going on (Wiggins, 2016). See (Appendix 5) for the list of discursive devices used in this research.

• **Steps of data analysis**

There is no certain methodology to conduct a discursive analysis; however Potter and Wetherell (1987) provide ten steps to guide researchers approaching their research. These steps cover the approach, from deciding upon the research questions to the writing stage of the research. Willig (2013) provides four main stages, which specifically cover the analytical process. Wiggins and Potter (2008) provide seven steps to guide the use of DP in practice. In addition Wiggins (2016) provides useful steps to analyse data using discursive devices (Figure 15). From all of this literature, I have selected the main steps, which are discussed as follows:
First: formulating research questions

The emphasis in the research questions is oriented towards what people do in a particular setting (Wiggins & Potter, 2008). As mentioned in Part 1 of this chapter, the research questions were generated based on the CHAT-inspired DBR methodology. However, it takes language as a topic and as being at the centre of interest, thus discursive research questions were developed and were informed by CHAT-inspired DBR methodology and take the discourse as the main focus of analysis following the epistemological stance of this research.

RQ: How is the transformative experience of BL integration constructed within Saudi academics’ discourses?

To answer this question the following questions must be addressed

RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourses?

RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourses?

RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics’ discourses?

RQ4: How are future design principles of BL constructed within Saudi academics’ discourses?
Second: the collection of data and building up a corpus

DBR is not based on specific methods of data collection and analysis; rather it is a methodological framework that adapts and uses other methods and techniques of data generation and analysis (Reimann, 2011). Thus, this research considers the use of different methods of data generation. Herrington et al. (2007) suggest different methods to be used in different stages of DBR. Wiggins and Potter (2008) indicate that discourse material can be anything related to people’s lives. Thus, this study will use data that is derived from qualitative methods of data generation. These methods are used differently at different stages of DBR and are responsive to the nature of each stage. See (Appendix 3). Here, it is important to address the question that: How these different methods are operationalised? The Vignette below describes how this had processed ?? with one academic.

Vignette

It was time to implement the design into practice, the semester had already begun, and A3 and I were motivated. I was invited by A3 to attend her class; she felt I am needed to be there in this particular class to support and answer students’ questions about the first designed activity the implementation of project-based learning (PBL) and the use of Piktochart to generate infographics about English terminologies. I felt great that I have attended her class number of issues are raised, and I listened to students types of concerns and motivations, which gave me new insights to ask A3 about more issues for the upcoming interview. Later, on the same day, I had a WhatsApp chat with A3, she needed guidelines into how to upload the instructions for this activity in Blackboard. She faced problems with embedding Piktochart and other supporting materials like YouTube videos, so instead, she attached links. Such WhatsApp chat was rich with a written account of expressions and even emojis that state her emotion and agency. This account gave me a more insightful understanding of the kind of the interactional and practical contradictions she was facing at this moment. When I met her later to conduct a semi-structured interview, I was well prepared with the kind of questions that recognises different contextualised issues rose from A3’s practices of BL implementation.

1- Documentary analysis as secondary data

Documentary analysis is used to locate information available regarding the current learning environment (e.g. instructors’ lesson plans, course materials). This allows the researcher to obtain a holistic vision of the research’s concerns. Documentary data is existing data, that takes diverse forms and exists for diverse reasons; for example, “personal documents, official documents, physical data and archived research data” (Johnson & Christensen, 2010, p. 212). This helped the researcher to get a clear image about the context of the study, and therefore build good research interview questions.
2- Semi-structured Interviews

The semi-structured interview is one of a collection of robust means to generate qualitative data (Lyons & Coyle, 2007). It gives the researcher greater insight, as it enables a researcher to access the participants’ world, obtaining information that might be otherwise hard to obtain (Johnson & Christensen, 2010). The researcher employed a semi-structured interview technique, which allowed questions to be adapted accordingly, based on any emerging situation that may occur during the conversation where open-ended and non-directive questions would be asked to obtain information about participants’ experiences. To generate appropriate interview questions the CHAT component is used, which involves questions about the subject and its relationship with the object, the tool used and its role in obtaining the object, the responsibility they hold, the impact of community in their teaching activity, and rules that govern that activity. All of these components are at the heart of the interview questions, and are used to formulate an appropriate representation of the individual personal and sociocultural discursive account around BL.

3- A diary of academic reflection

Diaries of academics’ reflections were gathered to examine information about participants’ beliefs, attitudes, and perceptions with respect to BL integration into their teaching. It is helpful in capture the “little experiences of everyday life that fill most of our working time and occupy the vast majority of our conscious attention” (Wheeler & Reis, 1991, p. 340). The researcher asked the participants to keep the reflection dairy as a means to encourage them to reflect on their teaching experiences with BL. This helped generate more natural accounts of participants’ discourses. However, one of the participants preferred to provide oral dairies rather than written ones.

4- Classroom and online observation

Classroom and online observation is conducted to assess the ways in which academics and students interact within the BL environments. This allows the researcher to observe all relevant aspects of the activity, gathering rich and fresh data from a real-world location as it occurred (Johnson & Christensen, 2010). Creswell (2002) states that having suitable listening abilities and the aptitude to focus on visual detail lies behind the successful observation. The researcher took this into attention; CHAT components were used to write the observations.

5- Focus-group with academics

This was the final stage of the research to generate the BL principles based on these academics’ experiences. Photos taken throughout the study were used as an ice-breaker to start the focus group and generate discussions. These pictures were taken from the commencement of the research, which helped bring a sense of historicity into the group discussion. The discussion was organised based on CHAT components and was moderated by me. There was a one-focus group
conducted in the fourth stage composed of three academics. This was voice recorded and took around 2 hours.

6- The researcher’s reflective commentary

The researcher also maintained a commentary to write about the research’s processes, steps, as developments. Shenton (2004) emphasises having a commentary, in gaining trustworthy conclusions. Therefore, the maintenance of a research diary helps achieving data and resource to uncover frequent questions and queries that in return could provide additional data Burgess (1981).

7- Concept mapping of content need analysis

This is a graphical tool to visually represent knowledge and learning. Concept mapping is defined as “perceived regularities in events or objects, or records of events or objects, designated by a label” (Novak, 1998, p. 21, p.21). It guides the participants’ interpretations of different concepts related to their teaching environment (Figure 16). Importantly, it encourages dialogue between the researcher and the subject of the research (Given, 2008).

8- Recall stimulus responses

Recall stimulus response RSR is a method to access the participants’ mental process of thinking about an event. This can be obtained through video recording or any other means (Fox-Turnbull, 2009). For this study, different means were used to access the participants’ reflections about designing BL in their courses; an interactive digital Concept-map, which contains different technological tools, was prepared by the researcher. Participants referred to this map as a mean of building their knowledge about the possible educational purpose of these tools. The researcher used YouTube video, articles, chapters of books and some successful stories of instructors from
around the world about their experiences with BL to illustrate the concept. Participants’ reactions to these new tools facilitate understanding their thinking about an event. In addition, the researcher conducted several meetings with participants to explain how to use a particular technology. During these meetings, conversations revealed how the participants think about the BL.

9- Photography

Photography is “one of the richest methods of data collection” (Johnson & Christensen, 2010, p.211). Photography was used in this research to document the research development stages and the use of BL over time. A number of photos were used as an ice-breaker in the final stage of reflecting about design principles.

10- WhatsApp conversations

WhatsApp is a smartphone application for instant messaging, derived from the English expression ‘what’s up?’ (Ventura, 2017). The researcher and participants exchanged instant messages over a lengthy period of time, which generated a corpus of WhatsApp conversations. These represented historical and socio-cultural discourses of interactions. Such discourses generated a greater understanding of the participants’ construction of BL over time and across all the stages. Saudi Arabia has one of the most active user populations for WhatsApp, with a reported population share of 73% (Social., 2017) (Figure 17). This well-accepted tool gives this method of data collection a value in generating data that constructs participants’ experience and sense-making process.

---

**Figure 17: Saudi WhatsApp Users**

• Third: Obtaining access and consent

After developing a set of research questions, methods of data collection are decided, and then access and consent are obtained from prospective participants. Full details pertaining to the ethical considerations of the research about obtaining access and consent from participants is given in the Ethical Consideration section.

• Forth: Transcription and data management

All recorded data was transcribed using Microsoft Word, then all the data related to each stage was gathered in one file and uploaded onto the MAXQDA data management software, which is a qualitative data analysis software package that was used in this study to organise the process of analysing the data. According to Wiggins and Potter (2008), DP usually employs a specific transcribing system created by Jefferson (2004) for the purpose of conversation analysis. However, the researcher decided whether to use a more or less structured level of transcription depending on the main focus of interest, and whether the interest was more geared towards the structure of the interaction or towards the content of the talk (Lyons & Coyle, 2016). There are written parts in which I did not transcript them. This piece of research adopted less structured transcriptions mainly because it was focused on the content of the participants’ speech rather than their interaction. Both the transcribed data and the recorded data were combined, which meant that the researcher kept referring back to the recorded data throughout the analytical process.

• Sixth: Reading

This step involves an iterative process of frequent listening and reading of the transcript (Wiggins & Potter, 2008). It aims to simplify and reduce the data, by carefully reading the collected data as the first step in analysing the data. Reading the data without analysis is critical, as it helps to formulate what the text is doing (Willig, 2013). A quantitative investigation of the qualitative corpus dataset was performed using the MAXDictio feature to identify the frequency of certain words within the data. The interactive word tree in MAXQDA was used to further read and examine the function of certain words or a combination of words with the corpus. This helped to locate the function of certain words within datasets. For example, within the corpus of stage one, the word ‘students’ had a frequency of 287, and other words such as ‘they’ and ‘them’ were related to the students with 493 and 301 frequencies respectively (Figure 18). This indicated the significance of the word ‘students’ when the academics were talking about their ‘teaching practical problems’ in this stage. Then, the ‘interactive word tree’ function in MAXQDA was used to read all of the related passages within the corpus that mentioned the word ‘students’ or its combined words ‘they’ and ‘them’. This helped formulate a better understanding of the data. Furthermore, during this process, initial memos were generated, inspired by the component of CHAT, using MAXQDA software. Significantly, the linguistic discursive devices of contradictions were examined as well, and a number of memos were written based on the interpretation of devices. Overall, this helped
locate a number of cultural discourse devices that had been used by participants, as well as locate the ways in they had been used.

**Seventh: Coding**

Following the reading and re-reading process, the researcher must select materials for the analysis, which is the process of coding (Willig, 2013). This stage is often complex, thus the research focus needed to be determined; consequently the coding approach was guided by the research questions and revisiting the focus of each stage of the research during the analysis. This step was the foundation of the analysis. The researcher approached the coding of the transcript based on the components of CHAT. This process was iterative, involving frequent listening to the recordings and reading of the transcript, with further searching and developing of categories. The process of coding results in further deletion or developing new codes and also further reviewing of the research questions (Hepburn & Potter, 2006). Therefore, searching for discursive patterns within texts under the identified contradiction that bound the accounts together was required to develop coherent codes. This is what is described by Widdicombe (1993) as a notion of sensitivity, in which the language that is in use is deemed to be more important. In this regard, the use of the CHAT component helps simplify the coding process as well as referring to the range of discursive devices.

Example: identifying contradictions through discursive devices

“My methodology of teaching is communicative, and I believe† in group work; I do know that the students here in Saudi are not for it, but I am for group work” (A1-Concept-map-2014). A1 employed two discursive devices category entitlement and contrast device in which she categorised herself as being a firm believer in the importance of communicative and group work approach that is in contrast with students’ community who entitled as being a non-believer on group work. This situation reveals a secondary contradiction between the subject of the activity (A1) and students’ community component in which it is hard for A1 to practice and assemble a
value of group work in her teaching activity with this non-believer community of students in which a conflict is formed.

- **Eighth: Analysis**

As there are no systematic approaches to analyse the initial coding, a number of activities are therefore involved in this stage (Wiggins & Potter, 2008). These activities are built around the researcher’s interaction with the text, although this interaction begins at the collection stage and gets stronger during the stage of transcribing (Willig, 2013). Potter and Wetherell (1987) recommended that during the process of analytics-text interaction, the researcher needs to ask him or herself, “Why am I reading this passage? What features produce this reading?” (p. 168). Researchers should be looking at how objects and subjects are constructed in the text, and how this construction differs across contexts (Willig, 2013). In doing so, researcher pays close attention to specific figures of speech, such as personal metaphor, grammatical structures and terminology that are used in the construction of participants’ accounts. Thus, each identified level of contradiction is a representation of different versions of constructed events (Willig, 2013). Within the process of analysis and the presentation of findings, it is correspondingly significant to admit the fundamental role of my own interpretation. I would argue that following the theoretical framework I am using minimises my own voice and prioritises participants’ voices. According to Alvesson and Kärreman (2007) that data analysis depends on the “paradigmatic, political, theoretical, methodological, and social predispositions” the researcher follows (p. 1270).

### 3.4 Epistemological foundation of the research; social constructionism

Epistemology involves a number of philosophical traditions that are concerned with theoretical knowledge. Researchers employ DBR to examine different claims; thus, the epistemological assumption differs across DBRs, depending on the different underlying claims and theoretical positions held by the researchers (Sandoval & Bell, 2004). In this research, discourse is taken as a topic of the research, where DBR stages are the context in which discourses are constructed. This is informed by CHAT to examine Saudi academic construction of discursive contradictions: “Language is a dynamic form of social practice, which shapes the social world including identities, social relations and understandings of the world” (Jørgensen & Phillips, 2002, p. 96). Discursive Psychology is associated with the social constructionist epistemological tradition (Lyons & Coyle, 2007; Potter, 1996). Social constructionism believes that the ways in which humans categorise and understand events in their everyday life is a historical and cultural production of certain understanding. Thus, social constructivists prioritise examining how social reality is constructed within a cultural and historical environment (Lyons & Coyle, 2007). Qualitative research is a naturalistic approach to study a phenomenon within its context, e.g. a “real world setting [where] the researcher does not attempt to manipulate the phenomenon of interest” (Patton, 2001, p. 39).
3.5 Participants

This research employed the purposive sampling technique. In purposive sampling, the researcher planned specific characteristics, afterward a sample is selected based on certain inclusion and exclusion characteristics (Johnson & Christensen, 2010; Ritchie, Lewis, Nicholls, & Ormston, 2013). This type of sampling is common in educational qualitative research, and is typically used to recruit a small number of participants or even a few cases, due to the fact that each additional participant means an extra load for the researcher (Creswell, 2007). A small and homogenous sample participated in this study and all fulfilled the following criteria: (a) they were engaged in teaching in Saudi higher education; (b) they were teaching in a traditional way and they were motivated to redesign their courses to become BL courses, where they shared the desire of making a difference, and (c) due to the gender segregation culture in Saudi higher education, the participants were three Saudi female academics who were teaching different disciplines in one Saudi university. See (Appendix 4) for the research participants’ profiles.

3.6 Trustworthiness

DBR accepts the concepts of ‘validity’ and ‘reliability’ over the concept of trustworthiness, although it follows the same trustworthiness as that of case study research, which is used in qualitative social science research (Juuti & Lavonen, 2006; Juuti et al., 2006). According to Shenton (2004) Guba’s construction of trustworthiness concepts for qualitative research is the most widely accepted and commonly used form. This construction includes the following:

- a) Credibility (in preference to internal validity)
- b) Transferability (in preference to external validity/generalisability);
- c) Dependability (in preference to reliability);
- d) Confirmability (in preference to objectivity). (Shenton, 2004). p.64.

A) Credibility, which refers to internal validity and the realistic faithfulness of the reported data. This could be managed by balanced the research’s subjectivity (Johnson & Christensen, 2010). This is achieved by applying investigator triangulation, where several investigators collaborate in the process of data collection and interpretation. As this study is a DBR inquiry, investigator triangulation is employed with the research participants, as they took a collaborative mode of participating in the research (Barab & Squire, 2004). Independent investigators were also asked to check the interpretation of the study, to bring more consistency to the reported data (Guba & Lincoln, 1985). Developing adequate familiarity with the context of the research and the participants before the collection of the data and establishing a trusted relationship is a needed strategy to promote credibility (Shenton, 2004). In this research case the implementation of the pilot study helped me gain access to a number of academics with whom I started building a trusting relationship.

B) Transferability, which refers to the potential generalisability of the study, it is an important factor in which the research’s findings can be generalised throughout all comparable settings following the similarities between individuals, conditions, and contexts (Stake, 1990). In this
research, the varieties and length of the data collection methods used in the research and the length of time over which the data was collected helped enhance the transferability of the research findings.

C) **Dependability**, which is the extent in which the participants’ beliefs, opinions and experiences are agree with what is under investigation (Johnson & Christensen, 2010; Shenton, 2004). This was attained through the following methods: 1) at the conclusion stage of the study, obtaining the research participants’ feedback. 2) let research’s readers to experience the real language of the participants through the employment of “low-inference descriptors” (Johnson & Christensen, 2010, p. 267). Here, the use of discourse analysis ensured closeness to the language of participants as much possible. and 3) as suggested by Johnson and L. B. Christensen (2010) and Shenton (2004) is to ensure the obtainment of a well-written methodology part to convince the reader about the dependability of the research.

D) **Confirmanility**, which refers to objectivity or the degree to which a theoretical interpretation matches the data (Johnson & Christensen, 2010; Shenton, 2004). This improved by peer review, which involved the researcher discussing the interpretation of the data with colleagues. In addition, the extended fieldwork ensured the theoretical validity, as this DBR stages has taken almost two years to be completed. Pattern matching also assisted to attain validity when certain patterns of results are predicted and examined and see if the real results match the predicted results (Johnson & Christensen, 2010). The triangulation of methods, whereby different research methods are employed to get a consistent conclusion and reduce the threat of bias (Johnson & Christensen, 2010). Employing several methods of gathering evidence validates the account of participants’ discourses. It also overcomes the weaknesses of each method to gain greater evidences (Creswell & Miller, 2000; Johnson & Christensen, 2010).

3.7 **Ethical considerations**

The submission with and implementation of ethical procedures is greatly recommended. “Ethical concerns should be at the forefront of any research project and should continue through to the write-up and dissertation stage” (Wellington, 2001, pp. 4,5). The University of Manchester has a particular form concerning ethical issues, which has been achieved and used in this research. By way of this form, the Committee assesses and agrees the ethical qualities of this research. The ethical practices for the study are guided by the British Educational Research Association (www.BERA.ac.ak) and permission from the participants was acquired to access their contributions. Participants were recruited for the study in a friendly and polite manner, with giving no offers or making any persuasion. A letter of invitation and information sheet was sent to them (see Appendix 1). Additionally, a consent form prepared to indicate the agreement between the researcher and the participants, see (Appendix 2). In addition, this descriptive statement covers information about the researcher and the possible findings of the research. This sheet emphasised the fact that participation in this study was completely voluntary, and that the participants were free to withdraw at any time without any obligations. This allowed the
participants to review the research and decide about if they were willing to join, without any pressure or influence.

Confidentiality and privacy matters are extremely important. All the gathered data is saved in a safe place and only accessible by the researcher. Once the information has been saved electronically, all paper-based data is disposed of. Other ethical issues need to be considered in formulating the research report, for example authorship and quotation (Johnson & Christensen, 2010). This study also faces a linguistic challenge, as the study takes place within the Saudi context, where the participants are Arabic speakers. However, in this research, only one of the three participants decided to conduct the research through the medium of the Arabic language. Thus, ensuring the accuracy of translations is important. To achieve this, a professional translator in both languages has helped to overcome this challenge.

3.8. Putting everything together: Explaining the structure of the research procedure of data collection and analysis

The purpose of this study was to generate data that would facilitate the investigation of understanding the way in which Saudi academics construct meaning about the integration of BL and how contradictions are constructed within their discourses. This research design is formulated using a social constructivist epistemology, where a CHAT-inspired DBR methodology is used to allow research participants’ engagement with the integration of BL systematically and coherently and to generate data from a real-world setting. Various methods of data collection are employed throughout these stages. Discursive Psychology analysis is employed to understand the research participants’ discursive practice around BL integration as demonstrates in table 3.

The first stage (chapter 4) of DBR is analytical, where Saudi academics and I collaboratively analysed practical problems associated with teaching activities. The main research question during this stage is research question RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourse? The research participants were engaged in analytical activity reflecting about their teaching practice, recounting events from their time as instructors within their particular context, what it meant for them, and what it would mean in their future practice. They reflect on the use of technology, what they know about Blended Learning and what it meant for them. The data needed to answer this particular question has been extracted from document analysis, semi-structured interviews, a concept map of content need analysis, Whatsapp conversations, observation and participants’ diaries. Discursive Psychology was used to get the essence of academics’ discourses and identify the accommodated contradictions. CHAT is used as the analytical framework of this first research stage of DBR; the focus is to identify the practical problems as contradictions experienced by the academics. For example, in stage one, academics identified the lack of idealised professional-development opportunities such as proper workshops as a secondary contradiction that promoted practical problems.

After formulating a good understanding of the contradictions and practical problems of participants’ teaching activities; the second stage of DBR is the design stage (chapter 5). The
research participants and the researcher developed a new design based on the Blended Learning approach. The main research question in this stage is RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourse? During this stage, the research subjects were engaged in designing new teaching strategies based on the idea of Blended Learning. As a result, they were participating in activities that involved discovering new concepts, new artefacts and tools, and new teaching practices. During this stage, CHAT was used as a framework to map the new design; the third generation of CHAT was used to design the Blended Learning environment where networks of online activity and face-to-face activities interacted. Through these activities of building and starting new teaching approaches and constructing knowledge about how new artefacts can mediate their teaching activities to achieve better teaching outcomes, the researcher kept track of the participants’ experiences through the events that they went through. Thus, it was possible to generate essential data from recall stimulus responses, semi-structured interviews, participants’ reflections and WhatsApp conversations. For instance, in this stage academics faced tertiary contradictions when they struggle to sustain their transformative agency within a traditionalist socio-cultural setting, where the object of designing new solutions comes in conflicts with the object of traditional teaching, where no demands of expanding knowledge is needed.

During the third stage (chapter 6), the new design took place in practical activities, where testing and refinement of solutions were put into practice. The main research question at this stage is: RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics’ discourses? During this stage, the subjects of the research participated in practical activities within their sociocultural setting using new tools towards the new object. Doing this encourages the participant to become a self-evaluator, evaluating their new activities and what it means for them, the social others and their teaching context. It also causes tensions between the activity systems, which may assist or hinder the subjects’ future motivation and practice. For this stage, the essential data was generated from observations, WhatsApp conversations, photography and semi-structured interviews. To address these issues from participants’ experiences, CHAT was used as an analytical framework. For example, academics faced a contradictory situation adopting BL approach into a traditional setting where students’ slow transitions from traditional learning to BL brings tertiary contradiction between the object of the central activity and the object of BL that is believed by academics as a more advanced method of obtaining the object.

After experiencing teaching activities based on Blended Learning, the final stage of DBR is a reflection of the design principles (chapter 7). The central research question during this stage is: RQ4: How are future design principles of BL constructed within Saudi academics’ discourses? During this stage, the subjects of the research participated in reflection activities about their experiences teaching with the BL approach. They were engaged in focus groups to recount anecdotes and events that were critical to them. Ranges of photos were used in this stage as a complementary method to facilitate the group discussion on what events meant to them and how they could affect their future practices. Besides, participants’ reflections were taken; to invoke deeper understanding about participants’ view of blended learning principles. To obtain sufficient
data, the researcher used CHAT as a concept map technique to map the blended learning principles that reflected subject experiences. Also, it is used as an analytical framework that maps the emerged contradictions between the current activity and future-ideal BL activity. For example, academics state that without effective BL-tools (e.g. the availability of reliable internet), the object of current activity would contradict the object of future-ideal BL activity, which is understood as tertiary contradictions.

<table>
<thead>
<tr>
<th>Design-Based Research stages</th>
<th>Research aims</th>
<th>Research questions</th>
<th>Methods of data collection</th>
<th>Cultural-historical activity theory</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chapter 4 (Stage one)</td>
<td>Understanding Saudi academics’ experiences of practical problems related to their teaching activities</td>
<td>RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourse?</td>
<td>Semi-structured interview</td>
<td>CHAT as an analytical framework to map the emerged contradictions’ practical problems in their activity system</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Understanding the way Saudi academics make sense when developing solutions to their courses based on BL</td>
<td>RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourse?</td>
<td>Recall stimulus responses (e.g. mind maps)</td>
<td>CHAT as an analytical framework that maps the emerged contradictions of the design of BL</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chapter 6 (Stage Three)</td>
<td>Understanding Saudi academics’ experiences of practicing BL and what refinement they could develop</td>
<td>RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics’ discourses?</td>
<td>Observation</td>
<td>CHAT as analytical framework to illuminate the dynamic interactions of the BL activity and emerged contradictions when implementing BL</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Focus on understanding Saudi instructors’ sense-making to produce BL design principles</td>
<td>RQ4: How are future design principles of BL constructed within Saudi academics’ discourses?</td>
<td>Focus-group</td>
<td>CHAT as a Concept-map technique to map the BL that reflected subject experiences principles, and analytical framework maps the emerged contradictions between the current activity and future-ideal BL activity</td>
</tr>
</tbody>
</table>

**Table 3: Structure of the stages, aims, and research questions**

---

72
Chapter 4: Stage one; Analysis of Practical Problems

4.1 Introduction

In this stage of the research, Saudi academics participated in the activity of analysing their courses, reflecting and thinking about the needs, requirements and problems contextualised in their teaching activities, aiming to transform this into BL. The main aim of this section, therefore, is to answer question RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourses? Answering such a question and searching for dialectical contradictions necessitates moving away from the traditional teaching process that academics see as being problematically inherent in their teaching practice.

4.2 Academics struggle to solve pedagogically and socially challenging students’ situations while trying to sustain their teaching pedagogic values

4.2.1 Academics’ criticism about students being inadequately prepared for university level

Extract 1

A1: Plagiarism† is an issue a lot of the students do not understand ↓ usually tell them ‘plagiarism is like stealing but you are >stealing< someone’s work that they sat <nights and days and days:: before coming up with one sentence that you in 5 seconds↓ took to copy and paste into your own work’ (0.5) I think introducing them to software where they have to identify areas in their paper that are plagiarised, they as students and are identifying mistakes and issues in their own work, because a lot of them feel that they can get away with writing anything:: See, no one ever↑ told them this is wrong; that’s one thing, and even if they know it’s wrong- > ‘it is not really really wrong< it’s just a little wrong‘ heh heh. So:: see that thing we have to change, we have to change the mentality in them (. ) I do not think they do it in a mean way. I just↓ think they GROW up in this educational system that >allows< it so they think it is ok.

(A1-Concept-map-2014)

A2: The students never prepare themselves for the upcoming lecture (. ) I usually give them the title for next week, I wish they prepared, (0.2) how can I say↓, there is only one word to describe these students, they are NOT independent↑ learners or responsible for their learning. <Do you know>, some students keep asking me to give them the lecture material before the class, so they can read it at home. I told them please read any good material such as a <book> I am quite SURE if I give them the new lecture they may not come to the next class; they will be absent:: especially before examination TIME.

(A2-Interview-2014)
A3: I like the idea of BL – it is >very< motivating::: My aspiration is to develop my teaching methods to be more active (.) where both me and my students are making the teaching-learning process >not only me<. I want my students to take a more active↑ role and at least take the challenge of asking and collaborating. <I am the only one who talks>::: I actually wonder WHY don’t they talk in front of everyone Ma::ybe because of their educational background (0.7) they come from schools where they >did not< practicing talking and presenting (.) I do not blame them↓, you know they grow up in the Saudi schools as <passive> learners. I believe it is about self-confidence↑ as well.

(A3-Interview-2014)

As confirmed in A1’s talk, she developed a criticism around students’ thought of plagiarism as a conflicting behaviour in her teaching. A1’s discourse about students’ plagiarism is constructed around two themes; firstly, the need to educate the students, as she discursively used ECFs (extreme case formulation): “like stealing”, and “see no one ever told them” (A1-Concept-map-lines: 2-7). In these remarks, she linked such conflicting behaviour with the need for technology to help students identify their mistakes by themselves, which she feels is crucial. This offers a stake confession device in which she acknowledges both the negativity of the case and the responsibility to solve the issue. Secondly, she uses an externalisation device to emphasise that such a historical belief is present because of the poor Saudi education system, which results in producing students who are less prepared for the rigours of university-level study: “educational system that allows it” (A1-Concept-map-lines: 10-11). Students historically developed the doctrine that plagiarism is “ok” or “even if they know it is wrong, it is not really really wrong, it’s just a little wrong” (A1-Concept-map-lines: 8-11). The use of reported speech here adds more factuality to how students recognise plagiarism. She shows her belief that the need to change students’ mentality is a shared responsibility by using footing shifts – “we have to change the mentality in them” (A1-Concept-map-line: 9) – to refer to plagiarism in this sense as a general educational problem associated with students’ ideology, which needs shared efforts to change.

Looking at A2’s account, it is clear that she criticises her students’ methodology of learning. For her, helping students develop critical thinking skills and being independent learners is one of her key teaching objectives, which conflicts with the students’ attitude of being unwilling to make any effort to learn. She gave an example of students reading and preparing themselves for new lectures, offering an ECF claiming they “never” (A2-Interview-line: 1) pay effort to prepare to add weight to her claim. She constructs her criticism around the fact using category entitlement, categorising students as “not independent learners or responsible” (A2-Interview-line: 3). These students are not willing to search for the information by themselves as independent learners, and at the same time they keep asking for notes and material for the forthcoming lectures that have been produced by the lecturer. A2 uses this narrative-structure device to make her argument more factual. The academic believes the real motive behind this request and the behaviour of the
students can be attributed to the fact that they do not wish to attend her forthcoming lectures, especially during examination periods.

A3 constructs a quite similar criticism to A2, but she starts by using a *stake confession* device, “I like the idea of BL it is very motivating”, in order to elaborate and authorise her criticism: “I want my students to take a more active role” (A3-Interview-lines: 1-3). That is to say, BL comprises a much-needed solution to overcome her negative feelings about her students by enabling them to become more active learners. Furthermore, she questions students’ behaviour using the *rhetorical question*; “I actually wonder why” (A3-Interview-lines: 4-5) to connect her previous statement about her need for BL to the other statement related to the fact that her students are unwilling to be active in their learning, by linking this to their educational background and the schooling system itself, which has apparently failed in its objective of preparing them to be competent students at university level, she attempts to externalise the situation using an *externalisation* device to approach a more factual account.

### 4.2.2 Academics’ criticism about students’ attitude regarding collaborative learning

**Extract 2**

A1: My methodology of teaching is communicative and I believe↑ in group work; I do know that the students here in Saudi are not for it, but I am for group work:: (0.9). The first assessment that they have in writing or presenting is not graded; why do I do this? For many reasons and >at many levels<. Psychologically, they feel more relaxed and this is what I want (.) because learning how to write >academically< is not an easy thing, but if I make them relaxed a little bit and help them through the process of writing a paper and it is not graded, and they work as a group, it really works so well. But, do you know what the problem is with this approach? It is a ginormous problem:: no one actually knows what is going on between the students. There are always students who feel they are BETTER than the rest so when they give you feedback for the other students, they do it in a very bad way; they gave <weak> feedback to each other. So, I decided that until they understand why we do this and the rules of doing it↓, and that it should not attach anything personal to it, I will do not do it anymore:: I used to do it, but <every single time> I did, it turned out so bad. (A1-Concept-map-2014)

A2: I have not ever tried to ask them to do any collaborative work:: It is not (0.5) I mean they are lazy and do not care about whatever you say or whatever you give them. They are NOT motivated, they only come to the university to socialise with their friends and their colleagues and then go back home, and that is it. They want to be in the university, but at the same time, they do not want to::(.) For example, to do their best and make the required effort↓ to get good grades. For this reason I really <do feel that> it is not the time for collaborative learning or maybe it has to be planned well for these type of students. And do not forget that talking
about this particular subject, this is the first time I am teaching it (0.3) so I am still developing the content.

(A2-Interview-2014)

A3: There is a big difference in the way students want to learn (.). There is a >big< problem with group work, even if it sounds >great< the students made me hate it. In the group, there are different student abilities, so you find some of them rely on the excellent students. For example, if there are 5 students in the group you will find all the work done only by ONE, and this is unfair. I really have a big problem with how to assess the students’ work. (0.8) I remember one of students came to me complaining about her group. She said ‘they have not done anything, they just gave me the money to buy the tools and they do not even answer my calls, because I am the one who designed the project’. So I felt that they had not got the benefit of the assignment, therefore it was not fair to give them the same grade.

(A3-Concept-map-2014)

From A1’s account, it is apparent that she faced a conflict situation. She stated her position persuasively using a contrast device mixed with category entitlement, in which students entitled a contrasting belief about group work compared to hers: “my methodology of teaching is communicative” and “students here in Saudi Arabia are not for it” (A1-Concept-map-lines: 1-2). She then oriented her action to narrate an account from her teaching practice, approaching a narrative structure device, where she used ungraded academic writing to help students work in-group. She connected this narrative with a rhetorical question– “why do I do this? For many reasons and at many levels” (A1-Concept-map-lines: 3-4). This draws the attention that her claim is significant and factual. This states an agent-subject distinction device to show her accountability and agent attempt to help students accept group work. To draw attention to another significant fact she uses a rhetorical question again combined with ECF– “do you know what [...] It is a ginormous problem” (A1-Concept-map-lines: 7-8) – to say that accepting group work amongst Saudi students is a serious problem. She oriented her narrative structure to try and explain her moral reasoning behind such a problem, in which she has less control over them, and they give each other feedback based on personal factors and not based on their real work. Such experience leads her to the realisation that students need to understand and feel the importance of group work beforehand and its overall objective, which she views as a collective responsibility. To end her point, she used an excusing device, softening her responsibility – “I do not do this anymore” – and to endorse the negativity of the situation, “I used to do this, but every single time I did, it turned out so bad”, which adds to the facticity of the discourse (A1-Concept-map-lines: 13-14).

A2’s remark presents a similar idea, in that she felt that Saudi students were not ready yet for group work. However, she has not tried any form of group work with them; she employs an ECF – “I have not ever” (A2-Interview-line: 1) – to push the factuality of her account. She then uses an excusing device to state the rationale that she failed to do group work with her students was because she felt they were “lazy”, indicating both the negativity of the situation and rejecting her
responsibility (A2-Interview-line: 2). She thought that students only came to university to socialise with their friends, and not for striving to achieve good grades. She feels that the time is not right yet for group work, unless there is a good plan that can be used successfully to approach what she refers to as the “lazy” students. This offers a disclaimer device, to imply that if students have a good attitude about group work and that well-planned group work is provided for this type of student, then she would be willing to use it: “it is not the time for collaborative learning or maybe it has to be planned well for these type of students” (A2-Interview-lines: 6-7). She purposely links the need for a good plan in encouraging group work to the fact that this course is a new one, which is still under planning. This offers an excusing device, acknowledging the undesirable features of the situation, and dismisses her responsibility: “this is the first time I am teaching it so I am still developing the content” (A2-Interview-lines: 8-9).

In A3’s account, when talking about students’ learning styles, she constructed students’ differences in regard to students’ ideology about group work, using an ECF – “a big problem” (A3-Concept-map-line: 1). She explicitly states an emotion category – “even if it sounds great, the students made me hate it” (A3-Concept-map-line: 2). These two different evaluations ‘great’ and ‘hate’ left her feeling constrained by two unacceptable alternatives in her activity system. This offers a disclaimer that if she was to let the students practice group work and they did it badly, this may lead to them being assessed in an unfair way, which may lead to the withdrawal of group work; something which goes against her teaching values. To make this claim factual she draws upon a narrative structure mixed with reported speech that allows her to support the narrative credibility, in which she narrates an event where one of the students came to her complaining about her group behaving badly with her. This device helps her manage her involvement in teaching with group work: “I felt that they had not got the benefit of the assignment” (A3-Concept-map-lines: 8-9).

### 4.2.3 Academics’ criticism about students’ low motivation and self-confidence

**Extract 3**

A1: I like to take students from zero, and then take them up. >It is a fun process< (.) Sometimes it is difficult because as I told you their backgrounds regarding their motivation to learn (.) students' motivation is very low, they come from areas where it’s really limited1 with what they were exposed to: so they really do not know what looks good and what looks bad and that, just in terms of PowerPoint slides as a presenter, I have to help them a lot in this part of the course, not only in terms of acquiring knowledge about good academic presentation, BUT also to motivate them to present and be confident.

(A1-Interview-2014)

A2: Students very lazy, they don't even take notes during the lecture (.) they are like babies. They do not want to make any effort to learn or to challenge their thinking; they really lack
critical thinking skills. (0.3) I have tried to challenge their thinking by giving them problems and asking them for solutions. For example, if you are a teacher in THIS situation and you face this problem while you are teaching, what would you do? They ((students)) would say we do not know, you tell us Dr (0.6) so:: I am telling you from now with these students we have to motivate them >along the way< because they have a lack of motivation]. Hopefully, because of the technology they will change.

(A2-Concept-map-2014)

A3: The students’ motivation is very weak† I am suffering from this (.). We are really challenged to motivate them. Some of them do not have the courage towards the general program ((psychology)), they said ‘we just enrolled on this course because there is not another pathway’, so it is not their own choice, they are not <passionate> about psychology I believe motivating them to be active in their learning is crucial, regardless of their motivation towards this particular subject of psychology ((psychological criminology)). If you attend one of my lectures, you will find them like, one concentrating on me, one sleeping, one writing I do not know what, one trying to get out of the lecture, one talking to her friends and so on; I mean it is very demotivating:: it is very boring].

(A3-Concept-map-2014)

A1’s comments begin with a confirmation that “I like to take students from zero” (A1-Interview-line: 1). Taking students from a ‘zero’ level of knowledge to a desirable level shows an agent-subject distinction device as she expresses that she ‘likes’ such process. She employed ‘zero’ as an ECF referring to the students’ level of knowledge as being extremely low, which stems from their educational background, especially in terms of their motivation levels. She uses an assessment device to define the process as both “fun” and “difficult” (A1-Interview-lines: 1-2), which gives an evaluative sense about her teaching role. To enhance the factuality of her account, she features that the most difficult part about taking students from zero to a desirable level is the motivation that students lack, which offers another ECF: “students’ motivation is very low”, (A1-Interview-line: 3), Stressing that by an example of one of their course assignments, the academic presentation, which is simpler than the academic writing assignment. She played a dual roles in this process; firstly, while she was teaching them she was helping students to acquire knowledge, and secondly, promoting their confidence to be more confident by motivating them to learn “not only in terms of acquiring knowledge […] but also to motivate them” (A1-Interview-lines: 6-7).

A2’s remarks used the word “babies”, (A2-Concept-map-line: 1) as a vivid metaphor to describe her students. Such a metaphor being used in her talk reinforces the fact that the students have a lack of motivation to learn, and that they are akin to babies with regard to receiving information. She also touches on the fact that they are ill-equipped with needed skills, as she feels “they really lack critical thinking skills” (A2-Concept-map-lines: 2-3). She further expands on this by giving an example, when she tried problem-solving strategies with them, by providing them with a problem
and asking for a solution. The students’ reply was “we do not know, you tell us Dr” (A2-Concept-map-line: 6). Drawing from this a reported speech example, she directed her comments by using a disclaimer device focusing her attention towards the importance of motivating the students if BL takes place in their learning, as she explains this by stating, “because they have a lack of motivation” (A2-Concept-map-line: 7).

In A3’s talk, to indicate the challenges she faced with the students, she assesses the students’ level of motivation as “weak” (A3-Concept-map-line: 1). She referred to her situation with her students and their motivation as ‘suffering’. The use such ECF combined with a footing shift from “I am suffering” to “we are really challenged to motivate them” (A3-Concept-map-lines: 1-2) shows her desire to downplay the situation as a serious integral social aspect of general practice where she works. She stressed the importance of motivating students by giving an explanation of her learning environment through a narrative structure device, “If you attend one of my lectures, you will find them like […] and so on” (A3-Concept-map-lines: 6-9), where one student concentrates on her lecture, other students are writing something, others are trying to make excuses to get out of the lecture and others are talking to fellow students. She considers this situation as “demotivating” and “boring”; these assessment devices gives a sensation about the negativity of traditional teaching and its impact on students' motivation (A3-Concept-map-line: 9).

The identified constructed contradictions within academics' discourses:

Secondary contradiction: Occur between the subject and community; “academics” and a “community of students” component of the activity, in which academics struggle to solve pedagogical and socially challenging situations while trying to sustain their teaching pedagogical values:

1- academics’ expectation of students’ ability at university level vs. students being inadequately prepared for university levels

2- academics’ value of group work as a valuable pedagogical method vs. students’ negative ideology about it

3- academics’ motivation to achieve desirable educational outcomes vs. students’ low motivation to learn in traditional methods. See (Appendix 7, figure 1).
4.3 Academics struggle engaging with an unsupportive community while attempting to move beyond traditional teaching practice

4.3.1 The need for idealized self-development opportunities and supportive community

Extract 4

A1: Workshops are not compulsory (.) so you go there if you want to. What USUALLY happens is that <no one goes> because not everyone is interested. Some individuals from our campus did a statistical study and found that only 7% of our faculty go ↓. You know why? Because >I am in accreditation< so I want to understand why people do not go. I did a pilot study; most of them have courses running at the same day of the workshop and if these courses are conducted here they might attend but these workshops are outside this building. For me, workshops are not a big matter, I am a <self-motivator> I look for things that motivate me, even if the workshop is not good, What is an issue is that I do get the >support< I NEED when I do integrate anything in my course. Like for example we were trying to have a practical lesson in SPSS and Nvivo. >After I promised< the students, the organisers declined <at the last moment> and I was so upset ↓ I was so upset because it ruined the course for me.

(A1-Concept-map-2014)

A2: I attended one workshop. For me, I did not get ANY important benefit from it, some of the workshop presenters did not know ↓ a lot about the Blackboard and they just come and teach when they are not >qualified< enough. Unfortunately, they did not explain things suitably, so at the end no one used Bb in their teaching. Tell me >how could I< do it without being able to understand it?:: Also I believe before they announce anything they have to think about our schedule because we will be not able to <leave or cancel> our classes to attend a workshop; Also, they have to bear this in mind: platforms, Bb and these things – we won’t be able to understand, within short time. What we need is consistent ↑ and <individual support> because at the end, not all of us had the same problems.

(A2-Concept-map-2014)

A3: There is support, but it is not <enough>, or real support (.) there are about 15 workshops each semester, which is not enough to support us ((academics)), and all of these workshops within the working days, when we have lectures and other work-related responsibilities (0.2) And if I do attend, these workshops are not >useful<. I attended one workshop about Blackboard and the lady was just reading from the paper. I regret ↑ attending it, <it was just a waste of time. But I have to know about Blackboard because I have to use it with distance students so >I learn everything about it by myself<. Yet, in another workshop I attended, some lecturers presented papers about Twitter, Facebook and YouTube in teaching. I liked
the idea very much, especially Twitter, But (.) it was only a 15-minute presentation. The presenters just explained it generally†, not HOW to do it in practice.

This account is powerful in establishing the case of training and workshops in the place where A1 works, in which she initiates her comment, using script formulation, that the behaviour of low workshop attendance is normal practice: “What usually happens is that no one goes” (A1-Concept-map-lines: 1-2). To build-up the factuality of her account, she uses a corroboration device to report the situation as being supported by others, wherein other individuals in her department did a statistical study investigating the low interest amongst academics in attending workshops, in which she uses a vivid detail device that only “7%” of academics were interested (A1-Concept-map-line: 3). Following, she stated that training is an essential part of what she does in an accreditation unit that specifically focuses on trying to understand why academics don’t attend workshops: “Because I am in accreditation so I want to understand why” (A1-Concept-map-line: 4). This offers a category entitlement device which allows her to categorise herself with particular responsibility towards the matter being discussed, and gives more credibility to what she is about to say. She offers a justification device; based on a pilot study to give a factual sense to her account, in which she displays responsibility for conducting the study to examine the case, and admits the negativity of the situation, where academics’ lecture schedules and the workshops’ location are the main conclusions in her study that prevent academics attending the university’s workshops. Workshops for her “are not a big matter”; this minimisation device orients to extent her ability to find professional development within herself (A1-Concept-map-line: 7). She gives an agent-subject distinction device, in which she thinks of training as an autonomous process: “I am a self-motivator I look for things that motivate me” (A1-Concept-map-lines: 7-8). She likes to describe herself as a self-motivator who can see advantages, even in a negative situation such as a bad workshop, for example. She stated that workshops are not important for her, to narrow the attention to the most important matter for her, which is having “support” whenever she integrates any idea in her teaching. The example she gave which made her feel “upset” and “ruined” her teaching, is when she thought students should have been introduced to a SPSS and Nvivo workshop to enrich their learning experience (A1-Concept-map-lines: 11-12). These discursive presentations of emotion categories manage her concerns with the lack of support rather than workshops. After she agreed with the scientific research deanship, the lady who was supposed to come declined at the last minute; this was precisely the point at which she was excited and looking forward to learning about this particular software.

The argument of A2 was centred on her unpleasant experience with the workshops that were being offered by the university where she said of one of them, “I did not get any important benefit from it,” (A2-Concept-map-line: 1). This minimisation of the workshop’s impact on her profession orients to minimise the effectiveness of the workshop’s organisation. She stated some factors when she tried to support her argument that these workshops often lack benefits, approaching a
three-part list. First, some workshop presenters are not qualified enough, and so no one has used Bb due to bad instructions: “they did not explain things suitably, so at the end no one used Bb in their teaching” (A2-Concept-map-lines: 3-4). It was at this point that she felt hopeless. Implicitly she makes a disclaimer that if these workshop presenters are qualified, a fruitful outcome of the workshop would be ensured. Second in her list, she used a rhetorical question mixed with emotion category, to further prove her point, “Tell me how could I do it” (A2-Concept-map-line: 4), expressing her exacerbation and general frustration at not being able to master such knowledge. Another factor she constructs a criticism about is the way workshops should be organised: “they have to think about our schedule”, and “They have to bear this in mind […] these things – we won’t be able to understand, within short time” (A2-Concept-map-lines: 7-8). These disclaimers orient to dismiss any negative interpretation that the speaker has no reason to not attend; instead, if these workshops are conducted out of their work schedules and are more effective she would be happy to attend. Third in her list is the construction of “individual support” (A2-Concept-map-line: 9), in which she offers a disclaimer that academics learn about technology differently; thus, she believes if individual support is provided things would operate differently.

Regarding the role of workshops in her professional development, A3 constructed a similar argument to that of A2, in that she stated a minimisation device, “There is support, but it is not enough, or real support” (A3-Concept-map-line: 1), to minimise the availability of adequate support. In support of this argument, she uses a three-part list; firstly, she stated that although there are 15 workshops each semester, this is simply not enough support in her opinion, given the number of faculty members at her university – “which is not enough to support them” (A3-Concept-map-line: 2). Secondly, she stated that the time devoted to these workshops would clash with her lectures, which made it difficult for her attend: “all of these workshops within the working days” (A3-Concept-map-line: 3). Third in her list, is that these workshops lack usefulness: “if I do attend, these workshops are not useful” (A3-Concept-map-line: 4). To enhance the factuality of her account, she draws upon a narrative structure device as she mentioned two different workshops she attended, one of which was about Bb, which she needed to learn about in order to teach her distance students. She expressed a general feeling of regret about attending this workshop as she failed to see any benefit from it: “I regret attending it” (A3-Concept-map-lines: 5-6). Ultimately, she ended up being self-taught and said, “I learn everything about it by myself” (A3-Concept-map-line: 7), offering an agent-subject distinction device. Another critical event she talked about was a workshop that lasted for only 15 minutes regarding social media in education. In this workshop she discovered the importance of these applications for her teaching, especially the use of Twitter, which orients as a frame transformation, in which she framed a new value about technology in her teaching that holds her attention. Following this workshop, she tried to adopt Twitter but she was unable to do so because of the lack of time that had been devoted to the workshop, and the expeditious nature of its content; the workshop left her lacking basic knowledge about how to use Twitter effectively in her classroom.
4.3.2 Technical support plays an uncooperative role in solving technical problems posturing difficulties for academics dealing with technical issues

Extract 5

A1: Every lecture that involves setting up the computer and the projector <takes time>, I’m concerned about the lecture time (. ) Every moment is precious: I think the technical support unit is another problem↑. If I need help, I have to leave the classroom↓ and go to another building where they are located. When I asked the lady who works there about the problem; (.), for example, the last time I put my username and password in, but >it did not work<, she did not make ANY effort to come with me to solve the problem or at least tell me what to do she just said, ‘Ok, in this case, it will not work so try to continue the lecture without it because this problem is out of my control. Alternatively, restart the PC – it might work again.’

(A1-Interview-2014)

A2: <At the heart of this matter>, I really need someone who can help me when I need help:: people who are in the supporting units, they do not have the >knowledge< to do this role. For example, I told one of them, please make interactive links to embed some online pages within my university page. She said, ‘you can do it by yourself’. I told her I do not know how to make it. She said, ‘just go to hyperlink then script’, and she starts telling me a number of steps. OK I know, but, doing it following her way is difficult (. ) as many steps are involved. I think she maybe <does not know> how to do it. On another day here, what happened, you know, opening the computer and the projector takes time↓ out of the lecture. I tried several times and it did not work, so I needed to leave the lecture room to GO to technical support. Oh my God!↑ what if it does not work again? Do they want me to spend all my time going backwards and forwards to them?

(A2-Interview-2014)

A3: Another issue is related to technical support:: Sometimes I cannot connect the projector to the PC, or I cannot log into the university’s network (. ) Each time it’s a different scenario↓ and for me, I do not want to waste the lecture time. Here is the problem. I find myself struggling with a situation, and sometimes the students help me to solve the problem:: I either send one of the students to technical support, or I go myself (0.5) See this is one of the situations where you cannot stand↑ it. But, I think in some departments around the university the technicians are working well, but in ours, they do not do their job at all.

(A3-Interview-2014)

Looking at A1’s comments, she constructed the problems associated with the technical support unit from two angles approaching a narrative structure device; firstly, she highlighted that the location of the support unit is outside the building where she usually gives lecturers. Another issue is that she needs to leave the lecture theatre and go to the support unit, which is itself a concern. This is an issue that will clearly affect the lecture time, where every moment is described using
ECF as "precious" (A1-Interview-line: 2). A1 uses category entitlement, categorising the support unit as unsupportive: “the technical support unit is another problem” (A1-Interview-lines: 2-3). She uses a reported speech device to add factuality to her narrative, narrating what the lady from the technical support unit told her, which annoyed her, because the support unit member could not help her as the problem was out of her control.

A2 placed the need for support at "the heart of the matter", (A2-Interview-line: 1), approaching an ECF to clearly express her need for someone who is capable of helping her. She felt the need to voice her concerns based on her experiences with the support unit. She recalled an event through a narrative structure device where she needed help from technical support to embed some code into her university page. The lady she spoke to at the unit, instead of actually helping her, just verbally presented the academic with a step-by-step process, whereby all she did was to list the steps involved for embedding code. This annoyed A2 because she wanted somebody to actually do this for her (i.e. manually), and not tell her how to do it verbally. Consequently, this led A2 to have doubts about the level of knowledge this support staff member had, specifically pertaining to her knowledge of how to create interactive links: “I think she maybe <does not know> how to do it”, (A2-Interview-lines: 6-7). Another narrative structure is used to set the scene of difficulty dealing with technical issues within lecture time, in which she needed to leave the lecture to seek help from the support unit. A rhetorical question is presented: “Do they want me to spend all my time going backwards and forwards to them?” (A2-Interview-line: 10-11).

A3’s account also focuses on the insufficient technical support issue, in which she stated through ECF how often she encountered new problems: “Each time it’s a different scenario” (A3-Interview-line: 2). To set up this scenario she follows a narrative structure, relating a “struggling with a situation” (A3-Interview-line: 4) as she referred to it using ECF, when the lecture time was wasted because of technical matters such as the Internet connection: “I cannot connect the projector to the PC, or I cannot log into the university’s network” (A3-Interview-lines: 1-2). She stressed her negative feelings towards this issue to make her narrative more factual by presenting her emotion category, “this is one of the situations where you cannot stand it” (A3-Interview-lines: 5-6), when she needed to leave the lecture or send one of her students out to request technical support. However, she thought this problem was the worst in her department when compared with other departments and buildings around the university, which made her feel frustrated. This contrast device aims to stress how serious the problem is compared with other locations in the university.

The identified constructed contradictions within academics’ discourses:

Secondary contradiction: occurs between the subject and community; “academics” and a “community of university” component of the activity. Academics struggle to engage with an unsupportive community while working towards the object of technology best-practice:
1- Academics’ need for effective professional development vs. ineffective idealised professional development
2- Academics’ need for effective technical support vs. lack of adequate technical support within the university. See (Appendix 7, figure 2).

4.4 Academics are constrained by ineffective mediated-artefacts while attempting to produce the object of technology-best-practice

4.4.1 Repetitive problems associated with lecture rooms lead to lack of effective preparation

Extract 6

A1: You know the building it is not prepared very well or well-equipped↑. If I prepared myself to show them a video or a conversation (0.5) sometimes when I come to my class I find the computer is not working, so what I have to do is put this video on my university website and ask my students to watch it later. I know they won't watch it later heh heh <I:: I must have a plan B for example when the data show does not work. I have my own (.) when I bought one a few years ago with a little Sony data-show; it is portable so I take it wherever I want so I never face that problem. Sometimes::: if I need my students to use computers and these computers don’t work then I have to resort to plan B and look for another room or do something else totally different that is not on our agenda for the day.

(A1-Concept-map-2014)

A2: The ideal lecture room? What I REALLY want to have is moveable↓ furniture, moveable chairs and tables; so:: that through the lecture I can start with a teacher-based approach, then move to a group-based approach, then an individual basis. I call it the ‘horseshoe’↑ of my teaching, every lecture, see what I mean::: I mean at the beginning I want to start with a >normal< classroom where students are facing me in rows and then I want the students to be grouped↑ so I can work with them closely and then I want to return to the teacher-based approach like a horseshoe. So:: I always find it difficult↓ with the current set up to approach this cycle.

(A2-Concept-map-2014)

A3: This is a problem because:: (.) there is no Internet↑, or there is the Internet but the YouTube itself is blocked, or the data show does not work. I cannot upload these videos to my USB because of viruses, I do not want to harm my laptop. Besides I cannot connect the laptop to the projector. <I (. ) I do not want to lose lecture time::: See, to use the simplest thing like YouTube video is not easy↑ (0.5) This needs to be supported with Kaspersky for viruses because we really suffer from this:: Our devices usually get affected and even damaged, even our USBs (.) And these are important; they contain VERY important information and files (0.4) so now it is impossible to connect any of my important devices to the university
computers, I try to explain the lecture as much as I can, without any slides, presentation or videos.

A1’s talk starts with an acknowledgement that the lack of a suitable learning environment is constricting her ability to teach as effectively as she would like. She demonstrates this with her initial comments by using minimisation such as “not prepared” and “or well-equipped” (A1-Concept-map-line: 1), to explain how the learning environment looks with minimal needed equipment. To justify her claim she gives a narrative structure device that reveals how she dealt with the problem. The scenario she mentioned illustrated that if she had prepared materials for the students, they were unable to get the most benefit from it, in which it is assessed as being ineffective practice. In most cases, she could not use the materials in the F2F time, and so she was forced to upload it on her university web page. However, presenting a model verb (won’t) “I know they won't watch” (A1-Concept-map-line: 4), in this instance she acknowledged that, based on past experience, students would mostly ignore following such an instruction and were highly unlikely to view the material in their own time. It was this realisation through an agent-subject distinction device that prompted her to state, “I must have a plan B” (A1-Concept-map-lines: 4-5). Plan B for this academic involved using her own Sony data show device that she could connect to her laptop. This indicates that she had stopped relying on equipment within the lecture theatre. The worst plan B scenario she gives is when she wanted her students to use computers and the computers were not working in that room, which meant she had to search for another room. If another room was not available, this meant that no new teaching-learning activities could happen. All of these scenarios were presented in a three-part list to clearly illustrate that the availability of suitable tools within the learning environment can and does have a powerful impact on the teaching-learning process.

Similarly, A2 stated the powerful impact of a suitable learning environment on her teaching performance. She said that what she was looking for was “moveable furniture”; when using category entitlement she linked this to what she regarded as being an “ideal lecture room” (A2-Concept-map-line: 1). She also explained how the lack of an ideal lecture room, in her opinion, was controlling and affecting her teaching approach. She described, practicing a metaphor device, her approach as the “horseshoe”. She starts lessons by describing the content in a ‘teacher-based’ style, and uses the words “I want to start” (A2-Concept-map-line: 4), denoting a future tense, rather than using the words ‘I usually start’ in the present tense, this nominalisation indicates that the “horseshoe” method is her ideal teaching approach; something she aspires towards being able to employ, rather than something that is actually occurring at the moment. Following the “normal classroom” style where students are sitting in “rows”, for the next phase she prefers them to be grouped, in order for her to be close to them and assist them in their learning (A2-Concept-map-line: 5). Returning to the teacher-based style is the final step of her ‘horseshoe’ approach of teaching. Here she contradicts herself when she previously said she had
not used any group work related activities with her students. Having said that, her statement approaching a modal verb “always” helps her to manage the pressing difficulty approaching her preferred teaching approach. Her statement “I always find it difficult” (A2-Concept-map-line: 7) may perhaps offer an insight into elucidating this contradiction.

During the Concept-map for need analysis, A3 explains some issues, which she describes as “a problem” (A3-Concept-map-line: 1) that she presents in a three-part list, all of them being related to the learning environment. They are no Internet, some online pages being blocked, the data shown sometimes not working, and not being able to use her USB or laptop due to the university’s devices containing viruses that could affect her own devices. In her mind, thinking of all of these factors raises a concern for her about lectures, and the time that might be lost as a result of trying to fix these issues. Stating that, “to use the simplest thing like YouTube video is not easy” (A2-Concept-mMap-line: 4-5), she directed her comments towards the proposal of a solution, which is that the university’s computers must be supported by the Kaspersky anti-virus programme. She describes how users of these computers “suffer” and that their devices are being “affected”, and from this she formulates an extreme decision through ECF which is that connecting the university’s computers to her devices is “impossible” (A2-Concept-map-line: 8). To conclude, she stated how she teaches when confronted with these difficult types of situations, where she has to suffice without any presentations or videos.

4.4.2 Academics experiencing insufficient Technological, pedagogical and content knowledge (TPACK) which affected their mediation actions towards desired objective of teaching

Extract 7

<p>| | | | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>A1: I know about this WhatsApp:: that’s the only thing: that we use as a group and I have one with the whole group, and then we make groups within the group, they have a group with me and group without me hhh I told students consider me as being whatever you want &lt;devil or an angel&gt; but I am on your shoulder watching what you write. I keep telling them, even in your dreams dream of me↑, and what I am thinking of your work. On the individual level, it is only with &lt;WhatsApp&gt;. Every other kind of social media or whatever it is called &gt;I do not use&lt; I just have so much on my plate↑ I cannot THINK. I mean Facebook, we were talking about it last time &gt;I just do not have time, I barely have time for what I do, and so in order for me to do my job properly I do not think I can mingle there, but:: I have my university web page, which offers a space to upload the lectures using any types of files.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(A1-Concept-map-2014)
A1: These meetings are therapeutic!!! What I love about them is that she makes me think about all the things I never had time for, or sometimes even things I never heard about. I loved the map idea. Everything in my head became so structured. I hope Sahar can recommend some good reading so I can get more ideas to work with.

(A1-Reflection-2014)

A2: If the lecturer wants to be creative and wants her student to be creative, she will then do her best to integrate technologies into the curriculum::: I use WhatsApp not with all the students. I have students in groups and I allocate a group leader for each of them, these leaders are added to my WhatsApp to just answer their questions about exams and assignments. I have not used technologies because this is a new field for me↑, although I know a lot about teaching methods, but I am not an expert in suitable technologies for teaching:: I also (.) Why:: have I not used technology before? Because 1 or 2 out of 30 will interact with me, I do not know why. If there are marks, they would show better↑ interaction. But WHY why should everything be graded?

(A2-Interview-2014)

A3: I use YouTube videos, WhatsApp, and I have used Bb with distance students, so I do know how to deal with technologies somewhat, but with this subject, not yet:: I have not done this before. I >love< the idea of using Twitter practically for this subject. I think Twitter could help me do lots of things. I could post them links that could feed their minds about a subject that >is not in the curriculum< but facilitates their understanding and encourages their thinking. Maybe stories, videos anything and maybe this material could help me explain the content and encourage them to discuss. I also use my university web page, but it does not help me to communicate well with the students:::

(A1-Interview-2014)

The above account of A1 stated the limited use of technological tools in her teaching. She started by recognising the situation through a minimisation discursive practice, in which “the only thing” she knows and uses is “WhatsApp” and to use this to create communication channels outside the university (A1-Concept-map-line: 1). WhatsApp is used at different levels; a group for the whole class, groups within the group and the students use a group with and without her (A1-Concept-map-line: 1). Having the students use WhatsApp without her is something important, something she elaborated on approaching a narrative structure device. It means to her that students need to hide stuff from her, wherein she told them “consider me whatever you want”, and “even in your dreams dream of me” (A1-Concept-map-lines: 3-5). This disclaimer expression appears simultaneously to deny whether her students used a WhatsApp group without her to keep things hidden from her, as well as the fact that she can still use her power to control them. The second part of her comments are oriented towards dismissing her accountability of not using any other tools but WhatsApp. She uses a disclaimer to avoid any negative interpretation, framing that “social media […] I do not use […] I just have so much on my plate” (A1-Concept-map-lines: 6-7),
to indicate that there is no time for the use of other technological tools. For her to do her job in a proper way, she feels that she cannot combine using all of these technologies as she highlighted, “I do not think I can mingle there”, which re-stressed her previous claim (A1-Concept-map-line: 9). However, in A1’s reflection about her participation in the Concept-map analysis, she uses emotive language to draw attention to an important event practicing a metaphor device – “therapeutic” – which is a strong construction of her lack of technological and pedagogical knowledge (A1-Reflection-line: 1). As she further explains, these meetings, especially the Concept-map, open up new avenues for her to develop new knowledge: “things I never had time for, or sometimes even things I never heard about” (A1-Reflection-line: 2). She concluded by stressing her need for further reading, which implies that such an expansion of knowledge needs is a form of frame transformation in which new value is gained.

In response to a question about the use of technologies as pedagogical tools, A2 starts her remarks by clarifying that this is something that is open to the lecturer. The arguments are rhetorically produced using a disclaimer through “if […] then” formulations (A2-Interview-line: 1). For her, only creative lecturers want their students to be creative. The sake of creativity, therefore, is the motive for the lecturer to make the required effort to integrate technology. She wanted to state her responsibility and deflect possible criticism through presenting such a statement. Similar to A1, WhatsApp is mentioned as the only tool that has been put in place, but in contrast with A1, she stresses that her use is “not with all the students”, and that she uses it to “just answer their questions about exams and assignments” (A2-Interview-lines: 2-5). Here she uses a minimisation device, to frame the limitation of using this tool in her teaching. Turning to why she doesn’t use more technologies, she defines herself as an expert of teaching methods but acknowledged that she was constrained in terms of her limited knowledge about “suitable technologies for teaching” (A2-Interview-lines: 6-7). Another constraining factor for her was that students could play a controller role; this was illustrated when she asked a rhetorical question in a stressed manner: “Why have I not used technology before?” (A2-Interview-line: 7), She wanted to stress such a fact using a rhetorical question, stating that her ability to be creative is somehow not free – “But why should everything be graded?” (A2-Interview-line: 9) – as she appears to be questioning the students’ interactional willingness, referring to students’ low willingness to interact with technologies in learning, rejecting the students’ tendency to be motivated only when grades are involved.

In response to what technologies have been used so far in her teaching, A3 started with a three-part list to show she uses YouTube videos, WhatsApp, and has had experience in teaching distance students via Bb (A3-Interview-line: 1). She adds to this by confirming that she has a degree of knowledge in terms of how to deal with these technologies. However, she stated that this is not case when it comes to the subject that she is going to teach, and particularly when she brought Twitter into the discussion. The comparison she made uses a contrast device between Twitter, her ideal technological tool, and her university’s web-page, provoking multiple viewpoints of how she viewed the role of technologies in her teaching. The idealised power of Twitter – “I
think Twitter could help me do lots of things” (A3-Interview-lines: 3-4) – contrasted with her lack of enthusiasm about her university web page. She said, “it does not help me communicate well with the students” (A3-Interview-lines: 7-8).

The identified constructed contradictions within academics' discourses:

Secondary contradiction: occurs between the subject “academics” and the "tools" component of the activity, constrained by ineffective mediated-artefacts while attempting to produce the object of technology best-practice:

1- academics’ motivation to obtain technology best-practice teaching vs. repetitive problems associated with lecture rooms lead to lack of effective preparation

2- academics’ motivation to obtain technology best-practice teaching vs. insufficient TPACK. See (Appendix 7, figure 3).

4.5 Academics are strained maintaining a sense of professional agency within the negative socio-cultural ideology of traditional-based teaching practice

Extract 8

1 A1: My role during the last years <was not an easy role> and STILL not easy. See we have lots of people fighting quality↑ education because lots of people want the <easy ride>, like everything:: quick and easy (. ) or like with the MA girls the problem is they are >quite weak<. Most of instructors believe that the students were accepted, then they should be up to a certain standard which should not be the case:: because as I said our educational system is the problem and if we do not break↑ the cycle of bad education nobody will ever break it, we will KEEP having the cycle of bad education.

(A1-Interview-2014)

1 A2: I do not want to be a lecturer at university and that’s it; this is not my aim in life. I want to FEEL I can do significant things not only in the major of teaching methods, but also in my role as an academic. You know this field is always changing and developing, the whole settings of teaching-learning requires serious↑ changes and maybe BL is ONE thing I could do (0.5) Also:: in this place, not all the teachers they do work honestly, and they give the students the grades easily just to make them feel happy and that’s it for them. At the same time, you know our students the majority of them >do not< care and at the end they won’t acquire good education:: >I am the only one< who teaches correctly:: and gives the students the grades they are worth without giving them more than they deserve. The students will say ‘oh that lecturer is excellent’ just because she gave them grade A+ A+ A+: can you believe it?

(A2-Interview-2014)
A3: When you teach at the university level then you need to have the skills of being flexible and adaptable. Changes can happen any time in the blink of an eye: suddenly they decide to do something new, for example, changing a unit, removing a subject. So: being flexible, having the required skills, being ready and able to COPE with changes are quite important skills. As you know this is my second year of teaching here so I want to use new methods of teaching and learning to make a good change for others and also for me. If I feel this is a good approach and my students get the benefits out of it, I WILL improve my knowledge about it and then tell my colleagues to take advantage of it. You know each year there are newcomers, they come to teach, so instead of telling them about the old way of teaching I will be able to help them.

(A3-Interview-2014)

A1’s action-oriented comments are persuasive, wherein she starts by framing an agent-subject distinction to show how her level of agency is managed, saying that her role “was not an easy role, and still not easy” (A1-Interview-line: 1). To show honestly about the situation and acknowledging her interest, she provides a stake confession to stress that “lots of people [are] fighting quality education” (A1-Interview-lines: 1-2). The inference she draws attention to here, using a category entitlement device, is that the majority of MA students in her department are “weak” (A1-Interview-line: 4). For her, this is not the main problem, the issue is the majority of the instructors do not accept this reality and do not want to make an extra effort to meet the needs of such weak students. She provides rhetorical metaphors, in which for her these people are causing problems as they want to follow an “easy ride”, which, on reflection, maintains “the cycle of bad education” (A1-Interview-lines: 6-7). These metaphors construct a category of reality, in which for her teaching in a place where people like an easy ride ensures the continuity of less desirable educational outcomes, which in return makes her role difficult.

A2’s remarks show the challenges she faces in being in her current position, which she regards as being against her original goals in life. She says, “this is not my aim in life, I want to feel I can do significant things” (A2-Interview-lines: 1-2). A2 thus rejects being an ordinary lecturer, and presents a sense of agent-subject distinction, aspiring for a more active role in her university position. She extends that ambition further, in which she wants to achieve this role not only in her subject but also in her general profession, by picturing who she wants to be and by talking in a more motivated way about change: “BL is one thing I could do” (A2-Interview-lines: 4-5). She then uses category entitlement to distinguish herself from the academics who have no apparent interest in the teaching itself, through which she positioned herself against the university’s practice; she feels that “not all the teachers they do work honestly” (A2-Interview-line: 5). The way she interpreted this problem is that some academics do not care about teaching and quality education, alongside students who also do not care about receiving a good education. The students easily achieved high marks that did not reflect their actual efforts or abilities. She repeatedly said students received an ‘A+’ in a tone of anger; this affect display is followed by the rhetorical question “can you believe it” (A2-Interview-line: 11) to stress her difficulty in
comprehending such practices. She emphasised her practices using an *agent-subject distinction*, talking about her position by saying, “I am the only one who teaches correctly” (A2-Interview-lines: 8-9), to separate her own practice from what others are doing around her.

A3’s talks depicted the nature of working at the university as a changeable one where “changes can happen anytime in the blink of an eye” (A3-Interview-line: 2). Such a *metaphor* of describing a change helps her make a factual picture of the nature of working in higher education. Therefore, to state the factuality of her claim she draws upon a *category entitlement* of being “flexible and adaptable” (A3-Interview-lines: 1-2) as the main entitled skills to secure success when teaching at the university. She then moved on to connect the fact that “this is my second year of teaching” (A3-Interview-line: 5) with the importance of trying a new method of teaching for the sake of creating a ‘good’ change, not only for her but also for the people around her. Although she explicitly expresses that the adaptation of new methods is her solution, she also expresses some uncertainty. Through a *disclaimer* mixes with *hedge* device, by using the form “if […] I will” (A3-Interview-lines: 7-8), she does not attempt to deny the need for change, but rather wants to be sure that the new teaching methods can be fruitful for her teaching practice. She then speaks about her future goals, such as improving her knowledge and spreading that acquired knowledge, showing transformative agency through an *agent-subject distinction*. Finally, she explains this approach, as she rationalises that each year new people come to teach at the university and each year they provide instruction on how to teach in a traditional way. In this situation, her motive, expressed through an *agent-subject distinction*, is to give these “newcomers” new methods of teaching, which reflect her unsatisfied attitude about current teaching practice in her workplace.

**The identified constructed contradictions within academics’ discourses:**

**Secondary contradiction:** occur between the subject and community “academics” and the “object” component of the activity. The subject of the activity, (academics) are strained to maintain their sense of professional agency within the objects of “traditional-based teaching”. See (Appendix 7, figure 4).

### 4.6 Summary

Through this investigation of discourses around the practical teaching problems experienced by Saudi academics, the discourse construction reveals number of contradictions. The contradictions conceived here represent opportunities to change the instructional methodology of these academics away from the traditional method that have become stale, towards a coherent system comprised of goal-oriented actions that accurately reflect the motive-driven activity to which the system aspires. Although these academics showed little knowledge about integrating technologies or BL, they have revealed extreme motivation to change their teaching practice with a greater discourse of rejecting the old teaching practices and the need to formulate a new object
of their activities. However, they also demonstrated an understanding that such profound change can cause tensions within their sociocultural settings.
Chapter 5: Stage Two: Design Solutions

5.1 Introduction

Participants participated in the activity of designing solutions for their courses; the problems identified (see Chapter 4) are borne in mind to shape the design. In collaboration with the researcher, they tried to develop solutions informed by existing design principles and technological innovation. As a result, they are developing a new vision of their profession, while developing new teaching approaches based on BL. This activity constitutes a number of actions, such as planning new learning activities, developing new assessment methods, and reorganising course materials. These new goal-oriented actions will take their place in already traditionally-structured activities, imposing change and causing contradictions. The main aim is to answer the following question: RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourses?

5.2 As academics form a clearer vision around BL they become hesitant about the community of students’ ability to participate in the designed BL-based activities

Extract 9

A1: What about if they <do not know> how to do things↓ They do <know> how to do some stuff, but not at this level (. ) Do I need to give them like extra help? For example, ‘if you want to make a video go there and do this and that…’

R: Yes, sure. We have to prepare a >full guide< for students, we will create an activity map for each learning activity to guide them.

A1: I know this is >a good idea<, but:: What about if they <do not know> how to do anything? I mean MOST of them, they know how to use <little tech things>, shall I give them <extra help> like if they want to make a video you go to this site and if you want to do this go to this site, <I mean to assist them technologically (0.4) I am thinking:: that I have to <learn about them and then give students like a <semi-tutorial> about these technologies."


A2: Um:: I am not confident↓ or not sure how students are going to do this activity (. ) I mean >despite< the language problem <they won’t be able to MASTER this <technologically> advanced idea.

R: Etherpad is not that difficult…

A2: < I am eager to try this, but it concerns me. Although I believe this would not apply for all of them, I think some of them >won’t< be willing to use such technology in their learning because they do not have the required skills or even the basic skills to deal with technologies (. ) The students who will be willing to use technology, their major <must> be IT, and I believe they will be creative and <will be happy> using these technologies.
R: How can we encourage non-IT students to let’s say enjoy the activity?
A2: Well (. ) I think what if you come with me and explain to them the activity? I think not only this one but all other activities as well: (0.5) I think if they know how to do it, it will be an enjoyable experience (. ) I have some <technologically-advanced students, what if one of them asked me a question I could not answer:.? So: what I suggest is that <you come with me> to the class and explain any technology they have to use. I could not be professional in >all< of these technologies.

A3: Are we going to do >all of these activities<? I mean (. ) it would be better to see first how the students will react:. If they will be >motivated< about the first one or two activities and able to complete them, we will then continue with the rest of them or adjust them to make them >easier<, or just select the ones that does not require advanced technological skills, (0.5) I just do not want this to be an extra pressure] or an >overwhelming< task for them. Also, the content is very↑ rich and I need <every single moment> of the lecture to explain it to the students. If we are going to use technology I do not think the lecture time will be enough.
R: We will provide all kinds of support, In the activity page in Bb, we could put video screenshot images of how to do things.
A3: YES this is exactly what I need you↑ to help me in, <you know about these technologies better than me so you could <help me and my students> release our concerns.

A1’s conversation tends to weigh the importance of providing students with technological support to ensure their acceptance and active participation in BL, which she expressed by imagining an unwanted event, asking a rhetorical question, “What about if […]?”, (A1-RSR-line: 1). Although it was agreed that an activity map would be provided for each activity, including steps and resources for students to complete it, she stresses that providing students with guidance is not enough to help them improve their technological skills. She again constructs a serious need, “[…] but […] What about if […]?” (A1-RSR-line: 6), employed discursively in a stake confession device. She reveals a negative feature but acknowledges her responsibility. The dilemmatic hesitation A1 faces, when she realises the incompatibility between the design that was planned and the technological level of her students, leads her to decide that creating support sites for students is important, using an agent-subject distinction device: “give students like a semi-tutorial […]” (A1-RSR-lines: 10-11). This forms her responsible active-agent in dealing with her acknowledgment of the issue.

A2’s account constructed similar considerations; she addresses the incompatible reconciliation between the students’ ability to handle the designed activity and the technological skills required. This discourse builds around the use of ‘Etherpad’ as a solution to one of her teaching-practical problems. She is teaching using ‘general teaching methods’ and her students are from different
majors. Thus, gathering each major-group to plan one lesson and evaluate the appropriate teaching method for their major-related lesson across sessions was essential, while not possible using a traditional method. Etherpad provides the online space in which students can collaborate; it also enables categorising of students based on their majors, regardless of the session they are assigned to. Although she showed a very ambitious attitude to trying this idea, it clashed with her concerns about her students’ technological abilities. She uses a *hedge* device, “I am eager to try this, but […]”, (A2-RSR-line: 5). To stress this, she discursively uses *category entitlement* to compare IT major students and non-IT ones, assuming that those with IT majors would collaborate and enjoy the activity the most. In response to the possible techniques that could be offered to non-IT major students, she stipulated having the relevant know-how. An excuses *disclaimer* device mixed with a passive subject and less agency – “what if you come […] I could not […]” (A2-RSR-lines: 12-16) – helps her to acknowledge the problem but play down her responsibility to solve it on her own, wherein she admits the negativity of her students in driving the change and externalises her responsibility.

A3’s *rhetorical question*, in which the lecturer answers her own question, “Are we […] activities?” (A3-Interview-line: 1), is constructed to reinforce concerns about students’ reaction to and motivation towards the designed activities. This implies a sense of hesitation when it comes to students completing BL-based activities. Two incompatible considerations drive such hesitation: unskilled students and a large quantity of technology-based activities. This drives A3 to form another plan, using a discursive *formulation* device, where her old beliefs of students’ technological skills deny the new value of introducing BL-based activities. She decides only the first and second activities will be carried out as intended until she verifies her students’ active participation and ability to continue. Based on this, she will decide either to complete all the activities as planned or make the required amendments to the plan. She concludes by presenting her stake using words like “pressure” and “overwhelming”, offering an *emotion category* (A3-Interview-line: 5) to describe the experience of the students if they could not master the technological skills required to complete the activities. This tendency in her speech uses a *reassuring* discursive device in which empathy, acknowledging responsibility and citing of ‘others’ are employed.

**The identified constructed contradictions within academics’ discourses:**

**Secondary contradiction:** applies to two components of the activity system – the community of students learn through traditional-based tools, which means to academics in the designing activity stage that students are not technologically-skilled enough; this causes a secondary contradiction in academics’ designing activity.

**Tertiary contradiction:** this occurs when academics try to resolve the secondary contradictions. As they construct a clearer vision about BL they become unsure about the community of students’ ability to actively participate in the designed BL-based activities. See (Appendix 7, figure 5).
5.3 The designing of BL is being narrowed by what is perceived as more socio-culturally proper practice, while attempting to accommodate proper BL design

Extract 10

A1: The policy-makers want everybody at the university to use Bb, they are giving all these courses to all instructors and it’s open to everybody. It is one of the points in the university strategic plan for at least, I think, the percentage is like 70% of all instructors use some kind of BL. The system is already going on, where (.) I am a head of accreditation here so I fill out forms and give star ratings for the type of work they do with evidence… If there is >any< kind of BL, I will fill it into the system, and they will check if we reach the 30% or not… Now with the strategic plan it is only 30% because they’re just introducing it (.) and they want to reach the 30% or over. Now, it is not even 30% because BL and Blackboard are new and if you are not interested in technology that is a thing, and if you are really dedicated so you work after >2 o’clock< it’s also something; See there are <so many aspects> to this, but, if they can help people understand the >big< benefit that we as instructors can get, and our students will get, and the university will get and the society will get, this is where people will stick to using it. See in <Saudi Arabia you can do basically what you want. >If you want to teach well< you can. You want to teach <easily>, you can. So <it goes back to you as an instructor and <what you believe> good teaching is all about.

(A1-Interview-2015)

R: What about VLE ((Virtual Learning Environment)). Is there any particular platform in your mind?

A2: Wait (.) is VLE and platform actually:: the same?

R: Yes

A2: I know a bit about Blackboard:: I heard them ((Bb workshop organiser)) refer to it as a platform (0.5). I think they also told us this is called >BL< (.) The university encourages all of these trends: Bb, <BL platforms and other concepts related to this… One thing I want to say, when I attended the Bb workshop I have been told:: Bb is important for us, >especially< when we need to teach distance students but we can use it with regular students. But, put yourself in my position↓ I am teaching in the same university these students are attending, <I have office hours so WHY should I lose my own time? >Instead< of having a bit of relaxation I have to open the Bb and see what students need. If they are in a different city or country <maybe> it’s worth it† (0.5). Tell me now:: am I right or wrong? >I am< NOT saying it is not important, <I think it is important, but I cannot understand↓ the benefit of using it with on-campus students and >also< what is the difference between these so-called platforms and the university webpage?

R: Well I think it would be better to go through some examples of VLEs, in which I could answer your questions…

A2: It is good to know about <different things anyway↓ It is very important to use technology BUT not very important for all classes from the beginning to the end (.) Bb is the only thing I
know an <abstract> picture about (.) I know this is what the university wants whether I like it or not↓

(A2- R-RSR-2015)

1 A3: I think Bb is a GREAT tool. <When I used it last year, with distance students, I noticed <different features> that might help in organising the course::
2 R: Like what?
3 A3: >First< of all, as students' names will be already listed in the ODUS system, it will be easy to control their learning process and assessment through the Bb, and I know how to do that, I do not need to learn a new tool:: I already >taught< myself how to use Bb (0.5). The content, announcement, and instructions could be shared easily…
4 R: That's perfect….
5 A3: Another <important> thing is that the university offers <guidance and instructions> supported with videos and there is a support line: to call any time you face a problem with Bb (.) So <hopefully> we will have the required support for me and the students to be >able< to use Bb successfully:: although <I am not sure> if this support is for distance students only or if it is for anyone who uses Bb in the university↓ but still I think there >would not< be any problem with Bb.

(A3-R-RSR-2015)

A1’s comments start by narrating the case of BL in her institution as one of the university’s strategic plans, and how the university encourages this plan by providing a number of support sites to get 30% of the faculty using Blackboard. This essentially means, in this context, that they blend their courses. A1’s speech not only exemplifies how Bb is socio-culturally a dominant discourse, but also how Bb is associated with BL in her socio-cultural setting, leading to a misconception about what BL is. A1’s account stems from her position as an administrator and instructor at the same time, in which she positions herself through category entitlement as an active actor who tries to drive the university’s vision of integrating BL, which involves using Bb. This is described in the form of vivid details, “70%”, “30%” (A1-Interview-lines: 3-8), mixed with script formulation: “system is already now going on” (A1-Interview-line: 4). To turn her speech into criticising why the university’s ongoing efforts have not corresponded to the desired outcome, she follows up with minimalisation – “it is not even 30%” (A1-Interview-line: 8) – to downplay the effectiveness of the object and to explain why this has been the case. It’s noticeable that BL and Bb are described interchangeably as new tools, where she emphasises that “there are so many aspects” (A1-Interview-lines: 10-11). Thus, helping people understand the benefits of BL is the key solution, but she mentioned that there was a lack of interest and dedication amongst the faculty towards technology. She uses a three-part list device, “instructors can get”, “students will get”, “university will get” and “society will get” (A1-Interview-lines: 12-13), to broadly generalise the issue and resound her talk with her personal and cultural values. She metaphorically pictures the situation in which instructors choose the traditional teaching way as “easily” (A1-Interview-line: 14), which serves to distinguish herself from being perceived as against BL, which is
interpreted as Bb. This discourse serves different functions, but fundamentally it draws to her accountability to adopt Bb, which she refers to as “good teaching” (A1-Interview-line: 15), and essentially it means she follows the university’s vision of Bb and as a result she blends her course.

A2’s account reveals a significant underlying common-sense perception, in which BL is discussed with a lack of clarity about its actual meaning. The discussion is centred around which type of VLE would suit her course. Her reaction regarding the concept of VLE was fundamental. Primarily she wanted to clarify whether “VLE” and “platform” are similar concepts (A2-RSR-line: 3). Then she claimed that, “I think [...] is called BL”, (A2-RSR-lines: 6), defining Bb as BL, showing a strategic ambiguity about different concepts by using hedging discursively. She invites me then to take in her position, further employing a discursive bracketing, claiming that she would expect the use of Bb if her students are away from the university, but since they are on-campus students and she was located there in office hours, she questioned the benefit of spending such important time working in Bb. To validate her claim she oriented her talk by asking a rhetorical question: “am I right or wrong?” (A2-RSR-line: 14). She closes her statements by clarifying her position using the discursive disclaimer – “I am not saying [...] I think [...] but [...]” (A2-RSR-lines: 14-15). She uses this to draw validity to her claim and to soften something that may be perceived as negative. She turns to approach another orientation when the researcher suggested she go through the number of VLEs; stating the only one she has even an “abstract” knowledge about is Blackboard, underlining her limited knowledge (A2-RSR-line: 21). Such minimisation discursively manages her accountability towards Bb. Implicitly, she discursively uses justification that Bb is a priority, even if this is against her own inner belief as demonstrated by “whether I like it or not”, because this is the university approach (A2-RSR-lines: 21-22), showing less power over her decision-making.

A3’s assessment of Bb as “great” underlines her stake of interest about it. Unlike other participants, she had experience with Bb, although with distance students only. This reveals the way she has internalised this idea. She explicitly wanted to adhere to the use of Bb, using a narrative structure device in which an old experience forms a new value: “I used it [...] might help [...]” (A3-RSR-lines: 1-2). This demonstrates she has had a positive experience of using Bb with distance students, which encourages her to try it with regular students as well. Although using Bb with regular students is not as compulsory as it is with distance students, for her this means she adheres to university regulations. In response to what features are important in Bb, she employed a three-part list to emphasise the characteristics of some things over others. Interestingly, in her comments she uses an agent-subject distinction of self-admiration when she talks about her preference for Bb, to show her accountability of being a self-taught and active agent, and also to dismiss any possible interpretation that she does not want to learn a new tool. Moving from this state, she continues her lists further, stating another critical reason that drives her decision to use Bb, which is the availability of the university’s support for Bb users, unlike other tools. She shows a brief hedge, mixed with a modal verb, “hopefully [...] to be [...] I am not sure if [...]” (A3-RSR-lines: 11-13), to show that although the university support might not be applicable for regular students as well, she is accountable to deal with any Bb-related problem. She closes her
argument through a justification mode to deny any negative features if she uses Bb: "[…] would not be any problem with Bb" (A3-RSR-lines: 13-14).

The identified constructed contradictions within academics' discourses:

Secondary contradiction: applies to two components of the activity system – the community of university in the central activity gives extensive attention to Blackboard with less attention in promoting the learning activities, combined with a lack of developing an accurate definition about what BL is. This causes a secondary contradiction in academics' designing activity as they faced hardship through the lack of a socio-cultural shared definition about BL.

Tertiary contradiction: this occurs when academics try to resolve the secondary contradictions. The designing of BL is being narrowed by what is perceived as more socio-culturally proper practice, while attempting to accommodate proper BL design. (Appendix 7, figure 6).

5.4 Academics struggle to design BL as a new pedagogical tool while facing the pressing need to develop TPACK

Extract 11

1 A1: Experience is not enough (.) I once about ten years ago took a course with the British Council and it was a 3-month course on teaching. I did the theoretical part perfectly, but I was so >scared< of the practical part which was optional that I didn't go on and take it. I was afraid they would have told me 'theoretically you are very good, but practically you might not be so good' because of my <lack> of teaching background. Although our government will make it compulsory soon I still have not done it. I have a perfectionist personality↑ and something like this is really face-threatening↑ you know (.) You are a really dedicated and innovative instructor, but nobody knows you might be lacking in your teaching know-how, neither your fellow instructors nor your students know this but you know, and for me it is a horrible feeling which sometimes leans towards demotivation. At Saudi universities any Saudi can be appointed as an instructor without having any type of teaching degree (.) Because of the position I am in <I know things>. One of them is the fact that the Ministry of Education is going to make it compulsory that all higher education instructors have a one-year degree in education because so many university instructors are weak in teaching but strong in their majors (.) Although some instructors have this and I do not, <I know I am better than many instructors with such educational backgrounds, but I have to ADMIT it is an area where I know I still have much to learn↑ I >read up< on this topic and I attend university/non-university workshops but they really only give you a general idea or a <glimpse> of a small area with no practical side <so I really am lacking here>.

(A1-Interview-2015)
A2: This is a >big< change for me heh heh. <I was believing that there is no way students can apply the creative skills in this course but it turns out I was mistaken. I usually have a plan – I sent it to you before the beginning of the course and <I want to follow this plan and the course instructions, which I outlined for myself: For example, the >scientific< readings is one part of the curriculum. First I have to be prepared by reading at least four↑ or five books for me to understand it <and give them <the most> important points related to this topic, I then start to formulate some objectives such as understanding the meaning of scientific reading, understanding the advantages and disadvantages, understanding steps of using scientific reading (;) And of course, I have to give them examples of how to prepare their lessons according to scientific reading. <Now the students have to design a new project about scientific reading, they have to <plan, construct and do research to design this mini-project. This allows many objectives to be involved in only one part of the course, which is amazing, and (;) challenging at the same time:: Amazing in that the actual lecturing time would be >more< active and challenging although I have no clue how I can handle this, hhh you know, <we NEED to be careful and give the students the support they need and this is not only for the students, but also me. I have not done this before↓ and new teaching methods are involved that I have NOT practiced before.

(A2 Interview, 2015)

A3: I have to admit that I am a >traditional< lecturer (;) It seems like there are lots of things I was not aware of, <I think this is one of those areas where my <lack of teaching> knowledge comes in. Truly I have not done this before:: or even heard about it; the only learning activities I used with them is something like each lecture I call students by names, ask them questions, <they have to answer and then I give them two marks. I have not↓ considered any learning activities for this subject in particular. But now writing down these objectives helps me visualise the whole thing, I mean teaching and learning:: So I am glad we did that, I am learning (;) So that’s good, and do not forget that this is my <second year> of teaching here so I have not got the necessary experience yet, but I am learning.

(A3-Interview-2015)

A1’s account tends to draw attention to her lack of educational knowledge. She stresses the fact that “Experience is not enough” (A1-Interview-line: 1). Such a frame transformation device is apparently self-conscious in nature. She uses a narrative structure in which she begins with a storytelling sequence about the experience she had with a British Council course wherein, although she felt that she was theoretically good, practically she was scared of applying what she had learnt from the course into practice. She positioned herself as having “a perfectionist personality” which, when challenged, is “face-threatening” (A1-Interview-line: 6-7). She formulates why having such a personality in teaching is face-threatening, citing her colleagues and students to formulate her arguments. They could not notice such a lack of knowledge, but she notices this herself. She intensely describes this as “horrible”, and “demotivation”, causing her to feel demotivated (A1-Interview-line: 10), invoking this emotion category not only to declare
the matter of lacking educational knowledge but also to mitigate her liability to deal with the problem. She then turns her discussion to general arguments about Saudi education, using an externalisation device to illustrate the problem as a common one within her context, wherein any Saudi can teach at university level without getting a specific degree in teaching: “any Saudi can be appointed as an instructor without having any type of teaching degree” (A1-Interview-lines: 11-12). For her, although there is still a lot she needs to learn, and although she does not have the right kind of degree while some of her colleagues do, she still feels she is better than some of those who hold such a qualification; in this way, she uses a disclaimer. Admitting her responsibility to deal with her lack of teaching knowledge, she further stresses that despite her efforts to develop in this area through reading about good teaching and attending a number of workshops, it is just a “glimpse” (A1-Interview-line: 19) of what she really needs in order to develop. This is a minimisation device to play down the effectiveness of her efforts and enhance the believability of facts – she ends with, “I really am lacking here” (A1-Interview-lines: 19-20).

Starting with the evaluative assessment of “big” mixed with an affect display of rising intonation and slight laughter, “this is a big change for me” (A2-Interview-line: 1), A2 illustrates these changes in terms of her conception of applying a higher order of thinking, where she admits through a frame transformation device, “I was mistaken” (A2-Interview-line: 2). What was considered impossible in this particular course becomes possible when BL instructional design enters her teaching. She then starts to make a comparison between the traditional method and the developed design that is BL-based, particularly with a part of the course about scientific reading, where students’ learning objectives are based on lower orders of thinking. Here she has to prepare everything, compared with BL teaching where students have to conduct a mini-project in which they prepare everything. Such a shift is a big change for her, where she is to some extent passing the responsibility to the students instead of it being hers. What is significant about A2’s speech is her sense-making of such a shift, using assessment device, not only in her students’ learning but also in her teaching. This change is further evaluated as “amazing, and challenging at the same time” (A2-Interview-line: 13). It is also challenging because, as she explains, “I have no clue” (A2-Interview-lines: 14-15), using an ECF to strengthen her claim. Following this, she smiled, using an affect display device to brighten the situation. Then she moves her speech from the footing shift “I” to “we” (A2-Interview-line: 15), to draw attention to who is responsible for what, in which she stresses that it is not only her responsibility to overcome this challenge, but “we” have to “be careful” not only in supporting the students’ learning but also in considering this as just a new teaching approach for her.

A3’s speech structure starts with her self-label of being a “traditional lecturer” (A3-Interview-line: 1), categorising herself this way using Category entitlement to explain her acknowledgement that she lacks knowledge about the development of learning objectives: “[…] my lack of teaching knowledge comes in” (A3-Interview-lines: 2-3). This indicates that she may have done things differently if she had known more about how to develop learning objectives, as she explains: “But now writing down these objectives helps me visualise […]”, (A3-Interview-lines: 6-7). Such a frame
of transformation serves to establish that new value is inspired. To distance herself from anything that could be interpreted as negative, she used agent-subject distinction: “I am glad we did that, I am learning so that’s good” (A3-Interview-line: 8). She manages an active-agent voice in her speech, drawing attention to the fact that she is learning despite her lack of experience.

The identified constructed contradictions within academics’ discourses:

Secondary contradiction: applies to two components of the activity system – the academics in the central activity used to pay less attention in traditional methods to pedagogy and technology thus, this causes conflicts in instructional design of BL activities in which they need to expand knowledge, which they constructed as challenging.

Tertiary contradiction: this occurs when academics try to resolve the secondary contradictions in the central activity. By developing the new activity objects they examine new knowledge and evaluate the process. (Appendix 7, figure 7).

5.5 Academics struggle to sustain a sense of transformative agency while designing BL-based solutions within a traditionalist socio-cultural environment

5.5.1 Academics are conflicted between the excitements of changing pedagogical practice and the fear of putting the design into practice

Extract 12

A1: OMG!!!!! I finally met someone who has the knowhow regarding improving my teaching and enhancing student learning!!!! I loved every minute of our meeting together. I know I am a good instructor but I wish I could be better 😊 I do not know why I was never brave enough to try out this idea of appointing a specific area where I make them the expert of a particular topic. I like this idea but I am so scared of implementing it. I never 100% gave my students something like this except in advanced courses of the MA Program and even at that level it is still really under my control. My students come from diverse educational backgrounds and their English proficiency and understanding of research methods are two areas where many of them are lacking. Although I always tell my students I am a firm believer that they all have the potential to be great academics, I do not know why I was never brave enough to try out this idea before. I think this is why Sahar is a godsend. She actually made it sound easy or at least applicable, whenever I feel I am stuck in the middle. Whatever it is, I think I am going to try it and see what happens. Maybe I just needed that extra push.


A2: I am <afraid> they ((her community)) will consider me lazy. <You know in Saudi, the teacher-based approach is the most high and >prestigious< way of giving a lecture (.) Teaching in
teacher-based means that when you are active and students are >totally passive<, this is like, 'Oh wow↑ you are knowledgeable in your field!' You give lots of information and the students are >just< listeners. They will DOUBT my role although I am doing double work in creating that BL (. I think::: it will be teacher-based in Saudi until people change such ideas↓

(A2-Interview-2015)

A3: I liked the idea of using <mind-maps>, it is very:: useful to help students in the first part to construct >all< the English terminology. <You know what I used to do hhh. <I used to do a test. <I come to the lecture room, I say the concept in Arabic and they have to write it in English. It is like school practice and you know the students will forget <all> about them. I have to correct >more than< 70↑ pages, can you imagine how BORING this is, but with this idea it is more >fun< hhh so I like that.

R: Interesting, I like your motivation.

A3: And honestly >I always< think this test is not worth 5 grades, but this idea of mind-map it is worth↑ it and I believe the students will love::: it.

R: You may see a number of mind-map applications in the map I send you.

A3: <Yes I did, but I want to ask, what about <Illustrator?

R: Do you mean Adobe Illustrator? It will cost money and it will need more technological skills, and it does not support group work. I think we want five students in each group to do one creative mind-map.

A3: <Like what, show me please.

R: There is MindMeister… or maybe ThingLink, and a number of other possible ways we could use as well…

A3: Well I do not know about these technologies so:: what if I cannot help the students? Also >I am not sure<, I feel it is <more than great> and I am really into it↑ but I feel a bit <uncertain> (0.6) I think::: we need to finish the entire activities plan together so we can give the students <enough time> to complete the activities, but also we have to do examples together explaining everything in steps so I could be confident↑ that the course is going the >right way<. For example, we could do one map together in <full detail to show the students how we do it step-by-step.

(A3-RSR-2015)

A1 begins her reflection with emoticons and acronyms, "OMG" (A1-Reflection-line: 1), and this vivid description is designed to create a narrative structure in which she has been looking for someone who has the knowledge she needs to further improve teaching and learning in her context. This presents that her stake of interest towards change has always been there. She positions herself as "a good instructor", stating, "I am a good instructor but I wish I could be better" (A1-Reflection-lines: 2-3). The overall discursive strategy is an agent-subject distinction in which her agency speaks out, managing her accountability regarding the design of this particular learning activity. The curriculum area being discussed was ‘academic presentation’, and the main concern for her was students’ confidence to present. This was stressed in the discussion in stage one, highlighting that their educational background is the cause of such a problem. To mitigate
this, the design aims to let the students take responsibility with regard to lecturing and for them to actually take the lecturer’s role, and the lecturer therefore assumes the students’ role, which in this scenario involves listening and asking questions. She uses two *emphatic* contrastive evaluations, “I like this idea but I am so scared” (A1-Reflection-line: 5), to express her reaction to the implementation of such an idea; such a *category of emotion* helps her manage her accountability and add facticity to her claim. To state her affairs and manage her level of agency she discursively employed *agent-subject distinction* by demonstrating that she is “a firm believer” in her students’ potential, but she questioned her agency regarding this particular idea – “I was never brave enough” (A1-Reflection-lines: 10-11). To this end she justifies that “I just needed that extra push” (A1-Reflection-line: 14) through a *justification* device to perform the activity, a statement through which she is answering her earlier questions about her motivation towards not only implementing this particular activity, but at a wider level about the whole idea of BL. 

A2 explains her fear of putting BL into practice, believing she will be seen as being less professional; the evaluation between how she values the student-centred approach and how her community values such an approach is completely conflicting. Thus, she states in a form of definite *emotion category* that “I am afraid […]” (A2-Interview-line: 1). This feeling comes from the fact that her community is not ready for such a change, bringing some comparative evaluation between the approaches she is about to implement and the opposing ones that her community is more inclined towards, one in which she feels the student-centred approach will affect her sense of professionalism and she will be seen as “lazy” (A2-Interview-line: 1). She visualises the teacher-based approach in Saudi higher education discursive practice as being “the most high and prestigious way” (A2-Interview-line: 2), in which it metabolically mixes with *ECF*, referring to the traditional approach as having a high status. Then, she contrasts her voice to speak from the students’ stance through reported speech or represented talk to produce a vivid account of how the teacher-centred approach is seen by students, actively voicing that “Oh wow” (A2-Interview-line: 4), and stressing the students’ desire to take no role in their learning, which orients to help her manage the facticity of her account. She views her role as a BL instructor hesitantly, which in turn affects her level of agency. She forms a definite belief that “they will doubt my role although I am doing double work […]” (A2-Interview-lines: 5-6). Adding to this, she reports that in Saudi higher education, traditionalism is a dominant ideology regarding teaching and learning that needs to be shifted first to allow any positive change for BL – “I think it will be teacher-based in Saudi until people change such ideas” (A2-Interview-lines: 6-7). *Category entitlement* is used to build up some credibility for her claim, and she places herself in a different category outside her community, which is itself against any other approach except for a teacher-centred one. 

As for A3’s conversation, the focus was on reflecting on and developing a solution to help students develop the required English terminology. This part is essential within the curriculum, but the way it has been practiced is described as ineffective, particularly in terms of achieving its desired outcome. This is illustrated by the fact she believes “It is like school practice” (A3-RSR-line: 4). She uses this sort of *minimisation* to downplay this method’s suitability for university level as a
replicable version of school practice, the practice she previously, in stage one, constructed as a practical problem. She further expresses how “boring” it is to correct lots of papers for ineffective learning activities that are not even deemed to be worth the 5 grades allocated for it, asking, “can you imagine how boring this is” (A3-RSR-line: 5); this question rhetorically serves to add credibility to her claims. The instructional design solution was to let the students select a criminal case and find at least 10 English terminologies that build up this particular case, to be presented in a creative, digital way as a mind-map, which she judges as being “fun” (A3-RSR-line: 6). As the conversation progresses, she asks more questions relating to suitable technology for this task. Moving to the end of the conversation, her excitement about the idea becomes mixed with a sense of uncertainty when she says, “I am not sure, I feel it is more than great and I am really into it, but I feel a bit uncertain” (A3-RSR-lines: 18-20). Doubtfully, using all of these emotive and evaluative devices – “not sure”, “great”, “I am really into it” and “uncertain” – she hedges her claim somewhat with a counter argument that, although she shows motivation, putting the design into practice involves uncertainty. Such hedges help her to establish a facticity that left her hesitant and is based on her lack of knowledge about these technologies, which distance her from perceiving it as less accountable. As a consequence, she views the possible resolution of these dilemmatic feelings as the solution of working collaboratively in terms of designing the learning activities: “I think we need to finish the entire activities plan together” (A3-RSR-line: 20). Such a footing shift from “I” to “we” (A3-RSR-lines: 18-24) clarifies her accountability but also emphasises an acknowledgment of her need to overcome any uncertainty involved. She felt the need of collective efforts in this regard, in which she has no accountability to complete this alone. Furthermore, she sets the enhancement of her confidence with the collaborative work she felt as pressing, based on her comment, “do examples together […] so I could be confident” (A3-RSR-lines: 21-22). Such a reassuring discursive device is used not only to overcome her uncertainties but also to acknowledge her responsibility.

5.5.2 Academics faced difficulty sustaining innovative and responsible roles when designing BL with a need to expand their profession

Extract 13

1 A1: I thought I was IT-savvy (e.g. I know so much about Word and PowerPoint, I make and edit movies, I use a number of different computer-related software, I am into gadgets and apps, etc.) but it turns out there is so much out there I do not know about. However, I am always open to new ideas. I really love this idea of digital posters. I also like the idea that after every major completion of a topic, I have the students summarise it using such types of posters and I am thinking peer work here would be such a fantastic idea! I love what I am now doing with the classroom material I am preparing, but there are technical and knowledge issues that are just beyond me! I spent a day and a half frustrated to the utter limits because for example one of the slides on PowToon would not do what I wanted no matter what I tried. There was also the issue of editing text on the blog and downloading PDF files. I really feel so frustrated. I know the answer to my problems will be something in front of my face or just out of my league. That is usually the situation.
A2: It is hard to tell what is the best way. It is just I do not know what to say:: For example, when I want to prepare for the KWL ((Know, Want, Learned)) strategy I have to think a lot about it. What is the best time to do things and what technology to use – shall I give them examples <before>, during or after:: the classes? It also depends on the materials we have. Just going through this, since this is my first time, I feel unconfident about my decisions. So at this time I need you to clarify things. I am hoping >Insha’Allah<; we might see some advantage.

A3: Although I am extremely excited because I feel I am >changing< my course in a good way:: it is a really demanding and stressful experience. There are millions of technologies and millions of ideas and methods and no one can tell you 'just use this and this'; I do not know how, I mean how to create the best idea. Sometimes I ask myself is this the right idea or do I really need to do this... For example, last semester <I thought it would be better> if I changed the way homework is done because the students <tend to exchange their homework so I do not see the benefit of asking them to write assignments::: I could not control their behaviour. <You know> my problem is with the >large< number of students I am teaching. Then, instead of writing assignments that are worth 15 marks, I thought I will divide these 15 grades into 3 quizzes for the whole semester. Each quiz is worth 5 grades. I tell them that 'next week you will have your quiz', you know they have to prepare and it will cover for example the first and second part of the curriculum so at the end they have quizzes that cover the entire content. This is one of the ideas I did with my students. Also, <in another semester I asked them to prepare themselves so I give them something like a mini-exam, and as I told you the problem is the large number of students, so I asked them to work <in groups> like each 5 students together. All of these ideas are paper-based, I mean I correct them in the traditional way which takes me a long time and requires a lot of effort. So this semester I do not know what to do. <I have been teaching this subject four↑ semesters. <I have tried a number of methods and I feel these are not effective either for me or for them, so maybe I use Blackboard to conduct this homework (0.4) For example, five pieces of homework each worth 2 marks, 10 in total, and 5 marks for their participation in the class, something like that. <I still do not> know what to do. So yah:: there are lots of challenges involved and there is a lot of excitement as well.

In this segment, A1 uses a frame transformation device, recognising a gap within her technological knowledge before and after this designing stage – "I thought I was [...] but it turns out" (A1-Reflection-lines: 1-3). Such self-realisation discredits her previous knowledge when new horizons of knowledge are instilled. To form her position she uses an agent-subject distinction mixed with categories of emotion, in which she shows her ability to adapt to change and manages
her stake of interest, although there are challenges involved: “I am always open to new ideas”; “I really love this idea” (A1-Reflection-line: 4), and “I love what I am now doing” (A1-Reflection-lines: 3-7). For her, sustaining such motivation is constrained by technical issues and a lack of knowledge, which she describes as “just beyond me!” (A1-Reflection-line: 8), constructing the situation with externalisation. She shows her emotion and mixes it with an ECF when she talks of being “frustrated to the utter limits” (A1-Reflection-lines: 8-9). Here, the process of designing a solution is constructed emotionally, via an emotion category, as an event that constrains her motive. Towards the end of her reflection, she re-stresses similar emotion category, “I really feel so frustrated” (A1-Reflection-line: 11), to signify her feeling which links again with externalisation, and that the solution to her problems is out of her control. There is also the resolution of her unwanted feeling demonstrated by the comment, “[…] something in front of my face or just out of my league. That is usually the situation” (A1-Reflection-lines: 12-13), which pictures the situation as repeatedly occurring or ‘scripted’ by using a script formulation device. In addition, her comment using the modal verb “usually” (A1-Reflection-line: 12) implies a lack of knowledge to deal with pressing issues, and the fact they seem to frequently occur.

A2 constructs that finding the “best way” to blend her course is “hard” (A2-Interview-line: 1), which indicates ECF. She faced difficulty formulating her ideas “It is just… I do not know what to say” (A2-Interview-line: 1), as pauses and hesitation in her speech are apparent. In her representation of ‘KWL’, she indicates the amount of thinking she has invested to make decisions – “I have to think a lot” (A2-Interview-lines: 2-3) – with an emphasis in her voice; such ECF is used to legitimise her claim. She questions when and how to use technologies and examples to support her students’ understanding when KWL is applied. To add weight to that, designing BL is not easy to approach; she demonstrates this with a three-part list – “I have to think […] What is the best time to do things […] what technology to use […] shall I […]” (A2-Interview-lines: 2-4). Furthermore, she states, “I feel unconfident about my decisions. So at this time I need you […]” (A2-Interview-lines: 5-6). She uses a reassuring device to acknowledge responsibility, allay her feelings and cite others, to build-up the facticity of her claim that deciding the right blend is difficult and therefore external support is needed.

A3 utilises ECF, “extremely excited” (A3-Interview-line: 1), to strengthen her claims that through BL she is developing the course in ‘a good way’. This not only illustrates her state of satisfaction, but also softens another claim, which follows and seems more important – “it is a really demanding and stressful experience” (A3-Interview-line: 2). In this statement, she wanted to anthologise her action with both feelings of motivation and the category of stress emotion. Such contradictory pathology results in her comment of being surrounded by “millions” of technologies, ideas and methods, where “no one can tell you” (A3-Interview-line: 3) the best ways to help in the decision-making. Such ECFs strengthen the extent of the event. A3’s narrative structure of her previous practices helps her to construct an event that has personal liability, in which she articulates a number of challenges she has been through; namely, spending four semesters deciding how to design activities by moving from writing assignments where it was hard to control the large
number of students from indulging in unethical behaviour such as exchanging assignments, to the idea of mini-exams where the 15 marks allocated to the assignment were divided into 5 marks for each exam (3 exams in total). With this new approach she faced another difficulty, which involved having to correct all of these papers and therefore struggled to find another idea that could satisfy her need. This narrative structure is mixed with details of facts. Thus, she proposed using Bb for the upcoming semester as a solution to this pressing problem. However, she still struggles to figure out a method to employ for ensuring a good design. She concludes by expressing a first assessment of "challenges" and a second assessment of "excitement" (A3-Interview-line: 23) as an evaluative way for her to demonstrate her stake of interest.

The identified constructed contradictions within academics' discourses:

Secondary contradiction: although the academics in the central activity wanted to run away from the traditional practice, they are in the stage of designing BL, questioning their view of the socio-cultural appreciation of traditional teaching as a value that is hard to be against. Academics evaluated themselves as needing support to maintain innovative change and to be active agents in the change process, which manifested as a secondary contradiction between the activity’s tools and the academics. Here they faced difficulty sustaining innovative and responsible roles when designing BL with a need to expand their profession.

Tertiary contradiction: academics struggle to sustain a sense of transformative agency while designing BL-based solutions within a traditionalist socio-cultural environment where coherent support during the design process was a significant need. (Appendix 7, figure 8).

5.6 Summary

At this stage Saudi academics have developed a sense of excitement and motivation about BL, and such a sense grows as they come across new knowledge; however, notably, they have also experienced a sense of uncertainty or worry in terms of some concerns regarding the student community, university community and their ability to be responsible for the design of BL in the light of unknown results. It is also apparent throughout the data which academics have been able to gain an immediate understanding of what they are capable of and where they can improve. The implementation of the design in the next stage (Chapter 6) reveals how academics manage and talk about contradictions when the design is put into practice.
Chapter 6: Stage Three: Implementing BL Design

6.1 Introduction

In this stage, Saudi academics moved the design solutions from theory into practice. Before the start of the semester, the majority of the design solutions were in place, while some aspects of the design were left until the middle of the implementation stage because academics wanted to observe students’ reaction to BL. Thus, they would be more able to form more accurate decisions about any further use of technology. During the implementation stage, although BL brought a number of solutions for academics and their students, some issues and problems were raised. These issues are discussed in this chapter. The objective of this chapter is thus to address the question RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics’ discourses?

6.2 Contradiction governs the implementation of BL when students’ negativity clashes with academics’ objectives

6.2.1 Students’ slow transition from traditional to BL – academics face struggles maintaining students’ enthusiasm in a BL environment

Extract 14

A1: The main >problem< is the students↑, <they are not used to this type of learning here ((at her university)). Well I do not know about anywhere else but:: EVEN when I have been searching online about other instructors’ experiences internationally it is something new that is coming to teaching and education. So <I am not the only one> who is trying it out (0.5) Just students are >kind of< apprehensive↓ about it like:: ‘Ok we are going to do it because you said’ I think >especially< at the beginning there are >all< kinds of worries like ‘what is she going to get us into this one’, but they told me like – ‘we have to tell you from the beginning we are not IT savvy, we do not understand a lot BUT we are willing to learn, but we do have other courses and <please> keep that in mind↓ when you think about introducing us to <any of the tools’ – so:: that’s something they were worried about >but< they are now beginning to >enjoy< it. (A1-Interview-2015)

A2: At the beginning >all of them< they were not aware why we are doing this, they said ‘oh you add extra pressure↑ on us, let’s do it in <paper> and pen’, I said ‘I have NOT asked you to do >so< much’, but:: (0.5) after I talked to them >especially< when I explained why it is important to them in particular↓ as we prepare them to be teachers so:: this encouraged them. The students need to >know< the reasons of conducting these learning activities
because there are students who complain; (. ) I had a student:: she goes like ‘what >is this<, we already have two educational technology courses in this diploma, we cannot >afford< a third one'. She is >not< motivated to learn and::: of course, I have not given her >any< attention because I see other students are getting really motivated and they are <waiting for Saturday> ((everything is posted on Saturday)).

(A2-Interview-2015)

A3: <Students’ assumption about BL is <very weak> so it is really challenging (0.5) lots of <motivation, encouragement, pushing them:: (. ) I found like talking↑ to them each lecture about <where we are what to do next, what kind of work they have to complete↑ and >why< we are doing this is:: a good way to >keep< them motivated but I actually:: I do:: not blame them. >The whole< thing is new and they lack skills <Some of the students complain↓ about their lack of technology skills, <even> if it is a simple thing, it left them >dazed< which makes them lost and give up↑ quickly. So:: they have their reasons to be worried↑ I have my reasons to be >worried<. I believe it is ME who >has< to motivate not only them but also myself (0.7) Overall <they really enjoyed the new experience, they enjoyed being >exposed< to these new technologies, they enjoyed being >creative<

(A3-Interview-2015)

A1’s discourse centres students as a problematic influence, applying a category entitlement device to picture ‘students’ as being entitled to the defined category: “problem is the students” (A1-Interview-line: 1). She justifies the problem she has associated with students by observing this type of learning is new for them: “they are not used to this type” (A1-Interview-line: 1). In this stake confession, she shows honesty about the negativity of the situation, “I am not the only one”, and also gives a sensation that she is responsible and has a stake: “I have been searching online” (A1-Interview-lines: 2-4). Giving the students a categorisation of being emotionally apprehensive through an emotion category device, “students are kind of apprehensive”, (A1-Interview-line: 5) A1 explains the kind of challenges she faced to overcome this negative feeling of students. To enhance the factuality of her arguments about students she uses reported speech of her students’ reaction to her delivering her argument: “we are going to do it because you said” (A1-Interview-lines: 5-6). Such reporting back of students’ reactions allows A1 to position students as less agentic about their choice to learn with BL, showing an agent-subject distinction of those she has spoken about. She illustrates the agency of her students towards BL from the fact that they have chosen to adopt BL in their learning just to meet the instructor’s satisfaction. She then moves to minimise the case to the beginning stage where the students were first introduced to BL. She uses an ECF device – “all kinds of worries” – to sketch the case to the extreme. This extreme formulation follows the delivery of more reported speech to give a sensation of the kind of worries students felt about BL: “what is she going to get us” and “we have to tell you” (A1-Interview-lines: 7-8). However, she moves to hedge her claim, showing a positive transformative impact on
students’ acceptance of BL as they start to enjoy it, not only to satisfy her but because of the enjoyable experience of BL they had: “but […] beginning to enjoy it” (A1-Interview-line: 11).

A2's talk starts by stating how students perceive BL and feel about it, and how they have psychologically transformed from the beginning to the end of the course. Students’ primary challenge at the beginning was their lack of awareness about BL. Having categorised students with this category, A2 uses a category entitlement – “they were not aware” (A2-Interview-line: 1) – to emphasise the challenges she went through to get them to understand the benefits of BL for them, particularly given they are teachers in training. To enrich the factuality of her argument she delivered a reported speech device to present a dialogue between her and her students – “oh you add extra pressure on us” (A2-Interview-lines: 1-2). This shows the students’ rejection of BL and preference for the traditional way. In response she replayed, “I have not asked you to do so much” (A2-Interview-lines: 2-3) – this response to students’ reaction of rejection implies a stake inoculation device to inoculate against the students’ less factual claim about the pressure she puts on them when teaching with BL. She uses stake confession to give a sense of her responsibility in changing students’ negative conceptualisations about BL: “after I talked to them […] this encouraged them” (A2-Interview-lines: 3-5). This is especially important for these students as they are pre-service teachers. She follows her claim with a disclaimer, arguing that if students’ belief about BL is enhanced, they won’t complain about it – “students need to know” (A2-Interview-line: 5). This implies that students’ behaviour of complaining about BL is related to their lack of conceptualisation of BL; this challenge stands as a contradiction to her activity. To build a credible argument she delivers a reported speech device, presenting two different examples of two students being in contradictory positions regarding BL, which is a challenging factor. The first event in her talk is constructed about a student who complains a lot: “we cannot afford” (A2-Interview-lines: 7-8). She hedges this event to avoid making a certain claim, and to admit her responsibility for the negative feature of the situation of not paying attention to negative students who are not motivated to learn, and only paying attention to educate and talk to students who are motivated: “other students […] motivated” (A2-Interview-lines: 9-10). To enhance the claim that she made and to manage her accountability for dealing with some students’ negativity, she offers a narrative-structure device, in which she narrates how motivated students were each time they were looking forward to Saturday to see what was waiting for them in the next week’s activity with BL.

A3 starts with an assessment device about how students’ enthusiasm towards BL is evaluated as being low, which puts forward a challenge in setting up the transition to BL: “students’ assumption about BL is <very weak>” (A3-Interview-line: 1). To present her talk as more factual she turns to offering a three-part list in sequential order – “lots of motivation, encouragement, pushing them” (A3-Interview-lines: 1-2). She then emphasises the amount of effort she made to overcome students’ slow transition towards BL, deploying a frame transformation device wherein new value is instilled to an old meaning: “I found like talking to them” (A3-Interview-line: 2). In which it is new to her to establish a conversation with her students about the way she teach. She follows this with
justification in her talk, “I do not blame them”, (A3-Interview-lines: 4-5) to overcome potential criticism that could be attached to her profession. Further, to boost the facticity of her claim, she draws upon an externalisation device, to describe the situation as being beyond her: “the whole thing is new” (A3-Interview-line: 5). Stake confession shows her honesty about her students’ serious lack of skills and more importantly displays acknowledgment of responsibility: “I believe it is me who has to motivate” (A3-Interview-line: 8). She offers a three-part list device to build the arguments that, even though students had experienced difficulty interacting with BL, it was an enjoyable experience for them, by offering yet another positive construction: “they really enjoyed […] they enjoyed” (A3-Interview-lines: 9-11).

6.2.2 “The kind of worries I have, I think I cannot trust students’ behaviour” – academics face challenges managing expectations in a BL environment

Extract 15

1 A1: Sarah the IT savvy student I told you about, her <reflection about her assignments and her homework↑ that I gave out:: she told me a >very< weird story, something like:: big fat lie↓ but we will see (.) She posted them but she said they are not online. <I told her I am not sure why they are not online she goes:: ‘I did BUT they are not there↑‘, she does not know where the problem is. She goes >maybe< I did not press publish’. So ↓ do not know but she is really one of the smart students who do not do this but at the same time I feel she is lying↓. I told her, ‘you have until tomorrow’, because (0.4) SEE >all< the assignments they had we went through all↑ of them typically <in my office> but what I did I thought after what we did in the office I thought it is better to put all of them on paper >just< in case. (A1-Interview-2015)

1 A2: Students actually have problems: some have problems knowing their passwords, they register but when they log out, the system requires passwords. A student called Fatimah, she told me that she has registered using an old email that does not work anymore, now she’s asking how can she change it? Also some said, ‘we do not know how to register because it is in English’. What shall I tell them?

7 R: They will find their passwords in their emails.

7 A2: I do not think they are really having all of these problems: they just take it as an excuse to not participate in the platform. (A1-R –WhatsApp-2015)

A2: I thought my students WOULD not be able to master the new idea of BL (0.5) Although we had >problems< at the beginning, their <motivation, interactive participation in the online discussion and <other activities> was JUST amazing↑ I am glad that we did incorporate >BL<. I feel like I am over the moon↑ I feel they become more >responsible< and they
critically evaluate materials. I was reading their comments and I was astonished - hhh I had NOT expected that.

(A2-Interview-2015)

A3: The kind of worries I have, I think I cannot trust students' behavior. Although BL helps them learning new skills in different and unbelievable ways: like we encourage students to go online, search and construct understanding, but they did not get the benefit out of it. <See in online discussion: the cut and paste is a real problem (0.7) <Likewise with Bb I asked them at the beginning to group themselves according to their preference; they did not do it, not all of them. Some groups have grouped themselves quickly BUT others they were waiting for me to give them a list of their names and groups. I do not know why but I think it is more likely because they ARE NOT used to being independent...

(A3-Interview-2015)

A1's overall discourse offers a narrative-structure device, where she narrates an event about one of her students. She uses a category entitlement at the beginning of her narrative, “IT savvy student”, to categorise this student (Sarah) with an entitlement that states her prior expectations about Sarah as a technology-skilled student. To generate more factual claims about this student’s reaction to A1’s teaching, she draws upon a three-part list – “reflection about her assignments and her homework” (A1-Interview-lines: 1-2). A1 formulates what she is narrating as a “weird story” that contains a “big fat lie”, (A1-Interview-line: 2), using ECF to weight the importance of narrating this event. She relates the conversation that occurred between her and her student, displaying reported speech – “I did BUT” (A1-Interview-line: 4) – in which the student claimed that she had completed and posted all of her tasks online, although A1 cannot find them there. When A1 asks why she could not find any of them online, the student claimed that she might not have pressed the publish button in Edublog. Although A1 portrays the student as being unaware of the location of her tasks, she hedges the student’s credibility: “I do not know but […] I feel she is lying” (A1-Interview-lines: 5-7). A1 practises a frame transformation device wherein new value supersedes old meaning, namely that students need to put their work on paper, as after the effort and time she spent going through everything outside the lecture in her office, it is better “just in case” (A1-Interview-line: 10) that they put their work on paper to avoid any similar lying or suspicions of lying. This narrative shows how managing expectations creates contradictions in A1’s activity of implementing BL.

Managing expectations is also seen as a challenging contradiction in A2’s discourse, as can be seen in the WhatsApp conversation between her and me. At the beginning of the course lots of problems occurred while just getting students registered to the Canvas platform. She sent me a message displaying stake confession, in which she showed acknowledgment of her responsibility – “What shall I tell them?” (A2-WhatsApp-line: 5) – for the negative situation, which she described honestly – “Students actually have different problems” (A2-WhatsApp-line: 1). She also uses three-part list: “knowing their password, […] using an old email, […] do not know” (A2-WhatsApp-
This list enhances the factuality of her argument that different problems are occurring. In response to my explanation that they could access their passwords through their emails, she *hedges* the fact that they are really having all of these problems, showing low expectations of students’ willingness to participate in the platform: “I do not think” (A2-WhatsApp-line: 7). However, in a later interview with her towards the end of the course, she practises a *frame transformation* device, where she forms a new principle about her expectations of her students. However, this belief, “I thought my students would not be able” (A2-Interview-line: 1), has been inspired by her experience with BL and changed to a new value: “[…] their motivation, interactive participation in the online discussion and other activities was just amazing” (A2-Interview-lines: 2-3). She presents a *three-part list* device to her frame of argument to add more facticity. She then states verbally her emotion through an *emotion category* device – “I am glad […] I feel they become […] and I was astonished” (A2-Interview-lines: 3-5) – regarding the observable change in students’ learning, explicitly picturing the change through a *frame transformation* device: “I had NOT expected that” (A2-Interview-line: 6).

A3’s discourse shared similar meaning about managing expectations as a contradiction in her activity implementing BL. She uses an *emotion category*, in which being unable to trust students’ behaviour is causing her worries. She follows this constructed emotion by *hedging* that BL helps students learn: “unbelievable […] but they did not get […]” (A3-Interview-lines: 2-4). To give weight to her claims about the kind of worries she has, she directs her talk using a *three-part list*. Starting her list with the online discussion, in which she uses a strategic linguistic ambiguity, she *hedges* whether the students get the benefit of being critical about their discussion; they instead copy and paste – “the cut and paste is a real problem” (A3-Interview-line: 4). She puts another example in her list relating to the students’ behaviour of being slow to group themselves on Blackboard, criticising some of them who are not independent in their learning and were waiting for her to give them a list of their groups – “they […] being independent” (A3-Interview-lines: 8-9). This was against her initial plan of letting them decide what group they wanted to join.

**The identified constructed contradictions within academics’ discourses:**

**Primary contradiction**: applies to the tool component of the activity, in which BL is regarded as a novel tool. Thus, academics and students do not share a common value system on the awareness of BL importance, which is reflected in previous stages of the study.

**Secondary contradiction**: applies to two components of the activity system – the community of students and the tool – which conflict with one another and constrain academics’ endeavours to obtain the object of effective BL implementation. For example, students’ low confidence in their technological skills impairs their effectiveness at assimilating the new tool, leading to the community of students feeling apprehensive about the idea of BL and denying it. Academics identified this contradiction in previous stages as a conflict that controls their motives.

**Tertiary contradiction**: this occurs when academics try to resolve the primary and secondary contradictions pre and post the introduction of BL. For example, the new object of implementing
BL (non-traditional methods) does not fit with the socio-culturally acceptable preferences for traditional methods. This results in slow transition from traditional to BL methods and causes mistrust between academics and the community of students. (Appendix 7, figure 9).

6.3 Academics struggle to sustain creative BL implementation as staff who need to follow the university policy; academics as self-governing thinkers

6.3.1 Academics faced a situation where their creativity and efforts came into conflict with the university values and policy on technological use

Extract 16

A1: The university want us to use BL but at the same time we ((she and her students)) could not access the blog in the university. Oh my god↑ this is KILLING me. They ((IT people)) said like the problem is in the server. <I am sure there is >an easy< solution to this but every single time↓ I talk to someone no one knows the answer, >go to who< go I do not know to who. <I have been emailing people (. ) but NOW I am just going to the top↑ I know the vice dean <I will go to her office and I will >tell< her that I have <this problem> although I do not want to do that. It is >not only my< blog but my website↑ because the blog in the website, they blocked my website, the university blocked↑ my website which is in the university. I thought >that was crazy< but anyway I am going to go and sort that out.

(A1-Interview-2015)

A1: Maybe:: the disadvantage↓ of using a blog (. ) the university put in >a lot of money< in the Blackboard and I am supposed to use Bb so:: I was:: even kind of:: I do not know what >the word< is:: wel::l, <the lady responsible for Bb told me '>there, watch out< you might not be promoted↑ because you are using something other than Bb', I was upset↑ that she said such a thing to me, and I said well NOT everybody is using it yet↓ (. ) <'til I learn it and I go attend some <workshops on it now I am gonna do this ((using Edublog)). I already >know< <my way around this, >I do not think< I am going to use Bb soon, and <she said, 'it is something that you better >keep in mind<' (0.2) Um:: I do:: not think I am >convinced< by her theory:: It is about the money, what I am going to do is I am really enjoying↑ teaching with the blog and I like that.

(A1-Interview-2015)

A2: I think it is not >impossible< to establish this change↑ it's just a >number< of things need to be solved, and take place before BL is integrated (. ) If we are prepared very well why not? The >whole< thing is about the change of mind of the way of thinking and role of policy-makers… <These people holding administrative position they do not understand what BL is, they will consider it as a weakness↑ instead of >strength<, which is a problem (0.5) <I think
it is all about change. If we go back to organisational change in any organisation, when change has occurred it happens really slowly. I told you about that student who went and complained about me not teaching them, and they do most of the work. They do NOT understand that this is how BL works. I am not sure of the administrative people who write about my teaching because of one student.

(A2-Interview-2015)

A3: I am eager and desperate towards this movement of BL BUT I have a small problem. I need to meet the new head of department. Just at the beginning of this new year the head of the department has changed. I do not know who she would be, but I have an impression that we have a very serious Dr, she is more likely to be our head of the department, so I have to talk to her first, because she is very different from the old one, even her personality is different hhh. I do not know how she would react about me using Bb with regular students because normally here in the departments we use it only with distance students. The old one was ok with trying something new but the new one believe she will question me, if this is not for regular students WHY am I using it, <how will I assess the students’ work, and <how can I finish other responsibilities I have. I have to prepare a full report about what I am going to do for her to have a clear vision NOT just talking to her, but actually showing her in papers.

(A3-Interview-2015)

This discourse of A1’s followed an observation of her lecture. Our interview focused on the problem that she and her students faced accessing her blog in the university, and she starts by initiating a stake confession, in which she confesses her responsibility and displays honesty by questioning the fundamental role of the university in encouraging BL, while it is not possible to access her blog in the university: “The university want us […] we could not access the blog” (A1-Interview-lines: 1-2). She pictures this situation as negatively contradicting her attempts at active implementation of BL, in which she frames the situation to the extreme by using an ECF mixed with affect display, raising her intonation: “this is KILLING me” (A1-Interview-line: 2). She follows with a narrative structure device, narrating the scenario she went through in her attempts solving this problem. In her narrative she doubts the role of IT people in the IT department, as they lack the ability to solve the problem. To enhance this fact she turns to a three-part list to package the sort of response she has been given by them and emphasise the amount of efforts she made: “no one knows” (A1-Interview-line: 4). She uses an agent-subject distinction to indicate her accountability to solve the situation even in a way that she does not prefer, which she orients to state her rejection of accepting the university act of blocking her blog: “I am just going to the top” (A1-Interview-lines: 5-6). To extreme the case and add more factuality to her claim and her decision of going to the vice dean of the IT department, she also uses an affect display of rising her intonation of anger as an apparent display of emotion. Using an assessment device mixed with an affect display, she relates how “I thought that was crazy” (A1-Interview-line: 9). Here, with
a strong voice and repetition of the act “blocked”, she shows her rejection of such an act, which 
she assessed as being ‘crazy’.

In a subsequent interview with A1, she uses a category entitlement device to categorise 
the situation of teaching with a “blog” in her university as a “disadvantage”, which helps her manage 
her claim (A1-Interview-line: 1). However, she attaches the modal verb “maybe” to establish her 
degree of agreement about seeing the blog as actually a disadvantage. This is followed by an 
externalisation of the situation as being beyond her own judgment, using an externalisation device 
to recount how the university paid lots of money for Blackboard because its BL strategy is built 
around Blackboard and not another tool. During her attempts to construct how using a blog over 
Blackboard is a disadvantage, she turns her talk with hesitation mixed with vagueness, “what the 
word is” (A1-Interview-line: 3), facing difficulty managing her stake and her construction of the 
situation. She then quickly turns her talk to deliver narratively a conversation that occurred 
between her and a “lady responsible for Bb”, using a narrative-structure device with reported 
speech: “you might not be promoted” (A1-Interview-lines: 3-4). Reporting this from a responsible 
person in the university not only establishes the factuality that the ‘blog’ is a disadvantage, but 
also describes why. Namely, that the university is not promoting academics who are not using 
Bb, as the university offers an allowance for academics who incorporate approved technology in 
their teaching. This leads her to constructs a negative emotion – “upset” – about what this 
academic had told her: “I was upset” (A1-Interview-line: 4). As a response to such negative 
emotion she uses reported speech mixed with script formulation: “I said well not everybody is 
using it yet” (A1-Interview-line: 5). Establishing that no one has used Blackboard yet as a normal 
practice, and defending against what the lady is claiming, she positions herself as doing 
something for her teaching that no one else does. Providing reported speech about her replying 
to the other academic, mixed with an excuse device, “til I learn it” (A1-Interview-line: 5), she 
reveals a responsible sense that she is willing to use Blackboard, but also reveals a negative 
feature that in order to use Blackboard she needs to build knowledge about it and even attend 
some workshops. Also, she indicates that the time is not appropriate to use Blackboard instead 
of her blog, delivering reported speech to actively voice her reaction, mixed with a three-part lists 
to add factuality to her claim about preferring the blog as it is something she has already mastered 
the required skills to use: “I do not think I am going to use Bb soon” (A1-Interview-line: 7). To 
present how the academic responds to her claims she delivers another reported speech, in which 
she advises her to consider avoiding using anything other than Bb, meaning she won’t be 
promoted and she is equal with anyone who has not used anything: “you better keep in mind” 
(A1-Interview-line: 8). She then uses a strong construction of argument approaching a disclaimer 
by hypothesising that even if the university had paid lots of money for Bb that lady would not say 
that, thereby rejecting her claim to be factual: “I do not think I am convinced” (A1-Interview-lines: 
8-9). This situation implies that there has not been a clear policy and direction for academics 
regarding BL.
A2’s discourse builds around the idea that to sustain successful BL, creative and innovative policy-makers who are educated and believe in BL are required. She initiates her talk using a reassuring device, in which she attempts to hearten and comfort the situation by presenting that there are solutions available: “it is not impossible” (A2-Interview-line: 1). She offers a disclaimer device to hypothesise that if a well-prepared environment is created for BL, the establishment of BL as a new culture would be entirely possible: “if we are prepared?” (A2-Interview-line: 2). A three-part list is presented to enhance the credibility of her claim and emphasise how the new culture needs to be established: “change of mind […] of policy-makers” (A2-Interview-lines: 3-4). Consequently, the mind, the way of thinking and the role of policy-makers for her is the starting point to sustain effective BL change, which leads her to offer a frame transformation. The frame referred to here is the need for acknowledgement, understanding and acceptance of the culture of BL: “they do not understand” (A2-Interview-lines: 4-5). However, although she acknowledge this as a problem, she uses a script formulation device to describe the situation as normal practice in any organisation where change comes into practice; it needs time and change happens slowly: “it is all about change” (A2-Interview-line: 6). To make her claim believable and credible she turns her talk to narrate an event using a narrative structure device, where one of her students complains about her teaching with BL to the administrative staff. She is concerned about what comments on her teaching will be written by these administrators who lack understanding about the rationale behind BL: “They do not understand […] how BL works” (A2-Interview-lines: 8-9). The culture that currently exists is challenging the attempts of integrating BL.

A3’s discourse took place at the beginning of the implementation stage, where the head of the department had changed; she uses a narrative structure device to show how this links to her implementation of BL. She initiates her narrative with a disclaimer device to defend against any possible misunderstanding of her interpretation: “I need to meet the new head” (A3-Interview-line: 2). She uses a category entitlement mixed with a hedge device, categorising the potential head of department as being entitled with certain characteristics, while hedging who she would be, which she does to avoid making a definite claim: “I do not know who she would be” (A3-Interview-line: 3). She intimates that having a serious head means a new frame of practice, wherein she offers a frame transformation that talking to her and explaining and justifying her rationale of using a new approach will be required: “I have to talk to her first” (A3-Interview-line: 5). To increase the factuality of her claim she offers a contrast device mixed with an affect display of laughter to soften what could be received as a negative interpretation; she directly compares the ‘old’ head with the ‘new’ one, to distinguish the new one as having certain characteristics over the old one: “because she is very different” (A3-Interview-line: 5). She hedges the reaction that the new head will have, showing uncertainty to avoid creating a certain claim: “I do not know how she would react” (A3-Interview-lines: 6-7). To state such differences, she approaches a contrast device – “I believe she will question me” (A3-Interview-line: 9) – stating that the old one is open to change, while the new one won’t easily accept any change, and will question any new change. She attempts to approach a three-part list device to package the kind of questions the new leader will ask: “why am I using it, how will I assess the students’ work, and how can I finish other responsibilities” (A3-Interview-
Here, she uses an agent-subject distinction to show her accountability and agency to convince her new head about BL and Bb: "I have to prepare a full report" (A3-Interview-line: 11).

### 6.3.2 Pressing need for continuous support throughout the implementation stage

#### Extract 17

1. A1: I am so happy but at the same time really anxious. Implementing technology takes time 😞
2. R: It is indeed hard, but worth doing...
3. A1: Sahar, can we meet as soon as possible? I have a million and one questions 😄


1. A1: You know, for example when I called you and I was so >irritated< trying to create a video about plagiarism, for the flipped activity hhh. I really feel lost there are many things still NOT really clear. >I do not< want to look unprofessional in front of students, but though it was annoying, just having the feeling that there is someone who I can talk to and can provide me with the answer I need is just what we need, and that's something I do not think people at the top know.

(A1-Interview-2015)

1. A2: I think people in the top need to be involved um:: it seems like they are there doing their stuff and we are here doing our stuff. I believe it would not work like this. It has to be a shared mission (0.7) Besides:: I feel it is like a >lonely< journey if you are not there. It would not be possible hhh <I seriously think without your support I won't be able to get enough courage, confidence and knowledge to practice it or even enter this world of BL. I believe if anyone wants to teach with BL, definitely support has to be there and people here in the university >must< understand this and put a new direction or policy to achieve this::

(A2-Interview-2015)

1. A3: I have done all I could to help them. At the beginning they had difficulty registering with Blackboard; they do not know even how to access it. So because I teach distance students I knew there would be a workshop about Bb, offered by the university; although they are regular students, I asked my students to attend and provide proof of attendance. I believe if the university provides the same workshops and support for the regular students as that provided to distance ones, it would be great. I think at leadership level they NEED to understand that. I believe, if people at leadership level are concerned about taking BL forward, things will operate differently, I mean positively. From my experience implementing BL, we need to be supported, we need to have encouragement, and feel even
difficult things are possible to happen. We need to feel like we have answers to our concerns and direction for change.

(A3. Interview.2015)

In this WhatsApp conversation with A1, she states her feelings of being between two incompatible emotions – ‘happy’ and ‘anxious’ – using an emotion category device. This illustrates her accountability in implementing BL, combined with contradictory feelings: “I am so happy but at the same time really anxious” (A1-WhatsApp-line: 1). To manage the factuality of such a state of affairs, she puts forward a disclaimer device – “Implementing technology takes time” – subtly suggesting that she would not feel this way if the implementation of technology did not demand so much of her time. To further enhance her claim, she uses an emoji with a downturned mouth and eyebrows as an affect display “ 😞”, to state her feeling (A1-WhatsApp-line: 1). At this point, she practices an agent-subject distinction; responding to my attempts to soften and encourage the situation, she expresses her feeling of urgency to meet up in the nearest possible time to get rid of any unwanted feelings associated with the BL implementation – “can we meet” (A1-WhatsApp-line: 3). Also, the footing shift she offers (“we”) manages her accountability by suggesting she could not solve this problem alone. To emphasise such needs, she used an ECF to show that there were a “million and one questions” (A1-WhatsApp-line: 3) that needed to be answered. This put her in a contradictory situation where she was in urgent need of help, and she ended her construction with a sweating face with a smile emoji “ 😁” as an affect display to shore up the uncomfortable situation she was facing (A2-WhatsApp-line: 3).

This pressing feeling of needing support is explicitly apparent in the narrative structure she offers to develop a rational and logical account stating her need of support. She uses an emotion category – “I was so irritated” – (A1-Interview-line: 1) to support her narrative and suggest that what she has to say is worth listening to. She softens this emotion by an affect display of laughter to make her construction acceptable and then moves on to narrating the event by approaching
another emotion category – “I really feel lost” (A1-Interview-line: 2) – wherein this feeling is invoked as a consequence of the attached constructed fact. Establishing the negativity of the situation and acknowledging her accountability to be professional in her practice, she offers a stake confession device: “I do not want to look unprofessional in front of students” (A1-Interview-line: 3). She follows up with a frame transformation – “there is someone who I can talk to” – which frames that having support is what she needs to heal any negative feeling. A disclaimer device establishes that if people in the top positions who are looking for change and educational improvement know about the academics’ need of support, the situation would be different: “I do not think people at the top know” (A1-Interview-lines: 4-5).

A2 discloses negative features – “people in the top need to be involved” – that lead her to frame a new value: “It has to be a shared mission” (A2-Interview-line: 1). This offers a frame formulation device in which she implies that within the system of improving education and implementing BL, the lack of collaboration between people in policy-making and people who do teaching needs to be reframed. She turns her talk to state an emotion category mixed with a disclaimer, “I feel it is like a lonely journey if […]” (A2-Interview-line: 3), hypothesising that if the source of support did not exist (in this case the researcher), her journey of implementing BL would be a “lonely” one. The first construction about the need of collaboration followed by the second construction in an emotional sense implies that a source of support is emotionally needed in such a journey, and that needs to be considered by policy-makers. She further reconstructed her discourse to add more credibility by approaching an ECF mixed with a three-part list, stating her opinion as being a serious one: “I won’t be able to get enough courage, confidence and knowledge” (A2-Interview-lines: 4-5). What is interesting about her positioning is that she shows the kind of support she requires to be able to achieve her object, namely support that gives her “enough courage, confidence and knowledge”. She adds a further disclaimer that “support has to be there” (A2-Interview-line: 6) – conditional support has to take place for anyone to transform their practice to BL. This hypothetical statement needs to be understood by policy-makers: “people here in the university must understand this” (A2-Interview-lines: 6-7).

The discourse with A3 was around her Bb announcement page, when she posted an announcement of lecture cancellation. As shown in the screenshot, she apologised to her students for cancelling the lecture because the university was holding a workshop about Bb and she thought it was important for her students to attend instead. However, for her to make sure that students have attended the workshop she requires them to provide proof of attendance. This event links back to her construction in the previous chapter of her rationale behind using Bb as a platform, because she might get supported by the university. When I asked her to tell me more about this event, she approached a narrative structure device to narrate an event where students’ registration was taking up her time. She already knew that there was a workshop about Bb, but this workshop is offered for distance students only. However, to reject any possible blame, she shows her responsibility regarding the situation offering a stake confession device, wherein to get the students completing their registration, she required them to attend and provide evidence of
attendance. She orients her talk through a disclaimer – “support for the regular students […] it would be great” (A2-Interview-lines: 5-6) – observing that if regular students at the university received similar support to distance students, the situation would be more positive. Further, she constructs another category entitlement that the leadership level has a lack of understanding about the significance of support as a required influence towards the adoption of BL. Following this categorisation she draws upon a disclaimer – “if people at leadership level are concerned” – projecting that if a serious policy effort is made by people at the top, then the result will be faster change in a positive way. To strengthen the persuasiveness of her claim a three-part list device legitimates her action: “we need to be supported, we need to have encouragement, […] We need to feel like we have answers to our concerns” (A2-Interview-lines: 9-11). This also shows her subjective feeling of needing to be supported.

The identified constructed contradictions within academics' discourses:

Primary contradiction:

1- Within tool: no shared understanding of the value of integrated Web 2.0 technologies as a new instructional method between academics and people in leadership positions (e.g. the need to open YouTube access in the university vs. YouTube being blocked by university policy)

2- Within the subject of the activity: academics experienced contradictory emotions about their conceptualising of BL and the university community’s understanding of it (academics as independent thinkers vs. academics as employees)

Secondary contradiction: occurs between the subject and community components of the activity, in which the implementation of BL requires extensive support to be given to academics to obtain the object of successful BL implementation. Another recognisable secondary contradiction is that the available support is oriented mainly to the distance education delivery method, compared with the lack of support for users who attempt to use technology-supported content using other tools apart from Blackboard

Tertiary contradiction: when the participants looked to resolve the secondary and primary contradictions these contradictions become more serious in their activity implementing BL. Namely, the object operationalised by the university’s community activity does not fit with the academics’ more advanced motive-driven object to accommodate BL implementation. This gives a contradiction constructed between a central activity and more developed activity:

1- Academics struggle to sustain creative BL implementation where being self-governing thinkers comes into conflict with the university’s activity of technological implementation

2- The pressing need for continuous support throughout the implementation stage slows down the effective transformation of teaching practice from traditional to BL. (Appendix 7, figure 10).
6.4 Implementing BL as a new pedagogical tool for teaching and learning

6.4.1 “The problem with the technicality of it” – academics faced difficulty overcoming the technological requirement of BL

Extract 18

A1: The >funny< thing is I am truly motivated BUT when technical problems arise they truly make me experience turbulence in my motivational state. <Anyway> I can't wait to get home and start working again to overcome all the problems I am having. so I am having a problem with the <technicality> of it (0.2) like: you would not believe it. Just one slide, one slide >one stupid slide< hhh I had to make that video that I sent you lots of times. What they do, because of free application <it has little things that kind of make you: (.) like pushing you into the pro upgrade. and I was able also to download it and send it to you and I am happy↑ about that, but I forget↓ how this is done in the blog, so if you do not mind go through the blog again because I have been since last Saturday experimenting. I do not know if you saw my experiments.

(A1-Interview-2015)

A2: Um::: students go like::: (.) 'Dealing with technology is difficult', so I tried to motivate them, when I observe like the whole groups are stuck with one activity and they do not know how to deal with a certain technology so I told them, 'I am like you, let's explore it together', so I sat with them, I said, 'let's try this', 'let's do this'. I told them, 'if you face any problem just Google it, YouTube is full of solutions'. (0.5) Especially with some applications although it said that Arabic language is supported but it is like it supported the Arabic but not full support, there is difficulty in making it readable like lines: appears from left to right which is really annoying. So we searched for alternatives that fully supported Arabic language.

(A2-Interview-2015)

A3: I am working on a video with questions now and inshallah I will be finished with it this evening. I started working on it from yesterday and this is only for my first class. By the way, technology is not as easy to implement as I thought it would be. You know one of the things that's really bothering me is that these tools are not completely free and not direct. I need to search for answers all the time. So sometimes problems are related to the application itself but: (.) some::times um::: <like with the quiz, it was a success but I have to say that I had a problem with some of the students who didn't see my last message for the evening about the quiz. So while their friends were doing the quiz they had to go see the videos. It wasn't a very big failure because they got it quickly and started working. I think I might have to send SMS messages to remind them.

(A3-Interview-2015)
A1 initiates her construction by employing an emotion category in conjunction with a disclaimer device to mitigate her position regarding the situation, trying to construct her motivational state as being emotionally “funny” (A1-Interview-line: 1). The funny emotion is explained by a disclaimer to avoid any negative interpretation about her claim, in which she constructs herself as being “truly motivated”, but such a strong emotion comes into conflict when she faces any technical issues that cause “turbulence” in her motivation (A1-Interview-lines: 1-2). And yet this constructed turbulence emotion is followed by an agent-subject distinction managing her agency about what she is saying; in her formulation she presents herself as an active and determined agent to act upon such negative “turbulence” by working hard outside of her normal hours – “to overcome all the problems” (A1-Interview-line: 3). She explains she did not have any timetabled interactive activity in traditional teaching, but with BL these activities become a part of her teaching, and the technicality is a part of this new teaching. To make her claim more factual, she draws upon a narrative structure, narrating an event when she had to create a video for one of her lectures. She faced a problem that took her time and effort, and it was actually related to the fact that the application was not completely free and actually pushing her to upgrade to the pro version. Within her narrative she also employs an emotion category device, categorising herself as being happy when she was able to create, download and share the video she created, but at the same time feeling upset because she forgot how to upload the video to her blog. This event is another example that emphasises how problematic the technicality involved in BL teaching is: “I forget how this is done” (A1-Interview-line: 8). At this moment, she asks the researcher for help, approaching a stake confession in which she confesses responsibility and interest, and shows honesty about the situation, to dismiss any negative understanding: “if you do not mind go through the blog” (A1-Interview-lines: 8-9).

A2 employs a narrative structure device to ensure her claims are listened to and taken seriously, in which she constructs how she dealt with students as being complainants about the technology, claiming that it is difficult. Initiating her narrative, she uses reported speech to maintain a more realistic claim about the situation: “technology is difficult” (A2-Interview-line: 1). Within her narrative, she employs a three-part list device to manage her accountability for this event, emphasising the role she played to make it more factual, in which she argues that she motivated them, “I tried to motivate them” (A2-Interview-line: 1), encouraged them to explore solutions by telling them this is a challenge for her as well, and also asked them to Google any problem they face dealing with technology. Moving to employing category entitlement, she categorises an application as having bad Arabic language support, which creates an unsatisfactory interface in which lines: appears from left to right, making it unreadable. Having this technical problem forces her and her students to search for another application she categorised as being “fully” supportive of Arabic (A2-Interview-line: 8)
A3 practices an agent-subject distinction device, showing transformative agency when creating a video for her first flipped-learning experience; through this device she is managing her accountability by positioning herself as being agent and having the competence to complete the video: “I started working on it” (A3-Interview-line: 2). She then moves to apply a contrast device, to show that the implementation of technology is not easy compared to what she used to believe, emphasising the difficulty involved when dealing with technology: “technology is not as easy to implement as I thought it would be” (A3-Interview-line: 3). Within her talk she uses category entitlement to categorise the type of problems that make the implementation of technology “not easy”, in which she constructs problems related to the application itself like being free or having direct instructions for users. But implicitly she means that the problem is related to the way it is implemented: “but sometimes like with the quiz” (A3-Interview-line: 6). Further, she uses narrative structure mixed with a disclaimer devices to relate the event of using an online quiz, which she assesses as being easy to deal with in terms of the quiz creation, but mixed when it came to implementing it with students: “the quiz, it was a success but […] a problem […] students” (A3-Interview-lines: 6-7). However, she moves to a justification mode, downplaying the negative feature of the situation – “It wasn’t a very big failure” – and admitting responsibility: “I might have to send SMS messages” (A3-Interview-lines: 9-10).

6.4.2 Course-based BL: building online communities and the implementation of a virtual learning environment

Extract 19

1 A1: I used to teach in a traditional way and what I am doing now is 100% better than what I was doing because there is so::: much communication going on between me and my students, I mean even with my phone I can check what they are doing, so for me communication is number one. Through the Edublog students feel a connection, the group dynamic happens where all of us are together um:: I used to deal with the students one by one but now I do not feel I deal one by one, I feel I deal with the group and this is for me one of the things. Number two, with Edublog the girls quickly↑ get their feedback, well it is quicker than the traditional way; they can visit the Edublog and they can see what I posted for their friends and so that is also a very good use. They can check out the mistakes that their friends made. Third, it brings up potential in every↑ student, even from the simplest thing like the theme of their blog, the potential they have to become creative.

(A1-Interview-2015)

1 A2: … especially the platform, remember when we started it was a nightmare situation for me and for the students as well, but now Mash’Allah I am enjoying it:: (.) It took a lot of my time before but now↑ it is not taking such a time <and the students <they do not ask, ‘what can I do, where can I go?’ Once at the class I show them how to access the platform, some of them the moment they did Mash’Allah I had no problem whatsoever. No one has even contacted me once and told me they had a problem, but at the beginning I really spent time
with them to make sure all the problems are solved appropriately. Canvas provides a good platform to create an online space where it is easy to communicate, share experiences and ask for help. I like the easy access use of Canvas where I put something and it stays there; I do not have to worry about it is in my convince, and in my students’ convinces

(A2-Interview-2015)

A3: It was a right decision. Although I could not conduct lectures online as I do with distance students, I think there were a number of interactive activities tasks and online discussions in Blackboard that I do not usually do with distance students. In this course, I used Blackboard differently to send messages and announcements to notify them about the tasks they have to complete on a weekly basis, also we used the mudaunah for group tasks. Because of the assessment I need to know who has done what and if they have any questions or concerns I communicate with them online; before the only way to communicate with students was via emails or the WhatsApp application and these are usually not effective. We do not normally use Blackboard with regular students although their names are downloaded in the ODUS system, but we do not use this function; now it becomes easier to manage students’ grades.

Mudaunah: Arabic word for portfolios

ODUS system: On Demand University Services system

(A3-Interview-2015)

A1 starts her construction with a frame transformation device, “is 100% better” (A1-Interview-line: 1), stating that new value and appreciation about her current practice with BL using Edublog is cancelling out the old practice around traditional teaching. Looking at her overall discourse she approaches a three-part list, providing a packaging of “communication”, “feedback” and “creativity” that adds to the facticity of her construction and emphasises the advantages she perceives in teaching with BL. The construction of communication using ECF mixed with elongation – “so:: more communication”, “number one” (A1-Interview-lines: 2-4) – constructs a well-defended and strong claim. She then practices a contrast device to emphasise how easy it is to communicate with BL compared to what she used to do in traditional teaching: “I used to […] but now I do not feel […]” (A1-Interview-lines: 5-6). Her second constructed feature in the list is that Edublog enables her to provide instant feedback for her students, and they can actually get benefits from accessing other students’ blogs to learn from their mistakes. This offers another contrast between traditional and BL practices, in which she distinguishes the BL approach as superior: “the girls quickly get their feedback, well it is quicker than the traditional way”, and, “a very good use” (A1-Interview-lines: 7-9). Creativity is the third construction in her discourse, stating that with Edublog students’ potential creativity can be enriched – “it brings up potential in every student” with “even the simplest thing” (A1-Interview-lines: 10-11). This provokes a
reassurance mixed with ECF device in which she orients to hearten but makes a more well-defended claim by framing it to the extreme.

Within A2’s discourse she uses a frame transformation where the old value that was constructed negatively as being a “nightmare” has disappeared and a new value of enjoyment is constructed instead: “it was a nightmare […], but now Mash’Allah […]” (A2-Interview-lines: 1-2). This display of a transformed frame is followed by a justification in which she downplays the negative feature she constructed, as it was only at the beginning of the implementation, acknowledging her responsibility where she devoted lots of her time to solve problems related to Canvas. To manage the factuality of this justification she draws upon an ECF: “Mash’Allah I had no problem” (A2-Interview-line: 5). She then uses a three-part list – “easy to communicate, share experiences and ask for help. I like the easy access” – to enhance the factuality of her claim that Canvas is “a good platform” (A2-Interview-lines: 8-10). Using an assessment device here invokes her experience using Canvas as a platform.

A3’s discourse starts with an assessment device, assessing her decision about implementing Bb as her course learning management system as a “right” one (A3-Interview-line: 1). She tends to use a contrast device as a way of comparing her use of Bb with distance and regular students. Approaching this device helps her distinguish between two objects to make sense of her experience; with regular students, she has not conducted any online lecturing but her course was full of interactive activities; this is not the case with distance students, where she conducts online lectures but never designs any interactive activities. This contrast is obvious in her statement that “I used Blackboard differently” (A3-Interview-lines: 3-4). She then practices a three-part list to make her claim sound more factual: “to send messages and announcements to notify”, “also we used the mudaunah [portfolios] for group tasks” and “manage students’ grades” (A3-Interview-lines: 4-11). Within her talk she attempts to contrast aspects of her practice on Bb with regular students to manage BL teaching, in which communication methods before this in practice “are usually not effective” (A3-Interview-lines: 8-9). Further, she rhetorically puts forward a hedge, producing uncertainty about why Bb is not put in use while all student information is in the ODUS system, which would make it easier for academics to obtain a more manageable assessment system.

6.4.3 BL-based activity: the implementation of flipped classroom instruction, YouTube videos and online tools (Edpuzzle, eduCanon, Joomag)

Extract 20

1 A1: With Flipped Learning, students have this video and other materials to watch at home before they attend the class, explaining the main ideas of the next lecture and what they are supposed to take so when they attend they feel relaxed and willing to receive the information.
2 After the class each student has to write a question and post it on the Edublog for discussion,
which gives them more opportunity to exchange knowledge. This helps me go down to their level and then take them up to mine >quite< effectively. Now:: (0.8) I::: realised with the eduCanon video <I must confess that I didn't do it correctly and that is why the answer boxes kept showing up, so for next lecture I want it to be clearer and more precise so I am even going over the material I have up. I think the reason being is that I need to know what level they are at before I can give them anything.

(A1-Interview-2015)

Within her discourse A1 attempts to categorise students’ psychological and mental states when they attend the lecture after being exposed to FL. This emotion category, “they feel relaxed” (A1-Interview-line: 3), contrasts with what students usually feel without being exposed to a FL experience, which adds factuality and shows her stake of interest about this teaching approach. Having them feel this way enables her to solve one of her identified problem in stage one (see Chapter 4), in which she finds the FL activity very exciting because it fits her personal view of education, offering an ECF to describe the case as “quite effectively” (A1-Interview-line: 6). Screenshot 2 above is of the first FL she produced for her students, in which she attempted to use eduCanon to attach certain questions at specific points in the video, but she could not do that. Instead she embedded the video into her Edublog and wrote the questions directly. This resulted in a good practice and students benefited from experiencing it. Students got into team-based learning in the lecture time; this time she describes as the time when she could take them up to her level as they were engaging in discussion: “This helps me go down to their level” (A1-Interview-lines: 5-6). She expresses, however, a sense of not being fully satisfied, not because of pedagogical reasons but for technological ones. She shows a silence of two tenths of a second, and an elongation in her talk – “Now I realised” – showing a hesitation device, indicating a careful construction of what she wanted to say. This turn in her talk helps her manage her stake of interest, yet approach a stake confession device to display an honest construction about her practice – “I didn't do it correctly” (A1-Interview-line: 7). To dismiss any possible misunderstanding she admits her responsibility: “so for next lecture I want it to be clearer and more precise” (A1-
Interview-lines: 8-9). To further defend herself from any likely blame she offers a *stake inoculation*, externalising her responsibility and downplaying the role of the students: “I need to know what level they are at” (A1-Interview-lines: 9-10). Here she claims as if she intentionally created the first FL activity unperfected, aiming to know students’ level before she provided them with a more perfected video.

A2: … about Reinforcement theory ((the next lecture)) I want to use flipped classroom 😍. I want the students to discuss this over the weekend before next Monday. How can you help me? I was trying to find good video but I could not.

R: Ok I will help you search about good video, or we could use the BlendSpace website, you do not need a video but other materials as well.

A2: But we do not have time we have to upload this activity tonight, I will send you the material I have and let me know what you think.

R: It seems like you start to get more interested in the idea of flipped classroom 👍

A2: Yes especially when I noticed my students’ great interaction with the idea. How can I not!!

(A2-WhatsApp-2015)

During the design stage we designed one FL activity for this course, building around the use of Edpuzzle and a discussion form in Canvas. The successful application of it, where students showed great interaction, leads A2 to increasingly become interested in the pedagogy around FL, given the fact that one of A2’s main teaching problems identified in stage one (Chapter 4) was students’ low motivation to learn, especially to prepare for new lectures. The chat conversation in WhatsApp invokes the movement of A2 approaching FL to move beyond lecturing as the main method of delivering information. She states her stake of interest using an *affect display* 😍 (A2-WhatsApp-line: 1) of an in-love emoji to show her love of FL. She combines this emotion with an *agent-subject distinction* device to manage her level of accountability associated with integrating this approach practically with this part of the curriculum: “I want to use flipped classroom 😍” (A2-WhatsApp-line: 1). Although she shows a greater motivation towards FL she shows less capacity to create the video required for the flipped class without requesting help. As the conversation went, I intended to highlight the point that she was becoming more interested in FL to see how she would react, to which she responded using an *ECF* to stress the use of FL as something that gives “great” interaction amongst students. To strengthen this claim she discursively asks a *rhetorical question*, “How can I not!!” (A2-WhatsApp-line: 9).

Screenshots below are of the activity where A2 wanted the students to be exposed to the fundamental idea of reinforcement theory. In practice, students interacted quite quickly.
A3: I loved Flipped Learning, it changed the way the lectures run in a completely active way, I believe this has really changed my teaching practice and enriched the students’ understanding. Although it was not compulsory for the students to go online to see what is there before the lecture they actually showed great participation. Indeed students told me that it helped them go faster with the content, it enabled them to take their time exploring the content where they could re-watch the video several times, take notes as much as they wanted at their own pace and if they have any questions they could bring them to the lecture time or go online to discuss them with their colleagues.

(A3-Interview-2015)

A3 categorised her emotion for the idea of FL as “I loved” (A3-Interview-line: 1), as it added positive advantages to her teaching practice that created a change she wanted. To construct a strong claim she uses a category entitlement mixed with ECF, constructing the change in her teaching with FL as being “completely active way” (A3-Interview-line: 1), which gives a sense that the old practice entitled an opposite category of passive. This reflects in her construction in the stage one (Chapter 4) analysis of practical problems, where she criticised traditional teaching as “boring”. To state the kind of change she loved, she practices a frame transformation device, stressing new values have been established in
which both she and her students have transformed in the process of integrating FL. She teaches differently, and students' knowledge is enriched. One example of this transformed practice was, “they actually showed great participation” (A3-Interview-line: 4). This indicates a category entitlement, constructing students' great participation as being linked to compulsory activities. This shows a contrast to traditional learning – with FL, even where it is optional, students greatly participate. To present her argument as if many others agree with her claim about the positive change FL has promoted in her pedagogical practice, she offers a consensus device: “students told me” (A3-Interview-lines: 4-5). She strengthens her claim with a three-part list of the benefits students have realised: "exploring the content [...] take notes [...] discuss" (A3-Interview-lines: 5-8).

Figure 23: Screenshot: The use of Joomag as a Flipped Learning Tool (A1)

6.4.4 BL-based activity: the implementation of CBL– Twitter, Etherpad, and Edublog in real-life situations

Extract 21

1 A1: … evaluating print and online sources <this idea it profoundly changed my experience, I felt like I am a risk-taker heh heh. So:: yah a week before the class I posted instructions in the Edublog that each student has to build her case individually. >Yes< it is challenging, but what is great about it is this 100% promoted active discussion <Students are engaged with the materials, with their colleagues and with me which is something new to me. Like today we were just discussing a few issues they had with the writing and it was interesting because we were going through things and they really understood how to evaluate things. Although it took quite a lot of time to prepare this in the Edublog because I used to do this in paper and pen but I think I get this time in return during the in-class time where we extensively went through different materials guided by what students wrote about their cases.

(A1-Interview-2015)

This discourse of A1 builds around the part of the curriculum about evaluating print and online sources for academic writing. She initiated her talk with an assessment device mixed with ECF,
constructing the experience of using Edublog to promote CBL in her context as “profoundly” changing her experience (A1-Interview-line: 1). This extreme assessment orients to state the extent of her interest in this new experience. To make this claim more factual she tends to categorise her emotion as feeling like “a risk-taker” (A1-Interview-line: 2); using this emotion category helps her manage her affairs when talking about this new experience of change. She offers a category entitlement to show that CBL is challenging for her students in terms of writing about the case but at the same time encourages “active discussion” (A1-Interview-line: 4). This construction is taken to the extreme using ECF when describing the active discussion as being “100%” true, (A1-Interview-line: 4). Further, she employs three-part list to extend the construction about the kind of active discussion students are experiencing: “engaged with the materials, with their colleagues and with me” (A1-Interview-lines: 4-5). More interestingly, she constructs this kind of active discussion as being something new in her teaching practice. She turns to approach a narrative structure, narrating an event that just happened recently, where they discussed issues relating to students’ academic writing and she realised that they actually grasped the knowledge of evaluating different sources. To illustrate how new this is for her she offers a contrast device, constructing the differences between what she used to do traditionally and what she is doing with BL to promote CBL. Namely, she used to deal with paper and pen but with BL she needs to develop new content to be posted in the Edublog and develop the case material, which requires more prep time. However, in conjunction with this contrast, she draws upon a disclaimer to deflect any potential negative understanding of her construction, relating that although she spent more time developing e-content for CBL, it was well worth it as the students got a lot more active discussion time in the lecture: “extensively went through different materials” (A1-Interview-line: 10). Here “extensively” is another ECF she approaches to make her claim more factual.

Figure 24: Screenshot: The use of Edublog in A1 teaching practice of CBL

1 A2: Students practically do something related to their actual majors as future practitioners so I believe that’s why they feel it interesting. For this challenging part of the curriculum where it is complex, each student brought with her a reflection about her case. The case consists of
the fundamental concepts of the first part of the course, mostly how to plan effective lessons. Through the discussion appropriate knowledge is developing, significant questions are raised, and it stimulates critical thinking. I like that they first did it online with students from their majors and then they discussed it with other major students. They were instructed to provide their online group with the feedback they get from the F2F discussion. I liked the fact that students’ contributions were marked by different colours, so it was easier for me to see how they worked together as a group. Providing them support and adequate time kind of makes the process easier; however, there are students who said, ‘we forgot to print our cases’. I told them to go to the platform and talk to their group. Yet, it overall worked perfectly. (A2-Interview-2015)

A2’s discourse constructs her experience with CBL, in which she starts assessing students’ emotions, approaching an emotion category mixed with disclaimer device to imply that if what the students were doing was not related to their major, it would not be emotionally “interesting” (A2-Interview-line: 2). She categorised this part of the curriculum as being “challenging” and “complex” (A2-Interview-lines: 2-3), approaching a category entitlement where students need to undertake practical work after completing this part of the course, which was expressed as one of her teaching problems in the previous stage. She sees this as a weakness in her practical teaching as she could not organise students using traditional methods according to their majors. In the first phase of the activity, students use Etherpad (a feature in Canvas) to work collaboratively in groups. The groups are divided according to their majors (e.g. mathematics teachers group); they then need to select a lesson from the general school curriculum and collaboratively apply their knowledge in planning the lesson (e.g. write learning objectives and design questions). In the second phase, in the lecture time students discuss the case in groups of students from different majors. Afterwards, each student writes a reflective statement about the case, and has to give her online group feedback (A2-Interview-lines: 4-9). A2 prioritises the importance of F2F discussion in particular to her role as an instructor, using a three-part list: “appropriate knowledge is developing, significant questions are raised, and it stimulates critical thinking” (A2-Interview-lines: 5-6). Offering such a list adds more factuality to her construction of this activity as being interesting. She further emphasises that Etherpad provides an effective way for assessment: “how they worked together” (A2-Interview-line: 10). She follows with an agent-subject distinction to picture some students as being less agent, which bothers her, especially as she thought all the necessary support was provided to them: “Yet it overall worked perfectly” (A2-Interview-lines: 12-13).
A3: This case was a buzz issue on Twitter, it was a shocking crime about a girl who was killed in the Corniche. The students were eager to write about it. Their contribution to Twitter was worth only 2 marks. Some students do not have accounts, some have not participated as it’s >only< 2 marks, and some of them used their relatives’ account like her brother’s account, then she came to me telling me she contributed but with her brother’s account. Is this a joke? How can I know, so anyone who does not use the real information like her name and her university ID I did not give her the 2 marks. It is a very good idea to use Twitter but the students’ commitment disappointed me. I think the number of the students was an issue. if you have 70-80 it will be difficult to keep track of them. However, what is interesting is what happens in the lecture time; I used their comments as discussion stimulation, I randomly give groups a list of comments and I asked them to critique and discuss the other opinions.

**Corniche:** Jeddah beach
One of A3's identified problems was the lack of practicality, where the subject is heavily based on theoretical knowledge. Incorporating CBL aims to integrate the practicality of real-world cases. Thus, this activity was designed to enrich students' motivation and critical thinking about real social crimes. Overall, this discourse offers a narrative structure, in which A3 initiates her narrative with an assessment device to assess the selected case as being a “buzz issue on Twitter”. The victim was a girl the students’ age, and the crime occurred in a public place, Jeddah beach (Corniche), during the daytime, which was a big shock for Saudi society: “it was a shocking crime” (A3-Interview-line: 1). This piques students' curiosity to talk about different aspects of the case, trying to reach a possible justification and solution as psychologists: “students were eager” (A3-Interview-line: 2). This not only shapes the students’ emotional states as being “eager” through the use of an emotion category, but further states the suitability of this real-world case for this activity. A3, through a narrative structure, states that students were given an activity worth 2 marks to tweet their analysis to a hash-tag on Twitter with the course name in it (A3-Interview-line: 2). A3 faced a challenging situation with some students completing this activity, in which she constructs an emotion category to categorise herself as being emotionally disappointed about her students' commitment: “students’ commitment disappointed me” (A3-Interview-line: 8). She then uses a three-part list to package the kind of challenges she faced and insert more facticity to her talk: “students do not have accounts, […] have not participated […] used their relatives’ account” (A3-Interview-lines: 3-5). However, she emphasises her disappointment at the last item in her list particularly, whereby some students resisted making contributions using their real information on Twitter, tweeting instead from their brother’s or friend’s account. To picture students’ failure to take the task seriously as being funny, she rhetorically asks; “is this a joke?” (A3-Interview-lines: 5-6). She attempts to externalise the situation as being beyond her control and dismisses any perceived criticism by practicing an externalisation device to blame the issues on the difficulty of controlling a large number of students: “difficult to keep in track of them” (A3-Interview-line: 9). Although she admits the negativity of the situation, she attempts to dismiss or minimise such constructed negativity and admit interest about the activity, using a stake confession, “what is interesting” (A3-Interview-lines: 10), to show how using students’ tweets stimulates discussion in class and creates an enthusiastic environment.
6.4.5 BL-based activity: the implementation of project-based learning (PBL) and team project mind-mapping software (Mindmeister, Piktochart and Padlet).

Extract 22

A1: BL is the way forward but I do not know – it takes a lot of time to introduce it to students who have never used it before, not because it is difficult to use but because the girls know no one who is using it. They just feel it is a hassle, ‘let’s use paper and pencil’, but Alhamdulillah this was at the beginning of the semester but then Masha’Allah all of them are using Mindmeister, we are using it you know, having the girls in groups and they are working on their writing so I have them like group A and group B and like this. You know between the students I grouped into three it really works wonders and you know what, they are enjoying working together, you know when I said let’s work individually everyone said, ‘no no no, let’s work together we love the work together’. So it is really good, Alhamdulillah. The only problem is going into Mindmeister each time and trying to correct work, it is becoming a lot because they are doing quite a lot of them and this is taking a lot of my time, but it has nothing to do with BL. It’s just the amount of work that goes into it, but I love it, they do love it.

(A1-Interview-2015)
To moderate her standpoint and deny a potential negative interpretation of what she is saying, A1 uses a *disclaimer*, claiming that although it’s a positive thing to introduce BL to students it takes a lot of time: “it takes a lot of time […] never used it before” (A1-Interview-lines: 1-2). She follows this with another *disclaimer*, rejecting that BL is difficult to use by relating the problem’s she’s experienced to the sociocultural setting, contending that if BL was a known tool, it would be easier to implement: “the girls know no one who is using it” (A1-Interview-lines: 2-3). To support the credibility of her claim, she approaches an *emotion category* device, in which students feel BL is a hassle, and tend to prefer the old method based on paper and pen: “they just feel it is a hassle” (A1-Interview-line: 3). To minimise such negativity and support the earlier claim that if students were exposed to BL it would be more acceptable, she claims that this issue is limited to the beginning of the course, approaching a *minimisation* device – “this was at the beginning of the semester” (A1-Interview-line: 4). She mixes such *minimisation* with *reassuring devices*, “Masha’Allah”, and “Alhamdulillah”, (A1-Interview-lines: 4-10) to dismiss any involved worries and doubts. To add factuality to this claim she offers an *ECF*, “it really works wonders”, to show that when the students get used to it a good outcome is produced. What is interesting in this discourse is her preference for Mindmeister in her construction about the effectiveness of BL. She mixes a *frame transformation* with a *rhetorical question*, “you know what, they are enjoying working together” (A1-Interview-lines: 7-8), in which students’ tendency to reject the group-work, which was one of the identified problems in previous stages, is cancelled and a new value of appreciation of this type of learning is established. To make this claim true she puts forward an *reported speech* combined with the repetition of “no” to create a *three-part list*: “everyone said, ‘no no no, let’s work together we love the work together’” (A1-Interview-line: 9). This shows students’ strong attitude towards group-work as they are being changed actively. The *minimisation* device “the only problem” attempts to make insignificant the criticism about the negativity of this activity and is followed by a *disclaimer* detaching the problem from BL itself: “but it has nothing to do with BL” (A1-Interview-line: 12).
A2: This activity was number >one< favourite, I truly love it. It was simple to complete, interactive and great fun. The students’ reaction was also great too. They were excited and motivated. You know what was the >problem< at the beginning, these students do not know enough about computers but now they are getting used to it. Also as can you see although they come up with lots of interesting posts and good posters, the appearance of the language was not good. Another problem happened when some of the students’ posts disappeared, and they started to >complain<, but I opened the website with them in the lecture time and we figured out that the problem was like we JUST need to change the layout, how the posts are arranged, because students’ posts were so many. It was a minor problem and they enjoyed the activity.

(A2-Interview-2015)

This activity had two phases; first, from a number of given caricatures students were asked to select one individually, and critically write a short statement about why the selected caricature was important to them. Second, students were asked to work collaboratively in groups to present a digital poster illustrating possible solutions and presenting a problem scenario using their preferred application. A2 constructs her experience with this activity as “number one” (A2-Interview-line: 1); such ECF orients to prioritise this BL-based activity of PBL amongst others and demonstrates her interest. The emotion category “I truly love it” (A2-Interview-line: 1) manages the factuality of her claim about ranking this activity at the top of her favourites. She then moves her talk to add more support, providing a more factual reasoning through a three-part list device: “simple to complete, interactive and great fun” (A2-Interview-lines: 1-2). It is web-based and does not require any software installation. Padlet is completely free. She adds an assessment device, assessing the students’ reaction to her favourite activity as “great too” (A2-Interview-line: 2). To enhance the credibility of her claim about the students’ reaction, she draws upon an emotion category, categorising students as being emotionally “excited and motivated” (A2-Interview-lines: 2-3). To turn her talk to another argument she practices a rhetorical question to draw the attention of the listener – “what was the problem?” (A2-Interview-line: 3). She then uses a frame transformation device in which the old beliefs about students’ ability to deal with technology are questioned and a new value of trusting their ability is obtained: “students do not know enough about computers, but now they are getting used to it” (A2-Interview-lines: 3-4). Constructing students’ problems dealing with technology, as a temporary issue that occurred only at the beginning and showing a transformation within this frame seems to be part of a longer three-part list she discursively deploys to state the kind of challenge she experienced. The second part is the absence of proper Arabic language support in these tools, which affected the final product of students’ work. Looking at the screenshots of Padlet and the poster, the language appears from left to right: “the appearance of the language was not good” (A2-Interview-lines: 5-6). In the final item on her list, some students complain about the disappearance of their contribution on the Padlet wall. She shows active agency to solve the problem immediately in the lecture time through an agent-subject distinction device, combining this construction with a minimisation device – “minor problem” – (A2-Interview-lines: 9-10) wherein only the layout needed to be adjusted to
solve the issue. Treating the problem as being insignificant adds to her stake of interest about this activity.

A3: I cannot forget the students’ faces. They were really excited, they kind of could not believe that they can do it. Before I used to do a test for the students to make sure they know the English terminology related to psychological criminology, which was not effective from my point of view; they will definitely forget all of them after the test. But this semester it is a completely effective way. I asked them to work in-group to design an infographic that contains the main English terminology and supports the meaning with a video image or anything like that, which can represent the meaning of the word. Each group must select at least 8 words from a YouTube video. They liked the idea and they were motivated. However, it requires me to spend most of my time in front of my laptop, especially with this activity it’s just so new to me, so to make sure they will produce fairly good work I put a certain criteria or rubric to assess the quality of their work.

(A2-Interview-2015)

Constructing the emotion category of students as “they were really excited” (A3-Interview-line: 1) gives a sense of how students tend to feel in traditional practice – bored and less motivated. This matches the identified problem in stage one (Chapter 4), and presents a positive, transformative pedagogy. A3 offers a frame transformation – “it is a completely effective way” (A3-Interview-lines: 4-5) – that demonstrates the transformation in pedagogical effectiveness, adding more credibility to her claim. This PBL activity has two phases; first, students in a group watch a documentary video in Arabic about a crime and then try to identify the main words in it (at least 8). Then they translate these words to English and in the second stage they design an infographic.
about these words (A3-Interview-lines: 5-8). The mode of discursive device used to construct how she manages her responsibility to implement this BL is a *stake confession* device, in which although BL brings advantages, there is a disadvantage that “it’s just so new” (A3-Interview-line: 10). Having said this, constructing this activity as being new is a justifiable claim to dismiss the negativity of time investment, and positions her as being responsible to solve such a problem. To present her responsibility more explicitly she orients to offer an *agent-subject distinction* device, illustrating that she is following a specific rubric that she made to assess this activity, positioning herself as having the capacity to practice PBL as a new method “I put a certain criteria” (A3-Interview-lines: 10-11).

**Figure 32: Screenshot: PBL Practiced in A3’s context**
The identified constructed contradictions within academics' discourses:

**Primary contradiction:**

1- **Within tools:** problem with the technicality of tools (push you for upgrade, lack of clear directions for users, and the poor support for Arabic language)

2- **Within subjects:** experienced two contradictory values of BL implementation (e.g. happy vs. sad)

3- **Within community of students:** students experienced two contradictory values of learning with BL (e.g. enjoyable vs. extra pressure)

**Secondary contradiction:**

1- **Subject and tool:** academics’ knowledge about BL implementation – implementing BL at the beginning (nightmare) vs. when they are getting used to it (enjoyable)

2- **Subject and tool:** academics’ understanding of the technological tool as a fashion (using sophisticated tools) vs. as a pedagogical tool

3- **Tool and community of students:** socio-cultural acceptance of the tools (e.g. students differed in their acceptance of Twitter)

4- **Subject and community of students:** academics’ expectation of implementing non-traditional methods of teaching and learning (e.g. CPL vs. students’ preference for traditional methods, e.g. lecturing)

5- **Subject and division of labour:** academics experienced two contradictory values of teaching with BL (e.g. BL allows the application of formative assessment vs. BL requires creation of rubrics for summative assessment that take time and effort)

6- **Subject and division of labour:** academics need to be committed to completing an activity on time for students (e.g. prepare the content) vs. the obligation to prepare BL-related materials

**Tertiary contradiction:** when the participants looked to resolve the secondary and primary contradictions these contradictions become more serious in their activity implementing BL:

1- Academics faced slow transformation from traditional methods of teaching to BL (non-traditional methods) due to difficulty in implementing what they believe is a more advanced object that contradicts with the object of the central activity

2- Difficultly sustaining motivation and willingness to implement BL as a number of new responsibilities emerged that are more demanding, although some positive educational outcomes achieved, such as assisting students in non-traditional method. (Appendix 7, figure 11).
6.4.6 Academics' construction of a new professional self as a resolution between previous practice and new practice

Extract 23

A1: Number >one< ingredient of success in implementing BL is preparation. <To be a good BL instructor, <prepare in advance, a lot in >advance<, you know. If you wanna do a test, >a traditional test<, you can do it the night before the test, but BL >no way<, no way, no way. If my experience is successful that’s only because of the >preparation and time< I spend organising BL <instruction and support for my students. I AM such a structured person, if I do not have it in <1,2,3> I will be lost so my students will be lost as well (0.6) So:: I work, I work >a lot< especially on my learning objectives†. With the <traditional classroom everything >happened< in the classroom and <you wait until the next> class to see progress and to see students’ work. But with BL it is a CONTINUOUS thing, it is >good< and bad↓ heh heh <What is good about it is that I see their work >almost< on a daily basis, >the bad< thing is sometimes I see their work but I do not have time to correct it because I have other courses or other commitments† That really bothers me↑ I just do not have <enough time> to go through it all. That is the >only< problem with BL. (A1-Interview-2015)

A2: Why do I love BL? I just feel it opens new horizons I never thought about BUT the only drawback↑ is I wish I had more time, especially this course I am teaching right now it’s new to me so there are a <lot> of things that I wish I had more time to do:: (. ) but:: What I am doing is I am writing notes because over the summer I will try to perfect it… If the instructor >is not< dedicated and passionate about teaching with BL that’s not gonna work. It is a continuous act of checking↑, evaluating, and >giving< feedback, so if you do not have dedication it would not work. <You need to believe in it and believe that the time↑ you’re gonna spend on it, <it is time that your students will BENEFIT from 100%↑ even when the course is finished. (0.4) You can have >all< the web tools and everything at your disposal↑ BUT if the instructor >is not< dedicated about teaching with BL that’s not gonna work. (A2. Interview. 2015)

A3: Implementing BL is nerve-wracking↑ at the beginning, but I am learning as the course progresses. I feel that I have reached the stage where I am not scared any more. so being prepared is first and >foremost< because if you prepare you will be able to overcome resistance. There is always resistance for any new↑ ideas, which is <normal I think>. The best thing students said is that ‘BL makes a >difference< in our life’, so Wallahi↑ every single moment, every single second is <worth it>. (. ) True that BL is taking you >away< from your social obligation for <your family, your husband, your work – we do teaching, and we do work for the administration of the university – so Wallahi it is so::: >difficult< for me, BUT it’s worth it. (A3. Interview. 2015)
For A1, although there are a number of important ingredients for successful BL, preparation is the “number one ingredient of success” (A1-Interview-line: 1). A1 then uses a category entitlement to enhance the credibility of her claim that she creates the conditions to become a “good BL instructor” (A1-Interview-lines: 1-2) through advance preparation: “prepare in advance, a lot in advance” (A1-Interview-line: 2). Through contrast, she manages to distinguish between how it looks like to prepare for traditional learning and BL; this contrast helps her strengthen the need for preparing for BL. The prospect of leaving preparation for BL to the night before is greeted with, “no way, no way, no way” (A1-Interview-line: 3). This three-part list injects clarity and power to her claims. She downplays the success of her experience when she did not prepare and invest time, using a disclaimer: “If my experience is successful that’s only because of the preparation” (A1-Interview-line: 4). Such a disclaimer gives weight to her claim, relating the success of her experience to the amount of preparation she invests in developing her BL course. To manage her level of accountability and imply a degree of agency, she deploys an agent-subject distinction device to construct herself as a structured person: “[…] I am such a structured person […]” (A1-Interview-lines: 5-6). She suggests that being a structured person prevents her and her students from being lost in the journey of integrating BL. She tends to narratively structure her experience, particularly with developing accurate learning objectives for BL; where they aren’t there in existing content, she manages her agency again: “I work, I work a lot” (A1-Interview-lines: 6-7). Thus, having set learning objectives is a transformative practice for her in BL that enables her to be structured, but requires an investment in time and effort even with “old” subjects. A1 follows a contrast device to distinguish the differences in instructors’ responsibilities between traditional learning and BL, in which teaching in traditional methods has a limited responsibility – “[…] everything happened in the classroom […]” – in contrast with BL (A1-Interview-lines: 8). Hereafter, BL is constructed in “good” and “bad” terms (A1-Interview-lines: 9-10). It is entitled “good” as instructors can check daily for students’ progress; however, what’s “bad” are the time constraints that evoke an emotion category: “I do not have time […] That really bothers me” (A1-Interview-lines: 11-12). This construction of BL as a continuance of responsibility is described using a minimisation device, “that is the only problem with BL” (A1-Interview-line: 13), minimising other problems, to emphasis how BL becomes an important part of her teaching profession.

A2 starts her discourse by stating her emotion category of being in “love” with the impact of BL in her practice, mixing with a rhetorical question to draw the listener’s attention: “why do I love BL?” (A2-Interview-line: 1). She employs an ECF device to picture the time factor as “the only drawback” (A2-Interview-lines: 1-2), taking what she is talking about to the extreme. She then draws upon an excusing device, in which she attempts to both dismiss responsibility and recognise the negativity of the case, wherein the lack of time she experienced was due to the fact that this course is new and most of her time was spent developing the course content, which left her with no time to pay attention to BL. However, she moves to offer a reassuring device to alleviate the case, acknowledging the responsibility she has in the situation and showing her empathy by developing a sense of motivation towards her future practice: “I will try to perfect it” (A2-Interview-line: 4). She uses a three-part list when stating “checking, evaluating, and giving
feedback” (A2-Interview-line: 6) to emphasise the construction that BL is a continuous responsibility that requires dedication. She draws from a disclaimer device to hypothesise that “if you do not have dedication it would not work” (A2-Interview-lines: 6-7). This construction leads her to put the emphasis on instructors, who should remain dedicated and motivated towards BL. She repeats a similar disclaimer that even having everything at “your disposal” (A2-Interview-line: 9) does not ensure success if instructors are not passionate and dedicated to BL, which is something she develops as a new professional identity in her teaching practice.

A3 constructs her experience metaphorically at the beginning as “nerve-wracking” (A3-Interview-line: 1) to illustrate how difficult and worrying it was. Frame transformation mixes with an emotion category when she declares, “I am not scared anymore” (A3-Interview-line: 2), positioning herself as emotionally not “scared anymore”, where a new value of confidence is instilled instead. She follows with an ECF device, stating “being prepared” as the “first and foremost” requirement (A3-Interview-line: 3). Constructing preparation in this way is an extreme to defend her argument that preparation is a good treatment for the nerve-wracking prospect of BL. By using a disclaimer, she hypothesises her argument about the importance of being prepared, and that preparation could be a solution for the normal phenomenon of resistance when something new like BL is introduced. A3 uses reported speech from her students, recounting how they told her, “BL makes a difference in our life” (A3-Interview-line: 5). Such reporting helps her manage her accountability to be dedicated towards investing time and effort in BL. Given the importance of students’ positive assessments about their experience of BL, she uses ECF to strengthen her belief that BL is worth investing in: “every single second is worth it” (A3-Interview-lines: 6). BL for her comes in conjunction with her other responsibilities, as she indicates with a three-part list – “social obligation”, “we do teaching” and “we do work for the administration” (A3-Interview-lines: 7-8). This list states the extent of other responsibilities involved in her daily activities. She uses stake confession, concluding, “difficult for me but it’s worth it” (A3-Interview-line: 8-9), indicating honestly both the extent of her other responsibilities and her awareness of BL’s importance as a new role in her profession.

The identified constructed contradictions within academics’ discourses:

Primary contradiction:

1- Within the subject: good BL instructors need to be passionate and dedicated vs. definite failure in implementing BL if they are not passionate and dedicated

2- Within the subject: Academics encounter two contradictory values (in traditional teaching everything happens in the classroom vs. BL as a continuous responsibility)

3- Within the subject: Implementing BL vs. other professional and personal goals; implementing BL vs. time constraints
4- **Within the tool**: BL needs a lot of advance preparation vs. traditional teaching (e.g. only a day before the class). Implementing BL as a new tool requires extensive work and dedication (e.g. BL is nerve-wracking).

**Secondary contradiction:**

1- **Subject and community of students**: students’ educational attainment following a successful implementation of BL is constructed by academics as being linked to their transformative agency.

**Tertiary contradiction**: Academics positioning their new professional sense in relation to their new professional responsibility, in which they faced difficulty sustaining commitment. (Appendix 7, figure 12).

### 6.5 Summary

This chapter aimed to understand how the systemic contradictions emerging from the activity of BL implementation are constructed by Saudi academics. Within the community of the university, academics experienced a need for continuous support throughout the implementation stage. Furthermore, they were being challenged to sustain creativity implementing BL, where being independent thinkers came into conflict with the university’s activity of technological implementation. Students’ slow transition from traditional to BL, including the struggles they faced to manage their expectations of students to be active in a BL environment and maintaining students’ enthusiasm, form another contradiction. However, over time, as both academics and their students formed more competence about expanding the object, more desirable outcomes were reached. Additionally, the technicality of the tools, the contradictory emotions involved in dealing with BL tools, and distinguishing between BL as a pedagogical tool and a technological fashion challenge the implementation of BL. Interestingly, academics faced difficulty sustaining commitment. It was challenging to sustain motivation and willingness implementing BL as a number of new responsibilities emerged. Importantly, the process of the academics experiencing such contractions meant they became able to construct effective BL principles, which are analysed in the next and final stage (Chapter 7).
Chapter 7: Stage Four: Articulating BL Principles

7.1 Introduction

In this stage, Saudi academics engaged in the activity of reflecting about the experiences they gained integrating BL. The discourses build around their experiences before, during and after their participation in this research, in which they constructed principles for future practice. The main aim in this stage is to conclude upon their experiences with BL, answering the question RQ4: How are future design principles of BL constructed within Saudi academics’ discourses? This chapter sketches out how Saudi academics negotiated discursive changes within teaching with BL, and provides understanding of what principles are needed.

7.2 Constructed principles within the university’s community component for innovative BL practices

7.2.1 Training as a principle to provide a suitable environment for innovative BL practices

Extract 24

A3: "Training, training, training↑ WE have newly coming muadiah ((TAs)) and I think it is important to start with them and give them more extensive training about BL. Um:: tomorrow we will have a training session so I invited two of our new muadiah. They are eager↑ to know more. I think it is a good start. For us ((not muadiah)) it depends on your belief () because we are good believers in this:: WE want to learn more, maybe others are in the opposite position and others are believing that they had enough or]

A2: [Or too old for it.

A3: Exactly. If we want to start properly::: I thin::k it is important to start with the fresh minds<.

A1: Even old people want it () I have a doctor that’s working with us, she is 59↑].

A3: [and she wants it.

A1: She wants it >badly<.

A3: Maybe a workshop for old people that’s not extensive, but something they can do.

A1: Yes I think they need training, they really do not know their way around the computer other than with Microsoft.

A2: They need ESPECIAL training.

A1: <Slow> and easy () You take them slowly and we do not start with the whole course, you need to start just with certain elements in the course () Like with the literature lady I told her, "mind-mapping will be something fantastic↑ for you, I can VISION it: It makes you focused, it makes you structured", and when I was telling my colleagues about mind-mapping that’s what converted her () We were in a meeting and the head of the department said to me, ‘Ok say anything about what you are doing with BL.’ I said, ‘JUST mind-mapping, you are teaching literature and you have all of these different arrows, so what about using the mind-
map which you can incorporate <images, <files and URLs in’, and they were like ‘can we do
that, can anything do that?’ I said, ‘yes that is because you deal with papers, you DO NOT
know.’

A2: Well:: that’s right I agree if we↑ want to change and WE have to change from traditional
methods to BL:: some instructors (.) do not even do just simple PowerPoint presentations,
they do not know that they do the traditional way? They stand up and lecture and lecture and
lecture. With BL if it is introduced right and if people can help others understand that:: well
(.) it might be time consuming, but it might be just at the beginning then (0.5) maybe because,
we have lots of seniors here at the university, some of them can >barely< use a computer
so if that is the case, the consultation SHOULD be on all these <young> people or at least
people that >want< this.

A3: ... the university is <encouraging> us to use (.) they want to educate teaching staff to anything
related to using technology into teaching and there are lots↑ of workshops that are being
offered at the university but...

A1: I think you raised >a good< point, BUT the quality of training, because I have attended one
actually (.) and I thought I am going to learn more↑ than what I have learnt from this research
(0.5) but apparently:: I was better than the workshop host hhh. <Every time she showed us
something I went like, ‘WHY you showed us >old< stuff?’ and she got really irritated in the
end and <I get really irritated (.) actually because it was a >waste< of my time um:: So I
<even went up to the lady responsible and I said I am so SORRY but I am seriously thinking
of giving you guys a <workshop>, because if this is the best thing that you guys can do it is
a shame there is so much that can be offered. The problem is I really, really↓ do not have
the time I have SO many commitments, but >I am< going to prepare a workshop in the
summer, I want to show people that BL >is< not a difficult thing to convert to, and there are
a lot of benefits from using it but you have to put people on the RIGHT track before they can
<venture> down this lane.

**Muadiah:** Teaching Assistant

(Focus-group .2016)

Training is constructed as a main principle to transform the pedagogical culture from traditional
teaching to BL. Repeatedly the word “training” (A3-Focus-group-line: 1) is stressed in A3’s talk,
discursively using the three-part lists strategy mixed with affect display of increasing intonation.
Such a deployment helps the persuasiveness of her point. More importantly, how teachers should
be trained and how the training should take place is also addressed. Through category entitlement
the type of training is constructed according to the age of the faculty – ‘muadiah’ and ‘non-
muadiah’. To support her argument, she evaluates her act of inviting two muadiah to a session
about BL as “a good start” (A3-Focus-group-line: 4). A3 justifies that these muadiah are more
eager and willing to adopt change, compared with other academics who might lack belief in BL,
or be too old to accept it. This implies that A3 considers that changes to BL require collective
action, which is obvious from her frequent use of the pronoun ‘we’. Thus, the emphasis must be
turned to “fresh minds” (A3-Focus-group-line: 8) or newcomers as metaphorically described by
A3. A1 cautions against generalising the idea of only training fresh minds, by telling the group about her experience with a 59 year-old instructor from her department who wants BL “badly” (A1-Focus-group-line: 11). She uses this ECF discursively to strengthen her point. ECF is often used if the claim is subject to disagreement. This example led A3 to construct a type of training that could suit the needs of this particular lady as “not extensive” (A3-Focus-group-line: 12). In response to the appropriate type of training, old instructors need to transform teaching, as described by A2 in her use of “especial” (A2-Focus-group-line: 15); A1 replies, “slow and easy” (A1-Focus-group-line: 16). These descriptions construct how these academics envision the needed training for non-muaidah or old academics. This is followed by a narrative structure mixed with reported speech, as A1 continues her story about her colleague, who is 59 years old and teaching English literature; she recounts how she first tried to change her belief by convincing her about BL. This happened in a meeting where she had a chance to introduce her colleagues only to mind-maps. A1 narrates the meeting, and the way she pictures her colleagues’ reactions to the idea of mind-mapping is an event she discursively uses to weight her argument that they need training and knowledge to begin their BL journey – she replies to them in that meeting, “[…] you deal with papers, you do not know” (A1-Focus-group-lines: 24-25). A2 tries to stress her agreement that BL is promising if it is introduced right, especially for “young people” (A2-Focus-group-lines: 32). Using the pronoun ‘we’ discursively, she weights a similar orientation that BL requires collective action to be transformed. When A3 tries to highlight the positive role of the University in encouraging related workshops, A1 stops her and constructs another point that is in contradiction to A3’s point. In this she draws attention to the quality of available workshops. Again, A1 discursively uses a narrative structure device, to narrate her experience attending one workshop and comparably evaluate the type of knowledge she gains from participating in this research with the type of knowledge she was exposed to in that workshop. She constructed herself as better than the presenter of that workshop, where she and the presenter got “irritated” (A1-Focus-group-line: 41). Such ECF stresses her dissatisfaction about the quality of knowledge provided. As a reaction, she went to meet people in charge of providing these workshops, extending her beliefs using another ECF that the workshop was a “shame” (A1-Focus-group-line: 44). Wishing she could have the time to show other people how BL is easy to adopt if they find good training, she uses the agent-subject distinction device, “I want to show people that BL is not a difficult thing” (A1-Focus-group-line: 46), not only to show her self-motive towards taking agentive change actions, but also to strengthen the point that there is a lack of quality training available to academics that could put them on the “right track” (A1-Focus-group-lines: 47-48). Constructing training as the main principle stresses the importance of providing staff with quality training delivered by qualified specialists, as A1 metaphorically concludes, “venture down this lane” (A1-Focus-group-line: 48), comparing the journey of BL with a risky journey in which they need to be armed with essential knowledge and skills to teach with BL through effective training.

7.2.2 Support as a principle for innovative BL practices

Extract 25
A1: I have been motivating people all the time. Yah, every single time we talk about teaching and learning, I am always there going ‘you should try BL’. ‘What is BL?’ ‘Oh my god’, it is so fantastic just try it and if you need my help, I can help you, and we go through a lot of discussion, see because a lot of them worried about time, all of us worried about time. And if I tell them that um:: what I do I usually tell my story, hhh the story that me and you start your research, and when I tell them about it, it just motivates lots of people, I do not know it is the way I am telling it or the information in it but I really think it’s both. The way the story has been told and how successful it was because people like a success story, and everyone wants to be a very good instructor at the end. You know:: what we have done it has an impact on lots of people, see all of them all of the people I have talked to they have ONE concern: ‘Is there someone that can help us when we get stuck’, see everybody asks, um:: remember me at the beginning: if you weren’t there it would be really difficult. Remember it is something that I wanted to do for a very long time but I postponed it, I was stuck in the middle, so they are exactly worried about what I was worried about, ‘Is there someone that can help me when I stick in the middle?’. Especially at the beginning it is a lost story. 

(A1-Skype-meeting-2016)

A1: I think here we need someone like Sahar that knows how to help, guide and support throughout from the start to the end but most essentially has the knowledge to help accurately.

A2: That’s why I said if there is something that would be set up by the university it would be people that can give you advice and support. You know:: the writing centre we have here in the university. We need a BL centre that can help instructors whatever the speciality that they are in, help the instructor. I mean to guide her somehow like for example give her options, ‘do this and this or like you can do it this way’. It’s like what you ((the researcher)) are doing with us.

A3: The typical day or the cycle I go through to prepare for my lesson is: first know the Arabic materials, read the English resources, translate it into Arabic, write it down in the PPT and handouts, OK do activities for that: my time is done. Next day is my lecture. I do not have time to go through all the applications and teach myself about them. It took me a process of translating and also figuring out terminologies in the field:: so that’s why I think yes we need a centre about BL that can provide us with good support, not only training but support.

A1: You can train someone and they run away but if you trained someone AND supported her through her journey that would be the secret of change. So:: provide a person or innovative centre in each department where there has to be someone who is specialist, this is the key solution of everything. Not a specialist in IT and computers. For example, I go and ask, ‘I have this content I need a solution’ or ‘I have a technological tool I need to use to obtain a certain learning objectives’, exactly like when Sahar and me designed the course together, so support for me is number one because if Sahar did not help me, and she does
help me a lot, I do not think I >would< be as successful as I am with what I am doing. I am not the best BL instructor but I am doing A GREAT job because these girls are enjoying it and I am still doing it but <the support> if she was not around I would give up so easily but every time I have kind of FALLEN into a problem she helps me sort it out.

(Focus-Group-2016)

A1 uses an agent-subject distinction device to present herself as an activist to motivate, help and encourage change towards BL – “I have been motivating people […]” (A1-Skype-meeting-line: 1) – in which she figures out that her story of BL integration is motivating people: “I usually tell my story […]” (A1-Skype-meeting-line: 5). She corroborates that “people like a success story” and, “it has an impact on lots of people” (A1-Skype-meeting-line: 8-10). A1 is presenting that other people are supporting her claim and that she has been active in motivating people, using a corroboration device to serve this attributional matter. The orientation of her talk is that, although her story as a success story motivates lots of people to take their steps towards BL, all of them share one concern, which is the same concern she had when she started this research project. This concern builds around “Is there someone that can help us when we get stuck?” (A1-Skype-meeting-lines: 11-12). To support her point, she brought into discussion her experience at the beginning and compares that with those who want to change but have the same barriers she had at the beginning by giving a narrative structure. What sustained her movement towards the change was having the support where she needed it.

Looking at the focus group session, A1 attempts to downplay the role of the university in providing adequate support for BL as a negative feature, but admits the responsibility of academics to approach the change – “[…] here we need […]” (A1-Focus-group, line: 1). She uses a three-part list, “help, guide and support” (A1-Focus-group-line: 1), addressing what is ‘needed’ and must be provided “[…] throughout from the start to the end […]” (A1-Focus-group-line: 2). This helps achieve the social action that not only her but also “we” need support to achieve BL. A2 agrees that having the support is the missing principle: “if there is something […] it would […] give you advice and support […]” (A2-Focus-group-line: 4-5). Using a modal verb, ‘would’ mixes with the footing shift ‘we’ to orient her talk to illustrate the responsibility she places not only on her ability to achieve the object of BL integration within her community, but all the academic staff within the university. She provides an example of the “writing centre” that helps academics and other members improve their academic writing skills, wishing the university would set up a “BL centre” where she could find the support whenever she needed it. In response to A2’s suggestion, A3 narrates one typical day of her daily routine – such narrative structures stress the need for support as a way forward, i.e. if she has to incorporate technology into her teaching, it reinforces the point made by A2 about the need for a BL centre. A1 tries to distinguish between the training and support. She metaphorically states how people can “run away” after training, but the availability of support throughout the journey of change is “the secret of change” (A1-Focus-group-lines: 17-18). Having a centre that hires specialists to support the faculty during the change process, instead of just training them, is presented by A1 as “the key solution” (A1-Focus-group-line: 20).
Such ECF positions the need of support to the extreme. Stressing the fact that support is “number one” (A1-Focus-group-line: 23), A1 uses ECF again to place the need for support at the extreme. In recounting her experience with this research, A1’s use of formulation combined with narrative structure helps her enhance the factuality of her claim and re-align her experience of integrating BL with the new value of the absence of adequate support, wherein she explicitly expresses if she could not find close support she might give up quickly and her experience with BL would not be a successful one. The support during the journey of BL integration is constructed as a principle and the participants see the provision of a BL centre in the university where individual support could be provided as something the university should consider.

7.2.3 The need to build a community for practitioners as a key principle for innovative BL practices

Extract 26

1 A1: You know what is >strange<, what is strange is that when we were in a meeting, we were
2 out of 30 about 10 of us, we were <somehow> incorporating BL AND we do not even know
3 because there is no communication between us::: I mean there is no communication
4 between us as instructors that we are using BL (.) and I felt really sad↑ and I told the head
5 of the department that how↑ can >all of us< be using it and we do not gain experiences from
6 each other::: and she is going, ‘I do not know, I never thought about it’, but you know the
7 problem with our head is that she is not like the previous one, the previous one <you just
8 mention >anything< in the air will improve teaching will improve education – ‘go for it’ and
9 she grouped us into groups so you guys do this and:: (0.6) um:: with this one, she is nice
10 and <everything> and she does care↓ but with the other one she was into anything. By the
11 way she is one of those who said “I am too old for technology” but although she was >very<
12 old for technology (.) she was willing to go with any idea that improves teaching and when
13 she was the head of the department she was asking people to do a pilot study, she goes, ‘I
14 love your idea let’s see if it will work’. That’s how GOOD she was. <I know some people in
15 our departments are using BL, some of the people are using it a lot and some of the people
16 are >just< beginning to use it, and some people are <half> way there… It would be very nice
17 if she could group us and she goes like, ‘I want to do this’, I do not know if this is gonna
18 happen or not↓ (.) and you know in our department not everybody clicks↓ so you need to be
19 with people who you <click> with because I am telling you this is something new↑ and you
do not want to look >stupid< in front of your friends, your colleagues and that’s why if you
20 want to pair up with people or even in groups you have to be with people you kind of feel
21 comfortable↑ with even if you make a mistake.
22
23 A2: True (.) but let’s talk very honestly (0.3) I am sorry↓ to say that but:: what is ideal in your
24 department is not in mine: in my department there is a >share-down< between assistant
25 professors. For example if my boss said, ‘she is better than me’, OK (.) but do not say that
26 in a meeting there are people who accept it and there are people who not, just because my
27 boss said you are a figure <they changed and this printed in them>↓.
A1: Do not say that we have >lots< of disagreement. They do <under-handed business> they do staff under the table↓ it is everywhere, we are human (.) There is no ideal place but you HAVE to search for good people; some people come to your life >just< to search for your weakness↓ …

R: What advice do you believe is important to someone who is about to go through the same experience of yours with BL?

A1: <Talk to others that have done it before you >because< Wallahi↑ their experiences will help you. I have been::: I mean used some web tools that drove me crazy absolutely, I mean maybe other people who have used it they give tips on like ‘do this, don’t do this’, it was just a button Wallahi↑ do you remember, it was just ONE stupid button↓ I spent >two days< of effort and time. If I pressed it <everything> would work and that is the problem with technology: I love it and I hate it at the same time because when two days of your life go to something >as< stupid as looking for a button:: Wallahi↑ do you remember, it was just ONE stupid button↓ I spent >two days< of effort and time. If I pressed it <everything> would work and that is the problem with technology: I love it and I hate it at the same time because when two days of your life go to something >as< stupid as looking for a button:: For me I feel my time is valuable↑ I could have done other things so if you talk to others maybe she has an experience with it so maybe she give you one-to-one or:: at least she can direct you where to go for the best tutorials (.) or just watch out when you do. This is the number one issue, So I feel that is so important.

A2: We do not only need to gather and share our experiences but also when we gather we need SPECIALISTS in BL who can feed our thinking, <we need people who are specialised in this field to group <applications and software> and tell us as a group how to use them based on our majors…

A3: <Tutorials, give us tutorials on a regular basis for those who are interested in BL (.) Yes WE have lots of training workshops in the university, we just need to be organised and we want more opportunities to share our experiences↓, do things, come again, talk about what we have done and yah:: as Dr ((A1)) said, talk to each other.

A1: <One more thing. If we create <a platform for instructors (.) create a space to share our experiences like when we share things online with our students, it would be a GREAT space to share our experience. Without having a strong community >unfortunately< we cannot share and work together to change.

(Focus-Group-2016)

In this account we see clearly the need for a community of practitioners being constructed as a principle for changing the root culture of traditional teaching and moving towards BL. A1 uses a rhetorical question mixed with ECF, when she says, “you know what is strange” (A1-Focus-group-line: 1), to support her claim about what she considers “strange”, which is the lack of communication between instructors who already use BL. Such lack of communication makes her sad: “[…] I felt really sad” (A1-Focus-group-line: 4). This emotion category is used as a justifiable reaction when a great opportunity for collaboration and knowledge exchange between BL-interested groups is missed. A1 puts the reason for this lack of communication down to the type of leadership in the department. To enhance the factuality of her claims she tries to illustrate a comparison between the previous head of department and the current one, regarding their leadership strategies in encouraging changes and initiating innovative practices. To do this she
employs a narrative structure device mixed with reported speech (A1-Focus-group-lines: 7-18). The orientation of A1’s narrative is that the BL community is a principle that needs to be in place; however, it needs a leadership that is willing to encourage it. She states, “not everybody clicks” and BL is “something new” in which it is hard to accept being “stupid”, as with dealing with new things the possibilities of mistakes are higher (A1-Focus-group-lines: 18-22). Thus, it is important to be with those who you can easily “click” with – such category entitlement or membership categorisation, where she categories a group as people you can “click with” and those who you do not – belies her need to feel comfortable when working together to produce a productive BL outcome. A2 takes this point, approaching with hedges that mix with a number of pauses and repeated silence. She uses, “true, but…”, “honestly” and the apologising “I am sorry” (A2-Focus-group-line: 23) to negotiate difficult fundamentals in her context, such as her relationship with her colleagues, in a way that somewhat softens these difficult and sensitive aspects of her argument. An externalisation discursive device – “what is ideal in your department is not in mine” (A2-Focus-group-lines: 23-24) – is used to position herself as being dissatisfied with her relationship to her department community and present it as something outside of her control that affected the progress of change towards BL. This also emphasises that establishing the much-needed BL community is seen also as a challenge in a workplace where people find it hard to accept the success of other such category entitlement, wherein ideal and not ideal people category constructs affect her ability to integrate BL. A1 replays A2’s concern, showing a script formulation – “There is no ideal place […]” (A1-Focus-group-line: 29) – to make the situation appear as usual practice, and make such a reality acceptable. However, she turns her talk to a justification mode; although this negative feature is everywhere, she has to acknowledge her responsibility and find good people around her and group herself to them.

As the conversation went on, I asked them what advice could be valuable to someone who is about to start the journey of BL. A1 quickly replayed to me the “talk to others” approach (A1-Focus-group-line: 34), citing others who experienced BL before. She showed the importance of others through swearing by “Wallahi” (A1-Focus-group-line: 34) as an ECF to strengthen her claims that talking to more experienced people can save time and be effective, giving an example of an event when she spent two days searching for one button. The conclusion is that talking to others who can overcome this challenge would enrich newer instructors with their advanced experience. A2 adds to A1’s point about the importance of experienced others through the use of membership categorisation, when she says experts in the field of educational technology are needed, as they have the category of knowledge to guide them. She then metaphorically expresses that specialists are needed to “feed our thinking” (A2-Focus-group-line: 46) to build up a rhetorical effect that they are starved for gaining knowledge. A3 agrees that tutorials are needed, not only with these who they categorise as “specialists in educational technology”, but more generally and on a regular basis, so they can sustain their professional development in BL. This is followed by a turn in her talk when she employs a disclaimer to criticise the workshops ran by her university that, although rich in quantity, lack interactive communication between the university’s members. Consequently, she hypothetically claims, “we just need to be organised”
A1 suggested an online community for instructors who are interested in BL, similar to the BL platform they designed for their students, as a possible solution, so sharing experiences would be easier. She discursively uses reassurances that “without [...] strong community we cannot [...] to change”, in which she manages to provide comfort and admit responsibility for the situation, corroborating other academics in support of her claims, and show empathetic feelings that she felt sorry about what they “unfortunately” missed (A1-Focus-group-lines: 55-56).

The identified constructed contradictions within academics’ discourses:

Secondary contradiction: the lack of effective professional development manifests within the community of university and subject “academics” components of the activity.

Tertiary contradiction: the historicity of this secondary contradiction throughout previous stages leads the academics to consolidate that without effective and coherent professional development the object of current practice would contradict the object of future-ideal activity of BL. Thus, the following principles are constructed as main principles:

1- Effective training that differentiates between individuals’ needs, ages, level of positions, and stage in transition from traditional to BL practice is required

2- The University must build a community for BL practitioners where continuous knowledge exchange about BL practice can be facilitated

3- Effective support as an integral element of training must be provided throughout the transition. (Appendix 7, figure 13).

7.3 Constructed principles within the student community for BL best practice

7.3.1 Get traditionalists and influential students to believe in BL

Extract 27

A1: Students’ role:: in BL (0.5) they have to believe in it <to work>, but they have to um:: <let me tell you (.) One of my students >believes< in it but she goes like ‘do we have to do this?’ I said ‘what is wrong with you?‘’ <She is a complainer, she said ‘I do have lots of work’ and whatever reasons she gave I said ‘ok ok, everything’s gonna STOP’ and >I had< to waste, (. ) Well >not a waste< of time actually I had a good portion of 15 minutes that I had to sit not only with her but with other ones. I said ‘ok what do you think if we do it this way and if we do it this way?’ and I asked that particular student, I said ‘come on you tell me::’ because >if< I get these students who are against doing it to believe in it I mean she is CONTAGIOUS and her negative attitude could affect others so I got to deal with this <at the beginning>.
A2: In my case I have more than >40< students and I had these 3 students who I do not know how to say about them; one of them I talked to her and I even gave her a small task, she went ‘come on, come on’. She likes to bother me, she wants just to learn in the traditional way so what do you do with this type of student?

A1: <You need with difficult students: you need to put a >light point< on them, get them to help you in stuff even outside the class, and you know what we do in our department (0.5) you ask a friend of yours to come with you into [the lesson] and >sit in the back< and she watches <what is happening because sometimes there is <a very logical way> of dealing with it but because you’re so in it you do not know how to deal with it: (.) but she can see the whole picture in front of her of it so she can tell you ‘the best way to deal with it is this and this’, but sometimes you’re <so into it> and you’re personally involved with these >nutty< students hhh you just cannot see the possible ways of dealing with it.

A3: I have students who complain about the >amount< of tasks but I think as you said I go slowly with them, give them time but I believe because I talk to them each time they have a problem, they get motivated↑ and keep trying so I think especially with those students who >can< affect the motivation of others it is important to both put spotlight on them and talk to them more to keep them motivated].

(Focus-Group-2016)

A1 starts by explaining the role of students in successful BL. First they have to be a strong believer in the importance of BL: “they have to believe in it to work” (A1-Focus-group-line: 1). Such a category entitlement of students being “believers” or not is constructed as an essential category to ensure the success of BL. However, they must keep up that belief, even if they carry lots of other study-related pressure. Then a narrative structure discursive device mixed with reported speech helps A1 narrate and support the credibility of her narrative, drawing upon an event with one of her students she describes as a “complainer” (A1-Focus-group-line: 3). Although this student believes in BL, she is under the pressure of other subjects and starts to complain. A1 reports the student voice: “do we have to do this” and “I do have lots of work” (A1-Focus-group-lines: 2-4). In this situation, A1 stopped everything and talked to her students as a group about the fundamental importance of BL in their learning and its benefits to them. We then observe assessment and second opposite assessment as she speeds up her talk – “not a waste of time” (A1-Focus-group-line: 5) – to relate that the 15 minutes she had with her students was not a waste, which enhances the facticity of the claim she wanted to support. Within this 15 minutes she directed her talk to the “contagious” student. This metaphor is used to categorise students who have the power of influencing others, and is used to explain how it is important to talk to this category of students and get them believing in BL. Setting a scene where she had to deal with contagious and difficult students helps A1 to manage her accountability for setting the change of BL. A2 turns to put forwards another narrative structure device mixed with vivid details, in which she sets the scene of having more than 40 students in one session, with 3 of them constantly annoying her. She recounts being annoyed by them to the extent that she decided to talk to one of them. Unfortunately, she was unable to get the student on-side, reporting the student’s speech:
“she went ‘come on, come on’” (A2-Focus-group-line: 13). Such reported speech, in conveying the student’s style of delivery, not only gives her narrative a more realistic feature, but also diminishes the student’s stake. A2 then takes a justification mode, saying this student tends to prefer the traditional way: “she wants just to learn in the traditional way” (A2-Focus-group-lines: 13-14). In doing this she discursively constructs her acknowledgement of the problem, revealing the negativity of this student to her teaching activity. Here she looked at the whole group, constructing a question for them about how to deal with this type of student: “So what do you do?” (A2-Focus-group-line: 14). Such a question discursively serves as an externalisation device, in which she tends to present the situation as beyond her. A1 replied with a justification mode, in which she manages both to acknowledge her responsibility and disclose the negativity of the situation. She suggests putting a light point (spotlight) on these students and helping them get involved even in tasks outside the lecturing room, which will make them more involved and complain less. Further describing the event from a script formulation perspective helps reinforce the point that dealing with difficult students is a routine practice in her department, wherein she advises the best solution is to ask a colleague to come and observe these “nutty” students. Sometimes, for the lecturer directly involved in the teaching-learning activities, the solution is not obvious, thus the help of a colleague is appreciated. The category entitlement of the students as being “nutty” (A1-Focus-group-line: 22) adds to the picture of a difficult situation that cannot be solved by the lecturer alone, which enhances the credibility of her claim. A3 tries to summarise the whole idea and concludes that she had similar experiences of having difficult students. However, what motivates them and can overcome any possible negativity students may have during the experience of BL is talking to them and letting them feel that she is always there if they need help. Such a construction draws from a reassuring device that helps her to demonstrate her accountability in solving the problem: “I have students who complain […] but […] I go slowly with them” (A3-Focus-group-lines: 23-24). She also corroborates her claims with references to others, “as you said” (A3-Focus-group-lines: 24), to show her empathic feelings and that this situation is a shared one. A1 finds A3’s statement a good point to agree with and uses the assessment device “indeed” to show her agreement with A3. This discourse presents a challenging situation with some students, which is not applicable to all students. It also emphasises the importance of getting students to believe in BL, especially those who are against it or who try to affect others negatively.

7.3.2 Motivation is constructed as a principle to overcome students’ resistance to BL

Extract 28

1 A1: I have students who never <travel or use their English:: with (.) <low> technological skills >and< I have students who are <well-travelled and >high< tech. Now it is a really:: WEIRD combination but >both< types of students they loved↑ it, really enjoyed being introduced to all of these:: and (.) even in the focus group with Sahar they said ‘we want to use it in the future’. They want to go back to what we did whenever they want in the future (0.5) But:: my students they love it but at the same time at MA level there is a >lot< of pressure↑ and that
pressure is pouring into my course but all I know is they were fine with it and they are fine with the change; they did not have a problem with that – Alhmudullah. (0.5) I do not know if it’s because it is an >instructor-student< relationship that they do what I ask, and if they did not do what I want I am really <diplomatic> in the way I deal with it because otherwise we’re gonna lose them. I FEEL motivation and the >dynamic< of the class makes it work if they feel like you are their role model

A2: And you have to >encourage< them first and increase their confidence (.) like you are <very well skilled; <you’re applying it accurately and that’s EXACTLY what they need

A3: I am <a very strong believer> that motivation plays the main ENGINE and the main role↑ for any person to learn, (.) so if the motivation is not there <then the expectation >will be< really low, BUT (0.5) I am a STRONG believer that >as long as< I am motivated towards something and <I believe this thing will change and this thing will support and help, <then I have a message and they ((students)) will have the >energy and the will< to learn and go through ALL the obstacles <because they know it’s gonna be fruitful at the end.

A2: They are motivated, very MOTIVATED and the >key< thing that I found in motivating them is that most of the students are from >urban areas<, not from towns, and some of them with disabilities and special needs, and >they’re thinking< that they are close↑ to each other and get to know each other more, >including me<.

(Focus-Group-2016)

It is interesting how A1 constructs the students’ levels of motivation towards BL with regard to their differences, using a category entitlement device, as some of them are “high tech” while others not (A1-Focus-group-line: 2). Although some of them have more English proficiency than others due to frequent travel, both categories love, enjoy and wish to participate in BL in the future, as she said “they loved it” (A1-Focus-group-line: 3). To enrich the factuality of her statement about students’ extreme enjoyment of their experiences with BL, she draws upon reported speech of her students in the focus group: “we want to use it in the future” (A1-Focus-group-lines: 4-5). This is followed by a justification device in which she showed how she manages responsibility about students’ motivation despite the negativity she reveals about the pressure of other courses. Such pressures kept “pouring” (A1-Focus-group-line: 7) into her course, and this ECF states not only the extent of pressure studying at MA level, but also how successful she was in motivating her students, which improves the credibility of her argument. Demonstrating an agent-subject distinction that her students “were fine […] fine with […] change” (A1-Focus-group-lines: 7-8), she shows her relationship with her students and her success in providing a dynamic and motivating atmosphere in which they find a good environment to engage in BL: “it is an instructor-student relationship” (A1-Focus-group-line: 9). Giving great thanks to god, ‘Alhmudallah’, is an emotion category, demonstrating her gratefulness at being able to lead successful BL. The varieties of activities between heavy to very simple, and her flexibility of allowing more time in which she metaphorically describes her teaching as “diplomatic” (A1-Focus-group-line: 10), are strategies she follows to ensure student motivation. A2 reacts favourably to A1’s argument, emphasising that encouragement and increases in confidence are what the students need, as she asserts,
”you have to encourage them first” (A2-Focus-group-line: 13). She metaphorically constructs motivation in BL as an engine: “motivation plays the main engine” (A3-Focus-group-line: 15). In this discourse a disclaimer device helps her to establish that “if the motivation is not there then the expectation will be really low” (A3-Focus-group-lines: 16-17), prioritising the significance of motivation as the main condition of successful BL. She constructs herself as a “strong believer” (A3-Focus-group-line: 17) twice to stress the level of her belief about motivation and how the message of motivation will overcome any obstacles. An agent-subject distinction helps her implicitly talk about her message about BL in this context, as she constructs motivation as the reason for getting her message across and thus her students: “learn and go through all the obstacles” (A3-Focus-group-lines: 19-20). Thus, a “fruitful” success of will be obtained. A2 uses ECF when she says students “are motivated, very motivated” (A2-Focus-group-line: 21), despite the differences between them. This emphasises A1’s earlier point that despite the differences all of them enjoyed the experience. Relating their motivation to the fact that BL brings great bonds and relationships between the students and her, she uses a justification device: “they’re thinking that they are close to each other […] including me” (A2-Focus-group-lines: 23-24).

7.3.3 Provide students with well-structured guidance

Extract 29

1 A1: For me: other than >bonding< and learning more, I think the girls think BL is high tech kind of learning and that >enhances< the learning wouldn’t you believe it (.) because <they feel it is high tech↑, so high tech equals like the future]
2 R: [Very interesting.
3 A1: But: for these girls (.) ((Bachelor level)) I am teaching <at the moment> this is the first time they were <introduced> to any technologies so: I have to take it VERY slowly. For example, at the moment we are >only< using ONE web tool, Mindmeister, and I did not want to introduce <any more> tools because these girls as I told you they did not know↓ a lot about computers.
4 A3: <I think students are ready >they< are really READY they just need to be guided to go to the <right track>; for instance I believe there is lots of things going around applications and resources, they >just< need to be <guided and very well guided with a good resource and support to help them with what I am changing (.) For me I like to >imagine< the activity in my brain how well it will work for me first if I do it, how will I like it and then (.) I imagine it with the students.
5 A1: I believe also the >dynamic<, if I build a dynamic at the beginning of the course, if they know each other and >feel< comfortable with each other they can tell me their problems and I can understand them better↑, also they can <support each other >when >any< problem could happen.
6 A2: Also (.) <when you use the software and you use it into something in your teaching and show them >how easy it is< they REALLY like it.
7 A3: <Yes, they NEED to see a clear↑ example.
A1: Like PowToon (.) Some students >absolutely< hate it and <only> one student loved it although it was <optional> to use this particular software. <We make it up to them to choose:>

the technology they see as the >perfect< way to produce the task, but other types of technology they loved, even me I loved it not only them; you know in their reflections <they write me reflections> so we used >a number< of software ((such as)) Mindmeister and Padlet for collaboration. For <the academic writing part they loved Padlet because it is, as Sahar said, <user-friendly> and they did not need to learn a lot comparing with other applications.

A2: We do not >know< about these technologies and students >do not know<, BUT, students are very proficient in <Instagram, Facebook and they are technologically >ready< for these social applications so when it comes to >educational< use they are ready↑, they are CAPABLE to use it, they >just< need to be guided and go through more <helpful resources> because they are really sick↑ and tired of the <regular and basic> teaching like produce a project in <a very bad quality> and we do not know if they do it themselves or NOT. We want them to do something that’s >beneficial< for them and the others. Something that they can save in their USB and take it >everywhere<. I do not want to see materials that are useless like we used to do in the traditional teaching, it is a waste↑, honestly it is a waste.  

(Focus-Group-2016)

A1 uses a three part-list, "bonding", "learning more" and "high tech learning" (A1-Focus-group-line: 1), when making sense about BL-related benefits. Importantly, BL provides A1 with the type of learning and bonding that matches her philosophy of teaching, but more important in her list is that her constructed ‘high tech’ BL environment means a lot to her students. Her students constructed a belief that a ‘high tech’ learning environment equals ‘future’, which categorically entitled their motivation for BL compared to traditional learning (A1-Focus-group-line: 3). She uses a rhetorical question, “would you believe it?” (A1-Focus-group-line: 2), that gives the impression that there was a surprising positive effect of learning with technology on students’ motivation. However, she compares her past experiences of being a participant in this study with recent practice teaching bachelor students in the following semester. This is an excusing device that serves to admit the negative feature of students’ low technological skills: “this is the first time they were introduced to any technologies” (A1-Focus-group-lines: 5-6), and therefore, dismisses her responsibility. When she was a participant in this research, she used different types of technologies; however, since it ended she only uses Mindmeister and she is not intending to use any more technologies other than this: “at the moment we are only using one web tool, Mindmeister” (A1-Focus-group-line: 7). A3 goes to highlight the role of guidance in students’ motivation, criticising A1’s account of just using Mindmeister, claiming with an assessment device mixed with ECF that when it comes to students’ technological skills they are “they are really ready” (A3-Focus-group-line: 10). Thus, she repeatedly mentions the word ‘guided’ and uses three-part lists, asserting that students are ready to adopt BL if they get good guidance. She follows this with a reassuring device to encourage what is being constructed in her argument: “I like to imagine the activity in my brain” (A3-Focus-group-lines: 13-14). A1 voices agreement with A3, adding that the instructor’s ability to create a ‘dynamic’ classroom can contribute to successful BL in which
students can “feel comfortable” (A1-Focus-group-line: 17). This emotion category is constructed as important. A1 continues to explain why this emotionally categorised feeling of being comfortable in a BL environment is important, using the same reassuring device in terms of her relationship with students, “I can understand them better”, and the student-student relationship: “they can support each other” (A1-Focus-group-line: 18). To emphasise her earlier point, A2 recounts the importance of guiding students, in which she uses a frame device to argue that using technological applications at a teaching level before asking students to adopt them in their learning can allay their fears and show them how easy it is. On the same track, A3 supports A2’s argument about applying technological tools in teaching activities first by using a corroboration device to agree with A2: “Yes, they need to see a clear example” (A3-Focus-group-line: 22). A1 uses a narrative structure to recount an event, which serves to build up her argument. This is mixed with the use of emotion categories, “hated” and “loved” (A1-Focus-group-line: 23), to support the emotional experience of using different types of technology. She recounts of PowToon how some students “absolutely hated it”, and only one student loved it, to minimise the attraction of this particular technological tool. For other technologies, she recalls how “they loved it, even me I loved it not only them” (A1-Focus-group-line: 26). She then moved to draw upon a three part list, “we used a number of software [such as] Mindmeister and Padlet” (A1-Focus-group-lines: 27-28), to relate the emotion category of love to Padlet in particular, claiming that this is because it was considered “user-friendly” (A2-Focus-group-line: 29) software, citing the researcher as a reference to enhance the credibility of her talk and implying that the easier the application is, the more emotionally acceptable it is to users. A2 turns to get back to her first point, reminding the group of its importance – “students are very proficient”, “they are technologically ready” (A2-Focus-group-lines: 31-32) – but she uses a category entitlement device to distinguish between “social” and “educational” applications. With social applications students are proficient, while with educational applications students are ready but just need to be guided. This is followed by an externalisation device– “they are really sick and tired of the regular and basic teaching” (A2-Focus-group-line: 35) – to present the situation as coming from a social need of the whole community.

The identified constructed contradictions within academics’ discourses:

Secondary contradiction: occurs between the community of students and subject “academics” components of the activity, in which students brings challenges in previous stages to academics when BL is implemented as a needed change.

Tertiary contradiction: the historicity of this secondary contradiction throughout previous stages around students’ community leads the academics to conclude that without changing students’ mentality about BL the object of current practice would contradict the object of the future-ideal activity of BL. Thus, the following are constructed as main principles:

1- Get students to believe in the importance of BL
2- Motivate students to be active in BL
3- Provide students with well-structured support. (Appendix 7, figure 14).
7.4 Constructed principles within artefact-mediated tools for effective BL practice

7.4.1 The availability of unlimited access to the Internet around the university for effective practice

Extract 30

A2: One of the KEY tool <principles> I think, is when >I go down< to my lecture room, I have access to the Internet↓. <I have been having this issue for >three continuous weeks<. The university blocked↑ the Internet access, I have no idea >why<, so I RUN to the IT department and]

A1: [Everybody, everybody:: It has been happening because (. ) they’re setting up a new system or service so everybody has the same issue::<

A3: Although I do not think this is the <reason> because it has been there for LONG time >it’s just< getting worse (0.5) BUT they must announce it <so we know and >adjust< our plans. If they want to adjust a new server WHY during the semester and <why is it working in our offices not in the classes? (. ) I am not sure >what’s going< on but the Internet connection is a problem↑ that really hinders our <effort> to integrate BL.

A2: With BL if it is not >structured< it’s gonna fail↑ because with BL if it is <well-structured> the online and face-to-face activities are >linked< properly so everything will go as planned, and being planned because with technology:: (. ) um:: we’re going <so> motivated and <looking forward to tomorrow’s class and everybody was looking forward BUT at the last minute the <internet> is not working, it >kills< everybody (0.4) Today was the EXACT thing – my class was supposed to start at 9:00 and I did not start until 11:00↑.

A3: Oh what↑.

A2: The >whole< thing was down↓, there is NO Internet connection. <I have been asked to move to another building and >still< the same problems SO yes it kills↑ everybody.

(Focus-Group-2016)

To talk about one of her critical experiences, A2 uses, a narrative structure device in which she has been without Internet access in the lecture room. Such unacceptable experiences lead her to formulate a key principle for BL that "[...] have access to the Internet" (A2-Focus-group-lines: 1-2). Stating Internet access in the lecture room as one of the key principles rhetorically describes the case to the extreme by using ECF, in which she puts Internet access as the most important of the principles for successful BL. She describes her reaction to the problem using a stake confession device, showing her acknowledgment of how problematic it is, by stating frankly that “the university blocked the Internet access” (A2-Focus-group-lines: 2-3), and admitting her responsibility to disarm any would-be criticism when she actually tries to solve the problem: “I run to the IT department” (A2-Focus-group-lines: 3-4). Also the word “run” here metaphorically states how urgent and serious the situation is. A1 stops her from continuing her story using a
corroboration device; by using this device she attempts to ‘[offer] extended forms of acknowledgment’ (Whittle et al., 2008, p. 17): “Everybody, everybody […] so everybody has the same issue” (A1-Focus-group-lines: 5-6). A1 repeatedly mentions ‘everybody’, invoking that other people witnessed the same experience and so helping her to bolster the factuality of her account. She also uses a justification device as she tries to dismiss what has been claimed as negative about the university’s role, speaking from her administrative position: “because they’re setting up a new system or service” (A1-Focus-Group-lines: 5-6). A3 disagrees with what A1 has said, using a hedging device where the overall strategy of her argument is, “although […] but […] if” (A3-Focus-group-lines: 7-9). By displaying such uncertainty, she manages her accountability by avoiding taking a concrete position about the situation. Such hedges become explicit towards the end of her talk: “I am not sure […] but […]” (A3-Focus-group-line: 10). A2 arms herself with a disclaimer, hypothesising that “with BL if it is not structured it’s gonna fail” (A2-Focus-group-line: 12). To add to the facticity of her argument she repeats the same disclaimer argumentation with a justification device to acknowledge her responsibility for such a negative feature. Based on that sense she acknowledges that planning and adhering to that structured plan are fundamental to BL, so that F2F and online activities work together coherently. To enhance this argument she tends to narratively structure an event where each time she and her students were getting motivated and looking forward to the next class, and then discovered they had no Internet access, which “kills everybody” (A2-Focus-group-line: 16). To shore up her argument she mixes this narrative with vivid details: “Today was the exact thing – my class was supposed to start at 9:00 and I did not start until 11:00” (A2-Focus-group-line: 17). A1 turns to shows an affect display of being shocked, by raising her intonation: “Oh what” (A1-Focus-group-line: 18). A2 prefers to continue narrating the event with more justification devices, trying to show others that she tried to solve the problem by moving the lecture to another building. To explain the extent of the problem in her teaching practice she uses a vivid metaphor to say the extent of the class’s anger and disappointment about the event “kills everybody” (A2-Focus-group-line: 20).

7.4.2 Accurate decision-making about what tools to use for effective practice

Extract 31

1 A1: With Web 2.0 technologies, students >automatically< go like ‘this is so difficult we do not have time, >we< had an issue with this, we are >not going< to do this, although it looks interesting BUT we do not want to do this↓’, so I told them ‘>it is easy, quick, I love it<, it’s free’. <Me and Sahar> we had an issue with the free↑, I mean the free applications, because THIS has driven me crazy↑ because some of them are free but they are not really free, so it involves >numerous< attempts to select good applications but worth↑ the effort.

2 A2: It has to be free↑ but also <we need to learn these tools. >I know< from my position that I do need to >know< more about these applications and HOW to apply them (.) I do know I have to learn more about them BUT with the pressure I’ve got in my work…. Like:: a mind-map for example I said ‘oh my god↑ shall I go and learn more about it or shall I just finish my job even
in the traditional way?' (0.6) This moment↑ when I want BL but could not go >ahead< with it (. ) So it significantly has to be free, plus not complicated and <easy to use>.  

A3: What I did >I have been< trying is to divide the tools between me and my students (0.5) For::: example <there are tools I was the >only< one who had learn it and there are tools my students >need< to learn BUT I do not need to go <deep> into them, and I also tried to encourage the <good students to teach and help their colleagues in their tasks and Alhumdallah↓ >everything< went smoothly (.) despite some events where students get >annoyed<, for example <sending me their maps or: adding me there in the website and this was >obviously< because of the free issue. 

A1: I think you have to choose wisely↑ because there are SO many tools (.) Every time you open up the computer <you just go online> and look for new web tools and <you get like a list of >more< than a hundred web tools, <just> tools that related to mind mapping for example. So READ the reviews and then experiment because this is how we learn, so >trying< and making mistakes and learning from the >trying and improving<. 

A3: If is not >user-friendly< I am telling you, it is >just< a waste of time (.) because we have SO much work, it has to be >easy< to use tools] 

A2: [I get >motivated< and I go into planning but when I reach the stage of <application> when I have to get to learn about the application I go ’ok↓ I am not going to do this’, I give up >the whole thing<. I do this and I do that and everything is collapsed↑ in one thing and I do:: not know what to do (.) There is an issue I do not know. 

A1: Sahar gave me a >whole< bunch of them for me to think and choose but <you know> what I did – go online and I read reviews – because people <write reviews> for web tools and accordingly like ‘there is lots of money involved’ or ‘do not go there’, or maybe they give you alternatives. It is an >excellent< way <It is like when you want to go to >a restaurant< that you do not know about and you read what people wrote about it: (0.5) When Sahar introduced me to >any< technology first of all↑ <we sat and discussed> then I selected those I really want to learn about more. I go to online tutorials, I check the numbers of people who go into it and how recent it is and then I go on because there are >millions< of tutorials. 

(Focus-Group-2016) 

To build up her argument A1 uses a reported speech device, reporting students’ negative views that, “we do not have time […] although it looks interesting but […]” (A1-Focus-group-lines: 1-3). What is interesting is the way she responds to the negativity of students by showing her accountability, stressing the features of these tools to her students to sustain students’ motivation through a three-part list device: “I told them it is easy, quick, I love it, it’s free” (A1-Focus-group-lines: 3-4). To prioritise the feature ‘free’ amongst other mentioned features, she draws from a reassuring device, citing others, “we had an issue with the free”, showing her empathy which has driven her “crazy” and acknowledging her responsibility: “it involve numerous […] but worth effort” (A1-Focus-group-lines: 4-6). These are all taken together to support her claim that free applications are at the top of her list. A2 agrees explicitly with increasing intonation, saying “it has to be free” (A2-Focus-group-line: 7). However, she orient s to stress that another feature in A1’s list is more important, namely ‘easy to use’. To deliver her argument she uses a stake confession
device in which she displays a negative feature of being under pressure with her work and reveals her responsibility for developing knowledge about different tools: “learn […] but with the pressure […]” (A2-Focus-group-line: 9). To enhance her argument she repeatedly uses a reassuring device ‘to comfort and soothe’ (Whittle et al., 2008, p. 20) and restates her argument that it “has to be free, plus […] easy” (A2-Focus-group-lines: 12-13). A3 uses narrative structure to relate that free and easy to use are her main principles when deciding what tools to use. First, she pictures her practical method in the decision process; she divided tools using category entitlement in her narrative structure as “tools I […] learn” and “tools my students […] learn” (A3-Focus-group-lines: 15-16). Second, another strategy she follows is encouraging what she categorised as “good students”, again using category entitlement to draw an example of when the “good students” helped “students get annoyed” about the mind-mapping tasks and the problems of sending her the maps (A3-Focus-group-lines: 18-19). Importantly, she linked the whole problematic situation to the fact that the mind-map tool is not free, using a disclaimer device to hypothesise that it would not be a problem if the application was free: “the free issue” (A3-Focus-group-line: 20). A1 orients to extend the process of decision-making about what tool to go for, stating “choose wisely” (A1-Focus-group-line: 21) as a main principle. She talks with a reassuring device to ‘encourage and hearten’ (Whittle et al., 2008, p. 20), in which she constructs herself as an advice-giver: “I think you have to […]” (A1-Focus-group-line: 21). She concludes that when people give advice they heavily draw on reassurance. This is mixed with ECF to build up a ‘justifying factual claim’ (Edwards, 2000, p. 348); in this case the factual claim she is justifying is the importance of being able to choose wisely between numerous tools – “so many tools”, and “[…] a hundred web tools […]” (A1-Focus-group-lines: 21-23). She further uses a reassuring device to construct that this is a continuous process where mistakes are an essential part of learning and improving, provided you keep “trying and making mistakes and learning from the trying and improving” (A1-Focus-group-line: 25). In response to such encouragement, A3 uses a disclaimer device, conditioning the success of any tool to its features being easy, to soften any would-be negative interpretation of her claim, and relating this to the pressure of work they have, in which a waste of time is unacceptable. A2 orients to support what is being said by A3, narrating her talk as an emotional category, categorising her feelings to the stage she is facing. Knowing about tools helps her get motivated (“I get motivated”), which encourages her to excitedly plan (“I go into planning”); however, when she reaches the stage of application, her motivation towards any tools usually turns to a demotivation: “I give up” (A2-Focus-group-lines: 28-30). Here she tries to give an excuse for why she fails at the application stage: “everything is collapsed in one thing” (A2-Focus-group-line: 30). She hedges her negative emotion as she is uncertain why she develops such a feeling: “I do not know …I do not know” (A2-Focus-group-lines: 30-31). This argument from A2 drives A1 to narratively structure her experience of dealing with tools, especially constructing how she dealt with what she perceived as difficult. To navigate her route through what she constructs in her narrative as “a whole bunch” of tools, she expresses her agency through agent-subject distinction by showing her ability to critically review and decide: “what I did – go online” (A1-Focus-group-lines: 32-33). The orientation of A1 is to stress that academicians need to be critical thinkers in their decisions; to shore up her claim, she metaphorically compares selecting a tool for instructional design with researching a new restaurant’s before going, “go to a restaurant that you
do not know” (A3-Focus-group-lines: 35-36), and you read people’s reviews about that restaurant to select good food. She then brings this back to the subject matter and recounts the process she went through narratively (A1-Focus-group-lines: 36-40), stressing the vital role of reviewing and reading other people’s views on the tools she is about to use.

7.4.3 Developing instructional design knowledge for effective practice

Extract 32

A3: “Teaching strategies, reflection, the group work and this stuff, we need to know more about them (.) because I THINK if we do not know we cannot think out of the >box<.

A1: True↑.

A2: “Forgive me if I disagree with you. We >know< about this stuff and we >love< one or the other BUT here our students said, ‘No, you are not >a good< teacher if you do not teach in <a teacher-based> way’ (.) and:: they go to the dean or the head of the department or whatever and they <would say ‘she is making us do the >all< of the work↓’.

A1: I do not know why but I do NOT have this problem, maybe because I have the >power< or maybe it is the nature of the subject >I do not know< (0.5) but I DO have issues↑ with being >familiar< with different teaching methods.

A2: From my <experience>, not only here because I have taught in different positions, if you do not teach in a teacher-based way, they would not trust↑ you >even< with motivation and technology. (.) If I said↓, ‘look um;; I took the information from here’, a >YouTube< video for:: instance, <they would reply like ‘but↓ you said differently comparing with the author of the book’.

A3: My students, they want to >feel< that the teacher is in control but they >really< want the technology, the new teaching approaches, <so they want both and I think this is what BL↑ is about.

A1: Yes they do >but< the MOST important thing is that you make them feel that you are in control when↑ in reality you are facilitating things.

(Focus-group-2016)

A3 uses a three-part list device – “teaching strategies, reflection, the group work and this stuff” (A3-Focus-group-line: 1) – to package her talk to emphasise the extent of different pedagogical approaches more broadly. To build up the importance of such lists, she draws upon a disclaimer mixed with metaphor: “we cannot think out of the box” (A3-Focus-group-line: 2). Through the disclaimer she connects the lack of varied pedagogical knowledge to their struggle to think from new perspectives, which she metaphorically labels as “out of the box”. A1 agrees with A3’s point, to which A2 responds, “Forgive me if I disagree with you” (A2-Focus-group-line: 4). She clarifies herself by using stake inoculation to resist a counter-claim and positions the statements made by A1 and A3 as less factual by asserting that they are not lacking pedagogical knowledge; rather she relates the issue to the acceptance of the student-based approach culturally in Saudi higher education: “[…] our students said ‘No […]’”, and “[…] they go to the dean or the head of the
department [...]” (A2-Focus-group-lines: 5-7). A2 denies her interest in the student-teacher approach, not only inoculating her stake by ‘twisting the truth’ but also externalising the situation as and beyond her: “[…] you are not a teacher if you do not teach in a teacher-based way” (A2-Focus-group-lines: 5-6). This is similar to the claim made by A2 in previous stages. A1 rejects having problems with her students and hedges the reasons why she has not, assuming two possible reasons: one, that she might have more power over the students given her involvement in the administrative work in her department, and two, it might be a subject matter reason. A2’s talk orients to stress the factuality of her claim by aligning it within her personal experience, “not only here […] in different positions” (A2-Focus-group-line: 11), and uses narrative structure to address her accountability for being teacher-based as something she is forced to be involved in. This is followed by a disclaimer explicitly denying the potentially negative interpretation of what she is claiming – “if you do not teach in […] even with motivation and technology” (A2-Focus-group-lines: 12-13) – as a face-saving linguistic technique. She gives an example of students’ reaction if the same information is given to them from different sources, implying students’ preference for memorisation rather than critical thinking. A3 takes a justification mode that, although it is true that students psychologically prefer to feel that the teacher is in control, they prefer technological-based learning and new teaching methods, in which she shows accountability for prioritising the promise of BL as the best way to achieve these two. A1 draws from ECF when stating the “most important thing” (A1-Focus-group-line: 19) is prioritising the role of instructors in this sense to accommodate BL. Taking an active advice-giver tone, she indicates her agency of having the capacity to acting upon the problem using agent-subject distinction: “you make them feel that you are in control when in reality you are facilitating things” (A1-Focus-group-lines: 19-20).

The identified constructed contradictions within academics’ discourse:

Secondary contradiction: occurs between the subject of the activity “academics” and activity-tools components, in which BL tools convey conflicts in previous stages to academics when BL is implemented as a needed change.

Tertiary contradiction: the historicity of this secondary contradiction throughout previous stages around BL tools leads the academics to conclude that without effective BL tool principles, the object of current practice would contradict the object of future-ideal activity of BL. Thus, the following are constructed as main principles:

1- The availability of unlimited access to the Internet around the university
2- Accurate decision-making about what tools to use
4- The needs to further develop instructional design knowledge. (Appendix 7, figure 15).

7.5 Constructed principles within academics’ sense of transformative agency for attaining the object of transformative BL practice

Extract 33
A1: I am already <converting people>, did I tell you? Hhh. <we were in a meeting… and we had
two old↓ instructors. One of them said ‘I am in my >late< fifties I do not even need to think
about BL’. What we did then our head of department said, ‘Why don’t you tell us what are
you doing?’, a:nd when I started to tell them <just a few> things we have not really, really
started – I >just< told them about little things of what we were doing – she goes like '<But it
is not easy↓ for someone who is old as I am, I can <barely> work my way around the
computer except for Word and presentation’. I said, ‘Uh, why don’t you come up to my
office?’, (0.5) and actually:: we have a meeting this week me and her to >check out< some
of the web tools.

(A1-Skype-meeting-2016)

A3: I believe BL can help us create >a new vision< of education that is more promising↑ (.) It
started when I saw the BL courses in our department have somehow a similar content so if
it is >all< under one umbrella, <when students access the materials, the materials of <other
courses> and the materials of previous years, their thinking will be structured↑ >all under<
one system so we do not need the English resources >any more<, we can create more
creative resources. Also (.) because:: there is repetition not only in my course but <at the
level of the whole department↓, because:: for m::e and my students the topics are the same
and the students’ work will be the same, they <always> get barely any new ideas. (.) But::
with this new idea of BL the students <will be inspired to start >a new level< of thinking and
higher level of thinking, it would be a >fruitful< outcome.

A1: The students will access all the courses materials in one website↓.

A3: Yes::, this is what I suggested (.) and there is another issue to this. If you document the
students’ work in >one< system – I mean the students tend to take the past students’ work↓
and submit it as their own work↓ – we could put <an end> to this unacceptable behaviour.

A1: I think there is >one more< thing that’s gonna happen, you know. <The creativity> will go
up↑ (.) because if they see the type of the work we have at the moment <they can understand
the level >required< of it is either this or above, never below↓.

A3: Exactly, because BL is <a mixture> of traditional teaching and high-tech teaching that makes
learning really <motivating, interesting and it just elevates students’ level.

A1: <That is so cool, I like it. <Such a great idea, you> have to tell us then how things are going.

A2: It is a brilliant idea but:: (.) getting instructors to work together is a challenge because here
we do not have this type of >gathering<, but <because it is a positive change I think if anyone
JUST starts BL, even the simplest↑ form of it, they will never stop using it. F:::or example
with >QR< and the revision week activity, students >liked< the idea very much <when they
started the training session. When they had to <practically get involved> in teaching in real
schools, <they used the same technologies↑ in my course with their students in schools and
(0.5) I was VERY >happy<, yes:::, and when they wrote their reports they thanked >me<
because I showed them through my course some of these technologies and how they can
use them while they are >teaching<.

(Focus-Group-2016)
In the Skype Meeting with A1 she stated “I am already converting people” (A1-Skype-meeting-line: 1), using an *agent-subject distinction* in which she characterised herself as being the agent and manages her accountability to transform cultural pedagogy through BL in her department. She formulates the ambition towards change when she puts forward a *rhetorical question*, “did I tell you?” (A1. Skype Meeting, line: 1), to get her audience inspired by her argument. She then uses *narrative structure* to relay an event of a meeting in which she heavily depends on *reported speech or represented talk*. In addition, to build up her narrative she draws upon *category entitlement* to categorise actors in her narrative with specific roles and knowledge, in which “two old instructors” (A1-Skype-meeting-line: 2) who criticise the effectiveness of BL are compared to herself, who seems more knowledgeable and agent towards BL. She also recounts how the head of department took the role of accommodating the discussion between members in the meeting. One of the two mentioned old instructors downplays the relevance of BL for her as she delivers her speech, “I am in my late fifties” (A1-Skype-meeting-line: 2). The head of the department asks A1 to tell the group about her experience of integrating BL; again she uses *reported speech*: “tell us what are you doing?” (A1-Skype-meeting-lines: 3-4). She uses a *minimisation* device to treat the information she gives about her experience as insignificant: “[…] just a few things […] – I just told them about little things […]” (A1-Skype-meeting-lines: 4-5). As she started talk the same old instructor interrupted her and she reports her speech, again delivering her doubt of being able to deal with BL (A1-Skype-meeting-lines: 6-7). She invited her to come to her office and they decided to go forwards to plan BL for her course together. The overall orientation of A1’s talk is to establish her agency in transforming BL in her department, especially in relation to changing the attitude of people in resistance.

A3 reports how she tries to transform the current practice in her department as a result of being empowered with BL experience: “create a new vision of education” (A3-Focus-group-line: 1). She uses a *frame transformation* by suggesting a new system be launched in her department where students can access all the courses in one place, “[…] under one umbrella” (A3-Focus-group-line: 3). She uses a *justification device* that “courses in our department have somehow a similar content” (A3-Focus-group-line: 2), in which such a unified system could solve a number of pedagogical needs, showing responsibility and downplaying any negative features of her suggestion. Getting students access to one system, wherein they could access materials for previous and current courses, would allow students “all under one system” (A3-Focus-group-line: 5). She shows this is particularly important by using a *frame transformation*: “[…] need the English resources any more” (A3-Focus-group-line: 5). This means the Arabic resources deficiency will be transformed to creative Arabic resources for the whole department: “[…] more creative resources”, (A3-Focus-group-lines: 5-6). She equates the lack of creativity in students’ thinking to ‘repetition’, using *category entitlement* to label traditional teaching as lacking creativity, not only in her course experience but at the whole department level, stressing her earlier point that courses in her department all have a similar content. A3 uses a *contrast* device, “[…] But with this new idea of BL […]” (A3-Focus-group-lines: 9-10), discursively mixing with *frame transformation* to
state her point of “students […] new level of thinking” (A3-Focus-group-line: 10), picturing BL as a promising solution that opens horizons. A3 formulates another frame transformation, constructing responsibility towards the negativity of students’ behaviour about assessment methods: “students tend to take the past students’ work […]” (A3-Focus-lines: 13-14). Hereafter, documenting students’ work in one place will mean transforming this negative frame: “we could put an end to this unacceptable behaviour” (A3-Focus-lines: 14-15). A1 adds that, “one more thing” is “creativity will go up”, frame transforming that if everything is gathered under one system as suggested by A2, students will formulate an understanding about the level of creativity required: “it is either this or above” (A1-Focus-lines: 16-18). This ties to A3’s agreement, in which she uses a three-part list device: “motivating, interesting and it just elevates students’ level” (A3-Focus-line: 20). Such packaging in her talk stresses the extent of the benefit that BL offers. Following A1’s request to know more about how the project will go, A2 hedges the achievability by criticising the possibility that academics could work together as a team, relating this to the absence of a team-work culture in Saudi higher education: “we do not have this type of gathering” (A2-Focus-line: 23). However, she constructs BL as a “positive change” (A2-Focus-line: 23), practicing category entitlement that BL just needs to be discovered and no one will stop using it after seeing the positivity it produces. To shore up her arguments and state the transformation she achieved, she draws upon narrative structure devices mixed with emotion category, narrating an event where “very happy” (A2-Focus-line: 28) when her students wrote their final reports, after they had completed their school teaching training. This event is a critical event for her, since supporting her students – who are pre-service teachers – with the ways of implementing BL was one of her motives to participate in the research.

The identified constructed contradictions within academics' discourses:

Secondary contradiction: occurs between the subject of the activity “academics” and the object of integrating BL. Academics who experienced BL implementation construct that sustaining transformative agency depends on their ability to overcome any emergence of contradictions.

Tertiary contradiction: occurs between academics’ motivation towards the object integrating BL, what they believe as best practice, and socio-culturally believed best practice about traditional teaching. This manifests on the transformative agency expanding the object of BL, as they view traditional practice is well-rooted in their socio-cultural setting when they become active agents in changing and developing not only their own practice but also the socio-cultural practice around them, motivating, encouraging and helping their colleagues, departments, and students to make active use of BL. (Appendix 7, figure 16).

7.6 Summary

Participants draw principles for BL best practice based on their active participation in analysing, designing and implementing BL. Discourses around training, support, and the important of building BL-community are dominant and have been negotiated as the main principles for
successful BL at a university level. For students to embrace BL, the discourses have focused on getting students to believe in BL, motivating them, and guiding them well. The negotiation of tools in BL-mediated pedagogy demonstrated the need to have a clear conceptualisation of BL, internet access, being able to select wisely between different technological tools, being able to fit the tools into accurate instructional design, and the availability of resources. Moreover, a transformative sense of transformative agency was a clear feature of the discourse, in which participants positioned themselves as drivers and agents within BL change developments, trying to move forwards for a better future, constructing their contribution towards change as a vital principle they have to provide for their community.
8.1 Introduction

The focus of chapters 4 to 7 was on academics’ discursive construction of BL integration during different stages, approached through a CHAT-inspired DBR methodology. Studying such academics’ transactional process revealed a number of systemic contradictions. This chapter aims to discuss BL-transformative impacts in these academics’ discursive constructions across the stages. Hence, this chapter discusses the main research question that inspires this thesis: RQ: How is the transformative experience of BL integration constructed within Saudi academics’ discourses? To discuss this question, a cross-discussion of previous stages is employed and attempts to unify the study by discussing the findings of the research.

8.2 Academics’ construction of the ‘community of students’ as inherently the main discourse in their BL integration activities

In the first stage (Chapter 4: Analysis of Practical Problems), the first identified practical problem is that students were inadequately prepared for university-level study, which was identified by academics in this study as a secondary contradiction. This is in line with a number of previous studies, which show Saudi graduate students lack skills in a number of vital academic areas including writing, analytical thinking and quantitative skills. In Saudi Arabia, the secondary education system produces outcomes that are incompatible with the higher level of study expected at university. Al-Sheikh (2015b) describes this phenomenon in the Saudi school system as a failure to employ all cognitive domains in teaching, only successfully tapping into the domain of memory. Students attend these schools, but are not prepared for the format of learning required by a university student, such as “critical thinking, analysing a given situation or generating creative ideas” (Al-Sheikh, 2015b, p. 106). This issue of students being inadequately prepared for university is not an easy one to resolve, but nevertheless is an area which must be addressed as a priority. It is suggested by Golam Faruk (2015) that changing student mentality is possible, through the integration of higher domains of learning in their academic courses. As the findings stressed, there is a critical need to change the culture of learning that has become rooted in the education system and which has impacted on student beliefs for a number of years.

Additionally, findings show that students' negative ideology about group or collaborative work is another practical problem. One explanation could be that the guidance for the group-work has lacked clarity or transparent instruction and perhaps these academics do not provide a clear definition about what group work entails. This is supported by Al-Sheikh (2015b), who asserts that within the Saudi higher education much accountability is placed on the academics concerning how learning activities are planned, in which cooperative-learning concepts have to be suitably customised to the environment and students’ learning needs. According to Al-Sheikh (2015b) the provision of scaffolding, assistance and effective feedback from the academics is equally as
important as the students’ accountability in engaging with group-managing tasks, which are reportedly mostly absent when conducting group-work. Another implication of this finding could be that these academics do not trust their students’ ability to work in absence of their supervision. Similarly, the study by Al-Sheikh (2015a) suggests that Saudi academics are usually apprehensive about the cooperative learning methodology, with a lack of trust in their students’ aptitude to work independently with their peers without teaching input. Findings raised from this study reveal that the ability of the students and willingness to work together in a team towards a shared objective is affected by their pedagogical goals and values, which are shaped by a multitude of complex reasons. This finding suggests that there is a need to enhance the way in which group work is conducted to allow for more productive experiences.

Moreover, in this stage, it is claimed that Saudi students’ low view of education manifests itself in their lack of enthusiasm and motivation, which in turn creates a demotivated attitude amongst academics, forming another secondary contradiction. This finding is supported by AbdulCalder (2015); Sheerah and Goodwyn (2016), who state that Saudi students’ low motivation is a primary factor that impacts negatively on instructors’ motivation. Thus, it is argued that innovative and non-traditional instructional approaches are needed by academics to involve students in the acquisition of knowledge, but importantly in discovering and creating knowledge. This conclusion is supported by Ezza (2013), who observed that classrooms in Saudi educational settings are being affected by a lack of student motivation, in which learning activities are filtered by students’ motivation, resulting in the responsibility laying with academic staff to maintain students’ curiosity. This study stressed that BL could be a possible solution to promote students’ curiosity through effectively combining technology with pedagogy. This will maximise the effectiveness of higher instruction, an outcome that is well-reported in the literature, enriching Saudi students’ motivation and ownership of learning (Alshahrani & Ally, 2016).

When moving to the second stage (Chapter 5: Design Solutions), the previous secondary contradiction triggered a systematic tertiary contradiction. As academics visualise richer ideas about BL, they become more doubtful about students’ aptitude to enthusiastically participate in the designed BL-based activities. Thus, academics faced a pressing concern and hesitations; although the designed activities are agreed, academics strongly thought these activities were subject to change and amendments were required during the implementation phase to meet the students’ technological abilities. This dialectical situation leads to the reformulation of new meaning; A1, for example, suggested semi-tutorials to enhance students’ knowledge about different technologies and taking things slowly to solve any “teething problems”. A similar evaluation is supported by Al Gamdi and Samarji (2016), in which one of the main barriers to integrating e-learning identified by a faculty in a newly-established Saudi university was students’ lack of training on e-learning. This challenging situation in driving such a change is explored in Alebaikan, (2010b); it was found that getting students to change to the habit of new learning strategies such as BL is difficult because Saudi students are so used to traditional learning based on lecture-based teaching.

However, in this study the academics’ construction of students’ low ability to participate in technology-involved activities is a perception not based on real evidence. Saudi scholars like
Alenezi (2012); Alzahrani (2017b); Maarop and Embi (2016), have shown that for Saudi students, online learning provides new openings to question traditional understanding of the actual meaning of learning. Alothman (2016) investigated Saudi teachers’ and university students’ attitudes towards computing and concluded that Saudi undergraduate students have a positive attitude towards computer-based learning; however, lots of Saudi learners in the study had no computer accessibility at university, particularly female students. This implies that the academics’ ideology regarding students’ resistance to integrating technology into their learning environments, at this stage, may present just one viewpoint of the issue. It could be that these academics’ attempts to introduce technology for educational purposes have not aligned with the students’ actual needs and resources. Thus, Saudi academics must consider the implementation of effective BL that drives effective learning experiences for Saudi students and accommodates different learning styles (Alzahrani, 2017a). Faculty professional development initiatives impact on instructors’ attitudes positively, resulting in an increased awareness of their teaching methods and student learning, and a change in their conceptions that manifest in their practice in teaching and course design. Alhabeeb and Rowley (2017) agree that decision-makers in Saudi universities must consider the importance of students’ positive attitudes as a critical success factor for e-learning application through examining the culture of student learning.

In stage three (Chapter 6: Implementing BL Design), the students’ community generated a systematic contradiction when the negativity of some students clashed with the academics’ object. While BL has positively transformed the teaching-learning process, as academics construct in this study, academics faced struggles sustaining students’ enthusiasm to actively participate in the BL environment. Students’ slow transition from traditional learning to BL might be understood as having an emotional implication, in which the introduction of BL challenges students and leads them to resistance. Students’ slow progress to involvement in BL encouraged academics to engage and motivate students to actively participate in BL. The general discourse around implementing BL with students shows that BL provides innovative pedagogy for these students but involves a set of challenges, which is where the conflict lies; ultimately, as students’ emotional reaction towards BL transforms they get used to it over time. In one sense, these BL-based learning activities bring to them a radical change; on the other side, it takes them beyond the boredom associated with traditional teaching. Yet, the academics’ discourse shows a minimisation of the issue as they limit students’ demotivated behaviour to certain types of students, or they minimise the issue at the beginning of the course as BL is new and they attribute the issues to students’ need to develop IT skills. Nevertheless, findings related to this issue shows that academics’ role in supporting students emotionally plays a significant role in solving this issue. Therefore, for Saudi academics it is significant to consider the creation of a good student-instructor relationship in BL to emotionally support students’ active transition from traditional learning to BL. This is in line with Sheerah and Goodwyn (2016), who conclude that such a relationship is vital to establish the needed BL environment for Saudi higher education. Another cause for students’ low motivation at the beginning of introducing BL is students’ lack of an accurate conceptualisation of BL. This can be understood because BL implementation is in its early stage in Saudi Arabia (Alebaikan, 2010b; S. Alshahrani & Ward, 2014; Alzahrani, 2017a; Sheerah & Goodwyn, 2016) and also because as was pointed out in the literature review, there
is a struggle for researchers to define what it is. Thus, Sheerah and Goodwyn (2016) suggest the need for BL-orientation in a Saudi context for newcomers at all levels – students, academics and administrators. Al-Zahrani (2015a) recommended that the enforcement of innovative pedagogical methods using ICT creatively is an important consideration for Saudi higher education. Thus, as the findings suggest, it seems that to unlock its potential it is highly important to establish a culture of BL.

Moreover, in the implementing the BL design stage, managing expectations is constructed as a challenging influence for Saudi academics in this study. Although academics constructed some students as being less responsible in the BL environment, their discourses minimise this issue as they tend to prioritise the positivity of BL, in which students become more independent and creative thinkers. A study by Binyamin, Rutter, and Smith (2017) to investigate Saudi students’ acceptance of LMSs concludes that the main factors surrounding the acceptance of LMSs are, “prior experience with LMS, satisfaction, social influence, computer self-efficacy and teacher role” (p. 295). This finding is in line with this study, in which students accepted BL in different ways and this acceptance was subject to different factors. An additional implication is that BL is a new tool in this teaching-learning context; thus, the value and exchange-value of BL between academics and students do not share a common acceptance. Unlike a traditional learning environment, in BL students require higher discipline and awareness (Alebaikan & Troudi, 2010). Similarly, Al-Hassan and Shukri (2017) stress that students’ awareness of BL must be improved. BL has transformed the learning experience positively; this is strongly suggested in the findings in this study. A study by Hamdan (2014) explores the links between the change in Saudi students’ culture of learning and the application of different methods of online learning, the observations of two Saudi female-groups at university level when both first start integrating online-learning into their learning. It concluded that the integration of online activities has changed the learning culture amongst Saudi students. Appleton, Christenson, and Furlong (2008) articulate students’ engagement in learning as “a concept that requires psychological connections within the academic environment (e.g., positive relationships between adults and students and among peers) in addition to active student behavior (e.g., attendance, effort, pro-social behavior)” (p. 365). This gives a sense that for students to engage with BL, especially considering that BL is a new practice, a psychological connection and social motivations are very much needed. Academics in this study were able to motivate their students; thus, based on this finding, it can be said that BL environments expand the motivation and confidence levels of these students.

In stage four (Chapter 7: Articulating BL Principles), academics in this study constructed principles concerning the student community for BL best practice. The first constructed principle was to get students to believe in BL, especially students who are categorised as ‘traditionalists’. In this process academics weighed the importance of students’ belief in their construction about BL principles. This stresses the dynamic role of students’ belief about BL, which is rooted in social-cultural beliefs about BL. Additionally, this construction extended the previous finding of the difficulty in sustaining some students’ motivation and participation, which might give more explanation to this contradiction, in which students’ beliefs might be one explanation of some students’ low motivation in the implementation stage. A conclusion from Hamad’s (2017) study
illustrates that students need to be aware of the advantages of using Blackboard for BL, as some students still believe that the traditional classroom is more practical. Literature on BL within Saudi universities reveals the positive impact of BL on students’ achievement and satisfaction (Al-Hassan & Shukri, 2017; Sajid et al., 2016). However, the findings in this study indicate that without getting students to believe in BL, and paying special attention to certain types of students, BL might not ensure students’ satisfaction.

The second constructed BL principle associated with the student community is motivation to overcome students’ resistance to BL. It is interesting how academics constructed the need to motivate students in BL as being their role as change agents. Thus, it is reasonable to argue that academics develop a sense of the urgent need to provide students with the required motivational support, as they understand its importance to careful transformation. This need might be justifiable when considering the fact that a majority of Saudi students have not experienced a teaching-learning process based on social media or Web 2.0 (Kutbi, 2015). This appears to agree with a study conducted by Al-Hassan and Shukri (2017), which emphasises “the importance of empowering students’ attitude towards using technology in learning and independent learning to help them improve their study skills” (p. 200). Although academics strongly constructed the need to motivate students to participate in BL-based activities, they also constructed how BL transforms students’ motivation to learn, in which students’ engagement and participation in both F2F and online discussion was a surprising factor to them. Hamdan (2014) raised that academics who participated in her study directed that BL and online learning had motivated and engaged their students; surprisingly this was not expected for them, and they attributed such motivation to the maturity that came with being responsible and independent leaners. Dunn (2013) agrees, concluding that the implementation of social media increases learners’ motivation, commitment, teamwork, interaction, and the sharing of information. Accordingly, this finding gives an implication that Saudi academics must consider ways of motivating students to accept the change of BL and therefore obtain a fruitful outcome from BL.

Thirdly, providing students with well-structured guidance through the process of BL-mediated pedagogy is constructed as a vital principle for successful BL. This construction reflects a contradictory view about students’ technological skills in the analysis and design stages. Wherein students are constructed as a barrier due to their lack of technological skills. Yet, in the implementation and principle articulation stages academics shift this view and form a new belief that students are technologically ready, but they require social support such as clear instructions and peer support. This appears to be in line with Al-Zahrani (2015) study, which aimed to investigate how Flipped Learning impacted on Saudi students’ critical thinking. He recommended as an instructional design principle that the objectives must be clear for students before the implementation. Also, he relates the fact that some students could hesitate to undertake such a change. A study by Bazelaïs and Doleck (2018) concludes that, “the implementation of a well-designed BL approach can be highly successful and can have a positive impact on both the quality of instruction and students’ learning outcome” (p. 83). Essentially, peer social presence, such as building dynamics in the classroom, is powerfully connected to students’ learning in a BL environment (Türel, 2016). Thus, it is sensible to claim that academics’ ideology about students’
lack of technological skills is transformed to the recognition that these students need a supportive learning environment with clear instructions. Importantly, academics recognised the importance of dealing with learners’ emotions during the transition process, which seems to be a vital principle that is neglected in BL research. It also appears important for academics to develop well-structured BL guidance before the course starts, to ensure successful BL.

8.3 Academics’ construction of the ‘institutional community of the university’ component in their BL integration activities

In the first stage (Chapter 4: Analysis of Practical Problems) the lack of idealised self-development opportunities and the uncooperative role of technical support are rooted secondary contradictions, in which integrating effective pedagogy is becoming problematic for academics. Such a discrepancy between what they need and what is actually available from the community in their institutions has had the effect of lowering their motivation to use technologies for educational purposes, and it has also had an adverse impact upon their willingness to make a change and take action in this direction. Academics felt that the available workshops are not designed to be the idealised self-development that they need to enable them to make progress towards more effective and powerful teaching. This finding is well-documented in the Saudi context and beyond (Alzahrani, 2017a; Henderson, de Zwart, Lindsay, & Phillips, 2010; Maarop & Embi, 2016; Sheerah & Goodwyn, 2016). Thus, providing effective methods of institutional support that encourage the know-how amongst these academics, in order to obtain their object of delivering desirable technology-led instruction, is an important need. A doctoral thesis By AL-Enazi (2016), which aims to investigate the university support for Saudi academic when adopting (VLEs), agrees that such deficiency in idealised self-development causes a threat to university academics’ success and sustainability. This secondary contradiction affects the nature of these academics’ activities.

Furthermore, the availability of adequate technical assistance unquestionably mitigates the extent of technical troubles that can repeatedly occur, and guarantees a smooth flow of lecture instruction, supported by technology such as projectors and PCs. When assistance is not available, it adds more problems in these academics’ activities. This observation is supported by Nurain, Braima, and Makrami (2015), who sought to examine the obstacles affecting the applicable use of technology in teaching and learning English in one Saudi university. The majority of respondents with (61.2%) emphasised the need of having technical support available to them on location to provide assistance when essential. The results of Al-Sarrani (2010) directed that Saudi academics complain about the lack of technical support, which affects their desire to implement any technological tools in their teaching practices. This result frames the argument that Saudi universities must consider radical changes to professional development opportunities and the level of support provided to academics.

In the second stage (Chapter 5: Design Solutions) a tertiary contradiction developed, wherein the designing of BL is being narrowed by what is perceived as more socio-culturally proper practice, which contradicts academics’ object of accommodating proper BL design. The cause of this
appears to be the consideration of BL with a lack of accuracy about its actual meaning. The academic conception of BL as being limited to the adoption of Learning Management Systems (LMSs) such as Blackboard (Bb) is a result of university policy-makers, who orient their efforts towards Blackboard at the course level, not at the activity level (refer to chapter two for BL-levels). This implies that BL has not been socio-culturally defined correctly, which is supported by Alebaikan (2011), who states that “Blended learning is new to the university environment in Saudi Arabia. The transmission to blended learning requires a clear understanding of this concept including a selected definition, design and rationale for this new environment” (p.7). The accurate understanding of BL is crucial for academics to flourish and undertake their best BL practice; however, Saudi universities need to increase awareness about BL not only as a method to manage the course level, but also to design BL-based activities to obtain different learning outcomes. The lack of a clear plan to shift from traditional methods to a BL approach is considered to be a major obstacle. It is therefore important to use a set of systematic techniques that make technology part of the Saudi educational system (Sheerah & Goodwyn, 2016). Academics need opportunities to develop instructional design and be independent creative thinkers. Positive technology integration like BL hangs on the individual academic’s perception of it (Alebaikan, 2010b; Fresen, 2011). Therefore, it is critical to increase academics’ understanding, knowledge and experience about online-teaching practices through training and professional development. Evidently, establishing a shared meaning around BL that allows more creativity and is sensitive to different needs is a key consideration for Saudi universities.

Moving to put the design into implementation, in stage three (Chapter 6: Implementing BL Design), the previous contradictions shape another dramatic one, where academics experience conflict with sustaining creative BL implementation. This was initiated when academics met a situation where their creativity and efforts came into conflict with the university’s values and policy of technological use. Furthermore, academics found BL implementation requires a demanding level of support throughout the implementation at all levels – emotional, technical, and instructional. Hence, academics struggled to sustain creative BL-implementation where the object of the university’s community activity does not agree with the academics’ more advanced motive-driven object to accommodate BL implementation. This forms a considerable gap between policy and practice, prompting academics to question whether the university vision of e-learning initiatives is really shared by all parties. For example, academics’ attempts to promote initiatives of Web 2.0-based BL instructions (e.g. blogs and YouTube) come into conflict with the university policy of blocking a number of Web 2.0 sites within the university’s network, which limits academics’ creativity implementing BL. Although these self-motivated academics drive their BL integration independently of administrators’ activities, they still experienced challenging events when, for example, some students complained about their use of BL. What upset these academics was administrators’ lack of conceptualisation about BL’s benefits, which extend the argument that the lack of a definition of BL leads to a lack of shared vision about its educational value. Shaabi (2010) states that technology-driven instruction is strictly associated to the administrators’ role. Nevertheless, the policies and procedures that are developed to guide the use of BL should be made obvious by the institution, to raise and deepen the awareness of all employees. However, “some institutions do not have an overall vision or strategy for e-learning;
and if they do, many people are unaware of it” (Gunn, 2010, p. 93). Policymakers generally disregard academics’ concerns when proposing BL change (Ocak, 2011). Yet, in this case Saudi female leaders, as shown in previous research, experienced some barriers within the country’s segregated culture (Abalkhail, 2017), in which inadequate opportunities for engagement in strategic decision-making were available to Saudi female leaders, particularly because of the centralised decision-making opportunities and the narrow powers approved to Saudi female leaders (Abalkhail, 2017). In Kutbi and Hashim (2017), a study surveyed 518 King Abdul-Aziz University (KAU) academics, investigating Saudi academics’ perceptions about the attributes of successful universities and the future learning environment. The first attribute they identified was “appropriate governance (leadership, strategic vision, innovation and flexibility)” (p.101). Similarly, Alshahrani and Ward (2014) argued that the absence of a well-defined plan to shift from a traditional approach to a BL approach is a major barrier for Saudi universities. Al-Zahrani (2014) concludes that “Leadership must articulate a valid technological vision that is relevant to the current era, digital learners, and the rapid technology development around the globe” (p. 8).

Hamdan (2014) notes that in Saudi higher education there appears to be an overall agreement by policy-makers and stakeholders that LMSs are going to form the future of education in Saudi Arabia; as a result, the need for innovative pedagogies such as problem-based learning and innovative technological tools is neglected. This result indicates that the institutional strategic planning for BL must be extended to take a more accurate vision and move beyond course-based BL administered through LMSs (Blackboard) and promote more activity-level BL that enables more pedagogical, non-traditional approaches, giving academics the opportunity to practice their creativity. This includes giving women more opportunities to be involved in the strategic planning and decision-making to eliminate this organisational barrier.

Implementing BL requires ongoing support. The kind of support constructed in this stage is different from the technical support identified in the ‘analysis of practical problems’ stage, where academics’ need is not limited to fixing a technical problem in a lecture room. They faced a situation where their driven-motive object of implementing BL contradicts the university object, in which they need to be emotionally, technologically and pedagogically supported to adopt creative-BL activities. The available support clearly orients to Blackboard and its users, especially to distance users, which contradicts academics’ creative implementation of BL. This leads to the argument that ‘support’ is the missing institutional key success factor during the BL integration process. Hamdan (2014) agrees that one of the main challenges highlighted is the lack of training and ongoing support for faculty while they teach. In organisational change terms, the success of BL initiatives depends on a robust relationship between institutional support and its power to motivate academic staffs’ participation (Bacow, Bowen, Guthrie, Long, & Lack, 2012).

In stage four (Chapter 7: Articulating BL Principles), the aggravations of the abovementioned systemic contradictions drive the academics to construct the need for coherent professional development as the main principle for successful BL. Saudi academics consider professional development as a coherent system where training, support, and channels of communication between BL practitioners all come together; its absence is the main gap for Saudi academics driving constructive BL-based practice.
The construction of training as the main principle is widely agreed in previous studies; (Nurain et al., 2015), assert that academics are driven to initiate technology-integration in their teaching practices but are not supported with enough training to facilitate the know-how needed to successfully achieve technology-integration in their teaching. This agrees with Quadri, Muhammed, Sanober, Qureshi, and Shah (2017) study, which identifies “Lack of Training in E-Learning” (p. 103) as the main significant obstacle for Saudi academics. Similarly, Ageel (2011) discloses that the majority of Saudi academics in a well-known Saudi university admitted that they did not use any ICT-related teaching; however, they showed willingness to adopt ICT in their teaching when they received effective training. Academics in this study picture the training they require with some conditions. The first condition is that training must be sensitive to different groups of academics; for example, academics aged older than others must be provided with suitable training (extensive training for teachers’ assistants, and slow and easy for older academics). This finding, where professional development must suit different types of instructors, should be a major goal for Saudi universities fulfilling BL (Hamdan, 2014). Alhabeeb and Rowley (2017); Alzahrani (2017a) posit that the need for effective training must be considered by Saudi universities, in which proper training is a compulsory success factor for Saudi higher education to implement e-learning such as BL. Professional development such as training and workshops is crucial to support academics about online instructions; in embracing new pedagogical practices, assessing these new practices, obtaining the vital skills and reconstructing their instructor persona within an online teaching. Another condition constructed as a need for effective training is the quality workshop, to fulfil the need of academics and make a difference in their practices.

This finding adds a new insight to already established arguments in previous studies because although training is constructed as the first institutional principle, it has been claimed that training is not enough alone. Support, however, is seen as a serious complement that must follow effective training, in which receiving support when it is needed is constructed in this study as the mechanism of successful change. This study concurs with previous findings Hamdan (2014), which conclude that support in enhancing Saudi academics’ technological competence and pedagogical means is much needed for implementing BL. Furthermore, this result is confirmed in a number of studies (AbdulCalder, 2015; Ageel, 2011; Albalawi, 2007; Alebaikan, 2010b), which conclude that sustaining best practice in the implementation of technology in higher education is conditioned by the ability of leadership to support students and teachers on the technology available with effective workshops being at the top of the list of required institutional support: “Faculty members who lack institutional support struggle with the technical details of blended courses” (Ocak, 2011, p. 690).

Moreover, in the final stage academics discussed the importance of togetherness, sharing experiences on a regular basis amongst BL-interested academics; they believe it is the university’s responsibility to facilitate the mechanism of such togetherness. This is consistent with Alnassar and Dow (2013), who found that these activities at the department level may support the development of teaching communities that enables more negotiation about superior conducts of doing things. Institutional alignment and regular dialogue between these stakeholders is critical in affecting institutional change towards enhanced BL (Moskal et al., 2013). Effective
implementation of technology in BL courses requires administrators and instructors to collaborate (Donnelly, 2010). Administrators should consider instructors’ experiences with BL and attitudes and beliefs about the use of technology when developing training programs on the usage of technology for teaching and learning (Donnelly, 2010). Additionally, a study by Trust and Horrocks (2017) indicates that involvement in a blended community of practice provides evolution opportunities, in which participants can grow as professionals within several areas. This stress on the need for collective efforts for BL to grow in Saudi universities by empowering the formulation of a BL-community amongst academics is valuable to consider.

8.4 The construction of tool-mediated BL integration instruction

In the first stage (Chapter 4: Analysis of Practical Problems), repetitive problems associated with lecture rooms were central to the lack of effective practice. As a result of repetitive problems related to the quality and availability of well-equipped lecture rooms, these academics stated many scenarios from their daily teaching activities including unmovable furniture, a lack of Internet access and blocked sites, faulty computers or projectors, and computers requiring anti-virus software resulting in computers being affected by viruses and malware. The insufficient supply or availability of tools seems to affect other aspects of the lecturers’ teaching performance and overall expectations. Thus, academics are facing an anxious situation in trying to align themselves and their vision of education with a not-ideal learning environment. Alhabeeb and Rowley (2017) support the view that technical infrastructure involving LMSs, networking, communication tools, and other facilities are critical to the success of integrating technology, and can be achieved through committing a adequate provision of human and financial resources. Yearly, universities in Saudi Arabia devote millions to enhance the availability of ICT; however, this spending does not achieve sufficient enhancement in the usage of ICT (Alturise et al., 2016). Different pedagogical methods necessitate different styles of learning environment. Thus, to effectively exchange between different collaborative learning styles, the mobility of learning environment furniture, e.g. desks, chairs, etc. must be ensured, as restructuring of the classroom setting is essential: “The physical set up of the classroom; the indoor environmental quality, the instructional equipment and technology and the emerging teaching/learning pedagogies are the four major influential factors affecting student performance, learning and teaching styles in the classroom” (Mohammed & Abdou, 2016, p. 30).

Another contradiction that emerged during this stage is that academics experienced insufficient technological pedagogical knowledge (TPACK), which affected their actions towards the desired objective of technology best-practice. These discourses constructed the lack of knowledge amongst the academics generally pertaining to the different types of technologies, and about their hope to be able to integrate these technologies as educational tools to promote active learning activities. In this situation, WhatsApp is placed at the centre of their discourses as an educational tool to communicate with their students. This agrees with a study from Aifan (2015) in King Abdul-Aziz University to understand attitudes toward the use of social media, in which WhatsApp was found to be the dominant social media tool used in this context. However, it would appear that WhatsApp is not designed to deliver active learning activities; rather it seems to be used as a
means of creating communication channels. These academics expressed the realisation that the problem of being unable to integrate technology into their teaching such as BL could not be solved in isolation, but at the same time they saw it as being the way ahead. This impossibility is repetitively expressed in an elaboration of appreciative language about participation in the research as it is seen as a source to fill the gap of knowledge that exists. Academics constructed insufficient TPACK, which disturbed their actions towards the desired object of technology best-practice. Evidently, there has been a need for professionals who are motivated and armed with the required knowledge to respond to the ever-changing demands of higher education. Understanding an academic’s motivation towards their decisions within teaching, including their pedagogy and technology choices and practices, is an important contributor to value-creation within higher education (Hardré & Cox, 2009). This implies that the institutionally-required support is not limited to technical support, but also for reducing academics’ apprehensions regarding pedagogical and professional matters. Furthermore, encouraging the creativity of thinking about education beyond the current traditional approach is another important implication of such findings (Smith & Abouammoh, 2013b). This confined view of traditional teaching practices limits their TPACK in terms of innovative teaching alternatives (Alnassar & Dow, 2013). Obviously, what is required in Saudi higher education is the expenditure on a variety of teaching, learning and assessment methods that are adapted to meet the needs of each individual student and each component of the curriculum. This finding stresses the importance of introducing BL to these academics.

In the second stage (Chapter 5: Design Solutions), the previous contradiction about academics experiencing insufficient instructional design knowledge is aggregated and forms another tertiary contradiction, when academics are constrained by inaccurate conceptualisation of instructional design. Academics faced difficulty developing suitable BL-related learning objectives. This is supported by Alhabeeb and Rowley (2017) quantitative findings, which stress that instructional design knowledge is a key success factor, particularly concerning the learning objectives. Additionally, critical thinking is not fostered or encouraged in Saudi Arabia (Allamnakhrah, 2013). Saudi academics thus need to develop extra pedagogical and instructional designs skills to implement effective BL (Alebaikan, 2010b). This finding further stresses the finding in stage one that academics lack the required knowledge to develop suitable learning objectives for BL. BL’s suitable learning objectives clash with both the old-curriculum learning objectives, and academics’ insufficient pedagogical and technological knowledge. This is further emphasised in Hamdan (2014), which observes that training is usually offered with attention to technology but limited attention to the pedagogical methods of teaching and learning. Thus, Saudi decision-makers need to increase the focus beyond technology, promoting instructional design knowledge and providing well-defined meaning about what learning objectives are.

In stage three (Chapter 6: Implementing BL Design), a number of contradictions have originated when BL and its non-traditional methods and technological tools are implemented as a new pedagogical artefact. Academics struggle to deal with the technical aspects of BL. The technicality of BL contradicts academics’ motivation to implement BL. A similar finding is drawn from Pusuluri,
Mahasneh, and Alsayer (2017), which reported that the technicality of Blackboard creates difficulties for Saudi academics. Additionally, Al-Sarrani (2010) has warned that a lack of IT skills among lecturers is a major problem in the transition to a BL approach in Saudi Arabia. In other words, unskilled teachers who have not been trained to use computers and the Internet, for example, might create a lack of enthusiasm among students for their teaching in a BL context (Sheerah & Goodwyn, 2016). The rational reason for academics’ resistance to teach online is the lack of pedagogical, and technological understanding (Bates, Bates, & Sangra, 2011). Regardless of discipline, the move from F-2-F to online teaching requires novel roles and skills for academics, (Adnan, 2018). To accomplish these novel roles, academics must integrate new pedagogical methods, evaluate their novel roles and advance new aptitudes (Baran, Correia, & Thompson, 2011). Thus, raising academics’ responsiveness and knowledge about pedagogical understanding, and what roles BL requires through robust professional development training is essential (Adnan, 2018).

8.4.1. Course-based BL: building an online community and the implementation of Virtual Learning Environments (VLEs)

Academics’ discourses about their experiences utilising (VLEs) indicate the transformation in the tools’ effective usage, showing it was difficult at the beginning of implementation, but gradually as their knowledge and competence is expanding the situation has changed. The most desired outcome achieved is the creation of an online community, creating greater connectedness between students and instructors. However, academics construct that to follow-up on each student’s participation demands more time and effort, especially in large classes. This is agreed with by Sajid et al. (2016), as controlling a large number of students in discussion boards involves management challenges for Saudi academics. Academics need to understand that their online presence is equally important to their F2F presence, as a teacher’s presence is a success factor in promoting course-blending models. Academics in this study construct that maintaining online presence is demanding and required effort to master the skill of being online to mentor students’ participation. Further, it was demanding to develop an e-content and resource repository, especially at the beginning of the implementation. VLE tools within BL provide the chance for effective teacher-student interaction and communication outside of the lecture room and improved feedback provision. Although academics appreciate that various VLE tools enhanced communication, feedback and creativity compared with what they used to do traditionally, they were constrained dealing with VLEs as a new tool because of technical problems and students’ acceptance and access to these VLEs in the university through the university networks (despite the case of Blackboard being supported by the university). Notably, Bb in this study seems promising as a BL tool for academics to develop their interactive experience.

8.4.2. BL-based activity: the implementation of Flipped Learning (FL) instruction

The implementation of FL approach in this study was a successful experience that transformed academics’ and students’ attitudes towards BL. A number of studies have recounted similar
findings about the success of Flipped Learning in Saudi higher education, including (Al-Zahrani, 2015; Fattah, 2017; Sajid et al., 2016), namely that in FL, passive traditional lecturing practice is substituted with an active student-centred learning practice that enables students’ critical thinking, which in return enhances students’ motivation and participation in F2F interaction. This aligns with the need academics expressed in the first stage, where they were looking at how to solve these problems. However, video creation and pre-materials were difficult to prepare, especially for Arabic content where resources are not as readily available. Thus, academics teaching in the Arabic language faced more challenges developing FL experiences for their students. Another contradiction that impacted the smooth application of this approach was Internet accessibility within the university network; a number of websites were blocked and academics needed to gain permission from IT to make them accessible. This result was in line with Albalawi (2018): “The University must pay more attention to the infrastructure required for flipped classrooms in all courses, given the assistant tools for faculty teaching members” (p. 205). Moreover, obtaining the fruitful outcome of quality F2F interaction from FL requires students’ effective completion of pre-online activities (Al-Zahrani, 2015). The students’ reaction to FL was a surprising factor for academics, who underestimated students’ motivation towards any activity that was not graded. However, as Vockell (2006) observed, students engage with activities that promote their intrinsic motivation despite any kind of rewards apart from satisfaction. FL, in this study, seems to match students’ curiosity, and they were eager to complete the activity despite minor cases where some students for various reasons caused some negativity. Similar negative student behaviour in FL was found in Al-Zahrani (2015), who suggested that careful planning of FL that considers students’ study load is essential to ensure students’ completion of online activities. Also, academics tend to visualise FL by making technological tools more important than the pedagogy behind it. For example, A1 was able to make a simple FL activity in the course VLE; however, she undervalued its effectiveness and her thinking was oriented to more sophisticated tools although they would not add any more pedagogical value. This might be explained from the fact that these academics are still developing knowledge about the best practices of BL in general and FL in particular.

8.4.3. BL-based activity: the implementation of Case-Based Learning (CBL)

During the implementation of CBL activity, although academics criticised some of the student-driven cases as poorly structured (they felt these students were not motivated towards this particular activity), they found most of these cases promoted discussion in the lecture time and encouraged students to be active, especially in asking questions. A similar outcome was found by Latif (2014); CBL influenced effective pedagogical practice compared to traditional teaching for Saudi students. Besides, CBL promotes critical thinking amongst students and interactive group discussion (Lei et al., 2016; Nkhoma et al., 2017). This is evident in this study wherein students’ creativity, evaluation and critical thinking skills are practiced. Nevertheless, it seems that different technological tools could lead to different outcomes. Students’ reaction to a Twitter activity in this regard was not accepted by A3. A number of students, although they contributed to the rest of the activity, did not participate in this part of the activity, claiming that either they did
not have a Twitter account, or did not want to contribute using their real names; some of them used their relatives account like their brother’s, for example. A3 constructed that the possible reason was that this activity was only worth 2 marks, so students felt it was not important. This left us with two implications: first, the cultural suitability of Twitter. Sheerah and Goodwyn (2016) agree with this point, observing that “providing culturally suitable online materials, particularly for a country like Saudi Arabia, with a unique culture, is necessary” (p.11). Second, the extent of freedom Saudi female students have to publicly participate in social media applications such as Twitter might explain the weak participation. Miliay (2015) points out that “females are more likely than males to face family restrictions on their use of the Internet” (p. 3309).

8.4.4. BL-based activity: the implementation of Project-Based Learning (PBL)

It is constructed within academics’ discourses that PBL activities are challenging and require time and effort before, during and after the implementation of PBL. At first the preparation of PBL is challenging academics’ ability to overcome their emotional fears about students’ abilities and to overcome the lack of instructional design to provide students with well-designed activities. Academics implementing this activity repeatedly expressed similar criticism about students’ ability to participate in this kind of activity, which stressed their construction about students’ slow transition to accepting non-traditional pedagogical approaches such as PBL. It seems significant in this regard that academics constructed the problem only at the beginning of the process. This indicates that the shift from traditional to BL requires time and encouragement, particularly where traditional teaching is a rooted culture (Al-Hassan & Shukri, 2017; Alebaikan, 2010a). This reflects the academics’ earlier constructions about being challenged to sustain students’ motivation and managing expectations. However, it is believed to be a normal complaint from academics teaching in the BL approach that some students show less engagement in online-based activities or less motivation in completing the activity (Pérez & Riveros, 2014). It is recommended that students’ views must be changed to achieve the best practice of BL amongst Saudi female learners (Al-Hassan & Shukri, 2017), and institutions must provide seminars about the use of social media, such as these implemented in this study, to increase awareness (Aifan, 2015). Another important conflict is the poor support for Arabic language in some applications, which was not helpful in creating effective end projects; this might contribute to students’ low motivation. Notably, PBL provides a way to change the traditional practice to more creative and active experiences, as all the academics agreed that the majority of the students were highly motivated and especially enjoyed the fact that they were involved in knowledge creation in a creative way using various technological tools. Comparable results were found from a study by Alsamani and Daif-Allah (2016) conducted in Qassim University, which reported that PBL “developed new study habits for learners by promoting self-directed, independent, cooperative learning as well as out-of-classroom learning” (p. 51). Academics experienced another challenging situation in the assessment of students’ activities; although this is applicable for all the activities in this study, it was more pressure and pressing in PBL. The assessment of students’ work in the traditional way was less demanding compared to the new role they have in non-traditional assessment methods, including the use of new rubric-based frameworks that may be beyond the knowledge of these
academics. Although it was challenging to assess students’ projects, academics appreciated the productivity and creativity students put in to these projects and thought these could be reused as needed resources for future practice, which indicate the sustainable possibility these projects could provide.

In stage four (Chapter 7: Articulating BL Principles), academics constructed principles conceptualising BL-mediated pedagogical tools for effective BL practice reflect their need for reliable Internet access, technological tools to be chosen wisely, and development of instructional design knowledge as the main requirements. First; The availability of reliable Internet access is constructed as the number one principle for effective practice of BL. Academics in this research were struggling to connect to the Internet especially in the lecture room, which affected the flow of the lecture. It is “disheartening to see the lack of services being provided to Saudi students, faculty members and administrative staff” (Alturise et al., 2016, p. 767). A finding from a doctoral thesis Alali (2015) that aimed to investigate Saudi academics’ experience with integrating mobile learning into teaching practice was that the lack of Internet access in Saudi universities’ buildings posed a major challenge. The author considered the lack of reliable Internet access as the central cause to explain the lack of effective use of ICT services in some Saudi Arabian universities. This present study confirms the pressing need that “The Saudi community must become aware of the benefits brought by the Internet, particularly in the educational field” (Alzahrani, 2017c, p. 84).

Second tool-principle is the accurate decision-making about what tools to use for effective practice. Constructed principle of choosing BL tools wisely emphasises that some technological tools are more suitable with some pedagogical methods than others; the characteristic features of diverse technological tools strengthen the selection of diverse pedagogical practices and outcomes. As stated by Naveed, Muhammad, Sanober, Qureshi, and Shah (2017), the greatest factor for implementing e-learning effectively is that the tool is “User–Friendly Organized” (p. 175). Academics newly adopting BL are anxious about technology, particularly with regard to choosing appropriate technology amidst the myriad of tools available (Slattery, Ledwith, & Hyland, 2017). Thus, planning and resources are fundamental aspects of effective teaching, requiring time and support to enable these academics to undertake these time-consuming tasks, including preparing and organising materials; this view is supported by (Alnassar & Dow, 2013). Extra time to prepare invokes concerns about any increase in workload, which will add excessive pressure to these academics’ already busy daily schedules. Thus, for a successful BL instruction plan, the process of change must involve training, communication, and enough time to dedicate to implementation.

Third principle is to develop instructional design knowledge for effective practice. This constructed principle by research participants reflects back to their struggles expanding their knowledge to integrate BL in previous stages. The argument that Saudi academics are experts in their specialisation but lack the needed knowledge about education and teaching is supported by (Al-Hattami, Muammar, & Elmahdi, 2013). The results of their study displayed the numerous demand and importance of delivering training programs to improve and elevate academics members’ professional aptitudes in teaching. This highlights the need to incorporate more innovative ideas to improve content, development, and overall practicality of the curriculum. These aspects function negatively in the teaching activities of this study’s academics, as preparing and producing
content is an overarching teaching responsibility that dominates most of their efforts. This finding implies there has been demand for Saudi universities to investigate the factors acting to diminish the building of knowledge amongst Saudi academics; this is well reported in (Ageel, 2011; Anthony & Abdul Cader, 2014; Ezza, 2013).

8.5 The construction of transformative agency of an activity system’s subject in BL organisational change

In the first stage (Chapter 4: Analysis of Practical Problems), participants actively engaged in the activity of analysing the courses and critically identifying the practical problems they usually faced, wherein they experienced participative agency to initiate and drive changes. Transformative agency is defined as “a quality of expansive learning. Learning expansively requires breaking away from the given frame of action and taking the initiative to transform it” (Sannino, Engeström, & Lemos, 2016, p. 603). These academics seem highly aware of the need to actively engage in changing the currently ‘bad’ education, as they describe it. This is in line with positive articulations in other studies of ICT methods in teaching, which have been characterised as a way to describe a professional self in which academics get themselves leading a new movement of teaching (Sasseville, 2004). Smith and Abouammoh (2013a) agree that this rejection of and tendency to move beyond traditional practice causes tension between Saudi academics’ vision and cultural norms, and is one of the major struggles encountered by Saudi academics. These academics show a clear awareness that it is very doubtful that didactic methods of traditional teaching-learning, or these new BL approaches alone, will allow them to pursue that object of change. Thus, there has been a need for radical change in the culture of teaching and learning in Saudi universities, and this is seen as a motivation amongst this research’s participants to take an active role within their sociocultural setting, trying to break the cycle of bad education and pass on suitable knowledge to their students and peers. From these academics’ accounts it is evident that although BL is not fully understood yet, they showed a desire to integrate it as a way to change their teaching practice. To some extent, it can be said that they constructed BL as a challenge, and saw the need to work on one’s self in reaction to that challenge, because BL is represented here as a desire and motive towards change.

The formation of new solutions, concepts, and skills in double stimulation is much more than just a cognitive learning achievement. It is a liberating achievement of agency formation, which gives expansive personal and collective meaning to the associated cognitive and cultural learning contents (Engeström, 2007, p. 374).

Moving to the second stage (Chapter 5: Design Solutions), academics strained to mobilise their transformative agency as presented in the first stage, as they expressed the conflict between enthusiasm of changing pedagogical practice and apprehension of setting the design into practice. It is evident that while these academics recognised the need to form a new transformative object of activity, the absence of cultural acceptance and the lack of accountability to form such a new object creates a hesitant transformative agency. BL as a pedagogical tool of
instruction is not a culturally distributed tool within these academics’ context, and the application of a traditional method of teaching is more historically, socially and culturally situated. Thus, academics were experiencing difficulties in producing satisfying pedagogical practice, which was ruled by the monotony of traditional-based teaching practice. A didactic ‘lecture’ is a fundamentally reflected teaching style in Saudi Arabian universities, wherein academics stand at the front of a normally large class and present information. This method is not deemed effective to deliver the kind of innovative education that the Saudi government is pursuing. Changing the existing didactic model faces difficulties as it is so rooted in the traditional ‘culture’ of higher education teaching within Saudi Arabia (Alnassar & Dow, 2013). Students in Saudi Arabia are accustomed to accepting information from their lecturer and then reproducing the same information during their examination. Such practice does not add to the development of their existing pool of knowledge and does not provide Saudi Arabian students studying overseas with the necessary critical thinking skills to thrive in academic environments. Saudi students are used to memorisation and recitation, in which critical thought is not a part of the educational process (Allamnakhrah, 2013). The traditional university culture challenges the application of BL in Saudi universities.

Moreover, during the design stage (Chapter 5: Design Solutions), academics struggled at sustaining agentive actions when the innovative and responsible role of designing BL and expanding their profession was the challenge. When subjects of the activity are positioned in hard situations, the expressions of transformative agency become more emerged (Haapasaari, Engeström, & Kerosuo, 2016). This challenge faces academics who introduce blended solution design, particularly when dealing with the complex nature of BL. This is also illustrated by Maarop and Embi (2016) in their review of literature, who note that deciding the right blend is a challenge faced by instructors in designing BL. Critically, academics believe designing a balance of instructions between the F2F and online environments is an intimidating duty; Alebaikan & Troudi (2010) mentioned the absence of instructional design framework to be employed as a director, and academics’ inadequate knowledge, as the causal influences for this problem. Faculties need to gain professional skills that help them in taking the best technologies for a given BL course. They also need to learn new teaching skills that support a BL course (Al-Sarrani, 2010). In this case academics’ lack of knowledge causes less active agency, but they admit their willingness to expand such knowledge to be able to achieve their object of designing effective BL. The conclusion of Haron, Abbas, and Rahman (2012) is in line with this: “the introduction of a new technology provides challenges for the academicians. In coping with the challenges, academicians capitalize on their personal or self strength” (p. 179).

In stage three (Chapter 6: Implementing BL Design), academics positioning their new professional agency in relation to their new professional responsibility faced difficulty sustaining commitment implementing BL. Transformative agency is concerned with dealing with the contradictions of an activity system (Haapasaari et al., 2016). Thus, it can be claimed that sustaining commitment implementing BL is a constraint that affects academics’ decision-making when practicing BL. In a BL approach, academics must identify the best practice, and this involves times to gain skills, prepare and implement BL (Maarop & Embi, 2016). The responsibility of academics within the
implementation of non-traditional approaches of pedagogy within a BL environment extends beyond the walls of the lecture room, causing difficulty attaining a balance between traditional lecturing and BL (Strayer, 2012). Academics within BL and its non-traditional pedagogies have undertaken new amounts and modes of responsibilities with a consequent expansion of work hours (Tynan, Ryan, & Lamont-Mills, 2015). In this study, time and workload constraints have weakened academics’ attempts to act as active agents in implementing BL. They strongly frame that professionalism in BL implementation is associated with the ability to be prepared for the challenge.

Moving to stage four (Chapter 7: Articulating BL Principles), in the focus group session academics’ sense of transformative agency was shaped to take a form of transformative agency, in which academics engaged in social activism change for transformative BL practice as a result of self-development. “Transformative agency examines disturbances and contradictions in a local activity and takes actions to transform the activity and its current work practices” (Haapasaari et al., 2016, p. 257). Academics had seen themselves as able to undertake self-directed professional development and deepen their understanding of how technology could be incorporated into their teaching and were able to obtain their motive-driven objects. A similar result supporting this point is found in Hamdan (2014) study; although they have been given limited support from their institutions, Saudi academics have self-taught. Although they have different motives towards taking such a change, all of them were aiming to break down the dominant culture of traditional pedagogy, expressing that motive as a shared, urgent vision. They envisioned innovative patterns in their activity, expanding the object by taking actions in which they understand themselves as BL activists. It is obvious that how academics exercise their agency in developing a sense of professionalism, in which they take inspiration from other external and not culturally well-established tool such as BL, alleviates culturally and historically accommodated tensions. It is also evident from the analysis of the data how academics transform the activity from individual leads to more collective forms of sustainable transformative agency – not only in transforming their own teaching, including engaging students and assembling technological and pedagogical skills, but also in establishing collaborative change initiatives in their departments for future-oriented movements, in which they take actions. “Transformative agency develops the participants’ joint activity by explicating and envisioning new possibilities” (Haapasaari et al., 2016, p. 233). A1’s transformed agency manifested in her discursive construction of initiating change in her department (e.g. converting people), mobilising her profession and experience of BL to other members of her community. A2 expressed transformative agency in her collaboration with her students (pre-service teachers), who transform the object of BL from her lecture setting to school settings where they teach for training purposes. A3 had initiated a new system in her department where she leads the intervention of BL after gaining and shaping knowledge in this research collaboratively with her fellow colleagues. Evidently, it is obvious that the constructed transformative agency has been conditioned by the systemic contradictions, in which individual and collective transformative agency impacted one another. Thus, “issues related to positively enhanced autonomous motivation must be fundamentally considered by leaders, policy-makers and professionals in Saudi higher education settings” (Alghanmi, 2014, p. 105). to unleash the transformative potential of academics’ transformative agency.
Chapter Nine: Conclusion

9.1 Introduction

This conclusion chapter gives an outline of the thesis, what has been achieved and what the thesis contributes to our understanding of blended learning and its implementation. The study aimed to investigate the ways in which Saudi academics construct meaning about BL integration and, as a result, how they construct themselves as agents of change towards BL. At the centre of this sense-making process is how contradictions are discursively constructed as a source of change and development. This chapter discusses some of the concluding comments arising out of these study findings, including implications, recommendations, limitations and suggested directions for future research.

9.2 Summary of the Background and Objectives of the Study

This study stems from the need to conduct more real-world investigation about BL integration in real contexts. It has been claimed that Saudi academics must shift rooted, traditional beliefs about teaching because there is a pressing need to enhance the quality of Saudi higher education. Importantly, the majority of existing research about BL is oriented to discuss the use of LMSs at course level, with little known about how BL can improve the pedagogical practices at activity/learning level by incorporating non-traditional approaches such as CBL. Above all, the lack of researches that examines BL practice from academics’ experiences on a daily basis prevents our understanding of how these academics drive such a change as agents within their socio-cultural environments. Due to the central role of academics in the success of BL, this research aims to understand the discourses of Saudi academics, how they construct their socio-cultural settings, and how they construct themselves as activists of change in this environment. This provides a tool to reveal some of the unseen needs and facts around the transition process from traditional practice to BL practice within Saudi higher education.

9.3 Summary of research methodological approach

This research was designed to understand the transformative experience of BL integration as constructed within Saudi academics’ discourses, examining how contradictions emerged through academics’ discursive practice, through the methodological approaches of CHAT-inspired DBR. Deploying a CHAT-inspired DBR methodology using a social constructivist epistemology allowed richer understanding of Saudi academics’ discourses; namely, the contradictions that affected Saudi academics’ daily activity and how they worked within the contradictions of this discursive climate around traditional teaching and its associated practical problems. The drive of this study was to produce data that would enable understanding of the way Saudi academics talk about BL integration. Due to the different nature of each stage of CHAT-inspired DBR methodology, different methods of data generation were employed. This study reorganises academics as discursive constructs (actors) of the activity, identifying contradictions, dealing with them, and
trying to drive changes. Thus, this study aims to echo the voices of the participant academics through the analytical methods of discursive psychology. This allows richer investigation of academics’ discourses in both talk and text, from different angles.

9.4 Summary of the Study Findings

- **RQ1: How are contradictions concerning practical teaching problems constructed within Saudi academics’ discourses?**

  The first stage (Chapter 4), which comprised reviewing Saudi academics’ activity of analysing practical problems, offered understandings into how participants (the activity subject) were empowered to break down the traditional practices rooted in their daily activity. They were goal-directed by different motives but all of them shared one object: the BL integration change. Academics discursively criticised traditional practice and hoped for more effective pedagogy driven by BL. They were motivated to break down this activity while recognising the community contradictions; academics saw that students’ inadequate preparedness for university-level study was a fundamental element that was responsible for their poor educational achievement. They also observed students’ resistance to group work. Furthermore, they constructed students as having low motivation towards learning in general. The challenges posed by the university community (the inadequate provision of idealised professional development opportunities and technical support) became common themes. Besides the contradictions of available tools (technology, pedagogical knowledge, lack of effective tools and suitable learning environment), academics also expressed awareness of their own self-limitations, expressing contradictory participative agency with a sense of hesitation, given their limited understanding of BL itself at this stage.

- **RQ2: How are contradictions about the designing of BL solutions to practical problems constructed within Saudi academics’ discourses?**

  The second stage (Chapter 5) reviewed Saudi academics’ activity of designing solutions and found they were motivated and active agents in designing new solutions to their practical problems. However, they experienced contradictory evaluations as they expanded their vision about what BL actually is. Academics constructed the object of designing effective BL solutions as being in contradiction with the object of the central activity of the students’ community, in which they constructed a conflicting evaluation between the designed activities and technologically-unskilled students. Academics who were motivated to design BL solutions faced difficulty producing such designs, as BL itself was being socio-culturally narrowed down by what was perceived as more suitable practice. This socio-cultural conceptualisation of BL was driven by the university community’s single-minded focus on the implementation of Blackboard. This object of university technological implementation limited academics’ creativity when designing BL solutions and therefore contradicted the object of the designing activity. For academics expanding their
knowledge on an ongoing basis it was challenging; however, they were inspired by the new knowledge they gained, as the expanding of knowledge itself became a motivating tool, and evidently they were able to achieve a reasonable design solution with innovative new practices, especially regarding reformulating learning objectives where technology and higher order thinking skills are an integral part of the content to be delivered. Although academics showed transformative agency towards new practice and new design becoming a part of their professional sense, such active agents experienced struggles reconciling the sustaining of innovative and responsible roles with their own needs for pressing support, especially the kind that fulfils their emotional and motivational needs.

- **RQ3: How are contradictions emerging as a result of the daily implementation of BL constructed within Saudi academics' discourses?**

The implementation stage (Chapter 6) provided insights into how BL purposefully impacts the learning-teaching process. Implementation of non-traditional approaches and innovative practices moved students’ stance from being passive to performing more active roles in their learning. This manifested in a slow transition from traditional to BL amongst students; this slow transition was constructed by academics as a contradiction between their object of more developed activity and students’ central activity. Academics characterised students’ slow transition as a temporary initial phase driven by students’ emotional reaction to BL, students’ awareness of BL, students’ need for support, and students’ confidence about the technological element of BL. Another challenge BL brought in this activity was overcoming some students’ bad behaviour that contradicted academics’ objects of implementing BL. Moreover, the university community’s orientation towards Blackboard as the university vision of technology integration shaped a tertiary contradiction between the central activity of BL and the academics’ more developed activity. Academics’ motive-driven actions to implement non-traditional approaches contradicted the university’s policy of blocking a number of websites, such as Edublog, YouTube, and Joomag. This created a struggle for academics to sustain motivated and creative BL implementation. Furthermore, another contradiction occurred between the object of the university’s central activity and the object of academics’ more developed activity of implementing BL, when the pressing need for continued support throughout the implementation stage became apparent. Academics’ discourses about new pedagogical tools in their activity disclose a number of primary contradictions: the free version does not allow the full privileges of these tools, the appearance of Arabic languages was unsatisfactory, and some tools required more time to be mastered as there was no clear direction for users. Another primary contradiction is within the subject of the activity, where they experienced frequent contradictory feelings, e.g. happy and sad. And a similar primary contradiction was constructed within the community of students (e.g. BL was both enjoyable and extra pressure). Additionally, a set of secondary contradictions developed between academics’ expectation of implementing non-traditional methods and students’ preference for traditional learning methods, in which some students showed low commitment to the completion of their tasks. Another significant secondary contradiction was that the academics’ knowledge about BL at the beginning of the implementation was less than
required, which affected their motivational status (some words academics used to describe how they felt include “demotivated” and “nightmare”). However, over time they expanded their knowledge, driven by their agentive motive, and the experience was ultimately constructed as enjoyable. Not only that, but their understanding of the role of available technologies shifted as well, from the beginning when they assessed some of the tools as fashionable rather than considering their educational value, to the end they were thrilled by the extent of available technologies. Furthermore, the socio-cultural acceptance of the tools created an obvious contradiction between what academics thought would be acceptable and what some students were prepared to use (e.g. Twitter). Academics working with these contradictions created a tertiary contradiction comprising the general slow pace of transformation and difficulty sustaining motivation; this manifests as a conflict between BL and its more developed object, with pressure on the object of the central activity. Importantly, academics’ agentive motive in performing this role was constructed as being linked to how they perceive their self-professionalism. They strongly believed that only passionate and dedicated academics can be successful in making BL work, despite what tools are available. Furthermore, the implementation of BL extends the responsibility of these academics to no longer be limited to within the lecture-room walls, creating extra pressures. Academics accepted this difficulty because of the benefits they perceived students gained from it.

• **RQ4: How are future design principles of BL constructed within Saudi academics’ discourses?**

The final stage (Chapter 7) reviewed Saudi academics’ discourse around the activity of generating BL principles, focusing on what these academics constructed as the required principles to achieve ideal, flourishing BL practice. The deficiency of professional development opportunities, mentioned during the previous stages, drove academics to construct that without the provision of a systematic, coherent and effective professional development provision, the object of the central activity could contradict the object of future ideal BL. This coherent system desired by academics included effective training, support, and the building up of a community for BL practitioners. Moreover, reflection on the community of students throughout previous stages drove academics to state that a change to students’ mentality was needed to overcome the negativity within this community. To solve this, academics’ discourses turned to getting students to believe in the importance of BL, the need to motivate students to be active in BL, and, importantly, the need to provide students with well-structured support. Lastly, academics reflected on previous stages, starting with the construction of BL tools principles, noting that without the availability of unlimited Internet accessibility, developing accurate decision-making about what tools to use and developing solid instructional design would be difficult, leading the object of the central activity to contradict the object of future-ideal BL activity. Reviewing academics’ sense-making about BL reveals how it has strengthened their professional sense and has changed the way they view themselves as academics. They were empowered to transform the object and change not only their own teaching practice but act to transform other academics to grow BL practice, breaking through to more traditionalist believers around them. This reflects the transformative agency they
gained as a result of the expanding learning they experienced by interacting with the activity system of BL. This shows that bottom-up, individual-led change initiatives can create positive changes.

- **Main RQ: How is the transformative experience of BL integration constructed within Saudi academics’ discourses?**

In Chapter 8, cross-stages synthesis reveals four main discourses around academics’ activities of BL integration as follows;

1- **The students’ community during the transition from traditional to BL**

In the first stage, academics reported struggling to solve pedagogically and socially challenging student situations that lead to the development of a new object for their teaching activity, as they aim to move away from types of activity that have produced the same results for years. Moving to the second stage, academics’ previous negative construction of students as passive actors in their activities made them feel that BL was risky, as they questioned students’ ability and motivation to participate in BL. By the time of the implementation stage, a systematic contradiction in which academics questioned students’ ability became very clear. Students’ negativity, rooted to the object of the central activity, contradicts academics’ more developed object of implementing BL; students’ feelings about the introduction of BL into their learning was constructed as a challenging factor that contradicts academics’ motivation towards such integration. In this stage, although academics faced challenges managing students’ expectations, they recognised the benefit of BL and its promotion of desirable outcomes. However, such outcomes require a psychological and social support system for students to unleash their active, innovative and creative participation in BL. That this system was much-needed became more obvious when academics set to drawing out BL principles. The academics’ constructed that this system needed to increase awareness about BL among students, help them believe in it, drive their motivation and provide well-structured support and guidance.

- **Implications, recommendations and further research about the community of students**

This finding about students’ community implies that BL enables changes to students’ mentality about the nature of learning, promoting active learners; not only that, but it changed the academics’ conception about students’ ability to be active in the BL environment. It is recommended that academics who are looking to integrate BL methods into their teaching consider planning psychological and social support systems for their students as an integral part of providing BL. This leads to a recommendation on future research to investigate the impact of such systems on students’ transition process from traditional to BL.
2- Institutional support within the university’s community during the transition from traditional to BL

In the first stage, the main academics’ discourses around unsupportive university community expresses two main constructs: the lack of idealised professional development opportunities, and lack of technical support. This created a secondary contradiction in academics’ activities, who are empowered to integrate more teaching best-practice. This secondary contradiction formed a tertiary contradiction in the second stage where the object of academics’ designing activity was narrowed down by what was believed to be the most proper socio-cultural practice, in which these objects contradict each other. The university’s extensive orientation towards Blackboard created a lack of awareness about the actual meaning of BL, as the majority of available workshops were built around Bb, and academics believed that the adoption of Bb alone would achieve BL integration, but the educational value of BL is far more than this limitation. Within this limited BL conceptualisation, academics moved the design into practice, where another dramatic contradiction – the object of the university’s central activity – contradicted the object of academics’ advanced motive-driven activity. This reflects the gap between policy and practice where academics realised that they must be involved in the decision-making process about BL. This gap was manifested when academics’ initiatives of promoting Web 2.0-based BL instruction (e.g. Joomag, YouTube, Edublog) contradicted the university’s policy of blocking a number of Web 2.0 websites on the University’s network. Another expressed contradiction was sustaining creative BL implementation in the face of inadequate support through the implementation stage, wherein academics constructed the need for emotional and psychological support, and not only technological and pedagogical. The conclusion is that the generation of coherent policy on BL will be a paradigm shift between the actual and desired institutional support in the subject university.

This need became more obvious by the BL principles articulation stage, where academics constructed the need for provision of training that considers the differences of individuals’ needs. Findings from this study show that in contrast with the limited-effectiveness professional development academics traditionally received before participating in this research, they benefitted from close support from the researcher. During this time they were in charge of what type of knowledge they needed to develop, and closely related it to specific learning outcomes and subject matters designed to fit their needs based on their own vision of education. Thus, they were able to grow their teaching practices and expand their knowledge. As a result, they constructed the need for support as a continuous act throughout the transition process, and an integral element for training. Support that allows them to practice their own creativity and make their own decisions about what instructional designs to integrate, with flexible guidelines and support, can provide more fruitful BL outcomes. Furthermore, the need for a BL community for BL practitioners reflects the need to develop the object of institutional support activity to obtain the ideal future activity of BL integration.

• Implications, recommendations and further research about the university community

Discourses around the university’s community intimate that effective leadership leads to effective BL. Therefore, it is recommended that more professional development opportunities must be
given to Saudi leaders in universities to enhance the awareness of BL. A particular recommendation is to give Saudi women leaders more chances to be involved in the decision-making process of BL. Thus, further research that addresses leadership implications for BL integration could provide more insight into this fundamental matter. Moreover, the strategic planning of BL must be extended to take a more accurate vision, promoting more activity-based BL, and not only course-based BL. This strategic planning of BL must establish a shared meaning, which would allow a socio-culturally accurate understanding about the conceptualisation of BL and move beyond the limited understanding of it. Therefore, research that could provide more insights about how strategic planning of BL integration is generated in Saudi universities should be pursued.

The research findings conclude that a lack of effective self-idealised professional development opportunities is the main discourse that manifests throughout the stages of BL integration as a contradiction that narrates academics’ motivation to provide the best teaching practice. Thus, the central implication for Saudi universities is the need to enhance their professional development programmes. The provision of professional development opportunities as a coherent system is very much needed. This system needs to consider academics’ differences in their relation to BL: firstly, the provision of training should consider the differences of individuals’ needs, ages, and position within the university to allow flexible and individualised BL training to be developed; secondly, support should be a continuous act, throughout the transition process from start to finish. Having close support, decision-making accountability and a voice about what, when and how BL integration is conducted could change the current practice, yet this is ignored in Saudi universities unless it is individually driven by motivated academics. Finally, a BL community is needed for BL practitioners, where these practitioners could find opportunities to expand their knowledge and competence about BL by exchanging with academics around them who share similar needs. There is also a need for more research related to studying the impact of the creation of BL communities amongst Saudi academies. It is recommended that the professional development of BL integration incorporate similar stages to DBR – the analysis of practical problems, the design of solutions, the testing of implementation, and generating principles, with a careful professional development design for each stage where academic development could grow in the right direction.

3- The construction of BL as a new tool during the transition from traditional to BL

In the first stage, academics constructed a contradiction with their learning environments’ physical, technical and technological infrastructure, insufficient technological pedagogical knowledge and the lack of effective technical support, to state how this secondary contradiction creates struggles in their daily teaching activities – the lack of required, effective activity tools contradicts their actual need. Having this contradiction while moving to the second stage, where the BL designing activity challenges previous contradictions, another tertiary contradiction emerged, in which academics – constrained by an inaccurate conceptualisation of instructional design – formulated learning objectives that construct technology, pedagogy and content into one statement, so they could work upon this to achieve such objectives. With some difficulty, they built
accurate knowledge about instructional design and created a comprehensive BL design; and when moving to implementing BL the technicality involved in BL tools slowed down the effective implementation. In addition, academics constructed difficulties relating to the online communities created through VLEs, namely getting used to these online environments at first, the difficulty of tracking students’ online participations and the difficulty of controlling a large number of students. Fundamentally, academics need to be aware that these VLEs are not only resource repositories and that their online presence is as important as their F2F presence. The implementation of non-traditional methods involved a number of challenges but indicated that different tools led to different outcomes. Moreover, it seems that the formation of effective assessment methods could ensure students’ participation; yet during Flipped Learning activities where no grading was involved students showed even greater participation. One possible reason for this is that because it matches students’ curiosity. These methods promote student-centred approaches that come into conflict with the so-called traditionalists in the student community. Thus, there has been some criticism about some students’ behaviour and some students’ work poor quality. Yet, academics constructed a positive change in students’ mentality about learning in the way they showed higher active, creative, and critical thinking skills. Notably, the lack of cultural acceptance of some tools such as Twitter reflects the low freedom some female students have to publicly participate in social media. By the time of articulating BL principles in the final stage, these academics agreed that availability of unlimited Internet accessibility, accurate decision-making about what tools to use for effective practice and being able to develop instructional design knowledge were the main principles required.

- Implication, recommendations and further research about BL as a pedagogical tool in academics’ activities

The findings demonstrates that BL systems have the potential to empower positive change in Saudi higher education, if designed and implemented with proficiency, even with minimal institutional support and a lack of effective infrastructure. Therefore, universities should prioritise the vital role of academics as designers and implementers of successful BL. Furthermore, more studies are needed to explore some other relevant concerns; for instance, studying more current trends and the application of BL in different Saudi settings, with a focus on how cultural acceptance affects technological implementation amongst Saudi female practitioners. Additionally, the need to develop instructional design knowledge to achieve the benefit of BL for Saudi educational practices is one of the key BL principles constructed by academics. The extent of widespread institutional implementation of BL creates a ripple of consequences on how individual academics design BL environments. Therefore, there emerges the necessity to offer academics professional development opportunities on how to produce instructional design plans for BL, particularly to support with their understanding of the new role of teaching with BL. Thus, it is recommended that more studies need to be conducted around the appropriate instructional designs for BL, as this research has emphasised several questions deserving of further study. Furthermore, academics require different skillsets to manage BL activities, and promote student motivation and dynamic participation in BL. Future research is needed to explore the challenges
of implementing BL in Saudi university contexts with more focus on examining how non-traditional pedagogical methods influence the system of teaching and learning in Saudi higher education and elsewhere.

4- The construction of academics’ sense of transformative agency during the transition from traditional to BL

In the first stage, participants criticised the traditional practice of teaching, showing a participative, agentive sense to move away from this practice. Although they constructed a lack of understanding about BL in this stage, they were aware of the problematic contradictions inherent in their activity system, and they demonstrated a desire to take up the challenge of integrating BL. In the design solution stage, the transformative agency of academics was strained; at the same time as they felt motivated to change, they developed apprehensive emotions about what the consequences of this change would carry when the design was implemented. This hesitant agency arose from their concern about students’ acceptance of change and the extent to which they trusted their own ability to drive such change. By the time of implementing BL, the causes of this hesitant agency – ambiguity of students’ reaction and the ambiguity of their accountability sustaining an active role in driving BL change – became more obvious. As a result, they constructed their new sense of transformative agency in relation to their new role performing BL; the demands of such a new role creates a tertiary contradiction in which the object of implementing BL contradicts the pre-activity object of traditional practice. This can be expressed by the view that ‘everything was easier in the previous practice compared with BL’. Academics’ construction in the last stage around articulating BL principles showed their transformative agency, in which they positioned themselves as activists promoting change in their socio-cultural setting as a result of expanding their knowledge. The constructed transformative agency whilst expanding the object of BL resulted from their rejection of the well-rooted traditional practices in their socio-cultural environment. Thus, they developed transformative agency, motivating, encouraging and helping their colleagues, departments, and students to take a step towards BL.

• Implications, recommendations and further research about academics as subjects of the activity who drive change

From analysing the discourses presented around how Saudi academics’ think, feel and deal with BL integration, it is recommended that motivational and psychological support be provided for academics, especially for professional development programme providers. Moreover, more research should be concentrated on academics’ motivation and its impact on their active role. Throughout this study, BL is constructed as a privilege that has added positively to how these academics view their profession. Therefore, the understanding of academics’ self-professionalism constructions might lead to more understanding about BL as a construct in academics’ practices, giving more opportunities to better discuss the case. Furthermore, employing a number of BL non-traditional approaches such as PBL, CBL, and FL allows these academics to practice education differently compared to the traditional way, which affects their transformative agency.
Further research might examine in-depth the connection between these methods and the transformative agency of academics. In addition, it also shows that sharing success stories can promote changes, thus, more research should be conducted through the perspective of discursive psychology as “It studies how psychology is constructed, understood and displayed as people interact in everyday and more institutional situations” (Wiggins & Potter, 2008, p. 73).

9.5 The Study’s Contribution

• Knowledge contribution

This study was envisioned to enrich the presently limited literature on BL integration within Saudi higher education and elsewhere. It has sought to make the following contributions:

Contribution to knowledge about the student community during BL integration: this study provides discourses about academics’ constructions of the students’ community, providing more insights into who students are as challenging actors. In the first stage it seems that academics’ low expectations about students created hesitation about the suitability of the designed ideas for what academics constructed as low-skilled students. In the implementation stage, although some students’ negative behaviour presented challenges and contradictions for academics, the added value of BL was clearly constructed with positivity, in which academics concluded that students’ beliefs, motivation and need for well-structured support were the main BL principles to apply to the students’ community in BL integration activity. Fundamentally, students’ active, innovative and creative participation in BL may rely on the provision of required psychological and social support systems that emphasise the vital role of academics in driving such change. As such, there is a need to educate academics about ways to achieve this when designing BL professional development programmes.

Contribution to knowledge about the university community during BL integration: in the first stage academics experienced a lack of idealised professional development opportunities, with the absence of technical support contradicting academics’ attempts to promote desirable teaching practice. This contradiction affected academics’ ability to sustain innovative BL design. During the implementation stage academics realised the need to be involved in the decision-making process, as they experienced a gap between the university policy and their practice. Academics’ constructions about the need for training, support and being involved in the BL community reveal the importance of these factors to ensuring future-ideal BL activity. Thus, this research opens new horizons for organisational-level learning, and demonstrates the need for more investigation into idealised professional development as a coherent system; for example, further study concerning the impact of providing a BL community on the creation of successful BL.

Contribution to knowledge about tools-activity during BL integration: the first stage revealed that a lack of well-equipped learning environments combined with academics’ lack of technological and pedagogical knowledge to create a contradiction that strengthened the appeal
of traditional practice. In the designing of BL solutions, academics experienced conflicting needs due to the ambiguity of BL. Implementing the design created challenges in getting the students to accept new technological and pedagogical tools, dealing with the limitations of free tools, and importantly, sustaining motivation with the demanding responsibility of BL. Thus, the need for a reliable Internet connection, the ability to choose the right tool wisely, and the need for academics to develop instructional design knowledge were all constructed by academics as key BL tool principles. This study advances the conceptualisation that BL is a critical need for better outcome. Arguably, the implementation of BL occurs with significant limitations of tools and resources; however, positive outcomes are still seen, which provides new insight into the BL context, especially the role of female practitioners.

Contribution to knowledge about academics’ construction of their transformative agency during BL integration: this study is the first investigation of its nature not only in Saudi Arabia, but internationally that acknowledges academics change professionally during the BL integration process. When they analysed practical problems in their teaching, the pressing need to move away from the criticised traditional practice drove them to practice a participative agency for change, although they had not formed a full understanding of BL as a source of change. Then, as they started to understand BL more when designing activities, they displayed some hesitancy. Putting design into practice, academics’ transformative agency was affected by the historical and socio-cultural context (traditional practice) they operated in. As they met with struggles and challenges, they capitalised on their self-motivation, as they could not rely on the minimal support available to them. This became more obvious in the last stage of articulating BL principles, in which they constructed engagement in active socio-cultural change. Academics’ transformative agency manifests in their tendency to change the surroundings of traditional practices around them, which reflects how dealing with contradiction and conflict can promote change. This finding theorises that empowered academic agency leads to expansive learning. This thesis discusses the contradictory voices within academics’ discourse when tension rose. It is a new line of thinking in the discourses about BL that considering academics’ emotions and differences should be a key contribution, and this provides new understanding about the need to rethink professional development opportunities. It has been challenging to discuss the transformative agency especially of Saudi academics during the stages of BL integration because of the lack of relevant literature regarding this matter. Data from this study also indicated academics experienced a change in their identity, but there was only scope for limited discussion within this thesis. Thus, more research is required to investigate how constructed contradictions reflect changes in academics’ identities.

- Methodological Contribution

This study may provide theoretical and practical contributions to the higher education and BL literature. It has extended the existing literature, and by bringing CHAT and DBR together I hope that this study contributes to discussions in the field and to updating following research activity. CHAT-inspired DBR methodology is helpful for understanding the role of BL in identifying living contradictions. There is a high possibility that by taking such a novel approach to the entire real-
world process of BL integration this is one of the first studies that provides the groundwork and space to negotiate how Saudi academics experience the process of BL integration. This systematic qualitative approach methodology allows us to examine the everyday practices and developing situations for academics or the beneficiaries they are being performed upon, generating more discourses about BL. It allows the obtainment of open and flexible data to track the development and creation of contradictions as the activity develops in its socio-cultural environment. While this study has focused on Saudi Arabia, this methodology would be adaptable for any context.

The findings demonstrate the positive role of WhatsApp as a method of data collection, particularly the representation of emotions through the use of emoji as a discursive practice, which is new understanding in discursive psychology analysis. The fact that the vast majority of WhatsApp users are Saudis adds to its value in this context (see Chapter 3). It facilitates the connection between the researcher and practitioners, providing a history of dialogue that is rich with media and emotions. Turning to other methods, the Concept-map provided a helpful means to extract the practical problems in the first stage, where academics were able to demonstrate and negotiate the contradictions, giving a valuable technique to approach needs analysis and understand the contextualised practical problems in a structured method. In the last stage, the use of a Concept-map through CHAT in a focus group session allowed collaborative engagement within the group to articulate BL principles in an engaging landscape that visually characterised the group's ideas as a coherent system.

Approaching discursive devices analysis has not been explored within the BL field. This gives a new distinctive methodological dimension into how these devices are employed to construct fact and extends our understanding lens in discourses around the experience of BL integration. It offers an analytical strategy that explains systems of talking, approaching diverse psychological conceptions and how these conceptions are involved in different socio-cultural actions. It also gives understanding into how contradictions are constructed within psychological matters and social actions that are performed in talk.

9.6 Limitations and challenges conducting this study

The study presented comprehensive findings of academics’ experiences of BL integration throughout a period of time. However, the research does have certain limitations and challenges. The present findings cannot be generalised, as this research generated data from only three female participant academics. Although the three academic participants teach Bachelors, postgraduate diploma and Masters degrees, which provides a broad range, the participants of this study teach selected subjects that are offered on-campus only, which limits generalising the findings to other forms of learning modes. This study was also conducted in only one university. This area demands more research that brings insights from different contexts, which could provide useful comparisons to present different perspectives as well as confirming some of the findings. Moreover, this study was conducted with female academics teaching female students and cannot be generalised to male academics teaching male students. This research closely considers
academics and did not include the direct input of any of the university's policy-makers or students. Thus, future research should include a larger number of participants of both genders from a wider range of contexts.

Notably, although CHAT-inspired DBR methodology provides ample examples of the complexity of BL integration, my role as a mediator, adviser, and/or broker was challenging and enjoyable. Extensive time was invested both by participants and me in analysing, designing, implementing and articulating principles. Although academics were self-motivated, sustaining such motivation was challenging given the demands placed on them by the responsibilities they had. However, I can argue that the kind of role I played in these academics' activities – bridging the activity process and the function of a researcher as an activity-mediator – indicates the need for BL coaching and BL champions, which is ignored in Saudi universities. Another important challenge for conducting similar studies within a Saudi context is the apparent lack of understanding about qualitative research – what it is and what it requires. I was required to educate the participants about what I meant by different methodological and theoretical perspectives underlying this study.

9.7 Conclusion

There has not been enough research on academics' efforts to teach in a way that transforms their practice and moves beyond rooted traditionalism towards BL. Thus, this study has presented and analysed findings from a CHAT-inspired DBR methodology that yielded important insights into the field of BL integration and provides academics' discourses about the frequently expressed contradictions they encounter. The potential of BL for Saudi higher education to transform teaching-learning practices does not seem to have attained a significant uptake, as a number of questions call for further investigation. This study might shed a light on some practical matters related to BL integration in the Saudi higher educational context, yet its main achievement is the identification of systematic contradictions within academics' discursive constructions that provide a platform for further research.
References


Al-Zahrani, A. M. (2014). Challenges and Obstacles to the Effective Integration of Technology: A Qualitative Investigation of the Policymakers Perspective in Saudi Pre-Service Teacher Education.

Al-Zahrani, A. M. (2015a). Challenges and Obstacles to the Effective Integration of Technology: A Qualitative Investigation of the Policymakers Perspective in Saudi Pre-Service Teacher Education.


Albalawi, M. S. (2007). *Critical factors related to the implementation of web-based instruction by higher-education faculty at three universities in the Kingdom of Saudi Arabia*. The University of West Florida.


Alenezi, A. (2012). Faculty members’ perception of e-learning in higher education in the Kingdom of Saudi Arabia(KSA).


Dunn, L. (2013). Teaching in higher education: can social media enhance the learning experience?


Schoonenboom, J. (2014). Using an adapted, task-level technology acceptance model to explain why instructors in higher education intend to use some learning management system tools more than others. Computers & Education, 71, 247-256.


APPENDICES

Appendix 1: participants’ invitation letter

‘It was a dream and it happens’: Saudi academics’ discursive construction of Blended Learning’s integration: CHAT-inspired DBR.

Invitation Letter

I would like to introduce myself and the aims of my project and invite you to take part in this PhD study. I am Sahar Alghanmi a PhD student at the University of Manchester. You are being invited to take part in this research entitled ‘It was a dream and it happens’: Saudi academics’ discursive construction of Blended Learning’s integration: CHAT-inspired DBR. The overall aim of the research is to understand Saudi Academic blended practice and how these academics practice and experience the integration of blended learning and Web2.0 technologies into their teaching practice, Identify factors that govern the success of integrating blended learning in Saudi higher education and highlight the future direction for effective use of blended learning in Saudi higher education.

I would like to invite you to participate in this study because your professional experience as a lecturer is critical to my research. Before you decide it is important for you to understand why the research is being done and what it will involve. Therefore, Please make sure you read the information sheet and ask if there is anything that is not clear or if you would like more information. Take time to decide whether or not you wish to take part. If you are happy to participate, then please reply this email to me and then sign the consent form. Thank you for reading this.

Many thanks
Sahar Salem Alghanmi
PhD student
School of Education
University of Manchester, United Kingdom
Sahar.alghanmi@postgrad.manchester.ac.uk
Appendix 2: participants’ consent form

'It was a dream and it happens': Saudi academics’ discursive construction of Blended Learning’s integration: CHAT-inspired DBR.

Participant Information Sheet

You are being invited to take part in a research study of a student’s study towards a PhD degree. Before you decide it is important for you to understand why the research is being done and what it will involve. Please take time to read the following information carefully and discuss it with others if you wish. Please ask if there is anything that is not clear or if you would like more information. Take time to decide whether or not you wish to take part. Thank you for reading this.

Who will conduct the research?

My name is Sahar Alghanmi, I am a PhD student at the University of Manchester, School of Environment, Education and development. I am currently in the process of conducting fieldwork to collect the essential data for my PhD study.

Title of the Research

This study is entitled “‘It was a dream and it happens’: Saudi academics’ discursive construction of Blended Learning’s integration: CHAT-inspired DBR.”

What is the aim of the research?

There has been a need to change the rooted traditional beliefs amongst Saudi academic, inseparability with the urge needs to enhance the quality of teaching, learning and assessment in Saudi higher education. Therefore, the integration of blended learning as a catalyst of change is an essential requirement. Given the need to study academic blended practice in the real setting, this study, thereby will, focuses on accomplish in-depth understanding of “blended learning integration” phenomenon; where the focus on the lecturers’ practices and experiences.

Why have I been chosen?

The objective of this research is to explore the integration of blended learning into Saudi higher education and thereby create a sustainable blended learning environment. Towards this purpose I will collect data from Saudi lecturers who teaching in Saudi higher education. Therefore, I would like to invite you to participate in this study because your professional experience as a lecturer is critical to my research.

What would I be asked to do if I took part?

The participant in this study will be asked to participate in the process of analysing, designing, developing, implementing, and evaluating a solution for her own course problems in collaboration with the researcher. During these stages number of methods of data generation will be employed; in-depth interview (one hour duration for each), and all interviews will be recorded. If you do decide to take part you will be given this information sheet to keep and asked to sign a consent
form. Photography of research stages developments, timeline reflection, focus group with her students, observation will be conducted too.

What happens to the data collected?

All the tapes and field notes will be stored securely in a locked drawer and accessed by the researcher only until they are used to set out the conclusions of the study, and will then be deleted. The analysis also will take place in a private study area, so that no one else will be able to hear the interview or access the data collected.

How is confidentiality maintained?

The confidentiality and anonymity of the participant will be protected; the name will be substituted; the tapes and transcriptions of the interviews and all field notes and identifying information such as signed consent will be stored in a locked place at my home.

What happens if I do not want to take part or if I change my mind?

Your participation will be on a voluntary basis. However, if you decide to take part you are still free to withdraw at any time without giving a reason.

What is the duration of the research?

The entire duration will be for three years in different stages.

Where will the research be conducted?

The research will contact in Saudi Arabian university

Will the outcomes of the research be published?

I plan to publish the outcomes of the study but make sure that your identity will be protected; the name will be substituted with pseudonym in order to keep your confidentiality and anonymity. As I plan to publish from the data and may take some quotations from it; so you have the right to review transcripts of interviews to correct any points in discussion if you so wish.

Contact for further information

My contact details are at the end of this information sheet if you require further information; or if as a potential participant you want to discuss the research, or want to offer advice.

What if something goes wrong?

At any stage of your participation, if you wish to make a formal complaint about the conduct of the study you should contact:

Head of the Research Office,
Christie Building, University of Manchester,
Oxford Road, Manchester, M13 9PL.
Email: Research-Governance@manchester.ac.uk,
Telephone: 0161 275 7583 or 275 8093
'It was a dream and it happens': Saudi academics’ discursive construction of Blended Learning’s integration: CHAT-inspired DBR.

CONSENT FORM

If you are happy to participate, please complete and sign the consent form below

1. I confirm that I have read the attached information sheet on the above study and have had the opportunity to consider the information and ask questions and had these answered satisfactorily.

2. I understand that my participation in the study is voluntary and that I am free to withdraw at any time without giving a reason.

3. I understand that the interviews will be audio/video-recorded

4. I agree to the use of anonymous quotes

5. I agree that any data collected may be published in anonymous form in academic books or journals.

I agree to take part in the above project

Name of participant __________________________ Date ________________ Signature _______________________

Name of person taking consent __________________________ Date ________________ Signature _______________________

________________________________________________________________________

________________________________________________________________________
Appendix 3: timeline of the research data collection

<table>
<thead>
<tr>
<th>stages</th>
<th>Academic 1</th>
<th>Academic 2</th>
<th>Academic 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stage 1</td>
<td>Analysis of practical problems by researcher and practitioners, in collaboration</td>
<td>Observations</td>
<td>Concept map of need analysis</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Observations</td>
<td>Concept map of need analysis</td>
<td>Concept map of need analysis</td>
</tr>
<tr>
<td></td>
<td>Concept map of need analysis</td>
<td>Concept map of need analysis</td>
<td>Concept map of need analysis</td>
</tr>
<tr>
<td></td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Stage 2</td>
<td>Development of solutions informed by existing design principles and technological innovation</td>
<td>Recall stimulus responses</td>
<td>Recall stimulus responses</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Recall stimulus responses</td>
<td>Recall stimulus responses</td>
<td>Recall stimulus responses</td>
</tr>
<tr>
<td></td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Academic’s reflection</td>
<td>Academic’s reflection</td>
<td>Academic’s reflection</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Academic’s reflection</td>
<td>Academic’s reflection</td>
<td>Academic’s reflection</td>
</tr>
<tr>
<td></td>
<td>WhatsApp conversation</td>
<td>WhatsApp conversation</td>
<td>WhatsApp conversation</td>
</tr>
<tr>
<td>Stage 3</td>
<td>Testing and refinement of solutions in practice</td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
<td>Semi-structured Interviews</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Observation</td>
<td>Observation</td>
<td>Observation</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>WhatsApp conversation</td>
<td>WhatsApp conversation</td>
<td>WhatsApp conversation</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Photography &amp; Academic’s reflection</td>
<td>Photography &amp; Academic’s reflection</td>
<td>Photography &amp; Academic’s reflection</td>
</tr>
<tr>
<td>Stage 4</td>
<td>Reflection to produce design principle and enhance solution implementation</td>
<td>Focus group meeting</td>
<td>Semi-structured Interviews (Skype)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Semi-structured Interviews (Skype)</td>
<td>Semi-structured Interviews (Skype)</td>
<td>Semi-structured Interviews (Skype)</td>
</tr>
</tbody>
</table>
Appendix 4: profile of research participants

**Academic 1:** a Linguistics professor in one of Saudi Arabia’s leading universities, who besides her work as an instructor, also works as a head of the accreditation unit in her department. She always refers to herself as a ‘motivator’ who is into creative ideas. She teaches a Master’s level course called ‘Language and Computers’. This course is an introductory course designed to develop three main areas: how to write and present academically, and gain basic skills about qualitative and quantitative research. The course takes place over three consecutive hours once a week. There are a small number of students that attend the course, all of whom are aged between 22 and 30 years old. These students are different in many aspects: their IT skills, and their English proficiency, even their culture, as they are from different parts of Saudi Arabia. The professor used to teach this course in a very traditional manner in previous years. She has lived the majority of her life outside the Saudi context in English speaking countries (The United Kingdom and the United States of America). She also has experience of teaching in both private and government universities.

**Academic 2:** A senior doctor who teaches general methods of teaching for a higher educational diploma course in one of the main Saudi universities. The general aim of this course is to prepare future teachers to become qualified by acquiring the essential skills and knowledge to apply different teaching strategies and to be able to analyse, plan and prepare effective pedagogy for their students. She teaches over 200 students, divided into 4 groups who all come from different parts of Saudi Arabia, holding different degree disciplines, and some of them are disabled students. Every lecture would last for a duration of three hours over a four-month period. The assessment of the course is based on a mid-term and final exam. She has a PhD from Saudi Arabia, and has thus gained all her qualifications through the Saudi system. She refers to herself as being unsatisfied with the context she teaches in, which makes her detach herself from that context.

**Academic 3:** Teaches an undergraduate psychological criminology course in one of Saudi Arabia’s well-known universities. She always describes herself as a novice instructor who has less teaching experience, but has a great passion about teaching. Her subject was taught to two classes of students, twice a week per class, one group consisting of 54 students, with the other consisting of 75 students. The key learning outcome of the course as described by Academic 3 is to ‘know the reasons and motives of crimes in the community and try to develop solutions’. The course is designed to be taught traditionally, and as a result, there are many practical problems affecting her teaching practice.
Appendix 5: Lists of discursive devices


Empathy

*Description:* Empathy involves attempting to make an action acceptable by showing one’s feelings for others; see Fairclough’s discussion (1992) of the genre of counselling, which includes empathising in a patient–doctor context.

*Example:* “But I still take your point. I can understand what you mean there.”

Disclaimer

*Description:* Disclaimers are prospective linguistic strategies for deflecting criticism if projected actions backfire and are thus necessarily hypothetical – for example, “If something bad happens, then…” (Hewitt & Stokes, 1975).

*Example:* “There’s going to be some teething problems in going live. I’ll talk to you guys on that.”

Corroboration

*Description:* Speakers may cite others to shore up their explanations or accounts. Here, corroboration is used to signal that the speaker is not sceptical about her audience’s concerns by offering extended forms of acknowledgment tokens. In terms of framing (Goffman, 1974), corroborating the audience’s interpretation (“It will mean more work”) may be an attempt to increase the experiential commensurability and narrative fidelity of the speaker’s account (i.e., make her frame resonate with their personal experiences and cultural values).

*Example:* “You’re thinking, ‘Actually, I’m doing more than, than the consultants are doing, doing more paperwork.’”

Script Formulations

*Description:* Script formulations occur when participants in conversation describe actions and events as scripted (typical or routine) or exceptional. Here it is used as an opposite to extreme case formulations, to make the situation appear routine (see Bourdieu, 1992, on routinisation) – attempting to make something acceptable by arguing that “there is nothing unusual about this practice”, “this kind of stuff happens”, “this is just part of the everyday.”

*Example:* “This is not the first time this has come up”.

Stake Inoculation

*Description:* “The dilemma is that anything that a person (or group) says or does may be discounted as a product of stake or interest” (Potter, 1996, p. 110). Stake inoculation involves denying that stake is relevant or decisive – “I have no stake in this” (Potter, 1996). Stake inoculation also links to the concept of neutralisation, where actors attempt to make something acceptable by externalising responsibility for it, downplaying the role of certain persons, deflecting from potential blame (Bourdieu, 1992).

*Example:* “You know, this is not a Shirley and Becky thing. We’re just here delivering it”.

221
Hedging

**Description:** Hedging refers to linguistic strategies that qualify categorical commitment to a particular argument or cause by expressing caution or uncertainty (Hyland, 1996; Meyer, 1997). In a business example, hedging is employed to display uncertainty about the claims made by a critical and sceptical audience and the managerially-sanctioned script about quality the actor is responsible for disseminating – by hedging her bets and not taking sides. This use of strategic ambiguity (Faber, 2003) enables her to avoid being seen as unsympathetic but without directly corroborating.

*Example:* “I think I’ve got to sit on the fence with this one.”

Stake Confession

**Description:** Stake confession is an attempt to display honesty and disarm potential criticism by admitting the stake, interest, or responsibility one has in the situation: “I have a stake in this” (Potter, 1996). For example, admitting responsibility for dealing with the “problems” vocalised by an audience and expresses commitment to acting upon them.

*Example:* “We can obviously log down these issues.”

Bracketing

**Description:** Bracketing involves fencing off an activity or event so it does not disturb or disrupt the more general, overall frame (the shared meaning around “what is going on here”) (Goffman, 1974). As an example, a range of rhetorical moves are made to bracket off the grievances of the audience and thereby protect the overall legitimacy of the “quality” initiative by portraying the audience’s concerns as (a) false because of the benefits that can be derived, (b) premature because the concerns may never arise when the system is live, (c) unfounded because they are merely “teething” issues, and (d) irrelevant because there are many possible solutions.

*Example:* “So that when audit time comes up, you guys will think – hopefully, you guys – are the ones that are sitting in doing all the, you know, all the paperwork.”

Frame transformation

**Description:** To transform a frame, old meanings and beliefs have to be discredited for new values to be instilled (Goffman, 1974). In this case, the frame “this will mean more work” is recast as “this will save you work.”

*Example:* “So that when audit time comes up, you guys will think – hopefully, you guys – are the ones that are sitting in doing all the, you know, all the paperwork.”

Justification

**Description:** Justifying involves acknowledging responsibility for the situation, but playing down or dismissing its negative features (Scott & Lyman, 1968). For example, acknowledging responsibility for dealing with issues after they go live but suggesting the issues are merely “teething” problems as opposed to major concerns.

*Example:* “I think until you go live…”

Excusing

**Description:** Excusing involves acknowledging the negative features of the situation, but playing down or dismissing responsibility (Scott & Lyman, 1968). For example, seeking to externalise responsibility for a change.

*Example:* “You know, this is not a Shirley and Becky thing.”
Reassuring

*Description:* Reassurance involves the use of discourse to allay doubts and fears, to encourage and hearten, to comfort and soothe. In this case, reassuring involves both acknowledgement of responsibility, corroboration, and empathy. For instance, reassuring an audience that (a) the change could actually benefit them, (b) their concerns are being logged, (c) there are solutions, (d) they will receive support when they go live.

*Example:* “So that when audit time comes up, you guys will think – hopefully, you guys – are the ones that are sitting in doing all the, you know, all the paperwork.”


<table>
<thead>
<tr>
<th>Device name</th>
<th>Description and example function</th>
<th>Examples in talk (bold indicates target feature)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Basic</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pronoun use &amp; footing shifts</td>
<td>Using different pronouns (I, we, you, us, one) can highlight the relationship between the speaker and the account they are providing. Footing shifts refer to the way in which we might speak as the author, animator or principal of the discourse.</td>
<td>I was like, <em>you</em> know when <em>you’re</em> dead upset.</td>
</tr>
<tr>
<td>Assessments/second assessments</td>
<td>Assessments (evaluative) in interaction are often followed by second assessments; these are typically upgraded if they agree with the first assessment. There is a ‘preference structure’ for assessments.</td>
<td>This is <em>nice</em>. Yeah, it’s <em>lovely</em> isn’t it.</td>
</tr>
<tr>
<td>Silences, pauses and hesitations</td>
<td>Silences/pauses can indicate trouble in interaction; if there are too many pauses or too long a gap between speakers.</td>
<td><em>(1.2) vs (0.2)</em> pauses</td>
</tr>
<tr>
<td>Hedging</td>
<td>Hedging talk often precedes a dispreferred second assessment (i.e., a second assessment that disrupts conversational norms); it can also be seen in accounts, and can function to highlight the delicacy of an issue.</td>
<td>*(.hh .) em .( ) and I- (0.2) I’d just moved into..</td>
</tr>
<tr>
<td>Extreme Case Formulations (ECFs)</td>
<td>A phrase or word that is semantically extreme; i.e., invoking the maximal or minimal properties of an object, person or event. Can be used to justify or strengthen an argument, add credibilty and manage one’s identity.</td>
<td>The best friend I ever had.</td>
</tr>
<tr>
<td>Minimisation</td>
<td>Treats the object or account as minimal, often using the terms ‘just’, ‘only’, ‘little’, ‘bit’. Can be used to downplay the significance or importance of something.</td>
<td>It’s just a little something.</td>
</tr>
<tr>
<td>Lists and contrasts</td>
<td>Listing is a regular feature of interaction, and three-part lists add a particular rhetorical strength to an argument. They are often used in political speeches for this reason. Contrasts can be setting up an either/or state of affairs, or contrasting the speaker’s intentions/desires with an alternative ‘reality’. In both cases, they can be used to manage accountability and identities.</td>
<td>They hadn’t bothered coming, or they’d stayed for another drink, or whatever they’ve done. I’d love to be able to do that, but I just can’t.</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>Intermediate</strong></th>
<th>Description and example function</th>
<th>Examples in talk (bold indicates target feature)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Affect displays</td>
<td>Displaying affect (i.e., an emotive or physical state) in interaction is often organised within the unfolding interaction, e.g., immediately preceding or following a particular action in the interaction.</td>
<td>When there is audible sighing, crying or moaning.</td>
</tr>
<tr>
<td>Consensus and corroboration</td>
<td>These are accounts that suggest that many people or everyone agrees with what you are saying (consensus) or that someone else provides an independent witness (corroboration). Both of these are key ways in which people can attend to the factuality of what they are saying, and reduce any sense of their own investment in the account.</td>
<td><em>Everyone</em> who ate it said they liked the cake.... He told me ‘that was the best cake I’ve ever tasted’.</td>
</tr>
<tr>
<td>Detail vs. vagueness</td>
<td>Giving specific details of an event or person vs. being vague or unclear can manage investment (‘stake’) in the account and thus the speaker’s entitlement to tell the account or to be asked questions about it. It can also be used to suggest particular observational skills on the part of the speaker (i.e., their identity as being accurate and observant).</td>
<td>It was quarter to ten last Thursday vs one evening last week.</td>
</tr>
<tr>
<td>Disclaimers</td>
<td>These are inserted statements before the main account to try to mitigate the speaker’s stance on a particular issue. They make visible a particular interpretation of what they are going to say, then explicitly deny this. These often work alongside category membership-type issues (i.e., when a speaker’s identity is being explicitly addressed)</td>
<td><em>I’m not sexist but...</em> I’ve nothing against X but...</td>
</tr>
<tr>
<td>Metaphor</td>
<td>Metaphors can be subtle or more striking, and they can frame an account in a particular way, opening up issues of agency and blame, as well as speaker categories and footing.</td>
<td><em>It was</em> a scene from a horror movie.</td>
</tr>
<tr>
<td>Narrative structure</td>
<td>Presenting an account in a sequential order and within a particular temporal structure; often highlights things that need to be known first. The plausibility of an account can also be increased by embedding the account in a narrative sequence.</td>
<td>By 9 o’clock I’d had enough and went home.</td>
</tr>
<tr>
<td>Reported speech (aka active voicing)</td>
<td>Where speakers report the words or thoughts of others as if they were directly spoken; adds authenticity to an account.</td>
<td>I said, ‘oh do you know what.’</td>
</tr>
<tr>
<td>Script formulations</td>
<td>This is where an account appears as if it is a regular or frequent occurrence (as if scripted, or following a script); can present the account as normal and expected.</td>
<td>She’s always there, she’ll help you out.</td>
</tr>
</tbody>
</table>
List four:

Frames “provide meaning, determine what is relevant and irrelevant when considering certain actors, issues or events, and suggest appropriate behaviour” (Vliegenthart & Van Zoonen, 2011, p. 103).

Rhetorical questions “are examples of utterances whose form does not match their function. They have the structure of a question but the force of an assertion and so are generally defined as questions that neither seek information nor elicit an answer” (Rohde, 2006, p. 134).
Appendix 6: Transcription key

<table>
<thead>
<tr>
<th>Symbol</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>(.)</td>
<td>A micro-pause (less than two-tenths of a second)</td>
</tr>
<tr>
<td>(1.2)</td>
<td>A pause or silence, measured in seconds and tenths of seconds</td>
</tr>
<tr>
<td>=</td>
<td>Latched talk, where there is no hearable gap between words (can occur within a turn at talk, or between speakers)</td>
</tr>
<tr>
<td>::</td>
<td>Stretched sounds in talk; the more colons, the longer the sound, as in really :: ong sounds</td>
</tr>
<tr>
<td>CAPITALS</td>
<td>Talk that is noticeably louder in contrast to the surrounding talk (sometimes shouting)</td>
</tr>
<tr>
<td>Underlined</td>
<td>Emphasised words, or parts of words, are underlined</td>
</tr>
<tr>
<td>°</td>
<td>Degree symbols enclose noticeably “quieter” talk, with double degree signs indicating “whispering”</td>
</tr>
<tr>
<td>&gt; &lt;</td>
<td>‘Greater than’ and ‘less than’ symbols enclose talk that is at a faster pace (&gt;speeded-up&lt; talk) than the surrounding talk</td>
</tr>
<tr>
<td>&lt; &gt;</td>
<td>‘Less than’ and ‘greater than’ symbols enclose talk that is at a slower pace (&lt;slowed down&gt; talk)</td>
</tr>
<tr>
<td>↑ ↓</td>
<td>Upward arrows indicate a rising pitch in talk, downward arrows indicate falling pitch</td>
</tr>
<tr>
<td>£</td>
<td>British pound sign indicates smiley voice or suppressed laughter</td>
</tr>
<tr>
<td>#</td>
<td>Hashtag indicates ‘creaky’ voice such as when someone is upset.</td>
</tr>
<tr>
<td>[]</td>
<td>Square brackets indicate the start (and end) of overlapping talk</td>
</tr>
<tr>
<td>hh</td>
<td>hhs indicate audible breaths. A dot followed by hs (.h) indicate audible inbreaths; without the dot (as in hh) is an outbreath. Within a word (as in ‘yes(h)s’), this indicates laughter while talking (‘interpolated laughter’). The more hs, the longer the breath.</td>
</tr>
<tr>
<td>Huh/heh/hah</td>
<td>Laughter can be represented with outbreaths that have vowel sounds within them.</td>
</tr>
<tr>
<td>?</td>
<td>Strongly rising intonation (not necessarily when asking a question)</td>
</tr>
<tr>
<td>, ,</td>
<td>Commas indicate slightly rising intonation, full-stops indicate falling indication at the end of words</td>
</tr>
<tr>
<td>‘yes’</td>
<td>Single quotation marks are used to indicate reported speech or thought</td>
</tr>
<tr>
<td>(( ))</td>
<td>Double brackets (sometimes without italics) contain details about other features that have not been transcribed, e.g., ((waves hand))</td>
</tr>
<tr>
<td>(Unclear)</td>
<td>Words in single brackets are the transcriber’s best guess at what was being said, or (unclear) or (inaudible) if it really can’t be heard clearly</td>
</tr>
</tbody>
</table>

Appendix 7: Activity system analysis of contradictions

Secondary contradiction
1- Academics’ expectation of students’ ability at university
2- Academics’ value of group work as a valuable pedagogical method
3- Academics’ motivation to achieve desirable educational outcomes

Secondary contradiction
1- Students being inadequately prepared for university level
2- Students’ negative ideology about it
3- Students’ low motivation to learn in traditional

Figure 1: academics struggle solving pedagogical and socially challenging situations while trying to sustain their teaching pedagogical values
Figure 2: academics struggle engaging with an unsupportive community while attempting to move beyond traditional teaching practice.

Secondary contradiction
1- Academics’ need for idealised self-development opportunities and supportive community
2- Academics’ need for effective technical support

Figure 3: academics constrained by ineffective mediated-artefacts while attempting to produce the object of technology best practice.

Secondary contradiction
1- University’s lack of providing effective idealised professional development
2- University’s lack of adequate technical support

Repetitive problems associated with lecture rooms lead to lack of effective preparation. Insufficient technological pedagogical knowledge

Academics who are motivated to obtain technology best-practice

Traditional teaching-based practice

University’s lack of providing effective idealised professional development

Academics who are motivated to obtain technology best-practice

Figure 3: academics constrained by ineffective mediated-artefacts while attempting to produce the object of technology best practice.
Figure 4: Academics are straining maintaining a sense of professional agency within the negative socio-cultural ideology of traditional-based teaching practice.
Figure 5: tertiary contradiction: as academics construct a clearer vision about BL they become unsure about the community of students' ability to actively participate in the designed BL-based activities.
Figure 6: systematic contradiction: the designing of BL is being narrowed by what is perceived as more socio-culturally proper practice, while attempting to accommodate proper BL design.
Figure 7: systematic contradiction: academics struggle to design BL as a new pedagogical tool while facing the pressing need to develop knowledge
Figure 8: contradiction: academics struggle to design BL as a new pedagogical tool while facing the pressing need to develop knowledge.
Central activity: Traditional teaching-learning activity

1- Traditional methods of teaching and learning
2- No technological skills needed

Primary contradiction

Secondary contradiction
1- Students’ community preference of teacher-centred approach
2- Students lack of awareness about non-traditional methods of learning

Tertiary contradiction
1- Students’ slow transition from traditional to BL
2- Difficulty trusting students’ behaviour

Testing and refinement of BL solutions in practice

More developed activity: BL implementation activity

Primary contradiction
1- academics’ value of BL importance vs. students’ value (e.g. students need to understand the value of BL)

Secondary contradiction
1- Students’ lack of technological knowledge, confidence, and skills vs. the requirement to master technological competences

Primary contradiction
1- Students’ pressing need of support
2- Students frequent excusing and late submission of tasks

Secondary contradiction
1- at the beginning students were apprehensive about the idea of BL vs. academics’ attempts to motivate them
2- some students behaviour practicing plagiarism (copy and paste) vs. academics motive to improve higher order of thinking (e.g. critical writing)

Figure 9: contradictions governing the implementation of BL when students’ negativity clashes with academics’ objectives.
Figure 10: Academics struggle to sustain creative BL implementation as staff who need to follow the university policy; academics as self-governing thinkers
Central activity
Traditional teaching and learning activity

More developed activity
Blended learning implementation activity

Primary contradiction
1- Problem with the technicality of tools (push you for upgrade, not clear direction for the users, and the poor appearances of Arabic language)

Secondary contradiction
1- Academics’ knowledge about BL implementation (implementing BL at the beginning (nightmare) vs. when they getting used to it (enjoyable))
2- Academics’ understanding of technological role as a fashion (using sophisticated tools) vs. as a pedagogical tool
3- the socio-cultural acceptance of the tools (e.g. students were different in accepting twitter)
4- Academics were different in making the e-content accessible for students especially the PowerPoint slides

Secondary contradiction
Academics experienced two contradictory values of teaching with BL (e.g. BL allows the application of formative assessment vs. BL requires creation of rubrics for summative assessment that takes time and efforts).
Academics need to be committed to complete activity within time for students (e.g. prepare e-content) vs. the obligation of time to prepare BL materials

Primary contradiction
Students experienced two contradictory values of learning with BL (e.g. enjoyable vs. extra pressure).

Secondary contradiction
Academics’ expectation for students to be committed vs. some students low commitment in completion their tasks

Figure 11: Implementing BL as a new pedagogical tool for teaching and learning
Figure 12: academics positioning their new professional sense in relation to their new professional responsibility

Central activity
Traditional teaching and learning activity

More developed activity
Blended learning implementation activity

Secondary contradiction
1- implementing BL contains two contradictory values good and bad concerning the new professional responsibility (e.g. good and bad, difficult but worth) 
2- effective tools does not ensure success but effective tools combined with academics' beliefs and passionate about BL

Primary contradiction
1- Academics encounter two contradictory values (in traditional teaching everything happens in the classroom vs. BL a continue) 
2- implementing BL vs. other professional and personal goals
3- implementing BL vs. time contains BL needs preparation a lot in advance vs traditional teaching (e.g. only a day before the class)

Secondary contradiction
1- implementing BL as a new tool requires extensive work and dedication (BL is nerve-racking)

Secondary contradiction
1- no e-content needed 
2- no support needed for students

No technical skills required
(Paper and pen) traditional methods of teaching no new teaching methods is required

Testing and refinement of BL solutions in practice

Primary contradiction
1- Academics positioning their new Professional sense in relation to their new professional responsibility in which they faced Difficulty sustaining commitment

Secondary contradiction
1- implementing BL is nerve-racking

Academics

Primary contradiction
Good BL instructors need to be passionate and dedicated vs. definite failure in implementing BL if they are not passionate and dedicated

Secondary contradiction
Students’ educational attainment successful implementation of BL constructed by academics as being linked to their professional responsibility

Academics

Subject
Rule
Community
Division of labour

Tool

Central activity

No technical skills required
(Paper and pen) traditional methods of teaching no new teaching methods is required

Testing and refinement of BL solutions in practice

Primary contradiction
1- no e-content needed 
2- no support needed for students

Secondary contradiction
1- implementing BL contains two contradictory values good and bad concerning the new professional responsibility (e.g. good and bad, difficult but worth) 
2- effective tools does not ensure success but effective tools combined with academics' beliefs and passionate about BL

Secondary contradiction
1- implementing BL as a new tool requires extensive work and dedication (BL is nerve-racking)
Activity of produce design principle of BL-implementation

Secondary contradiction
There is a lack of effective professional development (e.g. training and support).

Future-ideal activity of BL

Tertiary contradiction
The historicity of this secondary contradiction throughout previous stages around students community, leads the academics to consolidate that without change students mentality about BL the object of current practice would contradict the object of future-ideal activity of BL.

Figure 13: principles required in the university community for effective BL practice
Activity of produce design principle of BL-implementation

Future-ideal activity of BL

Secondary contradiction

Students community brought challenges to academics when BL is implemented as a needed change

Tertiary contradiction

The historicity of this secondary contradiction throughout previous stages around students community, leads the academics to consolidate that without change students mentality about BL the object of current practice would contradict the object of future-ideal activity of BL.

Future-ideal activity of BL

1-The need to get students’ belief in the importance of BL
2-The need to motivate students to be active in BL
3-The need to provide students with well-structured support

Academics vision of needed future-ideal BL implementation

Figure 14: constructed principles within the student community for BL best practice
Activity of produce design principle
BL-implementation

Secondary contradiction
1-The need of unlimited access to the Internet around the university.
2-Defficulty making accurate decision-making about what tools to use.
3-Develop instructional design knowledge

Future-ideal activity of BL

Secondary contradiction
1-The availability of unlimited access to the Internet around the university.
2-Accurate decision-making about what tools to use.
3-Develop instructional design knowledge

Figure 15: Constructed principles within artefact-mediated tools for effective BL practice
Activity of produce design principle and enhance solution implementation

Future-ideal activity of BL

Secondary contradiction
Academics who experienced BL-implementation construct that sustaining active agent depends on their ability to overcome any emergence of contradictions.

Tertiary contradiction
Academics motivation towards the object integrating BL, what they believe as best practice, and traditional teaching that is socio-culturally believed as best practice

Secondary contradiction
Academics vision of future-ideal BL implementation manifest on the transformative agency expanding the object of BL, as they view traditional practice is well-rooted in their socio-cultural setting, as they become active agent in changing and developing not only their own practice but also the socio-cultural practice around them, motivating encouraging and helping their colleagues, departments, and students to make active use of BL.

Figure 16: Constructed principles within academics’ sense of professional agency for attaining the object of transformative BL practice.
### Appendix 8: Technological Tools glossary

<table>
<thead>
<tr>
<th>Technological tool</th>
<th>Description</th>
<th>Reference</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Edpuzzle</strong></td>
<td>“Edpuzzle is an assessment tool that allows instructors to upload a video from a computer or find a public video from a video hosting Website. The video editing process in Edpuzzle takes instructors through various steps, from cropping the video to adding a new audio track (which completely replaces the original audio), to adding audio notes (in addition to the original audio track), and adding assessment questions (open ended or multiple choice) or instructor text comments” (p. 82).</td>
<td>Baker, A. (2016). Active Learning with Interactive Videos: Creating student-guided learning materials. <em>Journal of Library &amp; Information Services in Distance Learning</em>, 10(3-4), 79-87.</td>
</tr>
<tr>
<td><strong>Youtube</strong></td>
<td>“YouTube was launched in 2005 as a place where individuals could record and share their own videos without cost (Terantino, 2011; YouTube, 2013). The website is now owned by Google and is viewed daily by millions of individuals across the world. Although much of the content on YouTube is for entertainment purposes, there exists an enormity of educational content. For example, YouTube EDU was created in 2009 as an educational hub for lectures, courses, and examples and is used by professionals and non-</td>
<td>Fleck, B. K., Beckman, L. M., Sterns, J. L., &amp; Hussey, H. D. (2014). YouTube in the classroom: Helpful tips and student perceptions. <em>Journal of Effective Teaching</em>, 14(3), 21-37.</td>
</tr>
<tr>
<td>Tool</td>
<td>Description</td>
<td>Source</td>
</tr>
<tr>
<td>--------------</td>
<td>-------------------------------------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------</td>
</tr>
<tr>
<td>Etherpad</td>
<td>Etherpad is a fully web based solution for creating collaborative content in real time. It does not provide functionalities for uploading or saving documents, but it allows up to 8 people write at the same time on the same article by simply accessing the link of the article, stored on the Etherpad server. Thus, it has a greater portability, allowing people having different operating systems to collaborate. Etherpad is the only authoring tool allowing authors to see in real time the changes made to the document by the other authors, by highlighting text according to the user that changed it. Also, Etherpad keeps the entire history of the documents so that each change made to the document can be undone no matter when it was made.</td>
<td>Apostol, C. G., Mihalca, R., Ion, A. M., &amp; Intorsureanu, I. Comparative Analysis of Collaborative Authoring Tools. E-Learning, 9.</td>
</tr>
<tr>
<td>Twitter</td>
<td>Twitter is an online social networking service accessible from any Internet-capable device. It allows people to connect virtually through microblogging – exchanging 'nuggets' of information in 140 characters or less</td>
<td>Forgie, S. E., Duff, J. P., &amp; Ross, S. (2013). Twelve tips for using Twitter as a learning tool in medical education. Medical Teacher, 35(1), 8-14.</td>
</tr>
<tr>
<td>Padlet</td>
<td>&quot;Padlet (<a href="http://www.padlet.com">www.padlet.com</a>) provides a free, multimedia-friendly wall which can be used to encourage real-time, whole-class participation and assessment. If you have ever led an in-class activity where you have asked students to write ideas on sticky notes and then place their sticky notes on a big piece of paper or wall in order to collect ideas from the whole class, Padlet provides a similar experience online. I have been using it in classes since 2012 when it was known as Wallwisher. Padlet is a useful tool in the information literacy.</td>
<td>Fuchs, B. (2014). The writing is on the wall: Using Padlet for whole-class engagement. LOEX Quarterly, 40(4), 7.</td>
</tr>
<tr>
<td>Tool</td>
<td>Description</td>
<td>Source</td>
</tr>
<tr>
<td>----------</td>
<td>----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
<td>----------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Blackboard</td>
<td>“Blackboard is a Web-based tool that is becoming an important and popular course management software application in higher education. It provides a number of learning tools, including an online discussion board, course content management, a course calendar, information announcement, electronic mail, reviews, auto-marked quizzes and exams, navigation tools, access control, grade maintenance and distribution, student progress tracking” (p. 49).</td>
<td>Marchewka, J. T., &amp; Kostiwa, K. (2007). An application of the UTAUT model for understanding student perceptions using course management software. Communications of the IIMA, 7(2), 10.</td>
</tr>
<tr>
<td>Edublog</td>
<td>“Edublogs is an educational blogging service that allows students and teachers to share materials, download links, and publish their work. It can also host forums and threaded discussions. The free version allows users to write posts and create pages; the advanced versions provide custom domains, allow embedded videos and plug-ins, keep track of visitor statistics, and provide email support. Edublogs is accessible via tablets and phones” (p. 8).</td>
<td>Reigle, R. R. (2015). Web Applications That Promote Learning Communities in Today's Online Classrooms. Online Submission.</td>
</tr>
<tr>
<td>Canvas</td>
<td>“Canvas LMS” is a cloud-based Learning Management system created by the US Instructure company. This platform for learning was created in 2011... it is open-source and flexible when extracting the data.</td>
<td>Fernández, A. R., González, F. S., Merino, P. J. M., &amp; Kloos, C. D. (2017). A Data Collection Experience with Canvas LMS as a Learning Platform.</td>
</tr>
<tr>
<td>Canva</td>
<td>“Canva makes graphic design easy. It can be used to create a book starting from a blank page or an existing layout” (p. 15).</td>
<td>Paganelli, A. (2016). Storytime in a Digital World: Making a Case for Thinking Outside the Book. Knowledge Quest, 44(3), 8-17.</td>
</tr>
<tr>
<td>Tool</td>
<td>Description</td>
<td>Reference</td>
</tr>
<tr>
<td>------------------</td>
<td>-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------</td>
<td>-----------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Piktochart</td>
<td>“Piktochart is a free web application (with premium upgrades available) that allows users to easily create and customize infographics. Suitable for both printed and digital syllabuses, Piktochart provides graphic renditions of your content. Piktochart is most appropriate for shorter syllabuses with less textual information, as it becomes cumbersome to try to include paragraphs of text” (p. 53).</td>
<td>Anderson, L. L., &amp; Lord, G. (2014). It’s in the syllabus. <em>Language</em>, 52.</td>
</tr>
<tr>
<td>Flipsnack</td>
<td>“FlipSnack is a creative tool that could lead many projects and activities. It could be especially helpful when trying to introduce a topic. While this tool only creates books, the teacher or student can create the books on any topic and display it in multiple ways” (p.18).</td>
<td>Snyder, M. (2014). <em>Technology Integration for Educators: The Why and the How.</em></td>
</tr>
<tr>
<td>Whatsapp</td>
<td>“WhatsApp is a cross-platform instant messaging application for smartphones. It enables users to send and receive location information, images, video, audio and text messages in real-time to individuals and groups of friends at no cost. At present WhatsApp handles over 10 billion messages per day and is one of the most popular paid-for apps across all mobile platforms. Given the availability of WhatsApp across multiple mobile platforms and the fact that it has reached a critical mass of users, it provides us with an excellent opportunity to investigate how people really use such applications and how the messaging practices adopted in such services differ from traditional SMS” (p. 352).</td>
<td>Church, K., &amp; De Oliveira, R. (2013, August). What's up with whatsapp?: comparing mobile instant messaging behaviors with traditional SMS. <em>In Proceedings of the 15th international conference on Human-computer interaction with mobile devices and services</em> (352-361). ACM.</td>
</tr>
<tr>
<td>QR generator</td>
<td>“QR (quick response) codes are two dimensional images that when scanned by a smartphone’s camera, prompt the smart phone to open a webpage or display an image, video, or text. QR codes are, therefore, essentially pictographic hyperlinks that can be embedded in the physical environment” (p.16).</td>
<td>Coleman, J. (2011). <em>QR codes: what are they and why should you care?. Kansas Library Association College and University Libraries Section Proceedings</em>, 1(1), 16-23.</td>
</tr>
<tr>
<td><strong>Grammarly</strong></td>
<td>“Grammarly is one such web-based spelling and grammar application. It is available from any browser, with no download required. Grammarly integrates seamlessly with the Microsoft Office Suite, including Word and Outlook” (p.393).</td>
<td>Daniels, P., &amp; Leslie, D. Grammar Software Ready for EFL Writers?.</td>
</tr>
<tr>
<td><strong>ThingLink</strong></td>
<td>ThingLink is a freemium application that allows users to create interactive images. Once an image is uploaded, a very simple and intuitive interface allows the user to add “tags” to the image. Tags are small interactive buttons. Tags can include simple pop-up text and links to Web sites. Tags can also include video and audio from many sources, including YouTube, Vimeo, Vine, SoundCloud and iTunes. Users must create an account with e-mail, Google, Facebook or Twitter. P.4.</td>
<td>Forbes, C. (2014). Free Web-based tools for information literacy instruction. Library Hi Tech News, 31(10), 1-5.</td>
</tr>
<tr>
<td><strong>PowToon</strong></td>
<td>is a free online application that students and instructors can use to upload their own images and sounds to animate them and export them to movie clips. P.6.</td>
<td>Conrad, O. (2015). Community of Inquiry and Video in Higher Education Engaging Students Online (Doctoral dissertation, California State University, Fullerton).</td>
</tr>
</tbody>
</table>
Appendix 9: Researchers’ background information

Conferences contribution

- The International Conference on Innovative Teaching and Technology in Higher Education held at the Kadir Has University, Istanbul, Turkey, during June 2-3 2016. Talk
- Participated in Cambridge conference Implementing Implementation Science Conference 2014. Poster
- Participated in the 7th Saudi scientific conference at Edinburgh. Talk
- Participated in the Cambridge University Kaleidoscope conference in UK. Poster
- Participated in PGR conference in the University of Manchester in UK. Poster
- The 6th international LAMS (learning management systems) learning design conference; learning design for the changing world, in Macquaire university, Sydney, Australia. Attendance

Rewards

- 2013, 2016 I have awarded from Royal Embassy of Saudi Arabia Cultural Bureau in London as a senior student twice.

Training courses

- Attended CHAT: Possible Futures – Advancing Research in Cultural Historical Activity Theory to be held on the 22nd May 2015, Cambridge university, UK.

Workshop presentation

- 2015: Presented a workshop about the integration of blended learning for King Abdul-Aziz University academic staff in Faculty of Arts and Humanities

Publication: